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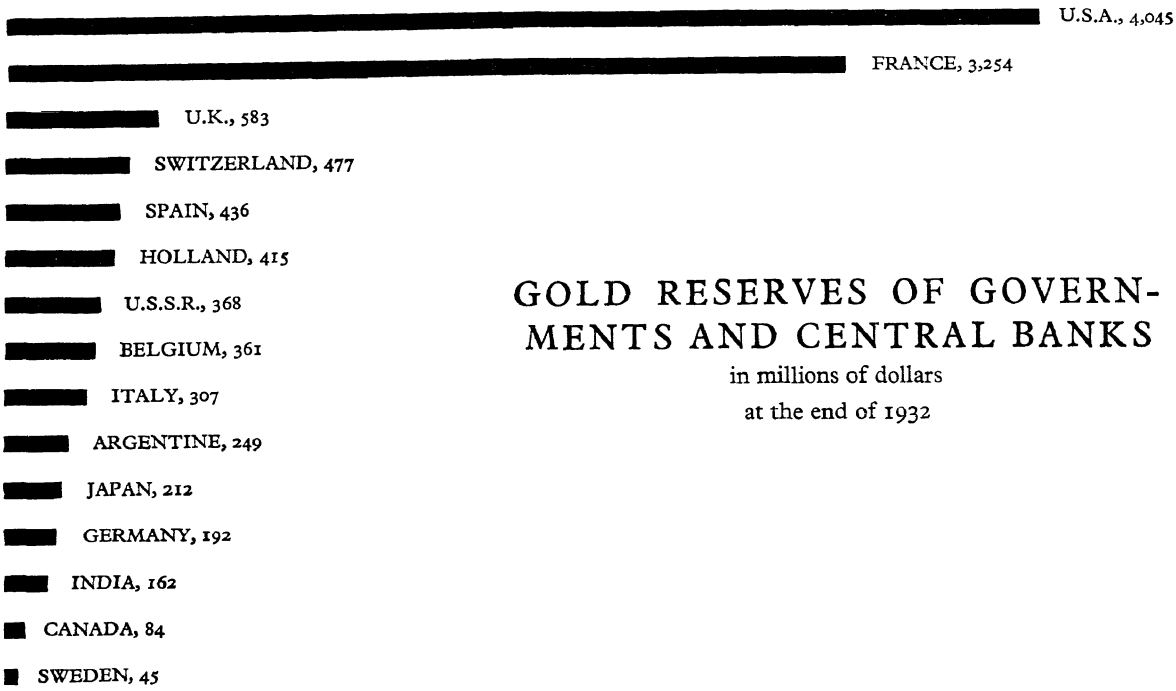
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WHAT EVERYBODY WANTS TO KNOW ABOUT MONEY



GOLD RESERVES OF GOVERNMENTS AND CENTRAL BANKS

in millions of dollars

at the end of 1932

WHAT EVERYBODY WANTS TO KNOW ABOUT MONEY

A PLANNED OUTLINE OF MONETARY PROBLEMS

By

Nine Economists from Oxford

COLIN CLARK
G. D. H. COLE
E. F. M. DURBIN
H. T. N. GAITSKELL
E. L. HARGREAVES
R. F. HARROD
G. R. MITCHISON
E. A. RADICE
AYLMER VALLANCE

Planned and Edited By
G. D. H. COLE

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FOREWORD

THE PLAN of this book differs from that of the ordinary text-book about money, because it is meant primarily, not for the student, but for the general reader. In these days, monetary questions crop up so constantly in the newspapers, form so large a part of the substance of political and economic controversy, and, above all, attract so many cranks that it has become indispensable for intelligent people to know something about them. But the ordinary text-books do not tell the ordinary person what he wants to know, at any rate in such a fashion as will enable him to understand it. I therefore planned this book, to be written by specialists for non-specialists, in such a way as to bring out into relief those aspects of the monetary problem which are most under controversial discussion to-day, and most relevant to the solution of the world's pressing economic problems.

There is accordingly more description of actual financial institutions and of their working—including not only banks but also more specialised institutions dealing with international trade, new capital issues, and other aspects of the "money market"—than most general books on money contain. There are also a discussion of some of the monetary aspects of the present world crisis, and special chapters devoted to the vital question of the "price level," and to certain of the outstanding exponents of monetary doctrines regarded as dangerously heretical in orthodox circles. I have also included a chapter on the socialisation of banking, which is already a very live political issue in Great Britain, and may perhaps very soon become one in the United States, where partial socialisation is already in being.

We shall begin with a preliminary attempt to define and delimit money, for the sake less of the definition than of getting clear the varying senses in which the word can be

used, and so getting on guard against that unconscious transition from one sense to another which so often makes nonsense of the process of economic argument. For the terms of monetary theory, as of all economics, are of necessity words in everyday use among business men and private persons as well as among economists ; and much misunderstanding arises between the two groups from a failure to realise when they are using the same word to mean different things. In discussing whether cheques, bills and bank deposits, as well as coins and notes, are money we shall make a first nodding acquaintance with a number of leading points of monetary theory, including the well-known, and much abused, Quantity Theory of Money and its younger brother, the Purchasing Power Parity Theory of the foreign exchanges. We shall also begin, even at this stage, to raise some pertinent questions affecting the policy of " reflation " which has been attempted in 1933 in the United States.

From that beginning we shall proceed to a general discussion of the monetary aspects of the world crisis, considered in relation both to its causes and to the possible ways of escape, as far as these can be sought in the monetary field. But any conclusions reached at this stage will have to be purely tentative ; for the main part of our task is still before us

This is, next, to describe as plainly and objectively as possible the present working of the monetary system, with special reference to Great Britain and the United States, though not without a good many incidental remarks on conditions in other countries. We shall begin with Central Banks ; for upon these the entire financial structure is now pivoted in the leading capitalist countries, and it is mainly through them, if at all, that the task of monetary " management " must be attempted, and a revised monetary policy put into force.

From Central Banks we shall pass on to the deposit, or joint stock, banks which are the chief holders of the short-term monetary resources both of business men and of

private persons above a low income level, and also the chief dispensers of " credit " to industry and commerce. At this point it will be of special importance to observe the wide differences between the banking institutions of the leading countries, and the influence exerted by these differences on their economic systems.

Next will come a treatment of two special aspects of the financial working of Capitalism which are largely in the hands of more specialised institutions, though the joint stock banks play a direct part in them, and the Central Banks also profoundly affect their fortunes. These are, first, the financing of foreign trade, with which is involved the entire question of the rates of exchange between different currencies. This is obviously a vital matter ; for the demand for a return by the world to the Gold Standard is based largely on the view that stable exchange rates are indispensable as a basis for the rebuilding of international trade upon sound lines. Moreover, in this chapter we shall have to examine the difficult questions of the " balance of trade " and the " balance of international payments," which are always cropping up when countries propose to raise their tariffs, or in other ways restrict the quantity of their imports, and also in connection with such problems as the payment of war debts and the investment of capital abroad.

This latter question—foreign investment—as well as investment at home will be discussed in the following chapter, which deals with the Capital Market and describes how new capital investments are made, and how vital are the problems raised by the present unplanned arrangements for attracting money into business enterprise, both at home and abroad. In this chapter something will be said of the stock markets as well ; for we cannot be concerned only with new capital, in a world in which dealings in " second-hand " capital, *i.e.* stocks and shares, are apt to play so significant a part in upsetting the equilibrium of the entire financial system.

At this point we shall have completed our broad survey

of the existing system ; and questions of policy and of the future will begin to loom larger, and difficult theoretical issues to be more frequently raised. The next chapter, on " Money and Prices," plunges us into the thick of the monetary controversy which most sharply divides the economists of to-day. For against the advocates of stable exchange rates are ranged the advocates of a stable internal " level of prices " ; and we shall have to master the principal arguments on both sides, and to decide which we prefer—if, indeed, we do not end by deciding that both sides are wrong, and that there is some third policy preferable to either of the familiar antagonists.

But before we can finally settle this problem, if indeed we can, there is more ground to be traversed. For at this point —enter the heretics, headed by Major Douglas, each with his own diagnosis of the monetary evil, and his own suggested remedy, guaranteed to set the world to rights. The author of this chapter has had the hardest task of all ; for he has been set to sift the grain from the chaff in a number of theories in which the two are very confusingly mingled. The object of this chapter is not simply to explore fallacies —for there is much of sound substance in what the heretics have to say—but, far harder, to appraise and disentangle where the matter is difficult and the exposition often harder still.

Chapter IX brings us back from general monetary theories to a more limited issue, raising the question of the part which States play, or should play, in the regularisation of monetary demand, both as taxing authorities and as great spenders, whose policy in the execution of public works and in the social services deeply affects the balance of the whole economic system. Here arises in a new form the problem of marrying idle money to idle resources of real capital and labour, of securing a right balance between spending, saving and investment, and of the general distribution of the national income as well as of its amount.

This consideration of public finance leads on naturally to a survey of debts, though private as well as public debts

have of course to be taken into account. We shall see here how disproportionate present debt burdens throughout the world are to the existing levels of incomes and prices, and how debts consequently stand in the way of the recovery of balance in the economic sphere and of the resumption of normal trading relations between countries. With debts will have to be considered interest-rates, for both long- and short-term loans, and their influence on the activity of business enterprise.

Last of all, we shall proceed to discuss the question of socialisation. Central Banks, we shall see, are in many countries already public or semi-public institutions ; but deposit banks and other financial agencies are, in all capitalist countries, left in private hands. We shall have to review the arguments for and against the socialisation of these various types of institution, especially in relation to the projects of " Planned Economy " which are now being so widely discussed in capitalist countries, as well as in Russia, and even put partly into practice, as in the United States.

Finally, there will have to be, not a summing up of the entire argument of the book, but at any rate an attempt to draw some of the threads together, and to estimate, in the light of what has been written, the relation between the monetary and the non-monetary factors in the world economic problem. For what the ordinary man wants to know most of all is how far the world's troubles are capable of cure by purely monetary remedies, or how far the other economic factors need to be radically handled as well.

As this book is the work of nine authors, it seems desirable to say something of how it has been written. For its arrangement and planning as a whole I am solely responsible. I drew up a general plan for each chapter ; and on this plan each of the contributors consented to work. I also sent out to them all, before making any definite arrangement, a letter setting out broadly the point of view from which the book was intended to be written, and the basic content of common doctrine which it was meant to embody.

Thereafter, each contributor was absolutely free to develop his part of the subject in his own way. I went carefully through each chapter when it was written, and made many suggestions to the writers—who accepted practically all of them. But I made no attempt to secure full agreement on secondary points, or to influence a contributor when his view upon a matter did not coincide with my own.

Each writer is therefore responsible for his own contribution, and for that alone ; and, as a contributor, I am in the same position as the rest. In addition I am responsible for presenting to the readers the entire book, as an exposition of the subject, but not for agreeing with everything that every contributor has set down. I think, however, I can reasonably claim that the book, despite the number of the authors, does work out as a reasonably rounded treatment of its subject, and does reveal a reasonable community of theory and outlook.

The contributors have this in common—they were all educated at Oxford. That now three of them teach Economics at Oxford, two in London University, and one in Cambridge, while one is Associate Editor of the most widely read of economic journals, one a barrister engaged in largely commercial practice, and one a Research Fellow in the United States who has been in a leading London financial house and subsequently my colleague in the New Fabian Research Department, speaks well for the growing diffusion of Oxford's influence in the theory and practice of Economics. If an editor and arranger may be permitted to dedicate other men's work as well as his own, I should wish this book to go out as dedicated to the growing band of Oxford Economists, Past, Present, and Future.

G. D. H. Cole.

Oxford, July 1933.

CHAPTER I: WHAT IS MONEY?

By G. D. H. COLE

WHAT IS money? The simple answer is that money is what buys things—purchasing power. For it is above all of the power to buy things that most men think when the idea of money comes into their minds. But this answer, though it is true and important as a first approach to the question, does not carry us very far. It is rather a definition than an explanation, and if the definition is to have much meaning we shall have to amplify it by trying to find out what falls within it and what must be regarded as falling outside. Put in this way the question is far harder to answer than it seems at first sight ; for the word money is habitually used, even in economic arguments, in a number of varying senses, and a great deal of confusion arises, even among economists, from slipping unconsciously from one sense to another. Nor can the problem be reduced to one merely of definition : it cannot be simply a matter of defining accurately what we are going to mean by money in this book, and then keeping rigidly to whatever definition we decide to adopt, for it will be impossible not to use the word in varying senses in different contexts, and the most we can hope for is that there will be no ambiguity about its meaning in any particular passage. We have to begin by discussing what " money " is, because " money " is a number of different things, and because many of the doctrines which are advanced about " money " are true if the word is used in one sense but quite untrue if it is taken as meaning something else.

Let us begin, then, with things which everyone agrees to be " money "—things which every definition of " money " which need concern us in this book can safely be taken to include. We are all in the habit of carrying about with us, and spending on such small purchases as we make from

day to day, certain round pieces of metal with certain words, figures and designs stamped upon them. These are called coins, and they are issued to serve as money by the Governments of the various countries in which they pass current as means of payment. Each country issues its own coins, although in exceptional cases coins issued by one country still circulate fairly widely in others—especially in those countries which have no developed currency system of their own.

These coins need not, of course, be round, though they usually are ; they can be any shape Governments choose to make them. A few of them still have a hole in the middle so that they can be strung on a string. But this practice is much rarer than it used to be, now that most of the world's coin-users have pockets or purses in which they keep their loose money.

Nor need these coins be made of any particular metal or even of metal at all, or possess any particular value given to them by the metal or other substance out of which they are made. We can, however, as we are considering money in the more advanced countries of the modern world, confine ourselves to coins which are made of metal, and ignore cowrie shells and other objects which have passed current as coins in less developed civilisations. The point which does concern us is whether there is any special significance about the actual metal out of which coins are made.

There is often supposed to be some special virtue in a coin being worth as metal as much as it is worth as money for buying goods and services. The world has suffered a great deal in the past from clipped and debased coins which have come through fraud and mere attrition to be worth less as metal than the face value stamped upon them ; and for centuries those who could insisted on being paid by weight irrespective of the nominal value of the coins tendered in payment. To this day the most widely used standard in China is a weight of pure silver, though the present Chinese Government is trying hard to establish a silver coin in its place. But in Europe and the United

States we have grown used to coins which are worth less as metal than the goods and services they can be used to buy. Copper and bronze coins are everywhere in this condition, and silver coins had also, largely because of the fall in the price of silver in relation to that of gold, ceased to be worth as much as they would buy long before Governments took to increasing the proportion of alloy to pure silver, as the British Government, for example, did during the late war.

Coins which are worth as metal seriously less than their face value are called " token " coins. They are " tokens " of a value, a purchasing power, which they do not intrinsically possess. This deficiency of intrinsic value need not interfere in the least with their purchasing power as money within the country where they are issued. But it does largely prevent them from circulating outside the country of issue, though any reputable coin can usually be changed at a money-changer's, on payment of a small commission, at the current rate of exchange with other currencies. In the past coins have been far more largely international in their circulation than they are to-day. In the Middle Ages and in the early days of modern Capitalism coins issued by many different Governments often circulated side by side. Before the war the British sovereign, which was worth as metal the full value stamped upon it, was freely accepted in many countries, and British travellers often carried sovereigns about with them when they were abroad. But nowadays gold coins such as the sovereign have practically ceased to circulate as means of payment, their place being taken by some of the " paper money " of which we shall have to speak later on. The coins which circulate to-day are mostly of copper or nickel or bronze or of silver greatly alloyed ; and as these coins are mostly of small nominal value, they are used chiefly in making quite small payments, and many transactions which would have involved the use of coins not very many years ago are now carried through with the aid of other sorts of money, or perhaps even without the use of anything that can be rightly regarded as

money at all. Coins are useful for bus fares, cigarettes, collection plates, pints of beer and other small purchases, and also for odd amounts involved in some larger transactions, and the sum total of all these small odd current payments is every day very great indeed, so that a large quantity of coins still remains in use in every country. But in the economic system as a whole coins now play a far smaller part than they did even in 1914.

Some people keenly desire to see coins restored to their old position and prestige. They long for the day when men and women in all civilised countries will again be able to chink gold coins, and they want these coins to be worth as metal the full amount for which they pass current as money. Some people even protest against the increased alloying of silver coins with base metals, and demand that shillings and sixpences and all similar coins shall be worth as metal as much as they can be used to buy. This latter demand is sometimes put forward by those who want, for one reason or another, to raise the value of silver in relation to that of gold, and hope to achieve this by increasing the demand for silver to be used as money. But there are others who advocate it because they feel it to be somehow wrong and unnatural that a coin should pretend to be worth as money more than it would be worth if it were melted down. These are the extreme advocates of " sound " money, who object to all forms of circulating currency that are not worth their face value in actual metal.

There is of course a point of substance behind this ascetic doctrine. No one can possibly make a profit by coining money which is to be worth as much when it is melted down as when it is a coin. Indeed, if the doctrine is quite rigidily interpreted, whoever coins such money is bound to make a loss, for it costs more than nothing to turn metal into stamped coins. In order to cover this loss a charge called " seigniorage " is sometimes imposed—that is to say, the value of the metal in the coin is allowed to be less than its face value by the cost of the actual coining, so that the issuing authority makes neither a profit nor a loss. In other

cases the cost of coining is met by the Government ; and this, which used to be the case with the British sovereign, is what the strictest advocates of " intrinsic value money " would like to see made universal. It is, however, obviously cheaper for the authority which issues coins to make them out of something less valuable than the amount of money for which they are to pass current. For the more valuable the substance out of which coins are made, the more capital is bound to be locked up in any given amount of coinage. If " silver " coins are made with less pure silver and more alloy, some of the silver previously used can be sold, and the issuing authority can make a profit on every coin which it issues. Moreover, it is often alleged that there is not enough of the precious metals available to allow of the coinage having everywhere full intrinsic value. But this point we had better hold over for the present, as it involves somewhat complicated questions about the level of prices, as well as about the actual distribution of the world stock of the precious metals.

If coins are " token " money, in the sense of being worth as metal less than they are worth as money, the issuing authority, which is usually a Government, can, as we have seen, make a profit on them. For it can use the coins which it makes to pay its bills, and these will cover more debts than it costs to buy the materials out of which they are manufactured and to carry through the process of coinage. It is therefore alleged that States will be under a temptation to make as many coins as possible, and so get money to spend without having to raise it by way of taxes or loans. But in practice the profit on the coinage is, in developed modern States, quite unimportant. For now that coins are used only for small payments, the amount of coinage that is needed is determined by the amount of small change the public requires, including any sums which the public may elect to hoard in the form of coins. The amount the public requires, apart from hoarding, to which we will come later, is in its turn determined by the amount of other sorts of " money " that is circulated in the community.

Thus, apart from hoarding, the quantity of coins in active circulation is a consequence of the prevailing degree of economic activity in the community and of the supply of other sorts of money which are used for larger payments. Modern States are not under much temptation to profiteer by issuing large amounts of coined money, though of course modern States have made a profit by debasing their " silver " money with an increased proportion of less valuable metal. Some base metal, by the way, has to be included in both silver and gold coins, in order to give the hardness required for resisting the wear and tear of circulation ; but of course this need not interfere with the possession by the coins of the full intrinsic value for which they pass current, as this depends not on their total weight but on the amount of the more precious metals included in them.

So much for coined money, which is now, as we have seen, almost all " token " money, worth less as metal than the goods and services which it can be used to buy. One important point that arises out of what has been said is that this " token money " gets its value by fiat of the Government which issues it. The Government says " Let this piece of alloyed silver or of mere base metal be accepted as a shilling, a franc, a mark, or whatever the monetary unit in question may be " ; and it is so accepted within the frontiers of the issuing country. But, of coures, a shilling or a franc or a mark will not necessarily be worth, and will not necessarily exchange for, any particular quantity of goods and services. It is, so far, only the name of a stamped bit of metal of which the State has authorised the circulation and fixed the value in relation not to goods and services but only to other bits of metal similarly stamped, or to other authorised forms of " money." Prices may change ; and the bit of money, whatever it is called, will buy more or less goods and services as prices move down or up. The Government therefore has, under normal conditions, usually taken a further step by making its " token money," either unconditionally or subject to certain

specified conditions, exchangeable for a fixed weight of gold. This essentially is what is meant by " being on the gold standard." When Great Britain was fully " on the gold standard " before the war, anyone could take twenty token shillings or 240 token pence and get in exchange for them a golden sovereign of a fixed weight and fineness, or, if he preferred, an equivalent lump of gold. Even under the gold standard in the form in which it was restored in Great Britain in 1925—the gold bullion standard, as it is called —a man could still get gold at a fixed rate in exchange for shillings and pence, subject only to the condition that he could no longer get coined sovereigns but only bar gold, and then only if he was prepared to demand a large enough amount of it at once.

This, however, was enough to make the token coins effectively convertible into gold. Being thus convertible, these coins could never lose their value in terms of gold. Their value in terms of other goods or of services might change ; but it could change only in proportion as the value in gold of these other goods and services changed too. In other words, the prices of things could still rise or fall, but the value of the token coins was firmly pegged to the value of one particular commodity, gold.

Even before the war, there were circulating in most countries, side by side with coins made of various metal, some of which had an intrinsic value equal to their face value and some not, other means of payment made of paper. But whereas coins were mostly issued by Governments from publicly owned mints, these pieces of paper, known as " notes," were issued sometimes by Governments and sometimes by banks acting under the authority or by the permission of the States in which they were situated. In some places the right to issue such notes was confined to a single " Central Bank " for each country ; and this Central Bank might be either a Government institution or a private one, or something betwixt and between—which was in fact the commonest case. In other areas a number of separate banks all had the right to issue notes ; but where

this was the case their right of issue was almost always defined and limited by the State, so that they could either issue notes only up to a fixed maximum amount or were compelled to keep some sort of backing in gold, or in some other asset regarded as being "as good as gold," for the notes which they issued, or at any rate for all issues beyond a fixed amount. In the United States both before and after the Federal Reserve Act of 1913, a large number of separate banks had the right to issue notes, but the Federal Reserve Act amended and redefined the conditions governing this right. In England, but not in Scotland or Ireland, the Bank of England as the Central Bank had a monopoly of note issue; for the limited right of issue left to certain private banks under the Bank Charter Act of 1844 had gradually lapsed into the hands of the Central Bank. In Canada there was—and is—no Central Bank; and the right of note issue was, and is, divided, under conditions laid down by the Dominion Government, among a number of separate banks.

In one sense there is no difference between paper notes and token coins made of metal. For if the intrinsic value of a piece of money is less than its buying power it matters little how much less its intrinsic value is. A piece of paper worth next to nothing does as well as a lump of nickel or silver worth a few pence, if both are to pass current by fiat of the Government for more than they are intrinsically worth. But paper notes are cheaper than token coins to produce, and are commonly given a larger purchasing value (though some countries, for example France, use paper notes of very small denominations). Accordingly, there is usually more profit in making paper money than in striking token coins, and far more temptation for a Government to increase its amount in order to make a profit and have money to spend without resort to taxes or loans. Hence the importance attached in certain quarters to placing the right of note issue in the hands of banks rather than of Governments, and of keeping the amount of the note issue under strict regulation by an authority which does not stand to profit by it. This object is supposed to be

accomplished by the restrictions imposed on the banks in respect of note issue when this right is entrusted to them by the State. On the other hand, there are obviously vast possibilities of inflationary issue of paper money when a State in financial difficulties reserves to itself the right to pay its bills with printed paper which it is in a position to produce without limit. Wherever gross inflation has occurred since 1914 the paper money had been produced either by a State or by banks acting under the direct authority and control of a State. But let us beware at this stage of regarding the over-issue of paper money as the main cause of inflation, wherever it occurs. This is a question into which we can enter only at a later stage when we have discussed the uses of other kinds of money in modern communities.

There is indeed one kind of paper money which is entirely free from this danger of inflationary issue in any sense in which inflation implies an issue of money insufficiently backed by intrinsic value. This is the " gold certificate," which is used, especially in the United States, as an alternative to the actual circulation of gold. This particular kind of paper money is a certificate of ownership of an actual equivalent in gold lying in the vaults of the authority which issues the certificate. It stands directly for the gold, and simply saves the waste and trouble of passing the gold itself from hand to hand. Every gold certificate is backed one hundred per cent by gold, and is directly convertible into the gold held against it—or was, until the United States suspended gold payments in 1933. Similarly before the war the number of bank notes which the Bank of England was allowed to issue without cent per cent backing in gold was so small in relation to the total circulation that there was never any doubt about the direct convertibility of Bank of England notes into gold. English bank notes were therefore in practice as good as gold certificates. After the war, and even after the restoration of the gold standard in 1925, when convertibility of notes into gold was restored in a conditional form, the number of notes

not backed by gold (called the "fiduciary issue") was so much larger in relation to the total number of notes in circulation that the Bank of England note could no longer be regarded as the absolute equivalent of a gold certificate in the American sense. Nevertheless, the note continued to be regarded as being virtually "as good as gold."

Bank notes, as well as coins made of metal, are undoubtedly "money." They circulate from hand to hand in payment for goods and services, and they possess a money value differing from their intrinsic value in precisely the same way as token coins. Paper notes are, indeed, in the world of to-day, far more important as money than coins of metal, for they are habitually used to make larger payments, and the number of them that is put into circulation has far more influence on monetary conditions than the number of silver and other metal coins. There are great differences between country and country in the use made of paper money. Some countries, as we have seen, issue paper notes for very small amounts, while others have notes only of denominations considerably larger than their current metal coins. In some countries quite large transactions are habitually settled in notes, whereas in others, especially Great Britain, cheques—to which we shall come later—are generally used in transactions involving considerable amounts. This difference in national habits is of the greatest importance in determining how far inflation and deflation, where they occur, are likely to be brought about directly by increasing or decreasing the number of bank notes available for circulation. In countries which use notes largely for the settlement of considerable commercial transactions, inflation or deflation is far more likely to be caused by an increase or decrease in the issue of notes than it is in countries which make a more extensive use of the cheque system. For in the latter, as we shall see, the number of notes issued is more likely to be a consequence of an increase or decrease in the volume of bank credit than an independent cause; whereas in largely note-using countries inflation or deflation can far more easily be brought about

directly by an increase or decrease in the issue of notes.

Bank notes are, in form, merely promises to pay. The bank of issue promises to pay the holder of the note so much in current national money. But what does it promise to pay? This is clear where a country is effectively on the gold standard; for in such a case the bank of issue promises to exchange its note on demand for a fixed quantity of gold. But where the gold standard or some alternative metal standard either does not exist or is in suspense, the promise to pay engraved on the face of the bank note becomes a fiction. For the bank can meet its notes only by paying out other notes or merely "token" coins in exchange for them, or by crediting the holder with a deposit in its books; and this deposit will confer no right except that of reconverting it into notes or token coins, or transferring it as a deposit to someone else by means of a cheque. A bank note can plausibly be regarded as not being "money" in the full sense of the word, but only a promise to pay "money," as long as the country in which it is issued is fully on the gold standard. But as soon as the gold standard or some other metal standard ceases to be in force a bank note obviously becomes "money" in the fullest sense of the word. Indeed, even when a country is on the gold standard a bank note, even if it is in form only a promise to pay, is in effect just as much "money" as any token coin made of metal and convertible into gold at a fixed rate is "money" —no less and no more.

We can, then, safely treat bank notes as being "money" for all practical purposes, and as included within the narrowest definition of "money" with which we need concern ourselves in this book. But far more difficulty arises when we go on to consider other "means of payment" and to ask whether they too should be included under the designation of "money."

In developed communities more and more transactions come to be settled not by paying over notes or coins, but by cheque. A cheque is essentially an instruction to a banker to pay over to some person a certain sum of money standing

to the drawer's credit at the bank. If the person to whom the cheque is made out chooses to receive payment in notes or coin, he is at liberty to do this ; and in that event the transfer of money is in effect a transfer of a claim to notes or coin, and the cheque, being merely an order to pay the notes or coin, is not itself serving as money. But far more often the recipient of the cheque simply pays it in to his own banking account, and the transaction involves directly no payment in notes or coin at all, but only a transfer of bank credit from one person's account to another's, either in the same or in a different bank. When this happens, is the cheque serving as money, and are cheques to be regarded as money because they are commonly used in this way?

The answer must be that they are not. For a cheque differs radically from a bank note, though they are both in form promises to pay. A bank note is a banker's promise to pay ; and if it is issued by a reputable bank it passes easily from hand to hand in a whole succession of transactions, without necessarily being ever converted into any other kind of money, even if it is in fact convertible on demand into coin or bullion. But a cheque, though it may occasionally pass through several hands and so be used as money, commonly fulfils its purpose in the course of a single transaction and is thereupon cancelled when its work is done. It does not normally circulate from hand to hand as coins and notes do ; for it is a promise to pay not by a bank but by the individual whose signature appears upon it, and its value depends on the condition of that individual's account at the bank. Doubtless there are some individuals whose names upon a cheque would make it no less acceptable as circulating money than the name of the bank upon a bank note. But that depends on the individual being well enough known and thought of for his signature to be generally acceptable, and even in such a case a cheque signed by him will normally not pass from hand to hand, but be paid promptly into a bank and so retired from circulation and returned to the individual who signed it. Moreover, most cheques are made out to " order " and not

to " bearer " ; and order cheques require endorsement by the person in whose favour they are made out. Again, many cheques are " crossed," which means that they cannot be directly cashed, but only paid into an existing bank account. In the light of these facts it is surely plain that cheques, although they may serve on occasion as substitutes for money, cannot ordinarily be regarded as money. It is utterly misleading to equate the cheque drawn by an individual upon his personal account at the bank with the banker's promise to pay engraved upon the face of the bank note.

This refusal to regard cheques as money is, however, only a step towards clearing the ground for a discussion of the real issue which underlies the widespread belief that cheques have come to be a sort of money in developed modern communities. For it is clear that the amount of " money " which exists in a modern community is by no means measured by the quantity of notes and coin that are actually circulating in the hands of the public, or lying in the vaults of banks and other business institutions. If we were to confine the term " money " merely to such notes and coin, we should be using the term in a sense far too narrow to comply with the broad definition given in the opening sentences of this chapter. For assuredly many things besides notes and coin are means of payment and can be and are habitually used for the purchase of goods and services. We have, then, to consider, if we reject cheques from our definition of money, what we are to regard as the money which these cheques are undoubtedly used on an ever increasing scale to transfer from one person to another.

This brings us of course to the question of bank deposits. When I write a cheque I write it upon a deposit lying to my credit in my bank. The cheque itself is not money, but what about the deposit upon which it is drawn? Bank deposits are in the most developed communities by far the most important means of payment, and those with the aid of which the largest and most important business transactions are habitually settled. It seems, then, that our definition

DISCOUNT RATES OF CENTRAL BANKS

	Average of 1928	Average of 1932	June 1933
U.S.A. (N.Y.)	4·5	2·8	2·5
U.K.	4·5	3·0	2·0
France	3·5	2·5	2·5
Italy	6·0	5·6	4·0
Belgium	4·25	3·5	3·5
Holland	4·5	2·66	4·5
Switzerland	3·5	2·0	2·0
Poland	8·0	7·2	6·0
Germany	7·0	5·2	4·0
Czechoslovakia	5·0	5·1	3·5
Austria	6·3	6·9	5·0
Sweden	4·0	4·4	3·0
Japan	5·5	5·3	3·66
India	6·2	5·0	3·5

DEPOSITS IN COMMERCIAL BANKS, 1928 AND 1932

	Current Accounts		Time Deposits		
End of:	1928	1932	1928	1932	
U.S.A.	19,944	14,965	13,453	10,527	million dollars
U.K.	1,026	991	789	963	„ £
France	21,502	21,178	13,870*	16,581*	„ francs
Italy	13,659	13,116	3,010	2,893	„ lire
Germany	4,321†	3,627†	6,932	4,143	„ RM.

* Including sight deposits.

† Up to 7 days.

of money must be wide enough to include bank deposits. But it will be necessary to consider with some care precisely what is involved in accepting this wide definition.

Bank deposits can be classified in either of two ways, and each classification divides them into two groups. The first and most obvious classification is that which draws a distinction between "current" and "deposit" accounts, or between "current" and "time" deposits. Of the sums which at any moment stand to the credit of the customers of the various banks some are credits which can be drawn upon at any moment—current accounts; others, time deposits, can be drawn upon only after a specified period of notice has been given to the bank. In most cases, though not in all, the banker is prepared to pay interest to his customer upon time deposits, but not upon sums lying to current account. He would argue in defence of this differentiation that money which he may have to pay out at any moment on demand is money which he must keep by him and cannot afford to use in any other way, whereas money placed on time deposit can be employed profitably by the banker while it remains in his hands, and he can therefore afford to share the profit which he derives from its use with the customer who has deposited it in his care. This is not wholly time; for banks can create a larger volume of credit as the sums placed with them on current account increase, because, the larger the total sums so placed are, the more they will tend to have continuously in their hands. Obviously, the whole of the sums on current account is not continuously in use by the owners, and a considerable aggregate amount is at any moment lying unused in the banks. This is just as much a basis for the making of short-term advances as the sums left on time deposit.

Under ordinary circumstances, the rate of interest paid which the banker is prepared to pay on time deposits will vary with the prevailing monetary conditions. When money can be used so as to bring in a good profit, the rate of deposit interest will be relatively high, whereas when it is hard to find profitable openings for the use of money the rate of

deposit interest will fall away perhaps almost to nothing. Commonly, the rate of deposit interest is in fact fixed by the deposit bankers in some definite relationship to the rates of discount or re-discount fixed by the Central Bank. A small rate of interest is sometimes paid on sums lying to current account, especially where customers are in the habit of keeping large sums of money in this way. But such payments are exceptional, and we can afford to disregard them for the purposes of this chapter.

What induces an individual or a business firm to keep money on deposit at the bank either in a "current" or in a "deposit" account? In the first place, convenience and safety. For under normal modern conditions a man feels that his money is safer in the bank than if he kept it in his home or office. To keep it in the bank also affords him the great convenience of being able to transfer it by cheque, and of getting a part of his accounts kept for him by the bank. In times of business crisis, as we have seen of late in the United States, this sense of the security of bank deposits may be so undermined as to cause a run by depositors on the banks with the object of getting currency which carries the guarantee of the Government or of a bank where soundness is not in question. In other cases, depositors who are in fear of currency depreciation try to get gold to hoard, until the Government intervenes to stop them. There was said to be some hoarding of bullion in London in 1933, in consequence of fears about the stability of all currencies engendered by recent developments in the United States. Very great inconveniences can arise from the practice of currency hoarding, which may, if it goes far enough, threaten the collapse of the entire banking system. But for the moment let us confine ourselves to the working of the banking system under more normal conditions, and leave aside the possibility of hoarding.

Since the banks usually pay interest on time deposits but not on money lying in current account, it obviously pays the depositor better to put his money on time deposit if he intends to leave it in the bank for any substantial period.

He will therefore tend to keep on current account only as much money as he thinks he may want to draw out in the near future. His current account in the bank is in effect a substitute for the notes and coin he would otherwise have to keep in his possession for settling current business transactions. The bank simply provides a more convenient way of settling such transactions than would be available if there were no banking system in existence. The sums kept on time deposit in the banks stand in rather a different position. A man does not normally invest his money by putting it on time deposit at the bank with the idea of leaving it there indefinitely; for the rate of interest which he can get in this way is usually very low in relation to what can be got by investing the money in other ways—for example, by buying high-class gilt-edged securities. Accordingly, time deposits in the banks are usually meant by their owners to be only temporary. The money is lying in the bank until the depositor wants it; but he expects to want sooner or later for some alternative use, either in some big business transaction which he knows is coming in a week's or a month's or a year's time, or for long-term investment in either shares or bonds of one sort or another.

The amounts of money which the customers of the banks are disposed to keep on deposit either in their current or in their time accounts are influenced by the condition of business. If business is brisk the amount of money kept on current account both by business men and by private depositors is likely to be large, because of the greater volume of current transactions and of current private spending. On the other hand, in times of slack trade the amounts kept on current account are likely to fall, both because the incomes of private customers of the banks are then lower, and also because the volume of business is smaller, and probably being carried on at a lower level of prices. In the case of time deposits the situation is different. When business is active firms usually need all their working capital for actual employment in their business, and have therefore little or none left on deposit account. Indeed, they are very often at

such times in debt to the banks for loans and overdrafts needed to supplement their own working resources. Moreover, at such times private individuals are unlikely to leave much money on deposit in the banks, because the opportunities for investment are then good, and they will therefore probably prefer to put their money into bonds or shares rather than leave it lying in the banks, even though the rate of interest allowed on time deposits is usually higher in prosperous than in unfavourable times. In periods of depression, on the other hand, firms doing much less than the normal amount of business may have some of their working capital lying idle in the banks, and private individuals who would normally invest their money may feel the risk of loss to be too great, and prefer to leave it on time deposit in a bank even at a very low rate of interest, while they are awaiting a more favourable opportunity for investment. Thus it is found that the proportion of time deposits to total deposits in the banks is usually much higher in times of business depression than in times of prosperity. This accumulation of large sums on time deposit in the banking system has been a marked feature of recent financial history in Great Britain and in other European countries.

In general, then, current accounts in the banks represent money which is actually in current use either by individual owners of incomes or by business firms in financing current transactions, such as the payment of wages and salaries, and the meeting of current costs for materials and other working expenses. Deposit accounts, on the other hand, represent partly working resources of business not in immediate use, and partly sums temporarily withheld from long-term investment in shares or bonds or in some similar employment.

But there is, as we have seen, another way in which bank deposits must be classified if we are to get an understanding of their real nature. So far I have spoken as if all the sums appearing as deposits in the balance sheets of the banks consisted of actual resources belonging to individual or business customers of the banks. But in fact this is very far

from being the case ; and a large part of what appears as deposits in the banks' balance sheets consists of sums lent by the banks to their customers. These bank advances take the form either of loans of definite amounts of money to customers of the bank, or of overdrafts—that is to say, of rights to draw out of the bank more than the sum deposited with it up to a fixed maximum. Such bank advances are usually given only on some form of security ; but this requirement of security is by no means universal, especially in the case of merchant houses of good standing.

When a bank grants a loan or overdraft, the effect is to create an additional supply of purchasing power upon which the recipient of the advance can then draw as if it were his own money. He is of course under an obligation to repay the advance at some future date, and to pay interest on it in the meantime. But while the advance continues in being it represents a real addition to the current volume of purchasing power at the command of the public. As soon as a bank grants a loan the effect is to increase the volume of the bank's deposits by the amount of the loan. When a bank grants an overdraft rather than a loan, the position is somewhat different, for the addition to the volume of bank deposits comes into being only as the recipient of the overdraft actually uses it by drawing cheques. In general, however, bank advances, in whatever way they are granted, tend to swell the total amount of deposits appearing in the banker's books. They represent a real creation of additional money—additional purchasing power which is available for current spending.

Whence do the banks derive their ability thus to make purchasing power apparently out of nothing? If you ask an orthodox banker, he will probably reply that he is able to grant these advances because he has lying in his hands actual sums of money deposited by his customers which they are not likely to use in the immediate future. This applies especially in the case of time deposits ; but it is, as we saw, also true that by no means the whole of the sum lying in current accounts is constantly in use. The banker

maintains that he makes advances by lending out and so putting to current use sums of money actually deposited with him by his customers which would otherwise remain idle.

To some extent this contention is undoubtedly true. But it is not true either that the banker's power to grant advances is limited to the amount of actual money lying idle in his custody, or that he has any means of knowing what the amount of such idle money is. For as soon as a banker grants a loan or overdraft, and this is actually used by the person to whom it is granted, its use takes the form of writing cheques against it, and these cheques are then in the normal case paid into someone else's account either in the same or in another bank. Accordingly, the sums paid in by the bank's customers to their own accounts consist to a large extent of the advances which the same or other banks have made to their customers ; and it is quite impossible for the banker to know whether a sum which is paid into Mr. A's account originates in a sum of money actually lying to the credit of Mr. B or in a loan or overdraft granted to Mr. B by a bank. Bankers sometimes wax indignant when it is suggested that they " create " credits out of nothing, and protest that their sole function is that of transferring money and not of creating it. But in fact there is absolutely no means by which they can know when they are simply transferring money and when they are creating it ; for when once a loan or an overdraft has been granted there is no distinction between the money to which it gives rise and money which is not the product of the creation of credit by a bank. *Pecunia non olet.* All the money, whatever its source, is just like all the rest, irrespective of its ultimate origin. Thus the money lying on time deposit in Mr. A's account may be the result of a transfer from the account of Mr. B, who may have been enabled to pay over the money because the banker has just granted him a loan.

In practice bankers do not, as indeed they cannot, attempt to consider what is the ultimate origin of the money which they lend. When they are considering whether they can afford to expand their loans or ought rather to contract

them, they do not consider how much actual money they have lying on deposit in their hands either on time or on current account, but rather what relation the sum total of their deposits bears to the cash resources which they can command. For this, and not the amount of " real money " held on deposit with them, is the real measure of their ability safely to grant advances to their customers. Bankers aim at preserving a certain " cash ratio "—that is to say, a certain proportion of cash resources to the total volume of their deposits, including the advances which they make to their customers. But the banker's conception of " cash " is far from simple. He includes in it, not only such actual coins and bank notes as are in the vaults of his head office and his various branches, but also other resources which he regards as being as good as cash, in the sense that he is in a position to turn them into cash at once if he so requires. Indeed, the amount of coin and notes held by the British banks is insignificant in relation to the total volume of " money " in which they are dealing from day to day. Their cash and notes are nowadays hardly more than till money, designed to meet such claims as their customers wish to have met by the payment of actual currency across the bank's counter. As by far the greater part of payments in business transactions is nowadays made by cheque, without any actual money passing across the bank's counter at all, the quantity of notes and coin which the banker requires to keep in his possession in order to carry on his business is a constantly declining proportion of the total amount of money with which he deals.

In Great Britain by far the most important demand for notes and coins arises nowadays out of the payment of wages. For wages continue to be paid in actual currency, whereas at any rate the larger salaries, like all major business payments, tend increasingly to be paid by cheque. It remains of course perfectly true that an expansion in the volume of bank deposits is likely to be accompanied by an increased demand for actual notes and coins. This is the case especially if the expansion of bank deposits arises out of

an improvement in industry and trade. For such an improvement will usually mean both that larger sums will be paid out week by week in wages and small salaries, and that the general public, being in receipt of larger incomes, will tend to keep more notes and coin in their pockets for current use. The banker has therefore in times of business prosperity to pay out substantially larger sums in notes and coin than in periods of depression ; but the money which he pays out in these forms is also constantly returning to him as it is spent by the recipients, for the shopkeepers and others to whom it is paid over will promptly return it to the banks, and from the banks it will flow out again to manufacturers and others to be used in fresh payments of wages and salaries. There will be in prosperous times at any given moment a larger total sum in notes and coin outstanding in the hands of the general public than in times of depression. But there will also be a far larger sum flowing daily in and out of the banks.

It is pertinent at this point to observe that an expansion of economic activity will make very different demands for an increased quantity of notes and coin according to the nature of the expansion. If business prosperity results in rising wages and a larger volume of employment and in a wide diffusion of the increased wealth among the consuming public, the demand for additional notes and coin will be at the maximum. If, on the other hand, the expansion takes the form rather of a speculative boom on the stock and produce exchanges without a corresponding expansion in the incomes of the general body of consumers, bank deposits will tend to rise sharply without a corresponding expansion in the demand for notes and coin ; for most of the increased volume of monetary transactions will in such cases be carried through by the use of cheques without the call for additional coin or notes. Thus, in as far as any limit can be imposed on the expansion of bankers' loans by a possible shortage of actual notes and coin, such a limit is likely to be far more effective in preventing the expansion of loans designed for productive purposes than in

checking a speculative boom on the stock or produce exchanges, or in real estate. This distinction is not, however, in practice very important in either Great Britain or the United States, because in both these countries the bankers can normally rely on a sufficient supply of actual currency to finance any expansion in their loans which they are likely to be willing on other grounds to undertake. But when an expansion of bank deposits does occur, and is accompanied by an increased turnover of cheques through the Clearing Houses, without a parellel expansion in the volume of currency in actual circulation, this usually indicates the existence of a speculative boom, unaccompanied by a corresponding upward movement in employment and consuming power.

In Great Britain what the banker counts as cash, or as good as cash, consists mainly not of actual notes or coin, but of the sums standing to his credit in the books of the Bank of England ; for under the British banking system all the great joint stock banks as well as the merchant banking houses keep an account at the Bank of England, and draw on this account whenever they require either to increase their supplies of notes or coin or to settle debts owing from one bank to another. It is important to realise that in Great Britain the joint stock banks are never in debt to the Central Bank. On the contrary, they have always very large sums lying there to their credit, and these sums constitute their main " cash " reserve against their deposit liabilities. The position is substantially different in the United States, where the member banks of the Federal Reserve System are normally indebted to the Federal Reserve Banks, which re-discount trade bills on their behalf. This, as will be seen in one of the later chapters of this book, substantially alters the working of the banking system ; but the point is not relevant to the issues which are being considered in this opening chapter. It is easier for our immediate purpose to discuss the situation in terms of British banking conditions, under which the deposit banks are always in credit at the Central Bank.

Thus, when the British deposit banks are considering how much money they can afford to create by way of advances for their customers' use, what most concerns them is not the amount of notes and coin in their possession, but the amount standing to their credit in the books of the Central Bank, and the proportion which this amount bears to the total volume of their indebtedness to their depositors. For the British banks, while they are under no legal restrictions as to the amount of credit which they can advance, have in practice a working rule by which they endeavour to keep the total amount of their deposit liabilities within a maximum ratio to their total cash reserves, including their credits at the Central Bank. This proportion they will not ordinarily exceed, nor will they, if they can help it, fall much below it. For if to lend more than the right proportion is held to involve dangers, to lend less may clearly involve foregoing opportunities of profit. In these circumstances the whole banking system of Great Britain is pivoted upon the amount of the deposit banks' holdings with the Central Bank.

This gives the Bank of England a position of quite exceptional strength and influence in relation to the working of the banking system as a whole. For the Bank of England is not a mere passive recipient of sums of money deposited with it by the joint stock banks, but is in a situation which enables it to influence to almost any extent the amount of these deposits. This it can do chiefly by what are called " open market operations," that is to say, by itself expanding or contracting the volume of credit through the purchase or sale of securities in the open market. For whenever the Bank of England buys a security with a cheque written upon itself it pays over into somebody else's hands a certain sum of money, and whenever it sells securities somebody else has to pay it a certain sum of money. The purchase of securities by the Bank thus leads directly to an expansion of the sums standing to the credit of the joint stock banks in its books ; for those who receive the money which it pays for the securities normally proceed to pay this sum of money

into their own banks, which thus acquire additional credits at the Bank of England. On the other hand, when the Bank sells securities, those who buy them write cheques on their own banks, payable ultimately to the Bank of England. The Federal Reserve Banks in America are in a position to use open market policy in much the same way, though, as will be seen in a later chapter, the different relationship between the Federal Reserve Banks and the member banks to some extent alters the procedure, and makes the hold of the Federal Reserve System over the member banks less strong than is the hold of the Bank of England over the deposit banks in Great Britain.

Thus under modern banking conditions, where an effective Central Bank exists, the control of the amount of money which the banking system as a whole is in a position to create rests mainly not with the ordinary deposit banks, but with the Central Bank itself. It is at the discretion of the deposit banks to distribute as they will among the various claimants for advances the sums of money which they are in a position to lend. But the magnitude of the total amount that they can lend is mainly determined for them by the attitude and policy of the Central Bank. The real creator or destroyer of credit under modern banking conditions is far less the individual deposit banker than the strongly organised and entrenched Central Bank which exists in each developed country.

This statement does indeed require one qualification; for although the Central Bank is usually in a position to determine by means of its open market policy the total amount which shall be available for lending by the banking system as a whole, it is not in quite the same position of power in determining that the whole of the sum available shall be actually lent and used. In other words the Central Bank can usually, if it chooses to exert its authority, check an expansion of credit at any particular point, but it cannot with equal facility and certainty bring about any given expansion of credit which it may desire. For it does not follow, because a sum of money is available in the hands of

the banking system for the making of loans, that the whole of this sum will be actually borrowed. The actual use of the money involves the existence of persons who are prepared to borrow it at the rates of interest which the banks see fit to charge; and these persons must be not merely ready to borrow, but sufficiently credit-worthy for the banks to be ready to lend them the money. But in times of business depression it may be difficult to find credit-worthy borrowers for as much money as the banks, in accordance with the policy of the Central Bank, have available for lending, at a rate of interest they are willing to accept; and the bankers, much against their will, may find themselves unable to use to the full the opportunities for lending which the banking system has placed in their hands.

In these circumstances the banker, when he finds it difficult to discover a sufficiency of credit-worthy borrowers, is very unwilling to have money left on his hands earning no interest. He will therefore, if he cannot place his money in the normal way in loans and overdrafts, tend to increase his holdings of gilt-edged securities, in order that the resources at his command may bring him in an adequate return. But in order to buy gilt-edged securities he has to find someone willing to sell them; and under the circumstances which we are now considering, the seller of these securities will be likely promptly to pay the money which he receives for them back into the bank, thus again swelling the total of bank deposits and recreating for the banker the problem of finding a use for the idle money. Meanwhile, of course, the effect of the banker's policy will be to reinforce the effect already produced by the open market policy of the Central Bank, and to force up the prices of gilt-edged securities, thus reducing their yield and exerting a depressing influence on current rates of interest.

It is sometimes supposed that a fall in the rate of interest ought to exert a stimulating influence on current business; for business men, finding themselves able to borrow money at a cheaper rate, should consider sufficiently remunerative

to attract them a number of enterprises which were below the margin of attractiveness as long as higher interest rates had to be paid. But, although there is something in this view, especially in relation to long-term interest rates, it is true only subject to very large qualifications. First, the joint stock deposit banks, which are the chief source of short-term advances for business, do not ordinarily reduce their rates for loans or overdrafts below a minimum of five per cent, however low other short-term rates of interest in the money market may fall. During the present prolonged depression this five per cent minimum has indeed to a large extent broken down, and a good deal of money has been advanced by the banks at four per cent, and some at even less; but even a minimum of four per cent may be quite highly deterrent in times of business depression. Moreover, in the case of short-term advances, a change in the rate of interest often makes only a very small difference to the total cost of production, so that even a substantial fall in interest rates has no very large effect in stimulating productive activity. Thirdly, in times of depression the openings for carrying on business at any profit at all may be so restricted that business men would be unwilling to embark on additional enterprise even if they could borrow the money for it without paying any interest at all. There are of course always *some* enterprises which will be undertaken if the rate of interest falls below a certain point, and not if it rises above this point; but the number of these marginal enterprises is liable in times of severe depression to be exceedingly small.

A fall in the long-term rate of interest may, however, have a large effect in the stimulation of activity in the building trade; for interest forms a very large part of the cost of very durable things such as houses. This consequence of a fall in long-term interest rates has been seen clearly in Great Britain in 1933; but housing is an exceptional, though highly important, case.

Thus the power of the Central Bank, even with the full co-operation of the rest of the banking system, to stimulate

industrial activity by additional sums of money in times of business depression is very limited indeed, whereas its power in times of boom to restrict the further expansion of credit and thus bring an inflationary tendency to an end is practically without limit. In effect banking policy can always cause depression, but it by no means follows that it can always engender prosperity.

This long discussion of certain of the essentials of modern banking policy arose inevitably out of the attempt to describe the function which bank deposits play as money in the modern world. More than any other one thing, the volume of deposits appearing in the books of the great banks *is* the effective volume of money in any modern community which possesses an organised banking system. There has to be added to it the quantity of notes and coin actually circulating in the hands of the public; but this quantity of notes and coin is far less a force of independent importance in the financial system than a direct outcome of the volume of bank credit that is in existence and of the uses to which this credit is being put. For, as we have seen, the more largely bank credit is employed in financing productive operations, and the less it is being used for merely speculative activities, the larger is likely to be the proportion of actual coin and notes in circulation to the total volume of deposits appearing in the books of the banks.

Are there any other forms of money besides those which we have already discussed that ought to be brought within the terms of the definition given in the opening sentences of this chapter? The most important claimant to be regarded as money of which we have not yet considered the pretensions is obviously the "trade bill." In all advanced countries a large part of external trade, and in some a considerable proportion of internal trade as well, is financed not by the payment of notes or cheques, but by means of trade bills. In certain respects these commercial instruments closely resemble cheques; for, like cheques, they are the embodiment of promises to pay, though, unlike cheques, they are drawn up not by the debtor but by the creditor,

who presents them to the debtor for his endorsement. The nature and working of trade bills are discussed more fully in later chapters of this book, and I am here concerned only with the question whether they are to be regarded as falling within the broad definition of money. Their claim to be so regarded rests mainly on the fact that, unlike cheques, they do actually pass from hand to hand, often a number of times, as means of payment before they are finally cancelled, whereas a cheque normally fulfils its function in the performance of a single transaction. In external commerce, trade bills are chiefly of importance because they avoid the necessity for transferring sums of money from one country to another in payment of debts, and because they allow the seller of exported goods to get paid for them at once without waiting for the actual remittance from his overseas customer, by the method of discounting immediately the bill which embodies the customer's promise to pay. In internal transactions the trade bill is of importance chiefly in the second of these ways, and it serves as an alternative to the financing of transactions by means of a loan or overdraft secured from the bank. As in practice the money for which the bill is discounted usually comes directly or indirectly from the recources of the joint stock banks, the trade bill is in fact only an alternative method to the loan or the overdraft for the making of bankers' advances ; for, as we shall see, although bill discounting is carried through to a high degree by specialised bill brokers and discount houses as well as by the joint stock banks, the resources with which these specialised operators work consist to a large extent of money borrowed from the ordinary banks.

A trade bill, when it is used to cancel one debt against another, and thus to avoid the necessity for an exchange of money across national frontiers, seems to be definitely fulfilling the function of money for the time being, and its use does undoubtedly serve to decrease the demand for other means of payment which we have already agreed to regard as money. But there is a big difference between a trade bill

and either a coin or a note on the one hand, or a bank deposit on the other. For a trade bill, although it may change hands several times in the course of its existence, is essentially a promise to pay which is meant to be actually implemented at a definite date, and not to continue in existence indefinitely as a medium of circulation. When the bill falls due it will be actually presented for payment, and payment will actually be made either in notes and coin or by a transference of deposits in the bank. For this reason it seems illegitimate to regard the trade bill as itself a form of money; for the money which it represents consists rather of the bank deposits out of which it is paid off when it falls due, and, during its currency, of the bank money which is applied directly or indirectly to discounting it. It must be agreed that the creation of trade bills can become an instrument for the creation of an additional volume of credit, and that in this sense an expansion of the number of trade bills may bring with it a real expansion in the available supply of means of payment. But, in spite of this fact, the trade bill cannot normally be regarded as a distinct type of money ranking with those which we have considered earlier in this chapter. It is rather a specialised form of cheque, dependent no less than other cheques on the volume of money which the banking system is in a position to supply.

It is, however, important that not only bills of exchange but also certain other short-term credit instruments, above all Treasury Bills and other short-term Government bonds, can be used in such a way as to increase the effective supply of means of payment available to the business world. For if trade bills change hands oftener during the period for which they run, or if business men take to paying one another with Treasury Bills, or even with coupons or bearer bonds, the supply of means of payment can be thereby increased. This is likely to happen to some extent when the operation of a restrictive policy under the auspices of the Central Bank runs counter to a powerful business sentiment, and business men desire to carry

through a larger volume of transactions in terms of money than the banks, following the lead of the Central Bank, are prepared to sanction. But to admit that trade bills and other bits of paper can be used as money in such a way as to increase the effective quantity of circulating media available is not to admit that such instruments can properly be regarded as money. There is, indeed, no limit to the number of things that people can use as means of payment if they really desire to do so. For the only condition that necessarily attaches to the use of a thing as a means of payment is that someone should be prepared to receive it as such. In times of panic, when belief in the solvency of financial institutions wanes or disappears, all sorts of strange things can be used as substitutes for currency or for bank money. In Europe in the years immediately after the war loaves of bread, pairs of boots, anything and everything that possessed an intrinsic value were somewhere used as a means of payment at times when faith in the available paper currencies had been utterly destroyed. In the American banking crisis of 1933 all sorts of paper instruments made a temporary appearance as money substitutes during the period when a large part of the United States banking system was shut down. Boys at school similarly use pocket-knives, conkers, and all sorts of small private possessions as means of payment. For there is no clear line between barter transactions and transactions mediated by something regarded not for its use to the recipient, but as a means of payment to be passed on to someone else. It would, however, be fantastic so to widen our definition of money as to include everything which under exceptional circumstances can be used as money; and it is most expedient to exclude bills of exchange as well as cheques from our conception of money, while admitting bank deposits and, indeed, recognising that they form the most important supply of means of payment in the modern world.

The simplest and most elementary generalisation about money is embodied in what is known as the Quantity Theory of Money. According to this elementary doctrine

the level of prices in any community depends upon the relation which exists between the quantity of goods and services which are actually being bought and sold, and the quantity of money available for their purchase. In its most rudimentary form, the Quantity Theory of Money is incontestably true. If there are four things of equal value to be exchanged, and four pieces of money available for their purchase, the price-level for each unit bought and sold is bound to be one. If now the quantity of money is doubled, while the number of things available for exchange remains the same, the price is bound to be two. If, on the other hand, the quantity of things is doubled while the quantity of money remains the same, the price is bound to be one half. So far, no one can possibly dispute the truth of the Quantity Theory of Money.

But in the real world of exchanges the problem is by no means so simple as this. For it is neither so easy to determine what is the quantity of things available for being bought and sold, nor what is the quantity of money available for financing their exchange. Moreover, the simple equation between a number of units of money and a number of units of commodity totally ignores the time element, which is in the real world of fundamental importance. Before, therefore, we even consider whether, and, if so, in what sense, the Quantity Theory of Money is true, we have first to consider what constitute on the one hand the quantity of money and on the other the quantity of goods and services which are entering into exchange, and secondly what influence the element of time exercises on the terms of the exchange.

Consider first the quantity of goods and services entering into exchange. At first sight this seems relatively simple. Industry in the widest sense is producing a current supply of goods destined either for consumption or for use in further production, and there is at the same time a current flow of services of many different kinds on offer in the market. These together constitute a current flow of goods and services which has to be financed with the aid of the

available supply of money. But many things are actually being bought and sold in the community besides the current flow of newly produced goods and services. (Capital goods already in existence) as well as goods currently produced, are constantly changing hands. Land, stocks and shares, houses, second-hand goods of any and every sort, can enter into exchange equally with currently produced commodities issuing from the productive system. But whereas the currently produced goods are, under modern economic conditions, almost all made for the purpose of being exchanged, there is no fixed relationship between the quantities of land, capital goods, and second-hand goods of all sorts actually in existence, and the quantities of these goods which enter into the market for purposes of exchange over any particular period. In periods of speculative activity, for example, there is an enormous increase in the quantity of stocks and shares which changes hands, and similar speculative booms occur in the buying and selling of real estate. These transactions, equally with transactions in the buying and selling of the current output of goods and services, need to be financed with the available supply of money; and if a larger proportion of this available supply is absorbed in buying and selling, say, real estate or stock exchange securities, the effect is to leave so much the less available for buying and selling the current supply of currently produced goods and services. Thus the conception of the quantity of goods and services which the available supply of money is to be used to buy is by no means so simple as it seems at first sight, and already one element in the equation embodied in the Quantity Theory of Money takes on a distinctly more complicated appearance than it presented in terms of the simplified instance given above. Money can be locked up in the buying and selling of real estate or stock exchange securities so as not to be available for the purchase of the current output of industry; and where such a locking up occurs it is by no means without influence on the current levels of prices for such goods and services.

Nor is it much easier to define what is meant by the available supply of money. For, as we have seen, modern money consists mainly not of actual bank notes and coin, but of deposits appearing in the books of the various banks, and this supply of bank money is constantly altering in accordance with the decisions made by the banks, and above all by the Central Bank, concerning the degree of liberality with which credits ought to be made available. Even if we leave out of account the possibility noted above that various instruments which do not normally serve as money may be pressed into use as money when the business world is in an expansive mood, the supply of money is nevertheless not a fixed thing, but something constantly variable in accordance with decisions made within the banking system. The banks, and above all the Central Bank, are doubtless guided in their policy in increasing or decreasing the supply of money partly by the reserves of actual metal which are lying in the vaults of the Central Bank ; but there is no fixed proportion between the amount of the monetary reserve and the superstructure of credit which the banking system may decide to erect upon it. Although in most countries there are laws which lay down some minimum requirement which the Central Banks are compelled to observe in the issue of notes for which they have not a hundred per cent gold backing, these requirements do not go so far as to prescribe a definite or fixed relationship between the volume of the note issue and the gold reserve, and are, moreover, commonly suspended when, under exceptional circumstances, the banks find themselves unable to preserve the normal relationship between their gold cover and issue of notes necessary to maintain an adequate flow of currency into the hands of the public. Moreover, there is no fixed ratio between the amount of currency that can be issued and the amount of credit that can be based upon it, though the additional demand for currency generated by an increase of credit does set an upper limit to credit expansion.

The quantity of money, like the quantity of goods and

services, is thus an exceedingly ambiguous conception. But the practical value of the Quantity Theory of Money is still further impaired because of the necessity for taking into account the time element, which in its simplest form it ignores. For if money circulates faster it is enabled thereby to do more work, in the sense of financing a larger volume of transactions within a given time. The same amount of money can do twice as much work, provided that it is able to circulate twice as rapidly as before. For with the greater rapidity of circulation it is able to finance twice as many transactions as it could when its " velocity of circulation " was slower. All modern statements of the Quantity Theory of Money recognise the importance of this factor of " velocity of circulation " ; but in practice it is by no means easy to measure the rate at which the money in the possession of the public is actually circulating from hand to hand.

Since bank deposits are in the modern world the most important form of money, the most significant measure of the velocity of circulation is to be found in the rapidity with which bank deposits are changing hands. This is most often measured by studying the relationship between the total volume of deposits appearing in the accounts of the banks, and the total volume of money changing hands by the writing of cheques which transfer resources from one account to another. But in practice this, although it is a valuable indication of changes in the velocity of circulation, is by no means a completely satisfactory measure. For the clearing statistics of the joint stock banks, while they exclude purely internal transfers from one account to another within the same bank, and are thus incomplete, include all transfers from one bank to another, whatever the nature of the transactions out of which they arise. They thus include under one head purely financial transactions arising out of the transference of stocks and shares, real estate or other capital goods, side by side with the transferences which accompany the buying and selling of the current output of goods and services. In order to get a

clearer indication of the volume of cheque clearances which represents current as distinct from capital transactions a distinction is sometimes drawn between different types of bank clearances ; thus in Great Britain clearances of cheques which take place in the City of London are commonly regarded as representative of the financial rather than of the industrial circulation, whereas clearances in the outer districts of London and in the provinces are treated as reflecting more nearly the current up and down movements of the volume of transactions taking place in industry and commerce. But this distinction is only a very rough measure, and there is in reality no way of distinguishing clearly between those transferences of bank deposits which arise out of capital transactions, and those which are the result of the buying and selling of current output.

Generally speaking, the velocity of circulation tends to be higher in times of good than of bad trade. Money flies faster from hand to hand when men are in a mood of business optimism and feel rich than when they are pessimistic about the industrial outlook and conscious of a fall in their current incomes and in the capital value of their assets. This situation, however, may be modified to any extent under abnormal conditions. The velocity of circulation is greatest of all in times of extreme inflation. For at such times men are conscious that money is rapidly losing its value in terms of commodities, so that the longer they keep it in their pockets or to their credit in the banks the less it is likely to be worth. Under such conditions anyone who is in possession of monetary resources hastens to pass them on to someone else, converting them into real assets which are likely to improve in value as prices continue to rise. The velocity of circulation in any country at a time of pronounced inflation is certain to be enormously increased, as it was in Germany during the Ruhr struggle of 1923. On the other hand, the expectation of falling prices tends to slow down the velocity of circulation, because under such conditions men consider that the longer they hold their money and refrain from exchanging it for goods, the greater

its command over goods is likely to become. Changes in the velocity of circulation are thus of vital importance in determining the price-level which any given relationship between the quantity of money available and the quantity of transactions requiring to be financed is likely to bring about; and it is impossible to hope for more than a very approximate way of measuring what the velocity of circulation is at any given time. All three factors postulated in the Quantity Theory of Money are thus exceedingly difficult to measure in practice. The Quantity Theory of Money is true in a sense; but it is always in danger of being a truism which it is impossible to apply in practice.

The Quantity Theory of Money, to the extent to which it applies at all, obviously applies only within the limits of a given monetary system. For, as we have seen, each country has its own national money and circulates this supply of money under the auspices of its own independent banking system. It remains, therefore, to discuss the bearing of the Quantity Theory on the international value of money, and on the relative values of different national currencies in the financing of international business transactions. When countries are effectively on the gold standard—that is to say, when national currencies are in practice freely exchangeable into gold at a fixed rate—this convertibility determines within narrow limits the relative values of the currencies of all such countries. For if I can exchange a pound for such and such a weight of gold, and a dollar for such and such another weight, the relative values of the pound and the dollar cannot diverge from the gold value thus determined save to a very small extent, limited by the cost of carrying gold from the one country to the other. As soon, however, as countries are off the gold standard, and their national currencies cease to be convertible into precious metal at a fixed rate, there is no reason why they should exchange one for another at any fixed or unchanging level. When countries are off gold their exchanges are free to fluctuate, save to the extent to which they are kept artificially " pegged " by the " management " of the

respective Central Banks—and even Central Bank management cannot stand out so as to preserve indefinitely an artificial rate of exchange in face of forces making for equilibrium at a different level.

What, then, determines the relative values of different national currencies when the countries using them are off gold? It is extraordinarily difficult to return a clear answer to this question. The simplest answer, corresponding in the international field to the Quantity Theory of Money as a national theory, is contained in the Purchasing Power Parity theory of the exchanges. According to this theory the relative values of national currencies which are off gold are determined in the long run mainly by their relative purchasing powers in terms of goods and services. If the price-level is higher in one country than in another, this will tend to break down the value of the currency of the country in which prices are higher in terms of other currencies.

This theory again undoubtedly possesses an element of truth; but like the Quantity Theory of Money it is by no means easy to apply in practice. For, in the first place, all prices do not exert the same influence upon the movement of the foreign exchanges. If a commodity is of such a nature that it cannot be exported, but can be sold only in the home market, a divergence between its price in one country and its price in another will not necessarily influence the relative values of the national currencies concerned. The fact, for example, that house rents may be higher in Great Britain than in France may be practically without influence on the relative values of the pound sterling and the franc. The Purchasing Power Parity theory, to the extent to which it works at all, works mainly in terms of the prices not of all commodities but only of such commodities as enter freely into international exchange. Such goods as wheat, raw cotton, coal and other raw materials and foodstuffs, which are largely imported and exported and have something approaching a world price, have far more influence upon the level of the

exchanges than commodities which enter less or not at all into international trade.

Moreover, the level of the exchanges between countries is determined not only by the movement of the money required to finance current transactions between them, but also, and especially at times of abnormal activity or depression, by the movement of capital. The relative values of different national currencies depend on the higgling of the market between those who want to buy and those who want to sell the currencies in question. But the desire to buy or sell francs or dollars may be based either on the need for getting foreign money in order to pay for current supplies of goods or services, or on the desire to move capital resources from one country to another. To whatever motive the demand for a particular currency is due it will have exactly the same influence on the price at which that currency can be procured in terms of other currencies. In fact, in recent years the relative values of different national currencies during the suspension of the gold standard have been due fully as much to international capital movements as to the relative purchasing powers of the various currencies within each national economy. The Purchasing Power Parity theory of money is useful and true up to a point ; but there is need for the greatest care and caution in interpreting it and in drawing conclusions from it concerning current fluctuations in the international value of the various national forms of money.

The Quantity Theory of Money is important, because it has been commonly used by the financially orthodox as a sufficient answer to all the schools of inflationists and reflationists. Issuing more money, we are told again and again, merely makes prices rise, and reduces the quantity of goods which money commands. It cannot increase the quantity of goods available for purchase. This is of course true enough if we begin by assuming that all the existing resources of production that are worth using are already in full employment ; for in that case there is clearly no way, except fresh invention or discovery, or an increase in the

productivity of those engaged in industry, of increasing output, and the creation of additional money cannot lead to an increase in real income, though it may lead to important changes, for good or ill, in the ways in which the real income is distributed among the various sections of the community. It will inevitably affect distribution, and affect it differently according to the methods used in putting the fresh money into circulation. Usually, when fresh money is created in such circumstances, the effects on distribution will be adverse ; for the " forced savings " inflicted on the consumers by the rise in prices will go chiefly to swell the real incomes of speculators, entrepreneurs, and owners of business equities as against the recipients of wages and fixed incomes.

But the initial assumption that all the existing resources of production are already in full employment is essential to the validity of this argument. For, if this is not the case, it is evidently possible that an increased issue of money will affect not merely the distribution of an unchanged volume of output, but the quantity of goods produced. For there are idle productive resources which the new money can presumably, if it is rightly applied, be so used as to bring into play ; and in that case it is fully consistent with the Quantity Theory of Money that an addition to the supply of money should increase real, as well as nominal, wealth. Nor is there any reason, in the nature of things, why this increased production should not occur without any rise in the level of prices, provided that the fresh supply of money is only enough to balance the additional production which is brought into being with its aid.

But, in practice, it is almost impossible to increase the supply of money, even in these circumstances, without causing a rise in prices. For the new money, even if it is issued in the first instance in the form of credits to the producers, and not directly to the consumers, gets into circulation, through the payment of wages and in other ways, faster than the new goods created with its help can become available for consumption. There is, accordingly,

an increased demand for both producers' and consumers' goods before there has been time for the supply to be increased; and in these circumstances prices must rise. But there is in effect no reason why this increase in prices should be more than temporary, unless it is subsequently maintained by the creation of yet more additional money. For as the fresh goods come into the market to balance the new money created at first, prices will tend to slip back to the old level unless the issue of new money is continued on an increasing scale. In past booms there has been a tendency for this to happen; for the rise in prices brings more and more borrowers into the field, and the banks go on lending even when a further enlargement of credit cannot be accompanied by a corresponding expansion in output. Moreover, as we shall see in the next chapter, it is not easy to prevent money created for industrial expansion from slipping out of the industrial into the financial circulation, thus causing demand for yet more new money in order to keep up the pace of industrial advance. For the present, however, we must leave this important complication aside.

It is clear that, unless the inflation were continued beyond the point at which the new money was effectively balanced by additional output, the rise in prices caused by it would be temporary, and prices would before long be slipping back to the old level. As a matter of common sense, this points to the desirability, in circumstances in which large-scale unemployment of productive resources exists, of controlled reflation up to the point at which the unused resources have been brought back into play, provided that the reflation can be so controlled that it does bring them back into play. This can be ensured only if speculative excesses can be kept under control, and if such rises in prices as occur can be promptly offset by a rise in consumers' incomes sufficient to buy the increased output at the prices at which it is offered for sale.

If, however, consumers' incomes do rise fast enough to buy the increasing output as it becomes available, at the higher prices caused by the initial reflation, the tendency

for prices to fall back to the old level will obviously be counteracted. This presents the real problem for those in control of the reflationary policy. For they have to decide which of three things they want to bring about. Do they want prices, after rising, to fall back to, or towards, the old level? Or do they want to raise prices permanently to a new level regarded as more appropriate to the existing wage, fixed-income and debt structure of the community, and to hold them at that level, subject to subsequent adjustments in the light of changing levels of cost and productivity? Or do they want to administer to industry a permanently increasing dose of monetary inflation, even after the resources of production have been brought back fully into use?

The third policy can be ruled out absolutely, as wrong and inevitably disastrous, because it is bound to lead to a speculative boom which will pass quite out of control, and to a gross mal-distribution of income between different sections of the community. But the choice between the other two policies remains open, and has to be made on grounds of expediency rather than principle. It is, in effect, only a question of choosing the point at which the increase in the supply of money is to be, first slackened off, and then stopped. For, broadly speaking, if the additional money is only enough to balance the additional flow of goods and services, prices will tend to slip back to the old level; whereas any excess of new money over additional goods will tend to keep prices above that level.

In general, if reflation starts from slump conditions, in which prices are out of adjustment with the current debt and income structure, it will usually be desirable that prices should be durably raised to some extent. To what extent depends on the degree in which readjustment is needed, and on the extent to which real costs of production are falling as output is increased.

But when this question has been answered, and a desirable price level fixed in the minds of the controllers of monetary policy, it becomes their manifest object to stop

the increase of money at the right point, but to do this not by a sudden jolt certain to upset equilibrium and lead to a new crisis, but by gradually slackening off the rate of increase for some time before the maximum amount at which they are aiming has been reached.

This is, of course, a greatly over-simplified statement; and much that is written in the following chapters brings out complications to which no reference has been made here and objections of which nothing has been said. Moreover, in this simplified presentation of the problem, I may seem to be ignoring my own warnings against the unduly uncritical acceptance of the Quantity Theory. My point, however, about the Quantity Theory is not that it is untrue as a theory, but that it is very difficult to apply in practice. I agree that the controllers of a policy of monetary "management," whatever their ideas and objects, must always be under the necessity of applying the principles underlying the Quantity Theory of Money, and that this must always be a highly complex problem. That, however, is to say that the policy here outlined requires very skilled and well-informed management, and not that it is in any way wrong. The question which the world—and each country—has to decide to-day is whether it has at its command a sufficiency of skill and knowledge to undertake this vital work of monetary control, or whether it must remain at the mercy as heretofore, of a monetary system which, supposed to be automatic and self-adjusting, has in effect again and again thrown the entire productive organisation out of gear, and condemned many millions of people to unemployment and unnecessary poverty. I am far from suggesting that the technique of control needed to remedy this situation has yet been fully worked out, or that there is general agreement among skilled persons about the basic principles of monetary management. If we attempt control, we shall make many mistakes; but we shall learn from them, and it is surely better to learn from our mistakes than to drown because we refuse to attempt to master the difficult art of swimming.

CHAPTER II: MONEY AND THE WORLD CRISIS

By G. D. H. COLE

IN 1929, on the eve of the world crisis, the financial circles of the world were congratulating themselves that the long period of currency disturbance which followed the World War had at length been brought successfully to an end. All the leading countries of the world, with the exception of China, which still remained on a silver standard, had come back to the gold standard, and those of the smaller countries which had not yet finished the process of currency stabilisation seemed to be well in sight of its complete accomplishment. The reign of inflation and of deflation alike was held to be over, and it was widely believed that the restoration of stability to the world's currencies had laid sure foundations on which there would be speedily built up a satisfactory new structure of international economic relationships. It was widely hoped that, now currencies had been stabilised, it would soon be possible to arrest the upward movement of world tariffs, to check the tendencies, particularly in certain European countries, making towards Economic Nationalism, and to build up, side by side with the political structure of the League of Nations, an effective system of world co-operation in the economic field. For many had held that, whereas it was hopeless to expect any effective restoration of economic internationalism as long as currencies remained unstable, the close co-operation which was being established between the leading Central Banks would speedily prepare the way for the re-establishment of the free international movement of goods and capital that had gone with the rapid economic advances of the nineteenth century.

It is true that the conditions under which the gold standard had been restored differed very greatly from one

country to another. Some countries, such as Great Britain, had gone back, to the accompaniment of a large measure of deflation, to the pre-war parity of their national money, while others had restored the gold standard only by means of a large measure of currency devaluation, and yet others —above all, Germany—had been compelled to introduce an entirely new currency unit based upon gold, and virtually to wipe out the inflated money of the years immediately following the war. The process of restoring the gold standard had been almost everywhere painful, and in many countries it had only been carried through at the cost of considerable temporary unemployment and economic dislocation. But in 1929 most of the leading authorities were inclined to hold that the world's troubles were already almost over, and that it no longer mattered by what methods or at what level currencies had been stabilised now that stabilisation could be regarded as an accomplished fact.

Of course, each country, when it stabilised its currency at a particular level in terms of gold, committed itself to certain corresponding adjustments in its national economic structure. France, for example, stabilised under conditions which, by placing a low external value on the franc, made easier the internal transition, whereas Great Britain, by forcing back the pound to its pre-war gold and dollar value, imposed on herself the necessity for large internal economic readjustments if the new arrangements for stabilisation were to be successfully maintained. It was, however, widely believed that, however awkward and painful the process of readjustment might be in a particular country, each country had in fact by 1929 so committed itself as to allow of no going back, so that it seemed plausible to think that the world could rely on stable exchanges for the future, accompanied by a gradual readjustment of internal conditions in each country to fit in with the requirements of the new valuation of its currency.

Moreover, in 1929 it was widely believed that the problem of reparations, if not already solved, was at any rate well in

hand. It might be necessary to revise the conditions incorporated in the Dawes Plan of 1924; and the preliminary discussions which finally led up to the Young Plan were already going on. But the contemplated revisions were not intended to interfere with the general settlement of the reparations problem that had been achieved in 1924, and to most people it seemed necessary only to complete the process which had been already begun of commercialising German payments and thus removing the question of reparations permanently from the sphere of political controversy. With reparations went the European debts to the United States ; for, as long as the reparations settlement held, no great difficulty was likely to arise in maintaining European payments to America. These payments too would, it was hoped, before long be placed on a commercial rather than a political footing, and a renewed Europe, advancing rapidly in wealth and production, would be able to sustain without disaster the enormous burden of debt which had been left behind as the legacy of the war and of the confusions of the immediate post-war years.

Everyone knows now how speedily these hopes of the world's orthodox financiers were to be disappointed; and everyone can see that the situation of the world in 1929 was by no means so settled and satisfactory as many people then believed. It is easy enough now to realise that the revival of European and above all of German prosperity and production between 1924 and 1929 was the result of highly artificial conditions, and depended on the continued pouring into Europe of a vast stream of American capital. It is clear too that, although production had been advancing fast all the world over and especially in Europe during the years immediately before the slump, the productive system was by no means in so healthy a condition as it appeared on the surface ; for already there had developed in the price structure of the newly stabilised world economic system serious mal-adjustments which threatened to throw the whole precariously moving mechanism out of gear. The prices of agricultural and other primary commodities

were already falling sharply in relation to the prices of manufactured goods, and this fall in relative prices was already imposing serious handicaps on the agricultural and other primary producers in all countries, and on the entire national economies of those countries which depended largely on the export of primary goods for the purchase of necessary imports and for meeting the service of their external debts. In America industry was booming, but farmers were already grumbling with more than their traditional gloominess, and with good cause ; while in many of the less advanced European countries as well as in Germany the power to purchase necessary imports in face of declining agricultural prices depended essentially on continued borrowing from abroad. It is easy now to see how deeply rooted were these causes of disequilibrium in the world economic system even before 1929. But there were comparatively few who saw them, and still less who realised their real character, as long as the post-war world appeared to be steadily gaining in prosperity and in political as well as economic stability.

Over the world as a whole the price-level had been falling for some years before 1929. But it was in the circumstances of these years exceedingly difficult to disentangle the world causes from the purely national causes of this decline. For while each country was engaged in stabilising its currency in relation to gold and in carrying through the internal readjustments which stabilisation demanded, the level of prices in each country was bound to pursue a course influenced largely by purely national conditions. In these circumstances it was hard to say what the world level of prices was, or how far it was really showing a downward tendency apart from purely temporary influences connected with the readjustment of national currencies. In any case many people held that a continued fall in the level of world prices was eminently natural and desirable as long as it remained within manageable limits. For if, as was undoubtedly the case, the general efficiency of production over the world as a whole was increasing and the real costs

of production were accordingly tending to fall, was it not desirable that prices should fall correspondingly, and the benefit of increasing efficiency be taken out in the form of a greater purchasing power of money rather than of an increase in money incomes? In the countries in which currencies had been largely devalued in the process of stabilisation there was a very strong body of opinion which held that this should be so; for the fixed income classes which had found their real wealth largely reduced by devaluation saw in a steadily falling price-level the chance of getting a bit of their own back, and felt that in common justice nothing should be done to prevent prices from dropping nearer to the pre-war level.

There is indeed a great deal to be said for the view that in a healthy and successfully functioning economic system within which the available resources of production are already fully employed at least a part of the benefits of increasing efficiency should be taken out in the form of lower prices rather than of increased money incomes. This question is discussed in detail in a later chapter of this book; here it is only necessary to say that a policy of allowing prices to fall in proportion to the increasing efficiency of production does seem on the face of the matter to offer the best hope of avoiding disturbances in economic equilibrium which arise out of monetary causes. For there is no reason to suppose that a fall in prices which is no sharper than the accompanying fall in the costs of production will have a deterrent influence on the volume of output and employment; and, if it is postulated that the available productive resources are already in full use, it follows that production requires no additional monetary stimulus, and, indeed, that any such stimulus is likely to introduce disturbances and disequilibria into the system. What is needed under such conditions is that money should be as nearly "neutral" as possible, and this seems most likely to be secured by an arrangement which allows prices to fall, at any rate to some extent, as the efficiency of production rises, though, as we shall see in a later chapter,

it is impossible to isolate the right price-policy from the policy which is being pursued in the matter of wages.

The falling price-levels of the years before 1929 did not, however, at all correspond in their incidence to the requirement of neutrality ; for it is manifest that the fall in the price-level was by no means being distributed amongst the different classes of goods in proportion to the changes in the costs of producing them. Large advances were doubtless being made in the efficiency of agricultural and other primary production as well as in manufacture ; but there is no reason to believe that efficiency was advancing faster in agriculture than in industry, whereas agricultural prices were undoubtedly falling very much faster than the prices of manufactured goods. Accordingly the changes in the general level of wholesale prices, as measured in the index numbers published by the various countries, by no means adequately reflected the realities of the situation. For the " general level of prices " is for most purposes no more than an abstraction ; and what matters to producers and consumers alike is far less the general level of prices than the absolute and relative movements of the prices of the particular goods which they are attempting to sell or buy. It was by no means comforting to the farmer that the level of wholesale prices over the world showed a reduction if this general reduction was made up of a large fall in the prices of agricultural produce and a very much smaller fall, or even no fall at all, in the prices of agricultural machinery and other industrial goods which he needed to purchase.

Nor was it even necessarily comforting for the manufacturer or the industrial worker that the prices of industrial goods should remain high in relation to those of agricultural products ; for the fall in agricultural prices necessarily meant a sharp restriction in the purchasing power of the primary producers and of those countries which depended mainly on the sale of primary goods. Accordingly the manufacturer was only able to sell at the higher prices maintained for his output a reduced quantity of goods, and in these

circumstances he reduced the number of workers whom he employed, with the consequence of inducing a fall in the consuming capacity of the market in the industrial countries as well. For the unemployed worker, even where he received some form of maintenance at the public expense, found his purchasing power severely curtailed ; and the sums paid out to him in doles were largely withdrawn from the purchasing power of the employed workers and of other sections of the community. It was often suggested that the remedy lay in the hands of the manufacturers and of the Trade Unions. Let the manufacturers reduce the prices of their products so as to bring them within the lowered purchasing capacity of the primary producers. Let the industrial workers, it was said, in order to enable this to be done, consent to accept lower wages in the hope of getting their own back both through an increased volume of employment and through the greater purchasing power of each unit of money. But it was not so easy in practice for the manufacturer or the industrial worker to follow this advice. For the fixed elements in costs of production, especially those arising out of debts, were very large ; and the cuts in prices which would have been required in order to bring industrial goods in sufficient volume within the purchasing capacity of the primary producers would have been enormous. Moreover, the wage-earners were widely sceptical of the elasticity of demand for their products within any price range that wage reductions which as they could possibly be expected to accept would render practicable. Nor were they less sceptical of the likelihood of a fall in wages and in the prices of manufactured goods carrying with it anything like a corresponding fall in the retail cost of living—any more than the sharp fall in agricultural prices had brought with it a corresponding fall in the retail cost of food. In these circumstances there was already, even before 1929, a large amount of distress owing to low agricultural prices among producers of primary commodities and a considerable volume of unemployment among the industrial workers in the more developed countries.

It was however, still widely hoped in 1929 that these were mere growing pains of the new post-war economic system, and that the disequilibria which had previously existed were in process of being gradually refined away by the working of the " natural " economic forces making for internal readjustment. Indeed, in some quarters it was very strongly urged that readjustment on a satisfactory basis would speedily come about if only the Governments of the world would refrain from bolstering up unsound positions, and give freedom for natural economic forces to act, and if only Trade Unions and working-class political parties would refrain from maintaining unsound wage rates with the aid of expensive systems of social legislation. This attitude, however, ignored many vital factors in the situation. In the first place it totally ignored the immensity of the debt burden under which the world was endeavouring to struggle back to prosperity. For every fall in the level of prices necessarily brought with it an increase in the real magnitude of debts fixed in money and therefore unfixed in terms of goods. It ignored, moreover, the increased strength of Trade Unionism and of working-class parties in the more advanced countries and the growing volume of public opinion behind the view that a world rapidly increasing in wealth and productive power could obviously afford better than ever before to maintain a high level of social legislation in the interests of its poorer sections.

In one respect the situation during the years immediately before the world slump presented a curious paradox. From the standpoint of production the rate of advance that was being achieved was considerably greater in Europe than in America. But it was in America and not in Europe that the peculiar phenomena associated with a boom were developing and that the so-called " prosperity psychology " was advancing to an extreme point. Europe, with much leeway to make up—for a large part of the European productive system had been badly shattered as a result of the war—was rapidly increasing its output of almost all classes of commodities, agricultural produce, raw materials, and

finished goods alike. In the United States, on the other hand, the general level of production, after an exceedingly rapid advance during the war and the immediate post-war period, was going ahead at a considerably slackened pace, and the American boom consisted far more of an extraordinarily sharp rise in the stock exchange value of industrial securities and in the prices of real estate than of a continuous advance in the volume of production and employment. There was already, in addition to a good deal of distress among the farmers, burdened with debt charges incurred when agricultural prices were at a much higher level, a growing volume of urban unemployment, reinforced by a drift of surplus agricultural labour into the towns. This growth of unemployment was put down by contemporary American opinion mainly to the rapid advance of mechanisation in both industry and agriculture ; for this was undoubtedly lessening the demand for labour at a steadily increasing rate. It was held that this " technological " unemployment was merely a phenomenon of transition from one system to another, and that the abundant consuming power of the American people would in due course bring about a complete absorption of the redundant workers into new occupations corresponding to the changes in demand which would accompany a rapidly rising standard of life. Americans themselves, and foreign visitors who reported upon conditions in America, spread far and wide the legend of unending prosperity, and in face of the enormous optimism of the stock markets it was difficult to believe that there could be much wrong with the American economic outlook. Speculation in stocks and real estate had come, moreover, to be the occupation not merely of a small class of professional operators, or even of a limited group of rich men, but of a large and growing section of the public, including the better paid workers, so that the bullish atmosphere of the stock markets penetrated far and wide into the homes of the American people. Who could help feeling rich when abounding paper profits were being made by the appreciation of security values, and who

could help feeling confident when industrial shares were being written up to a stock exchange value which reflected an anticipation of still vaster profits in future years? For optimism wrote up the values of common stocks of favoured companies to a point which made their immediate yield in terms of income ludicrously small, and it was clear that these values could be justified only on the assumption that American prosperity was still but beginning and was destined to take a further great leap forward in the very near future.

Meanwhile that specious abstraction, the " general level of prices," which in most other countries showed a falling tendency, was in the United States practically stable, and was being deliberately kept so by the operations of the American banking system. For the American bankers, with a large volume of economic opinion behind them, were working on the theory that the stabilisation of the price-level was the best means of assuring the permanence of economic prosperity, and of avoiding either deflationary or inflationary dislocations. Accordingly by means of open market operations and a liberal credit policy the Federal Reserve System, albeit with occasional hesitations and oscillations of view, held up the " general level of prices " in the United States in face of an undoubtedly sharp fall in the real costs of producing goods. But, as we have seen, this stability of the " general level of prices " did not and could not mean that the prices of individual commodities remained stable. It could not be effective in holding up the prices of those goods which America required to sell largely abroad, and it was by far most effective in holding up the prices of such goods as were consumed exclusively at home and protected by the high and rising American tariff. In these circumstances, the policy of stabilising the " general level of prices " meant that the further the prices of such goods as wheat and cotton, which were not under domestic control, fell on the world market, the more had the prices of other goods in the American market to rise by way of compensation. For if a general average is to be kept stable,

and some of the things included in the average fall, obviously the remaining elements have to rise all the more. The American policy of general price stabilisation therefore served to exaggerate the disequilibria between the movements of the prices of raw produce and of manufactured goods, and thus to lower still further the purchasing power of the agricultural sections of the public over industrial commodities. The bottom was thus falling out of the market for industrial goods in the agricultural parts of the United States even before the coming of the world slump.

Moreover, the policy of price stabilisation in face of greatly increasing efficiency of production obviously involved the realisation in industry of a large surplus, which had somehow to be shared between profits and wages. In fact, wage rates in the United States, which had risen rapidly during the war, were rising only very slowly during the years immediately before the slump; and in consequence of the increasing mechanisation of industry, which was reducing the numbers employed in industrial processes, the actual wages bill of industry was probably tending to fall in total amount. The absence of any system of public provision for the unemployed caused this fall in the wages bill to react more sharply on the total volume of working-class purchasing power than a similar fall would have done in such a country as Great Britain; and the policy of price stabilisation reacted so as to keep the cost of living high. In these circumstances by far the greater part of the gain which arose out of the policy of stabilising prices was bound to accrue to the profit-receiving classes. But the profit-receivers, in the circumstances of the boom years, were likely to use by far the greater part of their gains not in the purchase of additional commodities, but in investment and speculation, so as to receive a share in the vast paper profits which were being made on the stock markets and in real estate. This meant that the demand for goods lagged more and more behind the rapidly increasing productive capacity of American industry and agriculture, and that the additional money poured out by the banking

system in its endeavours to stabilise the price-level flowed irresistibly into speculation, so as to account for the obviously exaggerated writing up of stock market values. In addition, in view of the large prospects of profit opened up by the stock market situation, foreign capitalists were induced to transfer balances from Europe to the United States, and thus to swell the activity of the speculative movement.

This situation, however, could not possibly last. For in writing up the values of common stocks the speculators were in effect postulating a continuous and rapid increase in the volume of demand for commodities. Stocks were only worth high prices on the assumption that people were prepared to buy the rapidly growing volume of goods which the American business system was prepared to pour out. New investments floated under the boom conditions were worth while only on the same assumption. But sooner or later the disproportion between the growth in the amount of money circulating in the country and the amount that was being used for the actual purchase of commodities was bound to become manifest, and there is no doubt that the great recession which took place in the American stock markets in the autumn of 1929 was due to a realisation among the speculators—and first of all among the inner ring of speculators—that for some months already the demand for commodities had been lagging sharply behind, and that it was tending to fall further and further into arrears of the growth of productive capacity. As soon as even a few important stock operators had come to realise this, there was bound to be a sensational business collapse ; for, when once the selling began, the inflated stock market values were bound to tumble down at a prodigious pace. At the same time the reversal of fortunes in the stock markets was bound to bring with it a cessation of the boom in industrial investment and in the constructional trades, especially the building industry, which had been hard at work putting up palatial blocks of new offices in all the principal cities. Moreover, as soon as stock market values began to be written down, the vast section of the American

public which had been drawn into speculative activities at once became conscious of a sharp fall in the value of its monetary assets. For the paper profits arising out of the writing up of stock market values had been largely regarded by the public as an accession to income rather than a mere increment of capital. Feeling poorer, the deflated speculative public made haste to curtail its buying. There was an immense fall in the activity of the instalment purchase system, which had partly helped to maintain demand during the boom; and dealers, conscious of a sharp contraction in the current volume of demand, made haste to restrict or rescind orders and to cut down stocks to the lowest possible point, thus passing back to the industrial producers an immediate fall in demand far greater than the current fall in actual consumption.

It is easy in retrospect to see the inevitability of the American business slump ; but it is not so easy to see how far it is to be attributed to one cause or another. For undoubtedly there were a number of different causes, all related and all operating side by side. In the first place, there was the sharp contraction in agricultural prices, common to America and to the rest of the world. Secondly there was the growth of mechanisation, which was proceeding even faster in the United States than in any other country. Thirdly, there was the failure of the American wage level to rise fast enough even to offset the contraction in the volume of employment, much less to absorb the growing production of which the economic system was becoming capable. And fourthly, there was the deeply rooted tendency of the American public, arising out of certain fundamental characteristics of the American economic system, towards speculative excess, and this was greatly reinforced by the activities of an immense propagandist organisation originally built up during the war, but now turned, with all its forces, to the boosting of the " prosperity psychology " of the American people. Last but not least, there was the attempt of the American banking system, in face of all these factors, to maintain a stable

" general level of prices," in the belief that this was the best way of securing the economic system against the interference of monetary forces.

It is at any rate safe to conclude that the stabilisation of the general level of prices acted as a powerful exaggerating force in bringing about both the boom and the subsequent slump. It exaggerated the boom because it was impossible for the banking system in creating money to discriminate effectively between its industrial and its purely financial use, or to prevent the additional credits which it granted from being drawn into the speculative movement in stocks and real estate. As we have seen, the attempt to keep commodity prices stable involved, in face of the fall in the prices of primary goods, an exaggerated rise in the prices of manufactures. This engendered a boom in the common stocks of industrial concerns. But when once this boom had begun and the money created by the Federal Reserve System in order to stabilise commodity prices began to be drawn away into the speculative field, the more this happened, the more money it became necessary to create if commodity prices were not to fall ; so that the creation of money through the banking system became a cumulative process, and each fresh dose of money was of diminishing efficiency in maintaining commodity prices and tended increasingly to be drawn away into speculative use. If the American experience of 1928–1929 has taught the world nothing else, it should at any rate have taught it the danger of a facile belief that to stabilise the general level of prices is to ensure the neutrality of money in economic affairs.

It does not, however, follow that the policy of price stabilisation was the cause of the American disaster, though undoubtedly it very much exaggerated its magnitude. For even if the American banking system, instead of trying to keep prices stable, had allowed them to fall in correspondence with the growth of productive efficiency, the other causes making for disequilibrium would still have been present to upset, though in less measure, the balance of the economic system. The discrepancy between agricultural

and industrial prices would still have existed, though it would have been less marked. The fall in the relative purchasing power of the agricultural sections of the community would still have occurred—and the agricultural population is still an enormously important part of the American market for industrial goods. The speculative temper of the American business man and of the American public would still have been a factor to be reckoned with, though it would not, as it did in fact, have been immensely stimulated by the provision of credits *ad lib.* Finally, there is no reason to suppose that the American Trade Union movement, weak and divided as it is, and totally ineffective in certain industries, would have succeeded any better in raising wages in correspondence with the increase in productive capacity, or that the recipients of income in the United States would have been prepared, even apart from the effects of banking policy, to apply a sufficient proportion of it to the purchase of commodities for the increasing productive capacity of industry and agriculture to be adequately employed. The roots of disequilibrium go down far too deep in American economic life to be set right by a mere manipulation of the financial system. All that can be said is that with the best intentions the policy of the American banks made the situation worse than it need have been.

The American boom and slump were scarcely less disastrous for Europe than for the United States. For Europe, during the years between 1924 and 1928, had been building up its new economic system and re-equipping its industries with the aid of large borrowings of capital from the United States. This borrowed money was indeed for the most part applied to actual productive uses, though some of it was in effect used to keep up the interest payments on European debts to the United States, and the apparent solution of the problems of reparations and intergovernmental debts reached after 1924 was in fact no solution at all. Europe was able to pay America what was owing because America steadily lent Europe more than enough to meet the bill. In other words, there was no real repayment,

but an actual increase in the burden of debt laid upon the future. This, of course, need not have been a fatal objection if two conditions had been satisfied. First, if the American money had been effective in so raising European productivity as to enable the interest charges to be more than met out of increasing production, and secondly if the Americans had been prepared to receive payment in goods. The first of these conditions was on the whole satisfied, on the assumption that no new disturbance arose to throw the European economic system out of gear ; but the second was never satisfied at all, for the Americans were pursuing a policy of increasingly high Protectionism in the interests of their own industries, so that the United States was in the wholly anomalous position of being a great creditor country which aimed at exporting far more than it was prepared to import. As long, however, as the stream of American capital flowed uninterruptedly into Europe, the absurdity of the situation was not apparent. For it could always be supposed that at some unspecified time in the future the Americans would be prepared to receive payment in European goods, and for the present their preparedness to lend enabled the European countries to carry on.

This situation was, however, totally upset by the American boom ; for citizens of the United States, finding prospects of profit in their own country far exceeding anything that they could hope for in Europe, were no longer in a mood to lend their money abroad. There was accordingly a sudden and sharp fall in the volume of American capital exports to Europe, and this fall reacted with exceptional severity on the economic system of Germany, which had been largely rebuilt since 1924 with the aid of American borrowed money. Only with the aid of this money had Germany been able to pay reparations in accordance with the schedules embodied in the Dawes Plan. For a time the dislocating effect of the withdrawal of American capital from Europe was concealed in a variety of ways. For by various credit expedients, and above all by replacing long-term with short-term advances, the European countries

were able to carry on without disaster as long as the boom lasted, in the hope that the boom conditions in America would prove to be transient and would give place before long to a renewal of more normal but still prosperous economic activity accompanied by a resumption of overseas investment.

The American slump of 1929 at once destroyed these hopes ; for in face of the slump Americans were even less prepared to place their money in long-term investments in Europe than they had been during the boom. There was a scuttle for safety among the deflated investors of the United States, and their conception of safety certainly did not include locking up their money in long-term investments in European countries which were bound to be adversely affected by the American collapse. For despite the high American tariff the American market was of very great importance to the European countries both directly and because the Americans imported large quantities of raw produce from countries to which in turn the European nations sold their industrial exports. The collapse of the American market meant that the countries which had been in the habit of selling America their goods lost their ability to pay for imports on anything like the previous scale, and this reacted at once on the exports of the leading European countries. It therefore looked unsafe and unprofitable to invest in Europe ; and, besides, the Americans, badly tied up at home as a consequence of their own stock market collapse, were engaged in a scramble for liquidity rather than a search for fresh fields for long-term investment.

The immediate reactions of the American collapse fell above all upon Germany and Central Europe. For Germany had been the largest borrower from the United States, and the German bankers and industrialists had been to a large extent financing by way of credits the economic development of the Central European countries. Faced with a withdrawal of American credits and at the same time with a contraction in the market for goods and a severe fall in commodity prices, the Central European banks found

themselves at once in a position of very great difficulty. It was impossible for them to recover the short-term advances which they had made as these fell due ; and where the banks had become involved in industrial investment or had made advances against collateral, the value of their assets or of the security which they held against advances was very greatly impaired by the fall in commodity prices and economic prosperity. This applied not only to industrial but at least in equal measure to agricultural advances ; for, as the fall was most severe in the case of agricultural products, the value of farm stocks and of agricultural land declined very sharply indeed, so that the mortgages which had been obtained by the farmers soon came to be out of all relation to the value of their assets or to their current ability to pay. In the agricultural countries frozen farm mortgages became for farmers and bankers alike the most pressing of all economic problems, and as the depression continued all sorts of expedients had to be adopted in order to prevent the complete collapse of the farmers. In some cases mortgage interest, and in some the principal as well, were drastically scaled down ; but in a larger number of countries resort was had to moratoria which, without definitely modifying the sums due, postponed payment in the hope of an eventual recovery restoring the debtors' ability to pay. This enormous burden of farm mortgages in Europe, as well as in the United States, is still hanging over the heads of the agricultural communities, and it has furnished during the past few years the strongest of all motives for the maintenance of high agricultural protection, with the object both of saving the farmer from utter ruin and of enabling his creditor to recover a part at least of what has been lent. The movement behind agricultural Protectionism in Europe is strong because it has the support not only of the agricultural interests but also of those who have lent the farmers money, and are accordingly interested in the maintenance of land values at the highest possible level.

In Europe the problem of farm mortgages tends to be met

GOLD RESERVES OF THE LEADING COUNTRIES (CENTRAL BANKS AND GOVERNMENTS)

(IN MILLIONS OF DOLLARS)

End of year:	1913	1918	1924	1928	1930	1931	1932	1933 (April)
U.S.A.	1,290	2,658	4,090	3,746	4,225	4,051	4,045	3,977*
U.K.	165	521	748	748	718	588	583	905
France	679	664	710	1,253	2,100	2,699	3,254	3,170
Belgium	48	51	53	126	191	354	361	371
Holland	61	277	203	175	171	357	415	374
Switzerland	33	80	98	103	138	453	477	460
Italy	267	203	221	266	279	296	307	343
Germany	279	539	181	650	528	234	192	98
Spain	92	430	489	494	471	434	436	436
Argentine	256	304	444	607	412	253	249	249
Brazil	90	26	54	149	11	0·3	0·2	0·2
Canada	117	130	151	114	110	78	84	77
Australia	22	104	130	109	75	52	42	4
India	124	64	109	124	128	162	162	162
Japan	65	226	586	541	412	234	212	212
U.S.S.R.	786	—	73	92	249	328	368	—
Sweden	27	77	64	63	65	55	55	71
Total of 50 countries	4,857	6,808	8,956	10,028	10,917	11,291	11,897	11,976

* In April 1933 the total monetary gold stock of the U.S.A., including gold in circulation, was estimated at 4,312 million dollars.

GOLD PRODUCTION

(IN MILLIONS OF FINE OUNCES)

End of year :	1915*	1924	1928	1930	1931	1932
South Africa . .	9·1	9·6	10·4	10·7	10·9	11·6
U.S.A. . . .	4·9	2·5	2·2	2·3	2·4	2·5
Canada . . .	0·9	1·5	1·9	2·1	2·7	3·1
WORLD . . .	22.6	19·1	19·6	20·3	22·2	23·9
,, (millions of dollars)	467	394	405	420	458	494†

* Record year.

† In 1932, the production of gold was reinforced by a gold export of 234 million dollars from India and China, and by some melting down of gold not previously in monetary use, estimated at 48 million dollars.

by the adoption of high protection for agricultural products ; and it can partly be met in this way, to the extent to which the European countries are able to consume their own home produced supplies of foodstuffs. But in the United States and in those European countries which are considerable exporters of agricultural commodities this remedy is obviously not available ; for no system of agricultural protection will avail to raise agricultural prices where the goods have to be sold under competitive conditions in foreign markets. Again and again proposals have been put forward for meeting this difficulty by forming a consortium of European countries, including both importers and exporters of agricultural goods, with the object of according a preference to European foodstuffs in the markets of the European importing countries. But nothing has so far come of these projects, because the importing countries have been unwilling to make the required concessions to the exporters except on conditions—on which they have not been able to agree among themselves—concerning the preference to be accorded to their own manufactured exports. Consequently the mortgage problem remains acute all over Europe and serves as a powerful reason both for the maintenance of high agricultural protection and for the prevalence of peasant discontent with the prevailing political system, whatever it happens to be.

The European banks, however, found themselves tied up in the period following the Wall Street crash not only on account of the agricultural situation but also in respect of the advances which they had made to industry and commerce. In general, as we have seen, agricultural prices fell far more sharply than those of manufactured goods ; but the position of the European industrialists was only less difficult than that of the farmers, because, although the prices at which they sold their goods fell less, the maintenance of prices at a relatively high level involved a far sharper contraction of the total amount of sales. Consequently, whereas in the peasant countries the chief effect of the slump was seen in a widespread fall in the standard

of living, in the industrial countries it appeared rather in a great increase in the volume of unemployment, which in turn reacted upon the purchasing power of the industrial populations. In these circumstances business men who had borrowed money at short-term during the period of prosperity found themselves unable to pay it back, especially where they had applied short-term credits to relatively long-term uses, in the anticipation that bank advances would be readily renewed. The banks thus found themselves unable to collect the sums due to them, and had, whether they liked it or not, to arrange for renewals. But the Central European banks had depended for their ability to make these advances largely on their own borrowing from abroad, and when a part of their assets became frozen they were in turn unable to make repayments as they fell due to the bankers in the richer countries from which they had borrowed.

In consequence, the slump reacted at the second stage upon the bankers of Great Britain, France, Switzerland, Holland and the United States. But it reacted most seriously of all upon Great Britain, because the British financial system, with its long tradition of pre-eminence in the financing of trade by way of bills, had stepped most actively into the breach caused by the large-scale withdrawal of American money in the course of the Wall Street boom. The French were less affected, because they were able to maintain the liquidity of their own banking position by withdrawing a part of the large sums which they had held on deposit in the United States. These withdrawals largely account for the great flow of gold from the United States to France which set in during the period after the slump. In this great intake of gold into Europe certain smaller countries, notably Switzerland, Holland and Belgium, also shared ; indeed these smaller countries raised their gold reserves by a far larger percentage even than France, though of course the total amount of gold which they held was very much less.

Meanwhile, in face of the further fall in prices and of the

dislocation in the world market which followed the American collapse, the European countries, and also those of South America, found themselves confronted with a very difficult international trading situation. One and all, they found the value of their exports rapidly falling, whether this was due primarily, as in the agricultural countries, to lower prices, or, as in the industrial countries, to a fall in the volume of demand. But it was by no means easy for these countries to make proportionate cuts in the value of their imports. The industrial countries required for the maintenance of their standard of life large quantities of agricultural imports, and also of raw materials for their industries ; and, though they were now able to purchase most of these at very much lower prices, these reductions in cost did not in most cases offset the falling values of exports. Even where they did, or more than did as in the case of Germany, the situation was no easier, for the Germans had now to meet out of the proceeds of their exports not only the cost of imports but also reparations charges and interest on foreign debts, which they had previously been meeting by means of the import of capital. In these circumstances every country, from a purely national point of view, could see strong reasons for desiring to curtail its imports to the utmost possible extent by artificial means, so as to prevent such an adverse balance of international payments as would lead inevitably to the collapse of its recently stabilised currency.

At first most countries attempted to achieve this curtailment of imports by raising tariffs to a higher level ; but, as the volume and the value of exports continued to fall, this measure became obviously inadequate, and tariffs were more and more supplemented by special restrictions upon imports, and also at a later stage by the regulation of foreign exchange. A perfectly solvent purchaser in a country threatened with an adverse balance of international payments might find himself in these circumstances quite unable to buy from abroad goods which he badly needed and for which he was personally ready to pay, because under

the regulations imposed on the supply of foreign exchange there was no means open to him of converting his money into a form in which it would be accepted in payment abroad. Consequently import restrictions and the control of foreign exchange became even more effective instruments for the stifling of international trade than the high tariffs which were in force in almost every country. But obviously all countries could not set to work simultaneously to curtail their imports without proportionate effects on the volume of exports. For one country's imports are another country's exports, and if the one falls, the other must fall too. Accordingly, although most countries did succeed in lessening their adverse balance of trade by the measures which they adopted, this result was secured only at the cost of a proportionately sharp contraction in the total value of international trade as a whole. This in turn forced down the level of prices still further and thus increased the real burden of the foreign debts which each country was under contract to meet. But it was largely for the purpose of meeting these debts that the whole system of control had been imposed. While, therefore, one country might slightly improve its position in relation to others by the controls which it imposed, the general effect of the controls on the world as a whole was bound to be disastrous, because it greatly magnified the already top-heavy burden of international indebtedness by putting it still more out of adjustment than it had been before 1929 with the levels of world prices.

Until 1931 Great Britain, in face of increasing difficulties, maintained her Free Trade system in a world of rising tariffs and trade restrictions, which she made by her Tariff Truce proposals of 1929–30 a great effort to get modified. Meanwhile, the difficulties of the European banks and of her own industries were reacting more and more upon the British banking system, and the British banking situation was greatly worsened when, in 1931, the troubles of the bankers in Central Europe came to a head, first with the collapse of the Austrian *Credit Anstalt* in the summer of

1931, and a little later with the crisis in the German banking system which began with the breakdown of the *Danat Bank*.

Directly, indeed, the British financial crisis of 1931 was not brought on by the European situation, but rather by a loss of confidence in the stability of the pound sterling on grounds which were mainly domestic. The British Labour Government then in office was accused of extravagance in its administration of the public funds ; and the May Committee on National Expenditure produced in the summer of 1931 an alarmist report alleging the inevitability of a huge budget deficit during the current financial year. That the May Committee's statement of the situation was grossly exaggerated no one can now doubt ; but its publication at a time when grave fears were entertained for the solvency of the European banking system and when British financiers were known to be heavily involved in the affairs of Europe was enough to cause a serious run on the pound.

At this stage the Bank of England, with the support of the Labour Government, made the disastrous mistake of borrowing short-term assets from abroad in an attempt to stem the run by a demonstration of its ability to remain upon the gold standard. This policy might have been workable if the gold value placed upon the pound sterling by the terms of the British return to the gold standard in 1925 had really represented a sound valuation of the British currency in relation to the British structure of costs and incomes. But in fact the return to pre-war parity in 1925 had substantially over-valued the pound and made the maintenance of the restored gold standard always a difficult operation during the following years ; for the structure of prices and incomes in Great Britain proved far more resistent to the deflation required of it by the restoration of the gold standard at the old parity than the advocates of this restoration had expected, and under these conditions the maintenance of stable exchange rates was a difficult enough matter even apart from any special factors tending to shake the faith of financiers in the stability of the pound. Consequently, when the crisis came and the

May Committee produced in the middle of it this alarmist report, the run on the pound which followed was obviously too severe to be countered by short-term borrowing from foreign banks. It would have been far better to go off the gold standard at once when the run began ; for from the very moment of its beginning a fall in the external value of the pound was in fact inevitable.

When at length Great Britain did go off the gold standard and allow the value of the pound to fall, British exporters immediately experienced a substantial relief, and Great Britain was able to stand up relatively well to the world economic depression largely because of this advantage, which had once more brought her structure of incomes and prices back into a more realistic relation to the gold value of her currency. It is probable that the depreciation of sterling was far more effective than the tariff, which was speedily imposed by the new National Government, in helping Great Britain to maintain her position relatively well in face of the world depression. But it has of course to be agreed that the tariff did further result in a substantial improvement in the British trade balance by shutting out abnormal importations which countries at their wits' end to find markets for their products would have been eager to dump into the one remaining large Free Trade market in the world.

Great Britain's action in going off the gold standard, and allowing the external value of the pound to depreciate without fixing any new parity, was speedily imitated by a number of other countries which were in close trading relations with her. Above all, Scandinavia and certain of the countries of the British Empire came together to form a sterling group of countries which now related their currencies to sterling rather than to gold or to the currencies of countries remaining upon the gold standard. Canada, torn between her close trading relations with Great Britain and the United States, adopted a middle course, allowing the Canadian dollar to depreciate in relation to the United States dollar, but not to the full extent of the depreciation of sterling. South Africa, as the

CURRENCIES IN THE WORLD DEPRESSION

	Approximate Percentage Depreciation in terms of gold, June 1933	Percentage Depreciation in terms of gold. Average of 1929	Date of suspension of Gold Standard or of effective beginning of Depreciation	Date of imposition of Foreign Exchange Control
Turkey	89	89	Never restored	2/30
Japan	58	8	12/31	7/32
Greece	57	0	4/32	9/31
Spain	56	24	Never restored	5/31
Uruguay	56	5	4/29	9/31
Mexico	55	3	7/31	—
Chile	50	1	4/32	7/31
Brazil	48	1	12/29	5/31
China	48	0	Silver standard	—
Australia	45	1	12/29	—
New Zealand	45	1	4/30	—
Denmark	44	0	9/31	11/31
Finland	41	0	10/31	—
Argentine	40	1	11/29	10/31
Norway	36	0	9/31	—
Sweden	35	0	9/31	—
Great Britain	31	0	9/31	—
Colombia	28	1	9/31	9/31
Venezuela	27	0	9/30	—
Canada	27	1	9/31	—
Yugoslavia	23	—	7/32	10/31
Austria	22	0	10/31 (official 4/33)	10/31
U.S.A.	21	0	3/33	3/33
Estonia	6	0	6/33	11/31

Other countries which restrict foreign exchange, while nominally still on the Gold Standard, with date of restriction : Germany (7/31), Bulgaria (10/31), Hungary (7/31), Latvia (10/31), Roumania (5/32), Czechoslovakia (9/31).

Other countries which are on a Sterling Standard : India, S. Africa, Ireland, Egypt, Portugal.

Countries which remain on the Gold Standard : France, Belgium, Holland, Switzerland, Italy, Poland.

largest gold producer in the world, felt a profound concern in maintaining the value of gold, and therefore remained until 1933 upon the gold standard, only to be driven off in the long run by the excessive handicaps which this imposed upon her other exporting industries. Australia, which had been in the throes of a serious financial crisis before the British crisis developed, allowed her currency, which was already depreciated in relation to sterling, to fall further as sterling fell, so that the Australian pound remained as before at a discount in relation to the British currency. At a later stage New Zealand, which had previously preserved parity with sterling, depreciated her currency to the Australian level, and thus drove Denmark, as New Zealand's chief competitor in the British market, to similar depreciation of the Danish *krone* below the degree of depreciation in Sweden and Norway. Finland also depreciated her currency to a greater extent than the other members of the sterling group, but maintained a fixed relationship with sterling at the lower level.

There thus arose a group of countries with their currencies pegged at varying levels to sterling in such a way as to form a financially unified area of international exchange. Meanwhile the remaining countries divided themselves roughly into four groups—the countries which remained effectively on gold, those which stayed nominally on gold under a drastic system of exchange restriction, the United States, and a miscellaneous group which either had never returned to the gold standard, or was driven off it by the crisis and allowed its currencies to depreciate without entering the sterling area. The first group, in possession of large gold reserves which had been greatly swollen by the withdrawal of balances from America after 1929, remained, and remains as I write, upon the gold standard without the necessity for imposing any special restrictions upon foreign exchange. This group consists of France, Belgium, Switzerland, and with certain reservations, Italy and Poland. The second important group outside the sterling area is composed of those countries which have remained nominally

upon the gold standard, but have been compelled, in order to maintain even a nominal adherence to this standard, to impose restrictions, in most cases very drastic restrictions, on foreign exchange transactions. This group of countries, which is headed by Germany, includes most of the States of Central and Eastern Europe. The chief reason why the former countries have not resorted, like the sterling group, to currency depreciation as a way out of their troubles is that they are for the most part debtors on a very large scale, and most of their debts are due either in gold or to countries which still remain, or have remained until recently, upon the gold standard. To the extent to which these countries owed debts in sterling, they were benefited by the depreciation of the pound after 1931, and they have been further benefited in 1933 in respect of their debts to America by the fall in the value of the dollar, especially in view of the abrogation of the gold clause included in many American contracts. But they still owe large sums either in gold or in gold standard currencies, and most of them cannot even now afford to resort to currency depreciation on account of the immense inflation of debt burdens in their own currencies which such a step would involve. It was largely a similar consideration in the case of American debts that prevented Canada from following Great Britain in 1931 into the sterling group.

Thirdly, we come to the United States, which remained upon the gold standard until the crisis of 1933. Or perhaps it is truer to say that during the years up to 1933 the United States was on a dollar standard which it experienced no difficulty at all on international grounds in keeping at parity with the gold standard. For great as were the internal difficulties of the American economic system, and large as was the fall in the American favourable balance of trade during the years of depression, there was never any question of the United States having an unfavourable balance or being unable on international grounds to maintain the dollar at its existing gold value. When the United States decided to go off gold in the course of 1933,

the main motive for this action was not international but domestic. The root difficulty of the American economic system was that, in face of the enormous fall in prices and security values, the burden of debts of all sorts had mounted up out of all proportion to the assets of the debtors or to the collateral held against them by the creditors. Farmers owed in mortgages sums out of all proportion to the value of their farms or their crops. Bankers had made advances to industry on collateral which had fallen in value far below the sums advanced, or had themselves bought securities which were now worth far less than the deposits owing by them to their customers. Consequently the entire situation of American agriculture and of American banking was radically unsound. For a long time the banks tried to hold up the position by refraining from placing their shares on the market save at a carefully regulated rate ; for they realised that in the current situation of American industry large-scale sales of shares were bound to bring prices crashing down even more disastrously than they were falling without this added stimulus. But as the pressure for additional liquid resources increased, the weaker banks were compelled to sell, and the effort to hold up unsound banking positions with the aid of the Reconstruction Finance Corporation could only defer and not avert the trouble, which finally came to a head in the banking crisis of the early months of 1933. The policy pursued thereafter of guaranteeing deposits in the reopened banks is commented on in a later chapter.

The United States, then, went off the gold standard with the aim of freeing her hands for the pursuit of an internal policy which would raise domestic prices and security values, and so make manageable the enormous burden of debts which was weighing down the economic system. The aim of those responsible for this policy was far less, indeed it was hardly at all, that of making the dollar worth less than it had been in terms of other currencies, though this was in fact an incidental result of going off gold. The aim was to make possible, without an outflow of gold to which

no limit could be seen, the raising of the American price-level to a point at which equilibrium would again be reached between the selling value of goods and securities and the debt structure.

Nevertheless, the departure of the United States from gold was followed by a very sharp fall in the external value of the dollar ; and it is necessary to inquire what accounts for this fall in view of the fact that there was no adverse balance of international payments to be redressed. The answer must be that the main cause of the fall in the external value of the dollar up to the time of writing (July 1933) has been speculative. Holders of dollars have sold them and converted them into other currencies because of the anticipation that a rise in the American price-level will cause the dollar to become actually worth less in terms of goods than the currencies for which it can be exchanged, and also because of the widespread belief that the American Government means at some time in the future to fix for the dollar a new gold value substantially lower than that which has been hitherto in force.

Now these speculators may be either right or wrong. There has been already a sharp rise in the prices both of primary commodities and of securities in the United States. But the extent to which this rise is unsoundly speculative, in the sense of misinterpreting the future course of events, remains to be seen. Moreover, a rise in American prices will involve a fall in the value of the dollar only if it is not paralleled by a corresponding rise in prices in other countries ; and this obviously depends both on the success of the reflation boom in the United States in leading to a revival of confidence and demand in the world as a whole, and on the policies pursued by other Governments, which mostly profess, equally with that of the United States, to desire a rise in the level of prices, though they have shown no sign that they are ready to take any steps designed to bring this about. Moreover, although President Roosevelt is credited with the intention of definitely devaluing the dollar at some future date, no one

knows at what level this devaluation is to be made, whether there is at present any definite figure in President Roosevelt's mind, or even whether he does intend to fix a new gold value at all. Probably his own mind is not made up ; for it seems likely that he is waiting to see what will be the effects of the policy he is now pursuing both on internal conditions in the United States and on the attitude of other countries. This being so, the entire movement of the dollar exchange in recent months is speculative not only in the sense that it is mainly the result of the actions of speculators, but also in the sense that these speculators are not in a position to do more than gamble in highly uncertain futures.

It is of the first importance for the shaping of the world's monetary policy in the existing emergency that the motives behind the American action in depreciating the dollar should be clearly understood. In certain European countries, notably in those which have remained upon the gold standard, there has been a strong disposition to condemn the action of the United States on the ground that for a country deliberately to depreciate its currency when it is in no real difficulty in meeting its external obligations is a positive breach of faith. In addition, the Americans have been suspected of the desire to secure by currency depreciation additional outlets for their goods in the markets of the world ; and there have been already many threats of reprisals by European countries in the form either of a general rise in protective duties or of special discriminating tariffs against exports from countries whose currencies are at a discount. There is, however, no real reason to believe that the American policy has been shaped primarily with a view to the expansion of American exports. Indeed, there is every reason to believe that the Americans are doing all they can to promote a rise in their cost- and price-level at least equivalent to the fall in the external value of the dollar, and thus to counteract entirely the effect of currency depreciation in serving as a bonus to exports. So far, at any rate in the case of the primary commodities which America

WHOLESALE PRICES. RECENT MOVEMENTS

PRICES ON SEPTEMBER 18, 1931 = 100

	Prices in dollars (Irving Fisher Index)	Prices in sterling (*Economist* Index)	Prices in francs (Index No. Inst. Inc.)
End of 1932	83·5	101·2	90·1
January 25, 1933	80·5	101·3	90·4
February 22, 1933	79·9	99·5	89·4
March 22, 1933	82·1	99·0	89·5
April 19, 1933	82·8	98·7	88·3
May 31, 1933	90·0	105·3	90·9
June 28, 1933	94·4	107·6	88·1

WHOLESALE PRICES SINCE 1913

AVERAGE OF YEAR (1913 = 100)

	1921	1924	1929	1932	1933 May
U.S.A. (official)	140	141	137	93	90
U.K. (Board of Trade)	197	166	137	102	99
France (gold) (official)	—	—	127	87	78
Germany (official)	—	137	137	97	93

COST OF LIVING SINCE 1914

AVERAGE OF YEAR (1914 = 100)

	1921	1924	1929	1932	1933 May
U.S.A.	177	171	171	134	129
U.K.	226	175	164	143	136
France (divided by 5)	—	—	111	105	105
Germany	—	128	154	121	118

chiefly exports, the rise in prices has been at least as great as the fall in the dollar, and in some cases substantially greater. There has been therefore no export dumping with the aid of the depreciated currency by the leading American industries or by American agriculture. Indeed, the present fear of the American administration is obviously that internal prices may be forced up by speculators to too high a level, and may so get out of adjustment with the purchasing power of the American home market.

The desire to prevent this, and to provide for an expansion in the consuming power of the American people corresponding to the upward movement in prices and production, lies at the basis of the Industrial Recovery Act which President Roosevelt is endeavouring to put into effect as I write. For the Industrial Recovery Act is based upon a simultaneous regulation of prices, wages and production, to be carried through by industries themselves under agreed plans approved by the Government, in such a way that the increase in output and prices will correspond to the rise in the purchasing power of the American public brought about by a regulated increase in the level of wages.

It is of course open to objectors to the American policy to argue, as some of them do, that this grandiose scheme of balanced economic reconstruction in the United States is bound to break down, and that all that will be left behind amid the ruins of the Industrial Recovery Act will be a currency depreciation which, whatever the intentions of its promoters, will in fact lead to American dumping on the world market, and thus serve not to raise but to lower still further the level of world prices in terms of gold. This may, indeed, conceivably happen ; but it is still far too soon to take for granted the failure of the American plan, and there is every reason for the world as a whole to hope for its success. Unfortunately, the hostile and non-co-operative attitude of the leading gold standard countries is actually prejudicing the success of the plan and making less improbable the very outcome of which they are afraid. For it will obviously be far easier for President Roosevelt to raise

the level of American prices in an orderly and well distributed fashion, and to avoid the danger of a speculative upward movement being followed by a speedy collapse, if other countries are at the same time taking parallel steps to raise their price-levels both by controlled systems of monetary reflation and by accompanying measures designed to improve the level of domestic demand. There would be far less reason to fear that the American plan will fail, at any rate in giving the world a period of revived economic activity, if it were being pursued in concert by a number of leading countries.

The gold standard countries are, however, exceedingly reluctant to fall in with any attempt to raise prices by the method of monetary reflation. In the first place, they are holders of very large stocks of gold, and they feel that they have an interest in preserving the value of this gold in terms of commodities—an ambition which is obviously quite inconsistent with the desire, which their spokesmen have again and again expressed, to see a rise in the level of world prices. Secondly, these countries are all in a state of panic about the dangers of inflation. Several of them passed through periods of acute inflation in the years immediately after the war, and have re-stabilised their currencies only on a basis of very great devaluation. Thus in France the gold value of the franc is only one-fifth of what it was before the war, and in some of the other gold standard countries the ratio of depreciation is even greater, even apart from countries, such as Germany, which were compelled practically to wipe out their old currencies and make a fresh start. Devaluation on this scale is bound to leave behind it, in any country in which it has been experienced, both very strong fears of any reflationary movement and a keen sense of an injustice that ought to be remedied by a falling price level. Those who have had a large part of their savings swept away by drastic devaluation feel that they have a claim that the goods value of the savings which remain to them should be increased by a fall of prices at least corresponding to any increase in the world's productive

capacity. Any Government in such a country which declared boldly for a policy of reflation would have to face the strong opposition of its *rentier* class and especially of a large body of small savers. In such a country there may of course be a strong desire to bring about an increase in the prices of certain special types of goods which are of importance in the national economy—of the prices of agricultural products, for example. But this is a very different matter from a desire for a reflation designed to raise the general level of prices for goods of all kinds. When the French spokesmen at the World Economic Conference or elsewhere give their adherence to the policy of raising prices they are in fact thinking far more of a rise in the prices of certain special types of products than of prices generally. For in France the *rentier* class is an exceptionally powerful electoral influence, and any Government of the Left is bound to desire to placate it as well as the peasants, in whose interest the rise in agricultural prices is desired.

Consequently the gold standard countries have met President Roosevelt's policy of reflation with extreme hostility and suspicion. They recognise indeed that some devaluation of the dollar is now inevitable ; but they feel that President Roosevelt ought at once to declare at what level he proposes to fix the American currency, and thus to bring the period of uncertainty to an end and stop the speculative movements which are at present going on. So strongly do the gold standard countries feel this that, as we have seen at the World Economic Conference, they are barely prepared to discuss anything else until they have assurances that the Americans will return to the gold standard in the near future, and some guarantee that in the meantime exchange fluctuations will be kept under drastic control. But President Roosevelt on his side has been unprepared to give any such promise ; for, as his policy of reflation is directed to the internal needs of the American situation and is not aimed primarily at affecting relative currency values, he is not in a position to say at what gold value the dollar will be able to settle down consistently

with his desire to bring about a return of internal prosperity in the United States.

How soon he may be in a position to say this it is impossible to tell. Indeed, it is at present impossible to say whether or not the United States has any intention of returning in the future to the gold standard in its traditional form. For President Roosevelt, in the course of the long distance exchanges which accompanied the opening of the World Economic Conference, expressed his preference for long-term stability of internal prices as against the stabilisation of the exchanges ; and this suggests that he intends, not merely in the emergency but in the long run as well, to shape his monetary policy with a view to the internal needs of the American economic system rather than to making the stability of the exchanges his permanent object. All President Roosevelt's recent utterances read as if he had in mind the adoption of something in the nature of Professor Irving Fisher's well-known proposal for a "compensated dollar," which is of course quite inconsistent with long-term exchange stability between a currency so managed and currencies still on the gold standard in its traditional form.

For in the famous message which caused so much consternation among the delegates of the gold standard countries at the World Economic Conference President Roosevelt declared in favour of the stabilisation of internal purchasing power of the dollar not merely over a short period but from generation to generation. He was clearly at that stage thinking in terms of the establishment of a standard of value unchanging in its command over commodities, and regarding this as a far more important object of monetary policy than the stabilisation of the rates of exchange. Of course, it is conceivable that a currency might be made stable both in its purchasing power over commodities and in its rate of exchange with other currencies. But this implies either that the country in possession of such a currency is in a position, on account of the strength of its international relationships, to maintain a stable exchange ratio irrespective of the relation of its

price-level to the price-levels of other countries—which is in the long run out of the question—or that other countries are pursuing successfully in the management of their currencies a similar policy of price stabilisation, and so eliminating the principal underlying cause of exchange fluctuations.

For it is at any rate arguable that there would be no real difficulty in keeping exchange rates stable against other causes of fluctuation if prices in the countries concerned could be relied upon to preserve a constant relationship. There would still remain causes of exchange fluctuation arising out of capital movements, seasonal variations in the amount of payments due, and so on ; but there would be no more reason for these causes to upset the exchanges than there has been between two countries working upon the traditional gold standard. Such fluctuations in exchange rates as they were likely to cause could for the most part be readily met by allowing a margin similar to that which exists under the gold standard system (gold points) with the aid of a certain amount of management through an Exchange Equalisation Fund or by the unaided action of the Central Banks. It may be that President Roosevelt would be much best pleased if other countries would also take stabilisation of the internal price-level as their ideal, and thus enable him to reconcile this policy with stability in the rates of exchange ; but in his pronouncements in the summer of 1933 he made it plain that, if he had to choose between the two forms of stability, he had every intention of choosing the stabilisation of internal prices. How far this is in fact a wise choice is discussed in later chapters of this book ; and it would be out of place to attempt any anticipation of the argument here.

It has, however, to be borne in mind that, when President Roosevelt or any other spokesman puts forward at present the stabilisation of internal prices as an ideal, he is very far from having in mind their stabilisation at the existing levels. What the advocates of price stabilisation are seeking is, first of all, such a rise in prices as will put business back upon a satisfactory footing and once more establish

equilibrium between the price system and the existing structure of incomes and debts. In other words, monetary reflation is to precede stabilisation, and is to cease only when prices have been raised to the required level. This of course implies that the raising of prices by monetary reflation can be accomplished in such a way as to establish a new equilibrium at a higher level, and can be kept under such control as to prevent it from leading to a speculative boom and collapse. As I write, movements of prices in the United States, where the policy of reflation is already in full swing, are being watched by economists and financiers all over the world with the utmost interest from this point of view. For the policy of reflation has obviously considerable dangers. The immediate effect of putting it into force, and even of declaring the intention of putting it into force, in the United States in 1933 was to bring about a rapid rise in the prices of the leading primary commodities and also of common stocks of industrial enterprises. This rise was accompanied by a real increase in the volume of business done, as was shown by the figures of output in the steel and motor car industries and by the statistics of car loadings and bank clearances in other cities besides New York. But these movements, during the early months of reflation, were obviously due rather to increased speculative activity in the stock and produce markets and to increased orders by traders and intermediate producers in the anticipation of enlarged demand than to any actual increase in the volume of retail sales of consumers' goods. Indeed, up to the time of writing the published figures of retail trade in the United States show very little expansion and are still in many cases below the figures for the corresponding months of 1932. This seems to indicate that, up to July 1933 at any rate, the policy of reflation had been successful in causing a considerable advance of speculation and an anticipation of better business in the minds of many traders and manufacturers, but that it had not yet reached the stage of producing any substantial increase in the volume of consumers' demand.

Its long-run success as a policy, however, clearly depends on consumers' demand expanding, not merely step by step with the advance of production, but at a more rapid rate. For the object is not only to sell more goods and create more employment, but also to sell these goods at a higher price. It is accordingly indispensable for the success of the American policy that consumers' incomes, and above all the incomes of those consumers who chiefly supply the demand for mass-produced industrial goods and for foodstuffs, should expand rapidly. For otherwise the speculative boom will obviously collapse, and traders, so far from passing on increased orders to the earlier stages of production, will proceed again to contract their stocks, and thus bring about a more than proportionate decline in the volume of business at this second stage. That is why the American Government is now making haste to complement the policy of monetary reflation by trying to bring about as rapid a rise in wages as industry can be persuaded to accept —within the limits set by the desire to bring about a balanced expansion of demand—and that is also why it is anxious, despite its desire to raise the price-level to a satisfactory height, to prevent prices from rising too fast, because an excessive speculative rise in the level of prices will inevitably cause them to get out of adjustment with the expansion of consumers' incomes.

In fact, the policy of reflation cannot be exclusively, or even mainly, a monetary policy. It is doubtless indispensable that additional supplies of money should be available through the banks for the financing of an increased volume of transactions at a higher price. But the real problem of reflation is not the making available of these additional supplies of money, but the stimulation of consumers' demand ; and this can be brought about only if the additional money which the banks are prepared to create is brought into effective use in such a way that it does pass speedily into the pockets of persons who will use it for actual spending on goods and services. At the same time, it would of course be possible for consuming power to run

too far ahead of the available supply of goods, and for business costs to be raised so fast as to destroy the profit incentive for the employment of additional labour, and thus defeat the policy by causing the total wages-bill to fall despite the advance in wage-rates.

It would, therefore, be useless merely to raise wages without taking any other steps to stimulate demand. For a rise in wages or a reduction in hours, so introduced as greatly to increase the wages cost of production, would obviously, if the other factors remain unchanged, lead in some industries to a contraction of employment and thus neutralise the increase in the purchasing power of the workers who remain in work by destroying the incomes of those who are thrown out. Accordingly, while it is indispensable to the success of the policy of reflation that wages should rise promptly and to a greater extent than either prices or the volume of production—for the increased incomes have to be sufficient to offset both—a further element in any policy which is to succeed must be the positive creation of new demand by Government action. That is to say, the Government must, in addition to enlarging the available supply of credit and causing a rapid rise in wages in private industry, embark on large-scale public expenditure of such a sort as will speedily, by enlarging the area of employment, place additional purchasing power in the hands of the consumers without deterring the private employer. This is of course the significance of the large scheme of public works now under contemplation in the United States.

The most obvious difficulty, however, with schemes of public works is that they usually take a considerable amount of time to set in actual operation. For, before work can be actually started and wages dispensed, plans have to be made, and often a good deal of time has to be taken in overcoming the reluctance or opposition of interested local authorities or other bodies, and in deciding the terms on which the works are to be executed and paid for. In the past schemes of public works launched with the intention of

counteracting unemployment and increasing the current volume of purchasing power have often matured so slowly as to be in fact very little use, and even to reach their maximum at a time when, owing to the improvement of normal demand, they coincided with a high level of employment in industry as a whole. It is accordingly necessary, if public works are to be effective as a part of a systematic policy of reflation, that they should be greatly speeded up, so that the actual distribution of purchasing power which they involve takes place soon enough to coincide with the other measures described above. In particular, if the institution of a deliberate policy of reflation has in the first instance been effective mainly in causing a speculative upward movement based on the anticipation of increasing demand, it is vital that the actual increase in demand should come before there has been time for the speculative improvement to spend its force and to encounter the disappointment of finding its hopes of early expansion at the consumers' end falsified.

Needless to say, it cannot under any circumstances be an easy matter so to control all the forces which are involved in this co-ordinated policy of reflation as to secure the necessary balance and synchronisation of the various factors. In order to do this, it is necesssary for the Government responsible for the policy to be in possession of a very large measure of control over every essential aspect of the national economic activity, including not only the banks but also the entire system of production and industrial employment. The Government must be able to issue to industry its orders both as to the amounts that may be produced and the prices that may be charged, and as to the wages to be paid and the hours to be worked. Moreover, the Government must be in possession of sufficient financial resources to enable it to carry rapidly into execution a large-scale plan of public works, and must have sufficient administrative authority to override any local authority or other group or interest that attempts to obstruct or delay the execution of its schemes. Before embarking on the

present policy, President Roosevelt did succeed in arming himself with all the powers required for carrying it into effect, as far as these could be conferred upon him by vote of Congress and by his own prestige and popularity in the country. He was in a position, in the early months of his tenure of office, to issue orders even of the most drastic kind, in the confidence that public opinion was behind him in taking any necessary steps for their enforcement, and that the American constitution would be interpreted elastically in his favour if any question of the legal validity of his measures arose. He had, moreover, the advantage that many schemes of work had been held up by public bodies in consequence of their financial condition, after definite plans had been worked out—so that these plans were available for the purposes of his scheme, and the actual execution of public works could be greatly expedited with their aid.

But even with these advantages his task was one of extreme difficulty. For he was trying to convert in a period of a few months the most highly individualistic capitalist system in the world into a system of strongly centralised Government control. It was comparatively easy for him to take the early steps while the banks were still in hopeless confusion and the business world in a panic ; but it looked likely that, precisely to the extent to which his measures were successful in restoring confidence among business men and actually promoting an increase of economic activity, the resistance to his authority would increase, and the individualistic temper of the American people reassert itself. The real test of President Roosevelt's policy may therefore be expected to come if and when he has been successful in overcoming the early difficulties and begins to come up against the growing resistance of those who want to use the opportunity for the amassing of quick profits and resent the necessity, which will have to be imposed upon them if the policy is to succeed, of raising wages faster than prices are allowed to rise.

It is, however, impossible at this stage to anticipate the

future course of events in America, both because the American Government is embarking upon an unknown economic sea, and because it is not even now possible to discern clearly the whole of President Roosevelt's mind. It is, however, evident that his policy, whether it succeeds or not, is bound to take some time to work itself out, and that in the meantime the United States is most unlikely to commit itself to any international measures which might in any way interfere with full freedom to pursue the course dictated by internal events. This means that, whether or not the gold standard is likely to be restored on an international basis in the long run, there can be no question of the United States being a party to its restoration in the near future.

It is indeed very doubtful whether the Gold Standard will ever come back in its old form, despite the devotion to it of those European countries which are still clinging to it in face of all the present difficulties. For it is being more and more realised that in fact the Gold Standard, as it existed in the years immediately before the great depression, was by no means the same thing as the Gold Standard expounded in the textbooks of orthodox economics, or even as the Gold Standard which existed before 1914. There are several reasons why it could not be the same. In the first place, the Gold Standard of the textbooks never existed in its pure form in the real world. That is to say, there never was a Gold Standard which operated purely automatically, prescribing an inexorable law to which all banking systems had without question to conform. To a certain extent the Gold Standard always was a " managed " standard. But up to 1914, owing to London's pre-eminence in the world's money market, it was in effect a standard managed by London, and so managed that the fact of its management was hardly realised. London, as the recipient of by far the greater part of the world's current output of gold, and as overwhelmingly the most important financial centre, was in a position so to manipulate the Gold Standard as to make it in effect a sterling standard.

This situation could not possibly be reproduced after the war when London, although it largely regained its pre-eminence as a centre of short-term commercial finance, was no longer the world's leading capital market, and the control of financial operations had necessarily to be shared between a number of different financial centres of varying degrees of importance. In these circumstances the Gold Standard lost even the degree of automatism which it had possessed before the war, and became to a greater extent a managed standard. But it was managed, no longer by a single authority, but by the distinct and sometimes conflicting judgments of a number of Central Banks and financial agencies in different countries. It is indeed true that, since the British policy was to peg the pound to the dollar both before and after the restoration of the Gold Standard in 1925, the Gold Standard came in effect to be to a large extent a Dollar Standard—a situation which was confirmed both by the position of the United States as a great creditor country with a large favourable balance of trade and by the possession of an enormous gold reserve by the American banking system. But this identification of the Gold Standard with the Dollar Standard did not bring about unified control and management in the hands of the United States. For the United States was not nearly important enough as a centre of short-term financing to exercise this control. Control therefore remained divided ; but the technique of divided control was never satisfactorily worked out, despite the attempts to bring about a greatly increased degree of co-operation among the leading Central Banks. It was hoped, when the Bank for International Settlements was established in connection with the Young Plan, that the new Bank might grow from its original functions, concerned mainly with reparations, into a real international bank which would be able to take over gradually the organisation of the new co-operative relationship among the Central Banks of the various countries. But in fact this has not happened ; and it seems less likely than ever to happen now that the United States is so

clearly pursuing a policy widely at variance with that of the countries which remain upon the Gold Standard. For, if there is to be unified world management of a common standard, there must be community of objects and of economic theories among those responsible for working the standard in the various countries. But at present it is clear that no such community of object or theory exists.

Under these conditions it is more than doubtful whether a return to the Gold Standard, even if it could be successfully engineered by the world's bankers, would have anything to recommend it. For an international standard managed on the principle of pull devil pull baker would be most unlikely to work out effectively ; and it is more probable that, after the Gold Standard had been re-established at the cost of a considerable amount of wrangling, it would speedily break down under the pressure of the conflicting policies which the different countries would still be intending to pursue. But a restoration of the Gold Standard, if it were to be followed speedily by a further breakdown, would obviously be a tremendous disaster for the world as a whole. It is emphatically not worth while to put back the Gold Standard unless and until there is a sufficient amount of agreement between the monetary policies of the different countries to furnish some assurance of its co-ordinated working, and unless and until the profound causes of disequilibrium in the movements of money between countries can be removed by a satisfactory solution of the problem of international debts.

Even so, would it be worth while to put the Gold Standard back, at any rate in its previous form ? The principle on which the old Gold Standard was based was that each country should fix the value of its own currency in terms of gold, and endeavour to keep this value permanently unchanged, providing continuously for the convertibility of its currency into gold on demand at a fixed rate. There might be a divergence between the buying and selling prices of gold at the Central Bank ; but this would be a small

fixed difference which would not interfere with the permanent stability of the exchange rates within very narrow limits. In other words, the essence of the Gold Standard, as it has existed hitherto, has been its unaltering permanence—at any rate in intention. But there is no reason why gold should not be restored to a position of great importance in the making of international payments without this permanent relationship between gold and the various national currencies being resumed. For it is quite possible for the Central Banks of the various countries, just as they now alter from time to time their rates of discount or re-discount in accordance with current market conditions, to change from time to time their buying and selling prices for gold in terms of the national currency, with the object of adjusting the international value of the currency to changes in the relative price systems of the different countries. It would, of course, be important, if such a system of variable buying and selling prices for gold were established, that the changes should be made as seldom as possible, and only in connection with long-term variations in relative price systems. For it is of the greatest importance for international commerce that the relative values of different currencies should be fixed over periods long enough to eliminate exchange uncertainty in the great mass of normal commercial transactions and to render workable a regular market in forward exchange. But these conditions would not be very difficult to satisfy. It could be an understood thing that countries, while they reserved their freedom to alter the gold value of their national currencies, would resort to such alternations only at long intervals and in response to definite long-term economic movements. The requirements of short-term exchange stability, which is above all important for the trader, could thus be satisfied for the vast majority of transactions ; and there would be no difficulty in the working of a satisfactory forward exchange market for insurance against such uncertainties as remained.

Under such a modified Gold Standard silver could readily

be called in to play a part side by side with gold if this were held to be desirable. There are, however, still as strong objections as there were in the nineteenth century to a bimetallic standard, though these would not apply if "symmetallism," originally suggested by Alfred Marshall, were to be introduced. For whereas the preserving of a constant ratio between the values of gold and silver would present insuperable difficulties, there would be no similar difficulty in basing currencies upon a standard of silver and gold combined in definite proportions. It is, however, doubtful whether a symmetallic standard possesses the necessary quality of being readily intelligible by the ordinary person; and it is of great importance that the ordinary man should be able to understand so vital a matter as the monetary system under which he has to work. In these circumstances it might be better simply to modify the legislation of the various countries affecting the maintenance of metallic reserves so as to allow Central Banks, without attempting to fix the value of silver in relation to gold, to keep at their discretion part of their reserves in silver rather than gold, taking thereby the risk of upward or downward fluctuations in the gold price of silver. Undoubtedly, if this were done, and Central Banks did include a large quantity of silver in their reserves, the effect would be to bring about an appreciation in the price of silver in terms of gold, so that the banks would run no risk of loss in the immediate operations involved. This appreciation in the price of silver would, however, be simply an effect of the transition, and there would be no continuous tendency for the price of silver to rise, or even necessarily for it to be maintained when the transition had once been made. For the long-run price would depend on the effects of increased demand in causing an increase in the supply. Consequently, in the long run the holding of silver instead of gold as a part of the reserve would involve an additional element of uncertainty in the finance of the Central Banks. An experiment on these lines may, however, be worth while in the interests of the silver-producing countries.

It could do little harm ; and it might do some good in the present situation.

It should not, however, be rashly assumed that a sharp rise in the price of silver would be necessarily of advantage to the silver-using countries, and above all to China. For any increase in the price of silver would bring with it a rise in the prices of Chinese exports to foreign buyers. It would increase China's buying power over imported commodities, to the extent to which she was able to pay for them by the export of silver ; but it would decrease, in the present condition of the world, her ability to pay for imports by the export of goods. For, of course, in the case of China, the fall in the price of silver has had precisely the same effect in checking imports and stimulating exports as currency depreciation has had in the countries which have suspended the gold standard.

I have made, in this chapter, no attempt at a comprehensive survey of the monetary factors in the present world depression. To some extent, my omissions will be made good in subsequent chapters, in connection with various particular aspects of monetary policy. But many questions of importance are necessarily omitted altogether ; for the monetary reactions of the depression have been bewildering in their variety, and the sundering of monetary from other economic factors is everywhere an impossible task. I have endeavoured, in preference to attempting a more comprehensive survey, to concentrate attention on those aspects which raise questions of practical policy about which the world has to make up its mind if it is to succeed in reconstructing its shattered economic system on any basis of international collaboration and exchange. Inevitably, the great experiment now in progress in the United States has bulked large in what I have had to say ; for the United States is—apart from the U.S.S.R., where conditions are widely different—the only country which has so far made any serious attempt to escape from the depression by methods involving positive action simultaneously in the monetary and in the industrial field.

What I have tried to bring out, in discussing the American experiment, is that the raising of wages and the controlled expansion of industrial output are no less indispensable as parts of it than the reflation which is being attempted by monetary means. The essence of the American scheme is that the expansion of the supply of money, of the output of goods, and of the effective spendable incomes of the consumers should take place simultaneously, and in the right proportions. Any serious lack of balance in any of these factors will be liable to upset the entire scheme, and to bring about a renewal of the crisis. The question, of course, is whether a system of private enterprise, which still leaves both the industries and the banking system of the country in private hands, can be in practice so controlled by Government action as to secure the right balance in the development. If it can, a new prospect is opened up for the effective restoration of the capitalist system, at any rate for a time. I have always held hitherto that no such planned and balanced development of economic forces could be achieved within the limits of a system based on private ownership and relying for its incentive to produce on the expectation of private profit. But President Roosevelt has already gone further in controlling capitalist forces than anyone deemed to be possible in individualist America even a few months ago ; and, in face of the new plasticity of American economic conditions it behoves the onlooker to be wary of prophesying. If I am still sceptical, my scepticism is now rather of the long than of the short run. I do not doubt the possibility, or even the probability, of American reflation being able to bring about a temporary revival. But I do still doubt very much the ability of any Government, under capitalist conditions, to control the revival when it has occurred, or to prevent a period of restored prosperity being so abused as to lead on to an unsound boom, which will engender in its turn a fresh, and perhaps even a worse, depression.

CHAPTER III: CURRENCY AND CENTRAL BANKING

By R. F. HARROD

Kinds of Money. The function that money is required to perform in modern society is in essence a simple one. But the mechanism by which money is provided and used has become very complex with the course of time, and whoso understands these complications thoroughly is well on the way to knowledge of why and how man is failing so manifestly to achieve the comfort and happiness that lie within his grasp.

It is the purpose of this chapter to describe the regulations governing the issue of currency and the tasks which central banks do and might undertake. A description of rules governing procedure whether statutory or customary is, however, bound to degenerate into a meaningless catalogue, unless related at every point to an account of the essential purpose and nature of money. In the task of description it will probably be best to begin not with what is most fundamental but with what is most familiar.

The economic life of every individual has two aspects, his personal contribution by the exercise of energy or skill to the wealth of the community and his draft upon that wealth to provide for his own needs and comforts. The amount he is allowed to draw out of the common pool for himself or his dependents is closely related to the value assigned to what he puts in; his contribution is in an individualistic community taken to include not only that due to his personal exertion but also that which accrues from any fixed property the ownership of which is vested in him. His act of contributing to the common stock is marked by the receipt of units of money; the value assigned to the contribution of each individual in a given period may

be measured by comparing the number of units he receives with the number which any other receives. The quota of goods which he can then draw out of the common pool is proportional to the number of units of money he can offer for them. He is given money rather than goods in the first instance, in order to allow him freedom to satisfy his own private tastes ; this freedom is a great asset ; money entitles him to receive goods in general ; having made his contribution to the common stock, he can pause to consider in what form he would like to take out the share of it to which he has become entitled.

If an individual is asked how much money he has, he is likely to answer in a way that is not in accord with economic terminology. He will assess the value in terms of money of all the property he owns at the time, and give as his reply this value expressed in pounds, shillings and pence. His answer clearly does not indicate the actual number of pounds, shillings and pence he possesses, but this plus the number of pounds, shillings and pence he could acquire by the sale of the other items of his property, stocks and shares, land, houses, industrial plant, etc. The valuation thus includes not merely his title to draw upon the community's stock of goods, but also a number of goods which he has already chosen to acquire. If pressed by his economist interrogator to eliminate the items which do not actually constitute money, but are merely exchangeable for money in the market, how should he proceed ? All he need do is to ascertain the number of coins and notes in his possession and add this to his credit balance at the bank. (If, however, he is overdrawn at the bank he must *not* subtract his debit balance).[1] The total amount of money in the community is found by adding together the amounts held by all individuals, corporations and institutions ; it is equal to the total of coins and notes in circulation plus all the deposit balances at all the banks. The amount of money held by the banks themselves should, however, not be included, for reasons which will appear in due course.

[1] Cp. p. 133.

On this basis the monetary stock of the community is of two main kinds, the notes and coins on the one hand, constituting the currency, and bank balances on the other. First let us direct our attention to the notes and coins.

Coins may be principal or subsidiary. Subsidiary coins, half-crowns, shillings, pence, etc., in our own system, satisfy the needs of the community for small change. They are issued at the discretion of the Mint; their melting value is well below the value assigned to them in the monetary system and in law they can usually only be tendered in payment for limited amounts. The principles on which they should be issued are now well understood, and involve no unsolved problems. They need not detain us here.

Nor need principal coins long detain us; for, except in the East, they have gone out of fashion since the war. For purposes of this exposition, principal coins can be considered along with notes. When notes are issued there is usually a provision that a certain quantity of gold (or silver) must be held in reserve by the issuing authority to back them. Principal coins may be regarded as notes which carry the whole or part of this backing about with them. When the coins have a melting value equal to their value in the monetary system, their backing is 100 per cent. There is no difference in principle between such coins and the notes called Gold Certificates which constitute part of the U.S.A. currency and have 100 per cent gold reserve kept to back them. Thus the main kinds of money which we shall have to consider are currency notes on the one hand and banking deposits on the other.

The Gold Standard. There are two main kinds of monetary system, those the value of whose units is kept equal to some external standard, such as a certain quantity of gold or silver or units of another monetary system, and those which are independent or autonomous. In the former case the country which has such a monetary system is said to be " on the gold standard," " on the silver standard," or, where the external standard is the money of another

country, "on the sterling standard," "on the dollar standard," etc. Monetary authorities have usually made it their ideal to maintain such a standard, and regulations governing the issue of notes and principal coins have accordingly been adapted to that end. Two conditions are requisite for the effective maintenance of such a standard. One is that holders of gold, silver, the foreign currency, or whatever the standard commodity may be, should be able to get units of the home currency in exchange for it without limit at the official rate of exchange; the other is that holders of the home currency should be able to get units of the standard commodity without limit at the official rate of exchange. The former condition prevents the value of the home currency rising above its official valuation in terms of the standard; the latter prevents it falling below.

The first condition is easy of fulfilment; the currency authority has merely to print notes or mint coins in exchange for the standard commodity tendered. It is easy enough to print notes; and, as for the coins, since the value of the metal in the coin must never exceed the official valuation of the coin—for otherwise the coins would be melted and go out of circulation—the cost of providing the metal for the coins is always covered by the standard metal tendered in exchange for them at the official rate. Actually the issuing authority may be involved in a small loss; in the extreme case of notes for which 100 per cent metallic reserve is required or of coins the melting value of which is not less than their official value, the actual cost of printing or minting is uncovered. Some monetary authorities have thought it right to make a charge for this; England for centuries has made no charge, but the metal tendered was retained for a period of ten days, the presumed period required for the process, or, alternatively, cash could be obtained from the Bank of England on the spot on the payment of a small interest charge. The official valuation of sterling was £3 17*s.* 10½*d.* = 1 oz. 22 carat gold. The Bank of England was willing to give £3 17*s.* 9*d.* down. By the act restoring the gold standard in 1925, the Bank of England

was authorised to buy gold, i.e. issue notes against the tender of the standard metal, at £3 17*s.* 9*d.* an ounce, and sell gold, i.e. issue the standard metal against the tender of currency, at £3 17*s.* 10½*d.* an ounce. This difference between the buying and selling price meant that sterling had not an absolute value in terms of gold, but a value that could fluctuate between the two limits mentioned. This is a small technical point, but one that the reader would do well to bear in mind, as an extension of the gap, while consistent with gold standard principles, would do much to modify the working of the gold standard, as will be explained hereafter.

The second condition, namely that the monetary authority should always issue the standard metal in unlimited quantities against the tender of domestic currency, is less easy of fulfilment. It would be perfectly easy and indeed automatic if the issuing authority always retained all the metal that was ever tendered to it when it issued currency as a reserve against reverse demands. There would then be 100 per cent backing against all notes issued, or, in the case of coins, 100 per cent against the difference, if any, between their melting value and their official valuation. Such a system would work smoothly enough, but there are three cardinal objections to it. (1) It would be immensely expensive for any country adopting it. For instance, the Bank of England would have to hold over £400 millions of gold in addition to the reserve which it requires for other purposes. The economy, which is the main advantage of a paper currency, would be entirely forgone. (2) If it were generally adopted, the amount of paper currency in circulation in the world would have to be drastically curtailed, and this would lead to disturbances in the economic system much more violent even than those which we are at present witnessing. (3) A country adopting it would not be safeguarded against being driven off the gold standard. A gold standard can only be preserved if the central bank is able to meet its liabilities; but it has liabilities other than its note issue which it is more likely to be called upon

to meet in a crisis, and the system proposed would not automatically provide for its solvency in respect of these.

Regulations governing the Note Issue. In recent times the central bank has usually been charged with the business of note issue. With a view to ensuring its ability to convert the notes, when called upon, into the standard metal (which, in what follows, we shall assume to be gold), the legislature has imposed certain obligations upon it. These may be divided into three main types. (1) There is the system embodied in Peel's Bank Act of 1844, by which the Bank of England was allowed to issue £14 million of notes without gold backing while every note issued in excess had to have 100 per cent backing.[1] The figure for the unbacked issue was fixed at £260 million in 1928 to accord with modern requirements, and the right was granted to issue additional unbacked notes by agreement with the Treasury (a right which was utilized to the extent of £15 million between August 1931 and April 1933). This system is known as that of fixed maximum fiduciary issue. (2) It may be laid down that the Bank must retain a certain percentage of gold against the note issue. For instance, the Federal Reserve Banks of the U.S.A. must retain 40 per cent, the Bank of France 35 per cent, etc. This is known as the fixed minimum percentage system, and has been the most popular in recent years. (3) There is the system by which no specific amount of gold backing is required but a limit is placed on the total number of notes which may be issued. The Bank of France operated under this system before the war, and it is of especial interest as it was recommended for this country by the Macmillan Committee on Finance and Industry which reported in 1931.

[1] The limit of £14 million rose to £19¾ million between 1844 and 1923, owing to the fact that by the Act of 1844, private banks were allowed to retain but not increase their private note issues, and, as these banks were amalgamated or turned into Joint Stock Companies, their right to issue lapsed, while two-thirds of the issue previously allowed them was added to the fiduciary issue of the Bank of England.

In favour of the second system it may be said that it affords greater elasticity than the others; in times of expansion it is also more economical than the first, unless the law is frequently revised. When the currency requirements of the community are increasing, a larger superstructure of currency can be erected on a given basis of gold. The objections to this system appear, however, when it is put to the test by which all such systems must be judged, and notes are presented for conversion. The Bank can then only use the reserves which it has in excess of legal requirements. Thus suppose that the required proportion is 40 per cent, the notes outstanding £100 and the gold reserve £40. The legal requirement is fulfilled, but not one single note can be converted. The redemption of one note would reduce the outstanding note issue to £99 and the reserve to £39, but that would be only $39\frac{39}{99}$ per cent, which is below the legal requirement. Thus a large part of the reserve is sterilised. Since the only object of having a reserve is that in certain eventualities it should be used, the second system is self-contradictory; it locks up the reserve which it requires to be held, and makes it unusable. It is also extremely wasteful, as the gold legally required has to be held in addition to any gold that the Bank may think it needs as an effective reserve for converting notes. It is analogous to the regulation that at no time may there be less than three cabs on any rank. It has been held in the interest of gold economy, that the legal percentages should be reduced. This does not go far enough. The percentage system should be abolished. If the choice is between the first and second systems, the first is certainly to be preferred.

It remains to consider the third. It has already been stated that the central bank has other liabilities than those arising out of its note issue and that it is precisely to meet these liabilities that a central bank usually requires its gold reserves in an emergency. By reference once again to the principle that reserves are held for use and not for ornament, it appears that the Bank should be allowed to mobilise all its gold in an emergency and that no part of it

should be ear-marked against its note liability, in respect of which no demand for gold may be occurring at the time. The third system recognises this fact. An over-issue of notes is guarded against by the provision for a maximum total issue ; this can be revised from time to time, to allow for expanding needs. The third system is therefore free from the objections which may be levelled against the others.

Two further provisions should be noticed. Some central banks are allowed to hold part of the cash reserve legally required, in the form of " foreign exchange " (devisen). This expression includes foreign currency, deposits in foreign banks and drafts of one form or another of first class standing on foreign banking institutions ; the foreign country in question must be a gold standard country. For instance, the Reichsbank, the Central Bank of Germany, is required to hold a cash reserve of 40 per cent against its notes ; but of this only 75 per cent (=30 per cent of its note issue) need take the form of actual gold ; the remaining 25 per cent (=10 per cent of its note issue) may take the form of a holding of foreign exchange. Since the person presenting notes for conversion in most cases desires to obtain a given quantity of *gold value*, usually in order to acquire foreign currency, and not bar gold, the offer of foreign currency in exchange for notes satisfies his requirements equally well, and is as effective in preventing the notes from depreciating as the offer of gold would be. For this reason a central bank, operating under the obligation to maintain a specified gold proportion, often keeps that part of its reserve which is in excess of legal requirements, i.e. that part which is ready for effective use, in the form of foreign exchange. The object of this device is economy. It reduces the total quantity of gold metal which the central banks need to keep. Unfortunately the system received a severe shock when Great Britain, whose currency, being among the soundest, was often held as a foreign exchange reserve by foreign central banks, went off the gold standard in 1931. The reserve on which these central banks had been relying depreciated in gold value and they

became much less inclined to hold their reserve in this form. Thus the Bank of France converted approximately £168 million (gold) of foreign exchange into gold in the following year ; the National Bank of Belgium similarly converted £23½ million, the Netherlands Bank £13⅓ million, the Swiss National Bank £19 million, and the Bank of Italy £23 million. Their action alone represents a wasteful absorption of about a tenth of the monetary gold in the world.

When Great Britain returned to the gold standard in 1925 it was laid down that the Bank of England should not sell gold in exchange for notes in smaller quantities than 400 oz. This was a natural corollary of our decision not to return to a gold circulation. The object was to economise gold. The provision was designed to prevent people from withdrawing small quantities of gold for hoarding purposes. Since, if the notes were tending to depreciate, enough to buy 400 oz. could always be collected, this provision in no way interfered with the effective maintenance of a gold standard.

Such are the methods by which the State regulates the maximum of notes which a central bank may issue. It remains to consider how many notes are likely to be issued and how many it is desirable that there should be issued. Except in a crisis the maximum is seldom reached. The Issue Department of the Bank of England does, it is true, issue as many notes as are allowed under the law. But these do not all go into circulation ; the other department of the Bank, the Banking Department, holds the residue as an asset readily convertible into gold by transfer to the Issue Department. The position is precisely the same as though the Issue Department only issued the notes which the Bank wished to put into circulation, and the residue of gold not required by the Issue Department were held as a reserve by the Banking Department against its liabilities. The " free gold " of the Bank of England, that is, the gold which it can use for other purposes than to meet the presentation of notes, is equal to the notes in the Banking Department, i.e.

to the notes issued by the Issue Department but not in circulation outside the Bank. It should be noticed that the gold in the Issue Department which is expressed in sterling continues to be given its official pre-1931 valuation in sterling, although since Great Britain departed from the gold standard its actual value has been greater than this.

Banking Deposits and Cash. It is impossible to discuss the topic proposed in the last paragraph without first adverting to the other form of money in circulation, bank deposits. In a modern system there is usually a central bank responsible for the note issue and holding deposits for other banks, and deposit banks holding deposits for the main body of the public. Their customers' deposits constitute the principal liability of these deposit banks ; the customers have the right and may wish to exercise the right to draw out their money, on demand in the case of current accounts and after short notice in the case of deposit accounts. The term deposit is used to cover both forms of account. The banks hold assets of various forms against this liability ; part of their assets consists of cash ; this cash takes the form partly of notes and coins, partly of a deposit at the central bank. In truth the whole of their cash assets, apart from small change and principal coins, if any, usually constitute a liability of the central bank, their notes a note liability and their deposit at the central bank a deposit liability. The money held by the general public, in the sense defined above, thus consists of two parts, which, again apart from small change and principal coins which we shall neglect, directly or indirectly constitute a liability of the central bank. The notes are a direct liability ; the bank deposits are an indirect liability since to meet them the banks in their turn hold direct claims on the central bank, viz. its notes and deposits with it.

It is necessary to examine the kind of calls which may be made upon a deposit bank. A depositor may draw a cheque against his account in order to make a payment to someone who keeps an account at the same bank. In this

case the deposit bank does not have to make any payment out; its deposit liability is merely transferred from the name of one depositor to that of another. Alternatively the payment may be made to someone who has his account at another bank. In this case the first mentioned bank, say the Midland, does have to pay money out, but it goes to swell the deposits of the second bank, say, Lloyds. What actually happens is that all the cheques drawn in the course of the day are sent in to a number of clearing houses, where they are cancelled against one another, but if on balance there is a sum of money due from the Midland to Lloyds, the account of the Midland at the Bank of England is debited and the account of Lloyds there is credited with that amount. This operation thus makes no call on the resources of the Bank of England. A certain part of its deposit liability is transferred from one name, that of the Midland, to another, that of Lloyds, and no money has to be paid out by the Bank of England. If the transfer is a big one, both the Midland and Lloyds may have to consider what consequential action they should take, but that is a matter which need not concern us now.

Alternatively the depositor may wish to take the money away in cash. In this case the Midland will have to trench upon its cash reserve. Notes in hand may be paid out; it will probably replenish its till money (reserve of notes) by drawing on its deposit with the Bank of England. This process affects the position both of the Midland Bank and the Bank of England. A deposit bank usually keeps a reserve of cash assets bearing a definite proportion to its deposit liabilities; if £x is subtracted from each, as in the case envisaged, the proportion will be reduced, and it will have to consider measures for replenishing it. In the case of the central bank its liabilities will not have been reduced at all; but a note liability will have been substituted for a deposit liability. Its deposit liability to the deposit bank will have been reduced by the amount of money paid out to replenish the deposit bank's tills; its liability in respect of its outstanding note issue will have been increased by

an equal amount. In general it would be right to regard its position as neither strengthened nor weakened, were it not for the special legislation already referred to which usually governs the note issue of a central bank. The margin between the notes in actual circulation and that quantity which it is entitled by law to put into circulation will have been reduced.

Before exploring consequent repercussions, it will be well to examine more closely the original supposition. This was that a depositor may wish to withdraw some or all of his deposit in cash. This is constantly being done. On the other hand notes are continually being paid into banks by persons who wish to convert their notes into credit accounts at their bank. If payments in of this kind exactly balance payments out the position both of the deposit banks and the central bank is left intact.

It is therefore of immediate relevance to consider what the conditions are in which the conversion of deposits into cash are likely to exceed the conversion of cash into deposits. One such condition is a lack of confidence in the solvency of the deposit banks. A depositor may fear that if he leaves his deposit at the bank it will be lost, may distrust all other banking institutions which are at his disposal and prefer to hold his money in the form of cash. Abundant examples of this condition may be cited from the history of the U.S.A. in the last two years. It should be carefully remembered that such a loss of confidence in banking institutions has an effect not only on the suspect banks but on the central bank. The suspect banks may be asked to cash such a volume of deposits that all their cash assets are eaten up ; and if they have not a sufficient volume of other assets that are readily saleable without excessive loss they will have to close their doors. The central bank meanwhile is having to honour its deposit liability to the suspect deposit bank by issuing notes. And though this means not a draft upon its own assets, but a conversion of one type of liability into another, yet its position is weakened if its right of note issue is limited. The reserve which it in effect has to meet a

contingency of this kind is precisely the margin already referred to between its outstanding note issue and the maximum allowed. As this margin is reduced, its position is technically weakened. If it can replenish its gold reserve, its maximum note issue can be enlarged ; but the process of the drawing on their deposits by deposit banks does not in itself replenish the gold holding of the central bank. It is this precise predicament which led to the recent legislation (March 1933) in the U.S.A. allowing the Federal Reserve Banks (the Central Banking system of the U.S.A.) to issue more of a certain type of additional currency, Federal Reserve Bank notes, which unlike the other part of their issue (the Federal Reserve notes) do not have to be backed by gold at all.[1]

What are the other conditions in which depositors may wish to draw out additional cash from their banks ? Cash is used by two main sections of the public, as small change by those members who have banking accounts, and as their principal circulating medium by those who have not. The demand for cash is likely to rise if the former set take to carrying about a larger quantity of cash or if a rise of income or employment occurs in the latter. Apart from the lack of confidence already mentioned, the former change is likely to occur if there is a general rise in commodity prices. Such a change of habit with regard to the quantity of cash carried about may be well remembered during the course of the war in England, and more recently in other countries which experienced great inflations after the war. Shops and other trading concerns will need more cash in similar circumstances. Firms giving employment will also need more cash if their weekly pay rolls rise.

Finally reference may be made to seasonal fluctuations

[1] The main part of the Federal Reserve currency consists of *Federal Reserve notes*, against which 40 per cent of gold must be held. The Federal Reserve Banks were also empowered to issue *Federal Reserve Bank notes*, backed not by gold but by U.S. Bonds, to replace National Bank notes (issued by deposit banks) if and when required. Their right to issue this second type of currency was much enlarged by the Act, referred to in the text, for the period of the crisis.

in the demand for cash. Additional cash usually goes into circulation at the time of Christmas shopping or the summer holidays. These seasonal fluctuations are foreseen by the banks and do not present serious difficulty.

The two principal eventualities likely to cause a withdrawal of deposits in the form of cash are thus a loss of confidence in the deposit banks or a rise in the level of prices, incomes and employment. The first of these speaks for itself. The second requires much further probing. It is sometimes supposed that when a rise of prices occurs, it is always *due to* an increase of cash in circulation. The relation of cause to effect suggested in the foregoing paragraphs is the reverse of that. Analysis of the relation of cause to effect remains an obscure and doubtful branch of philosophy. This obscurity affects and destroys the value of much facile economic theorising. Suffice it to say here that only a very Pickwickian and contorted view of the process of causation could justify the view that a rise of prices is usually the effect and not the cause of an increase of cash in circulation in a community with a developed modern banking system. Changes in the general level of prices, incomes and employment are, however, intimately connected with the working of the monetary system. The conclusion that changes in the volume of circulating cash follow in the wake of changes in price and income levels does not exempt one interested in the monetary system from exploring the *causes* likely to affect the general level of prices and incomes. It merely drives him to a deeper analysis. In discussing the volume of cash in circulation at this stage, we have merely been observing the rule imposed at the beginning of taking first what is more familiar and proceeding later to what is more fundamental.

There is one more kind of way in which a deposit bank may be required to honour its deposit liability. The last case considered was when the community on balance requires more cash in circulation ; this is sometimes referred to as an " internal drain." It may happen, however, the

depositors wish to exchange their deposits not for notes or coins of the realm, but for exportable gold. This is known as an " external drain."

Members of a community frequently have to make payments abroad and conversely have payments abroad due to them. As a rule these payments undergo a process of cancellation in the foreign exchange market. But they can only be so cancelled if they balance. A temporary excess in one direction may be balanced by the offer of short loans in the other. An excess uncovered in this way may, however, occur. When the balance of payments moves against a country, the value of her currency tends to fall in the foreign exchange market. Only a limited fall, however, is consistent with the maintenance of the gold standard. It will be remembered that holders of the national currency are entitled, while the gold standard is maintained, to convert it into gold at its official valuation on demand. As the value of the national currency falls in the foreign exchange market, there comes a point when it would be cheaper to acquire gold in exchange for domestic currency and to incur the expenses of remitting it. The process of remission is generally undertaken by specialised arbitrage dealers, who remit gold, acquire foreign currency in exchange for it, offer this foreign currency in the foreign exchange market, and thus fill the gap between the demand for and the offer of foreign money in the foreign exchange market.

A withdrawal of deposits due to this cause entails a call upon the central bank. The depositor now wishes to acquire not money of the realm but gold. The central bank is under an obligation to honour its liabilities in gold. It may pay out notes in the first instance, but since its notes are redeemable in gold, it is bound to satisfy the requirements of the would-be gold exporter by cashing its notes for gold. The eventuality supposed is not likely to lead, at any rate in the first instance, to a reduction of the amount of cash in circulation ; the net effect upon the central bank consequently is that it is required to pay out

gold to meet its deposit liabilities. And it has to pay out sufficient gold to cover the " external drain."

The gold available for this purpose is whatever gold it has in addition to that locked up as backing for its note issue. This is its free gold. It must be added that when, as is the case with the Federal Reserve Banks of the U.S.A., the law requires that it shall hold a given percentage of gold against its deposit liabilities, its free gold is what it holds in excess of this. We have seen that it is the practice of the Bank of England to issue from the Issue Department notes against all the gold it has in its vaults. But not all these go into circulation. The excess of notes issued over the notes required by the community for circulating purposes is retained in the Banking Department. The notes in the Banking Department thus represent the amount of gold that is available without special provision, to meet an " external drain." But it is precisely these that are available to meet an " internal drain." The notes in the Banking Department thus represent the resources of the banking community available to meet a net encashment of deposits, whether that encashment is due to the rising needs of the community for currency or to an adverse balance of foreign payments.

The Genesis of Banking Deposits. It is time to concentrate our attention upon banking deposits. We have seen that careful regulations are usually enacted to govern the quantity of notes issued. The other part of the monetary medium consists of banking deposits which circulate from hand to hand by means of cheques. What governs the total quantity of deposits? This is a point on which the plain man is apt to entertain quite erroneous ideas. He conceives on the one hand of notes as being put into circulation at the arbitrary fiat of the issuing authority, and on the other of deposits as being piled up by the industry and thrift of the community itself. There does not appear to him to be any parallel between the act which brings a note into existence and that which brings a deposit into existence.

Yet in fact they are both acts of precisely the same nature. Unless he understands that, he will completely fail to grasp how our banking system operates.

Suppose the case of a community *which has only one bank* that issues notes and accepts deposits. Suppose a situation to exist in which an individual having acquired a claim on that bank was met by being handed out notes of the bank, consisting of a promise to pay gold on demand, a promise which might be suspended if the community decided to abandon the gold standard. When the claim of the individual is met, the notes come into circulation ; he holds them or passes them on and the community uses them as its means of payment. Instead of handing notes to the individual, the bank might suggest that the individual should satisfy himself by taking away a cheque-book—retaining a credit account at the institution. He can then write cheques up to the amount of his credit ; the recipients of his cheques can in their turn keep accounts at the bank ; as cheques are paid into their accounts, they are enlarged and the recipients in turn can draw upon them. There is little difference, apart from legal technicalities, between the circulation from hand to hand of claims on the bank in the form of notes and the circulation from hand to hand of claims on the bank in the form of cheques. A cheque-book may be thought of as a large note, from which coupons of varying sizes, representing any desired number of pounds, shillings and pence, can be detached by the owner, when he wishes to make a payment, and to which coupons can be stuck on when he receives payment. The size of his note would, then, alter from time to time exactly in the manner that, in actual conditions, his credit account at the bank alters.

It is necessary then to concentrate our attention firmly on the situation, supposed to exist in the first instance, in which an individual is said to acquire a claim on a bank. How does such a situation arise ? The situation when it does arise will be the starting point at which either a given quantity of notes begins to circulate or a credit account at the bank begins to circulate. If only we can understand

clearly when an individual first acquires a claim on the bank, we shall be in the way to discover what governs the magnitude of the total outstanding sum of bank notes and bank deposits.

First we must eliminate from consideration the mere transference of claims from one individual to another. Mr. Smith may acquire a deposit at the bank through the receipt of a cheque from Mr. Jones. This does not constitute the original inception of the claim on the bank. For what is now Mr. Smith's claim was formerly Mr. Jones'. But whence arose Mr. Jones' claim? Through a cheque received from Mr. Robinson! It is clear that individuals who pay into the bank cheques drawn on the bank by other members of the community do nothing to increase the total quantity of deposits at the bank. No new ball is started to roll by their action.

Secondly we must eliminate certain situations which seem to give rise to a claim on the bank, but which really only substitute one kind of claim for another. An individual may deposit notes at the bank. He thus acquires a credit account there. But he has not acquired a claim on the bank. For he already had that when he held his notes. He has converted a note claim into a deposit claim. It is true that he acquired a claim when he acquired the notes. But if he was merely paid the notes by another member of the community, between them they have acquired no new claim. If the individual draws his deposit out in notes, he is still not putting new money into circulation. He is merely substituting one form of circulating medium, a note claim, for another, a deposit claim.

Suppose now that the country is on the gold standard and the bank is obliged to issue notes against gold, or, alternatively, though not obliged to, is always willing to buy gold at the market rate. If an individual brings gold to the bank and deposits it there, this is indeed the inception of a new claim. The individual may arrange for the import of gold from abroad or he may melt down his watch and take bar gold to the bank. The bank receives it. The individual

now has a claim on the bank in the form of a deposit or alternatively in the form of notes issued to him. This is a new claim, and not a mere transfer. If the individual draws the gold out again by tendering notes or a cheque drawn on himself, the claim is liquidated and ceases to exist.

Thus claims on the bank are created by the deposit of gold and destroyed by its withdrawal. If we wish to discover how many of all the outstanding claims on the bank had their inception through the deposit of gold, we have merely to look to see how much gold there is in the bank vaults. So much and no more of existing claims were created by the deposit of gold. It is no use objecting that the bank may meanwhile have used the gold for other purposes. For when a bank uses gold, i.e. pays it out to someone, it necessarily kills a claim on itself thereby. It doesn't give gold away. If it uses gold, it destroys a claim. Therefore the amount of gold retained is exactly equal to the number of claims that have been created through the deposit of gold less the number of claims (originating in this or some other way) that have been met and therefore annihilated through its withdrawal. The quantity of gold represents the *net* amount of claims created by the paying in of gold.

But if you look at any bank, you will find that the claims upon it usually far exceed the quantity of gold in its vault. How were these additional claims created ? We have found one way in which new claims may be created, but this does not account for the whole of the outstanding claims, but only for a small part of them. Nor is it of any use reverting to the other type of explanation—individuals may have paid in cheques or notes. That eventuality has already been considered and shown to be inadequate to explain the inception of the claims.

The other principal and by far the most important way in which claims originate is by bank *loans*. If the bank lends me £100, I can draw out £100 of notes and put them into circulation or I can draw a cheque for £100 and so increase someone else's account at the bank by that amount.

Claims on banks have their most important origin in bank loans. There is a temptation to say that the bank can only lend what has been deposited with it. Such a notion is a most fertile source of delusions. It is true that if I desire to take my loan away in the form of gold, the bank can only satisfy me if someone has previously deposited gold with it. But if I am satisfied with notes or a cheque-book the position is very different. The bank by making me the loan has created new circulating medium. The circulating medium consists of claims on the bank. By making the loan the bank has added to the number of existing claims outstanding. If I withdraw the loan in gold for export or false teeth, then it is true that no new money will have come into existence. The creation of the new claim is precisely offset by the cancellation of a claim which the withdrawal of gold always involves. But so long as the credit account or notes generated by my borrowing continue to circulate, so much extra circulating medium remains outstanding. The repayment of the loan entails an opposite result. Part of the outstanding circulating medium is cancelled.

It now appears why in computing the quantity of his money, the individual was asked not to subtract his debit account at the bank. When a loan is made a twofold liability comes into existence ; there is the liability of the bank to honour the cheque of the borrower for the amount agreed on ; there is the ultimate liability of the borrower to repay the bank. This ultimate liability may take the form of an overdraft. But if on computing the quantity of circulating medium outstanding all overdrafts and other forms of outstanding bank lending were subtracted, little would be left. For by far the greater part of the circulating medium had its inception in bank loans and would disappear if the loans were withdrawn. Loans are, it is true, continually being repaid, but simultaneously new loans are issued, so that at any point of time there is a quantity of bank loans outstanding almost as great as the total of the circulating medium.

A bank, like other concerns, has business expenses, makes

charges, interest and other, for its services, and hopes to declare a profit and distribute dividends. The outgoings and intakings in these respects should balance. When a bank makes charges for its services, these decrease the claims upon it and when it incurs expenses, or distributes dividends, these increase the claims. If in any period there is not a perfect balance, the outstanding circulating medium will be decreased or increased accordingly.

What has been said about the generation and cancellation of means of payment by a supposed single bank, applies in a modern community to the banking system as a whole. The quantity of money is increased by the import of gold or the extension of bank loans and decreased by the opposite processes. We shall have to see how the argument is affected when there is more than one deposit bank and how each is related to the central bank.

It has been assumed that the note issue consists of bank notes. There may, however, be a government issue. Theoretically the size of a government issue is quite arbitrary ; in practice it is often not so. During the war, for instance, the British note issue was undertaken by the Treasury. A great increase in the deposit section of the circulation was in progress through the extension of bank loans. The increased cash requirements of the public were consequential on this. The government undertook to provide the banks with as much cash in the form of currency as they needed. Consequently precisely the same quantity of notes were projected into circulation as if the banks had had the right of note issue themselves.

The relation of a government note issue to government borrowing should be observed. Normally a government meets its expenses by taxation ; in special circumstances public loans may be raised. If these loans are subscribed to by the general body of the citizens with funds released by a contraction of their normal expenditure, the loans have no effect on the quantity of circulating medium. But if the government borrows some of the money from the banks, or if the money subscribed by the public is lent to them by

the banks for that purpose against suitable collateral, which may include the government stock itself, then the government borrowing involves an increase of the circulating medium. It is precisely as if any individual had prevailed on the banks to make some large loans to him. There is an increase in the quantity of outstanding claims on the banks. Government borrowing of this kind we may call for convenience *inflationary*.

Inflationary borrowing increases the circulating medium whether the government takes to itself the right of note issue or not. The essential cause contributing to an increase of money is a deficit not covered by loans subscribed to by the public and financed out of their genuine savings. If there is inflation involving a rise of prices, of pay-rolls, etc., an increase of cash will be required for reasons explained earlier in this chapter. Whether this is met by an increase of bank notes or an increased government note issue is a technical detail of little importance. If there is a government issue, the government borrowing from the banks will be *pro tanto* reduced. In this case the total inflation will amount to $£x$ borrowed directly or indirectly from the banks by the government plus $£y$ of note issue. If there is a bank issue, the inflation will consist of $£ (x+y)$ borrowed directly or indirectly from the bank by the government, and the claims with which these loans provide the government will be met to the extent of $£x$ by credit accounts at the banks, which will no doubt be concentrated at first in the government's bank and so pass into circulation, and to the extent of $£y$ by bank notes.

Bank Loans and Cash. The banking system performs two functions which are perfectly distinct in principle but closely interrelated in practice. On the one hand it provides, as we have already seen, the effective circulating medium for the community and on the other it is a channel by which the savings which people do not wish to lock up in long-term investments are made available for industry and trade. Since every time the banking system makes a loan

it necessarily adds an equivalent amount to the circulating medium, the interconnexion of the two functions is evident.

It is not necessary here to describe the various modes in which deposit banks commonly lend money, as that is the topic of the following chapter. We shall confine ourselves to those points which are necessary to the story of how the central bank exerts its control. The following four main types of loan have their counterpart in most countries.

(*i*) The banks lend money at call or short notice. This is usually the cheapest kind of money that can be had; the low interest rate compensates for the inconvenience of being subject to a sudden demand for repayment. In New York the market for call money consists of the stockbrokers, who deal for their clients on a margin in the Stock Exchange and who require ample funds for that purpose owing to the system of daily settlements which prevails there. In London the money goes to the Discount Houses who specialise in making advances to merchants on bills of exchange, and make their profit on the difference btween the call rate which they have to pay to the banks and the ruling rate of discount in the market, which is usually somewhat higher.

(*ii*) Banks lend money by discounting first-class bills of exchange themselves. They also invest largely in Treasury Bills, which are three-monthly obligations of the government.

(*iii*) The largest block of lending by English banks consists of their advances to customers against the deposit of collateral security. These advances usually take the convenient form of overdrafts, interest being paid on that part of the loan which is actually used. A customer may get an overdraft facility of £1,000, but he only pays interest at any time on the amount of his overdraft outstanding, £100, £500, or whatever it may be. The interest charged on these advances is higher than the market rate for bills since this kind of loan is not self-liquidating and is always in danger of becoming frozen.

(*iv*) There is a fourth type of loan which the banks habitually make but which is on a somewhat different

footing from the other three. The banks make investments in ordinary marketable securities. This kind of lending is precisely that which members of the public adopt when they wish to dispose of their savings. It is important to observe that such investments, when made by the banks, have precisely the same effect on the volume of circulating medium as loans of the other types. If the banks purchase securities they add to the amount of means of payment in circulation; if they sell securities, they cancel some of those means. This method of lending is undertaken entirely at the initiative of the banks and is a useful expedient when the banks wish to add to the circulating medium and ordinary trade borrowing is slack.

When the banking system as a whole extends its loans, it thereby adds to its deposits. Loans create deposits. To put it less accurately but more popularly, the loans " come back " to it in the form of extra deposits. The volume of deposits is governed, in the first instance at any rate, not by the thrift and industry of individual members of the community, but by the loan policy of the banks. What is it, then, that checks the banks from making an unlimited quantity of loans?

First it is necessary to consider this from the point of view of an individual bank. Though the banking system as a whole gets its loans back as deposits, this is not true of an individual bank. If all the banks simultaneously make an increase of loans of 1 per cent, there is some probability that the deposits of each will rise by 1 per cent. But if a particular bank extends its loans by £1,000, there is no probability that it will receive an extra deposit of £1,000. The new circulating medium created by its act will circulate round among all members of the community; it will be dissipated and its parts lodged successively at all the various banks. Thus if the banks are to expand, they must expand in step. Otherwise the more adventurous banks will find their cash depleted; when cheques are cleared the balance of payments will be against them and their credit accounts at the Bank of England or their till money (notes

in hand) will be transferred to their more conservative competitors.

Secondly it must be remembered that depositors have the right to cash their deposit claims. We have seen that they may wish to do this, either to add to their holdings of cash or to acquire gold for export or other purposes (" internal " and " external " drains). Now the increase of deposits might lead to an increased encashment of deposits under either of these heads. When and why an increase of deposits would in fact do so will be explained below. If it does so, the banks will find themselves involved in difficulties as a result of their loan expansion.

To take the " internal " drain first, the banks would be perfectly secure, if they all had the right of unlimited note issue. They would still have to be careful to keep in step with each other. But they would need to have no fear that a collective increase of loans would get them into trouble, since they could always provide means to meet a rise in the demand for currency consequent on the rise in deposits.

The second check would remain. If their customers began drawing out deposits in order to export gold, the right of note issue would not meet the situation, for the notes would be brought back to be turned into gold and their gold stocks would decline. If the country were not on the gold standard and their notes were inconvertible, then indeed an unlimited expansion or inflation of credit would be possible.

In a properly developed system the means at the disposal of the deposit banks for meeting an encashment of deposits are limited and controlled by the central bank. Thus an extension of loans by the deposit banks, though it would give them collectively a corresponding increase of deposits, would give them no increase of means of cashing them when required. It is the limitation of cash which debars the deposit banks from unlimited collective expansion.

The deposit banks usually observe a rule which safeguards their position both vis-à-vis competing banks and also vis-à-vis their limited quantity of cash collectively available. They endeavour to preserve a definite ratio

between their cash holding and the volume of their deposits. They feel themselves at liberty to expand loans if and only if their cash holding stands at a figure which exceeds this ratio. Their cash holding includes both their currency in hand and their credit account at the central bank. In the U.S.A. there is a minimum ratio (or rather multiplicity of ratios for various classes of banks and deposits) enforced by law. In normal times the banks treat this as a maximum ratio also. In England the deposit banks have established a ratio which they regard as safe ; the average ratio for the principal banks has recently remained constant at about 10.5 per cent.[1]

If for any reason there is an increase of cash at the disposal of the banks collectively, this will lead to an expansion of loans in one or more of the four ways enumerated on p. 136. Suppose that the Midland Bank finds that its cash holding and deposits are up by £1 million, while that of the other banks remains the same. The Midland Bank, finding that its cash exceeds the required ratio by about £900,000, will lend out the money; some of this, say £100,000, will " come back " to it as extra deposits, most of it, say £800,000, will go as extra deposits to the other banks. £200,000 of its extra cash will be retained by the Midland, £800,000 will be transferred to the other banks. They in their turn will find both their cash and deposits up by £800,000. But since this makes their ratios more favourable, they too will be disposed to lend. Provided that the new deposits are not drawn out as cash by the public, the banking system as a whole will be able to lend approximately £9 million. They will collectively be holding £1 million more cash and (initially) £1 million more deposits than before ; the expansion of loans will have led to a further increase of deposits by £9 million. Thus while retaining their old ratio of cash to deposits, they will have been able to increase loans by about £9 million.

[1] This figure is taken from their monthly statements, which are not representative of their average position during the month. It appears probable that their actual average ratio is somewhat more than 1 per cent below this (cp. Macmillan Report, p. 36).

This may be illustrated by recent figures. Between February 1932 and February 1933 the cash of the London clearing banks rose by £31.2 millions. At the same time their loans rose by approximately £267 million and their deposits by £298 million. Their ratio rose from 10.4 per cent to 10.6 per cent (i.e. remained roughly constant). These actual figures display with extraordinary precision the relations described in the last paragraphs. If the banks had not extended loans, their deposits would have risen by no more than the increase of cash (£31.2 millions). The upshot of the whole thing is that in February 1933 the public had credit accounts at the banks exceeding those of a year earlier by some £300 million. The banking system had produced a great expansion in their circulating medium.

We now come to the central and vital point in this whole discussion. What caused the increase of cash ? What governs the amount of cash at the disposal of the deposit banks ? The answer is *the central bank*. The central bank regulates by its operations the quantity of cash available for the deposit banks and so indirectly the quantity of circulating medium in the community.

Control by the Central Bank. How does it do this ? By the use of the printing press ? No. It might print notes, but mere printing would not put them into circulation. It habitually does print many more notes than ever go into circulation. The means by which it increases cash is its *loan* policy. In the period from February 1932 to February 1933 it increased its loans by £32 million.

Of the types of bank-lending described above, the Bank of England engages chiefly in the fourth. It makes investments in marketable securities. The other three types usually involve some knowledge of the special circumstances of borrowers. It is not the business of the central bank to go into these, but to exercise an impersonal control over the credit situation as a whole. The Bank of England has, indeed, taken some interest, through subsidiary organisations, in recent schemes of industrial reconstruction.

But that is not its primary task. It must be added, however, that in a crisis or panic, when it becomes difficult to borrow on the best security, it is the duty of the central bank to act as "lender of the last resort," and make advances on all sound types of security.

The relation between the loan policy of the central bank and the cash at the disposal of the deposit banks is easy to explain. If the central bank purchases securities worth £5 million, i.e. extends its lending by that amount, the sellers of the securities acquire claims on the central bank worth £5 million. These they pay into their own banks. The deposit banks thus find their deposits rise by £5 million, and at the same time their credit accounts at the central bank (which constitute an important part of their cash) rise by £5 million. If the central bank sells securities, the credit accounts of the deposit banks with it undergo a corresponding diminution.

The principle already applied to the banking system as a whole that loans create deposits, applies to the central bank in particular. But in the case of the central bank, the creation of deposits is twofold. On the one hand the public at large acquires extra deposits at the deposit banks ; on the other the deposit banks acquire extra deposits at the central bank. That is the consequence of their holding their reserve in the form of a banking account at the central bank. Thus the central bank, when it lends, creates additional deposits *with itself*. And these deposits count as cash for the other banks. The extension of loans by the central bank thus increases the cash as well as the deposits of the other banks, and puts them in a position, consistently with the maintenance of a given ratio, say 10 per cent of cash to deposits, to expand their loans by approximately nine times as much.

The loan policy of the central bank is not the sole force affecting the quantity of money in the country. This is also affected by the balance of foreign payments. If gold is flowing in, and is not side-tracked into non-monetary use (for watches, etc.) it goes into the banks and creates new deposits. This has already been explained in a general way in an

earlier part of this chapter. At that stage we did not distinguish between the central bank and the other banks.

If a gold importer sells £5 million of gold to the Bank of England, he acquires a claim on that institution which he can pay into his own bank. What is the effect of this operation? The Bank of England acquires £5 million of gold and a new deposit liability of £5 million. The importer's bank acquires an addition to its credit account at the Bank of England of £5 million and a new deposit liability of £5 million. If the Bank of England takes no further action, the deposit banks can collectively expand their loans by £45 million. The net effect of the import of gold is precisely the same as if the Bank of England had purchased securities worth £5 million.

It should be noticed in passing that the importation of £5 million does not have much effect on the total quantity of money in the country unless the deposit banks behave appropriately. The total banking deposits of Great Britain are about £2,600 million. The import of £5 million in and by itself merely raises deposits by £5 million. It is only if the deposit banks take advantage of the situation and expand their loans by £45 million that the import of gold has an appreciable effect. The operation of the gold standard works through the loan policy of the banking system. But the deposit banks can be counted on to take advantage of the situation. Finding their ratio of cash to deposits up, they will tend to increase loans until their conventional ratio is restored.

What will be the attitude of the Bank of England to this import of gold? We must distinguish between technicalities and essential matters. When gold comes into the Bank of England, it is its custom to pay it into the Issue Department and issue notes against it. Thus the assets of the Issue Department will be up by £5 million gold and its note liability will be up by £5 million. Meanwhile the new notes are transferred to the Banking Department. Its assets will be up by £5 million notes and its liabilities will be up

by £5 million owing to the new deposit liability to the importer's bank (*vide supra*).

The essence of the matter is—and this would be true of any central bank—that its total liabilities are up by £5 million and its assets are up by £5 million in the form of an extra gold reserve. (The liabilities of the Bank of England seem to be up by £10 million ; but this is due to the cross entry owing to the holding by the Banking Department of notes issued by the Issue Department.) The central bank, like the other banks, holds part of its reserve in cash (gold, in its case) and part in the form of the securities on which it has made loans, including the securities it has bought outright (*vide supra*). The increase of £5 million on both sides of the account, involves an improvement in its ratio of gold to total liabilities.

Will the Bank of England at once set about restoring its previous ratio of cash to liabilities, in the style of the deposit banks? It may do so. Suppose its previous ratio was one third.[1] If the Bank of England seeks to restore the ratio to its former level, it must make £10 million of additional loans. In the upshot, its assets will be up £15 million, £5 million in respect of the new gold and £10 million in respect of the new loans, and its deposits will be up £15 million, the former ratio of gold to deposits (1 : 3) being preserved.

If the Bank of England takes this action, the deposit banks will find their cash up not merely by £5 million, but by £15 million. If they come to heel in the ordinary way

[1] I refer here to the ratio of gold to total net liabilities; actually owing to the legal system of a maximum fixed fiduciary issue and the automatic manner in which the Issue Department is worked, all gold being transfered to it and the maximum of notes allowed by law being issued, attention is often concentrated on the ratio between the cash in the Banking Department (=the free reserve available to encash deposit claims), and the deposit liabilities of the Banking Department; this ratio is known as "the proportion"; in this argument I use the word "ratio" in the sense of the relation of gold to note and deposit liabilities together; this is known as the "reserve ratio"; it is more convenient to consider this, since what is said of it applies also to central banks which work under a different legal system of note issue.

and maintain their ratio constant, they will lend not merely £45 million (approximately), but three times this, viz. £135 million. The total circulating medium of the country will then be up by £150 million. It will have been increased precisely in proportion to the increase of the gold in the Bank of England.

Reference is sometimes made to the " automatic " working of the gold standard, or the " rules of the game." What presumably is meant when such phrases are used is that the central bank should behave in the way outlined above and make the quantity of circulating medium in the country vary in precise proportion to its gold holding. Such a system would have the beauty of simplicity and ready intelligibility. It does not appear, however, that it was ever put into operation ; nor would it be desirable to do so.

When gold is imported and the central bank finds that its ratio of gold rises, it may do one of three things. (*i*) It may apply the so-called rule of the game, extend credit to restore its old ratio and thus cause the total quantity of circulating medium in the country to rise in precise proportion to the rise in its own stock of gold. (*ii*) It may be purely passive, neither expanding nor withdrawing loans. In this case the circulating medium will rise by a moderate amount (£45 million in the above example), but not in full proportion to the increased gold stock. (*iii*) It may adopt a reverse policy and sell £5 million of securities. If it does this the cash basis of the joint stock banks will be precisely the same as before. What they gain by the new deposit of gold they will lose by the contraction of credit by the central bank. The central bank sells £5 million of securities ; the purchasers of these will write cheques on their own banks adding up to that amount ; the credit accounts of the deposit banks at the Bank of England will be reduced by £5 million and this will precisely offset the rise in their accounts entailed by the influx of gold. If the central bank is concerned to preserve the quantity of circulating medium at a stable level rather than to make it vary with changes

in the country's gold holding, it will adopt such a reverse policy.

In the post-war period of the gold standard in this country (1925–31) there were considerable influxes and effluxes of gold. When gold came in, the Bank of England had a shrewd suspicion that it would presently depart again. It did not want monetary conditions in the country to be continually disturbed by these changes. Consequently when gold came in, it offset this by selling securities, and when gold left, it offset the exodus by buying securities. This was known as a neutralising policy.

The Trammels of the Central Bank. The central bank has to take a fairly long view. It has two concerns. In the first place there is the effect of changes in the quantity of circulating medium on the state of the country's industry and trade, and secondly there is the effect on the foreign balance of payments. In the matter of its second concern, if the country is on a gold standard and the balance of foreign payments becomes adverse, the central bank will have to cover the excess of payments out over payments in by selling gold. It is of the essence of the gold standard that nationals should be able to convert their money into gold at par ; if the price of foreign currencies rises, owing to the adverse balance of payments, to the point at which it becomes cheaper to export gold, the nationals, in particular those specialising in arbitrage (*vide supra*), will desire to get gold in exchange for the circulating medium of the country in order to export it. Such a situa- thus engenders the " external " drain already referred to. This is a vital matter for the central bank. It must be able to cover the adverse balance in gold, if its solvency is to be maintained. Thus it will be deeply concerned to secure that the foreign balance of payments is not excessively adverse. It will have to adapt its monetary policy to this end. If the country is not on the gold standard an adverse balance of payments will make its currency tend to fall in the foreign exchange market. This is also a matter of some interest,

though in the absence of a gold standard, of less vital interest to the central bank. It will keep an eye on the effect of its monetary policy on the course of the foreign exchanges.

In the matter of the internal situation there are two considerations. If an expansion of deposits occurs and this is associated with improving trade and, possibly, rising prices, the community may require more currency in circulation. The increased demand for currency will have to be met by the central bank. This is the "internal drain." Ideally, if the central bank feels itself able to allow an expansion of loans, it should not mind if the liabilities so generated take the form wholly of a deposit liability or partly of a note liability. Actually it works in severer legal trammels with regard to its note issue, and it may feel impeded in its desire to expand loans by the fact that the demand for currency consequential on this would exhaust its legal powers to issue currency, and so place it in a position in which it was unable to meet its deposit liabilities by notes. Still worse would be the position if it had so enlarged the deposit banks' basis of cash by its loan policy as to lead them generally into unsound channels of lending, jeopardising their solvency, and thus cause the public, out of lack of confidence, to turn their deposits into notes. Such action affects, as we have already seen, not only the suspect deposit banks, but the central bank also. It is the central bank which has to provide the currency. The suspect banks will draw out their deposits with the central bank in currency.

The second consideration with regard to the internal situation goes deeper. It is the business of the central bank to see that the monetary system of the country, in the broad sense not of currency merely, but of total circulating medium, is in such a condition as to enable the industry and trade of the country to go forward smoothly. It might appear that this should be by far the most important consideration governing the actions of the central bank. It may, however, be hindered in the undivided pursuit of this end, on the one hand by considerations relating to the foreign

balance of payments already mentioned and on the other by the legal restrictions on its note issue already mentioned. The Federal Reserve Banks had in the period 1922–29 a gold reserve, which, though not out of proportion to the huge economic structure of the country, was large in relation to legal requirements. They thus had an ample margin to spare to meet either a foreign drain of gold or an internal drain of currency. Consequently they were able to concentrate their attention on providing a monetary system that should satisfy internal needs. This was an ideal situation. The Banks used the opportunity to make the experiment of pursuing a policy designed to secure stability. With the monetary system so managed the country enjoyed an unprecedented degree of prosperity. The situation has now sadly changed. It is arguable that subsequent calamities are due to the fact that after the Stock Exchange crash of October 1929, the Federal Reserve authorities lost their nerve and did not maintain their previous record. The guiding spirit, Governor Strong of the Federal Reserve Bank of New York, had departed. It is also arguable that the management undertaken in the good years was not free from criticism, that some lessons were not yet learnt. Into this speculative domain we must not enter now.

So far we have been concerned with the mechanical relations of the various parts of the monetary system. We have seen that the central bank controls through its policy and in co-operation with the deposit banks the total quantity of circulating medium. We have seen that it usually works under legal restrictions with regard to its note issue and this tends to check an upward expansion of deposits. We have seen that it must have regard to the foreign balance of payments. The picture remains incomplete. We have still to consider how these various movements in the monetary sphere and the course of trade and prices act and react on each other and to determine what policy it is possible and desirable that the central bank should pursue.

The Central Bank and Interest Rates. Let us return to the balance of foreign payments. Space forbids a detailed examination of this topic. Broadly foreign payments fall into two main categories, those on current account and those on capital account. The former consist of payments in respect of visible trade, the import and export of commodities, of invisible services such as shipping, mercantile services, insurance, brokerage, etc., and the service of foreign investments. Payments on capital account consist of loans and the repayments of loans.

Let us first suppose a gold standard to be in operation. Let us suppose that after a period in which payments have balanced, an adverse factor begins to operate. This may be merely seasonal or transitional, owing to a temporary excess of imports over exports or some such cause, or it may be more enduring and be due to the loss of a foreign market or the failure of foreign investments to earn their former rate of profits. It has already been explained that the balance of external payments is a matter of vital concern to the central bank. What means have they to secure the position ?

The central bank has a double-edged weapon having on the one hand an immediate and temporary effect and on the other a deeper and more permanent effect. This operates through its control over interest rates. In the situation envisaged the central bank will produce a rise of interest rates. This involves a contraction of bank loans. The technicalities of the process may be explained by reference first to the English and then to the American banking system.

In England the official rate at which the Bank of England discounts bills of exchange is usually above the open market rate. Persons who wish to discount bills consequently go to the open market to do so and not to the Bank of England. There is an exception in the case of favoured clients of the Bank, for whom the Bank is willing to discount below its official rate. When the Bank wishes to produce a rise in the market rate it sells some of its securities. This causes

a restriction of the cash of the deposit banks in the manner already explained. They, wishing to maintain their former ratio of cash to deposits, proceed to cut their loans. Their first line of defence is their money lent at call or short notice, which they draw in. This money is used by the Discount Houses to discount bills of exchange. The Discount Houses may be able to meet the call out of the proceeds realised by maturing bills. Probably they will also have to go elsewhere for part of the money. Where can they go? By hypothesis all the deposit banks are tending to restrict rather than expand their money lent at call. In this case the Discount Houses will have to go to the institution, which serves as "lender of last resort," the Bank of England itself. They will go to the Bank of England and re-discount some of the bills which they have on hand. But they will have to pay the Bank of England rate, and that is higher than the rate at which they themselves have been discounting bills. They will thus incur a loss on the bills which they have to re-discount. They will therefore be extremely anxious to work free of the Bank of England, and this they can only do by reducing the volume of their own discounts. The demand for loans by way of discount will then exceed the supply and the market rate will tend to rise. The Bank of England will have achieved its object. If there is initially a considerable gap between the market rate and the Bank rate, and the rise in the market rate which the Bank desires to secure is small, it will content itself by selling securities. If the gap is small or the rise required large, the Bank will also raise its own official rate. A rise in the Bank Rate will then occur, a phenomenon well known to the public through the daily Press. The deposit banks raise their call rates in unison. The final upshot will be a rise in market rates and a reduction in the circulating medium of the country. The deposit banks which have had their cash basis reduced, will probably not confine themselves to calling in call money. They may also reduce their holding of Treasury bills and other bills, their investments, and ultimately their advances against collateral, the rate

charged on which, namely 1 per cent above Bank Rate (but subject normally to a minimum of 5 per cent), will also be raised in unison with the Bank Rate. The control exercised by the Bank of England is satisfactorily complete.

In the United States the mechanism is somewhat different. There the deposit banks which are "members" of the Federal Reserve system (and they represent the greater part of the deposit banks if they are weighted according to their resources), are normally in the debt of the Federal Reserve Banks. (The twelve Federal Reserve Banks jointly constitute the central banking system and correspond to our Bank of England.) These member banks are required by law to hold a specified reserve against their deposit liabilities in the form of deposits with the Federal Reserve Banks. If these deposits tend to fall short of the required amount, they replenish them by borrowing from the Federal Reserve Banks through re-discounting bills with them. The Federal Reserve Banks provide credit in two ways, first by re-discounting bills for their member banks and secondly by their open market operations, the purchase and sale of securities.[1] If the Federal Reserve Banks desire to raise market rates, they sell securities. This, as in the case of England, has the effect of reducing the deposits of the member banks with them. Since the member banks do not usually have deposits with the Federal Reserve Banks in excess of legal requirements,[2] they are forced to make good the reduction in these deposits by additional re-discounting. This they do at the official Federal Reserve re-discount rate, which may meanwhile have been raised. The Federal Reserve re-discount rate is, it is true, normally below the rate at which member banks discount for their clients. This is due to the different nature of the paper so discounted in

[1] The emergency legislation of 1932 and 1933 has also empowered the Federal Reserve system to re-discount directly for the public.

[2] The conditions of 1932 when the Federal Reserve Banks were attempting to produce a great expansion of credit were exceptional in this respect.

the American market and to differences in its structure which space forbids me to explain here. The member banks thus do not actually incur a loss when they have to rediscount additional paper with the Federal Reserve Banks. But their indebtedness to the central banking system will have been increased ; they will be anxious, and, if they are not anxious, pressure will be brought to bear on them by the Federal Reserve Banks, to decrease this indebtedness ; and, in order to be able to do so, they will tend to reduce their own loans of various kinds. Thus though the control exercised by the Federal Reserve Banks is less immediate and imperious than that of the Bank of England, it is similar in kind.

Raising interest rates has a short-period and a long-period effect. The immediate effect is to render the country a less eligible centre to borrow from and a more eligible place to lend to. This has a direct effect on the balance of foreign payments on short-term capital account of the country in which rates are raised. The balance is made more favourable. The tendency towards an adverse balance is for the time counteracted.

Interest policy has also a more far-reaching effect. The rate at which the " real " capital of the country is increased, whether in the form of fixed equipment, other forms of aids to production or stocks of raw materials and goods in process, is partly determined by the rates of interest. Low rates tend to stimulate an increase, high rates to discourage it. Rapid accelerations in the rate of capital increase do, indeed, often occur in the face of high interest rates in times of boom, while at other times low interest rates do not prevent stagnation. But when a change of rate is introduced into a given situation, a rise tends to retard and a fall to increase the pace at which additions to real capital are made.

It is necessary to trace out the further consequences of this. Suppose a fall in the rates to occur, encouraging additions to real capital. New employment will be given. Income so earned will be expended partly on the importation

of goods from abroad, partly on purchases of home-made goods. The latter class of expenditure will stimulate the output of home-made goods, if this is practicable ; there will be a further addition to employment consequent upon this, and this provides fresh income which will be expended in a similar manner. The net effect will be a new debit account in the balance of foreign payments, due to additional imports and possibly also to additional foreign investments by those in receipt of the new incomes, increased employment at home and a tendency for prices at home to rise.

Opposite consequences would ensue on a rise of interest rates. The rate of addition to real capital will slow down, unemployment will occur at first in the constructional trades and then be more widely diffused. The income and purchasing power of the whole community will be restricted and purchases of foreign goods and securities will be cut down. This is the more far-reaching effect of a central banking policy of high interest rates. It is the well-known process of Deflation. The foreign balance of payments is restored, because imports and foreign investments, which both appear as debits in the foreign balance, are cut down. The prices of home-made goods tend to fall ; the output of them is reduced. The severer the deflation, the more widespread is the unemployment and the greater is the reduction of income.

Maintaining the Gold Standard. Under the gold standard, the condition of the credit account in the foreign balance of payments must be the primary factor governing the policy of the central bank. This is the second concern of the central bank, referred to on p. 145. It cannot allow a serious adverse balance to be generated. The favourable position of the Federal Reserve Banks in the period before 1929, which has already been referred to, was exceptional. The control which the central bank exerts through interest rates is simple and salutary if it can be confined to its short-period effect of adjusting the flow of foreign short-term

loans. It is an excellent expedient for evening out temporary oscillations in the balance of payments. If, however, there is a substantial reduction of payments due from foreigners, destined to be permanent, as happens, for instance, when there is a great fall of world prices, the high interest policy has to be allowed to have its more far-reaching effect of producing severe depression at home. This is the inevitable corollary of the gold standard.

If the community were entirely isolated, what would be the ideal policy of the central bank? It should maintain such interest rates (and such a consequential expansion of loans) as would encourage additions to real capital to proceed at a rate that kept in line with the collective saving of the community. Capital production can only be pushed ahead more rapidly than this, by the imposition of forced saving on the community through rising prices. If production already bears a reasonable relation to the capacity of the country, so that employment is good, rising prices lead to excessive profit and conditions become "inflationary." If on the other hand capital production fails to keep pace with the saving of the community, insufficient money will be to hand to buy consumable goods, prices will tend to fall, their output will be restricted and unemployment will grow apace. This is the condition of deflation. It should be the business of the central bank to steer between these two extremes.

The exigencies of the gold standard are likely to debar it from such a policy. A favourable balance of foreign payments does not indeed compel inflation, since the central bank may allow gold to come in and its reserves to accumulate. It may incur the wrath of other countries for doing so, but it can legitimately plead that it is its duty not to produce an inflationary expansion of credit at home. But in face of an adverse balance, it must deflate, in order to maintain solvency. It must restore the balance. The consequent restriction entails misery and needless waste.

Deflation restores the balance by reducing the purchasing power of the community and so bringing about a reduction

in the debit side of the foreign account to correspond with the reduction in the credit side postulated as the disturbing cause. Might not the proper remedy be, not to reduce the debit side but somehow to take arms against the reduction in the credit side and restore it? This might be done if costs at home could be reduced and our volume of exports thereby raised. Any attempt to reduce costs at home meets with strong resistance, and if successful is likely to involve grave injustice between particular sectional interests. If the reduction in costs required was great, it could only be achieved with fairness, if all contracts, bargains and customary rates of pay, expressed in terms of money, could be simultaneously revised in a downward direction. Such a solution must be ruled out as impracticable.

We have seen that our system provides a perfectly adequate remedy for a transient reduction in the credit items on foreign account. A single adverse factor operating against the credit side even if it be permanent is likely to be offset by other favourable factors, or even, if not, will not produce severe dislocation. The disturbances which are large and lasting enough to require severe internal deflation as a remedy usually spring from serious recessions in the outer world associated with a fall of world prices. These affect the credit balance in two ways. They reduce the value of our exports and the volume that can profitably be marketed at the new level of prices, and they reduce the income from foreign investments.

Beyond the Gold Standard. Two remedies seem possible, a national one and an international one. The national remedy is to abandon the gold standard, which links the national monetary system with that of the world. A fall in world prices can be countered by making the value of national money in terms of gold fall *pari passu*, thus maintaining its value in terms of goods at its old level, and keeping the relation of costs of production at home to world prices the same as it was before. Such a

system would at least mitigate the repercussion of a world depression in the particular country which adopted this policy.

The effects of such a policy were visible in Great Britain after the abandonment of the gold standard in 1931. She was sheltered from the further deterioration in conditions which occurred abroad in the following year. The *status quo* was preserved ; this unfortunately was already very bad. No serious attempt was made to regain lost ground. To do this, it would have been necessary to counteract the effects of the previous deflation, re-stimulate capital output and so revive the volume of incomes and employment generally.

By the spring of 1932 a régime of low interest rates was indeed achieved. This, however, failed to have the effect of re-stimulating capital output that might have been expected of it. The recession had already gone too far. Consumption had fallen to such a low level that the capital equipment of the country far exceeded requirements, and low interest rates by themselves did not provide a sufficient motive to extend it. In default of trade borrowers, the banking system extended loans by the method which is open to it on its own initiative, the purchase of securities. The circulating medium of the country was thus considerably expanded in the course of 1932. Figures were given above. This extension of loans was not reflected in an increased capital output. Sellers of securities to the banking system did not use the money so acquired to embark on new enterprise ; it was held in idleness by the public, in the absence of profitable forms of investment. There was no incentive to use it. Capital equipment was so redundant that much additional outlay on capital production could not be expected until some revival of consumers' demand occurred. But the normal channel through which consumers' demand rises after a depression is through an extension of capital production, the incomes of those engaged upon it being used in part at least to buy consumers' goods. When consumption has fallen so low that low interest rates no

longer stimulate capital output, it seems that some other method is required to revive output. The most obvious one is unbalanced government expenditure.[1]

What can be done by a nation singly by abandoning the gold standard can be done more efficiently by international co-operation without abandonment of the gold standard. The obstacle to individual expansion by a country on the gold standard is the adverse balance of payments generated when the nationals acquire an increase of purchasing power, but foreigners do not. If expansion could be arranged to occur in all countries simultaneously, the increased purchasing power of each would be accompanied by a revival in the export markets of each. If international co-operation could be achieved, a common world standard such as the gold standard, at least in some modified form, would no longer be incompatible with the pursuance by each country of a banking policy adapted to her needs.

It has been suggested that this might best be achieved by the establishment of an international central bank. The Bank for International Settlements, set up in consequence of the Young Plan for German Reparations (1929) to facilitate the transfer of Reparation payments, might be adapted for this purpose. It would stand in the same relation to national central banks as they do to the deposit banks. By the purchase of securities it could increase the cash of the national central banks and enable them each and all to pursue a policy of expansion. Just as the Midland Bank, when it finds its cash at the Bank of England up, can increase its loans to clients, so the central banks of particular countries, when they found their deposit at the International Bank up, could expand loans in their national markets. This is essentially similar to the recent proposal of Mr. Keynes for an International Note issue. For the system to work properly, each central bank should feel itself more

[1] This includes public works financed by loan and unbalanced expenditure on current account financed by inflation. For a definition of this see p. 135. Inflation deliberately undertaken to relieve a depression has recently been christened *Reflation*.

or less obliged to expand credit in response to an enlargement of its cash reserve, just as the deposit banks now regard themselves as obliged to expand loans in response to an increase of theirs. The International Note issue would not produce a revival, unless it led to an increase of capital output in all countries. Many countries might find themselves sharing the recent experience of England, that the achievement of low interest rates did not by itself stimulate new capital output. It would in this case be the duty of every government itself to intervene and re-stimulate demand by unbalanced government expenditure. The strenuous joint and simultaneous pursuit by each country of a policy of expansion, by increasing capital output or unbalanced government expenditure, would suffice ; the mechanism of an International Bank or an International Note issue is not indispensable ; but it would give definite form and precision to an agreement for international co-operation.

International co-operation in pursuit of a revival of demand would be beneficial not only because it would bring prosperity over a wider field than isolated national effort, but also because it would make each national effort easier. A country which seeks prosperity by divorcing itself from the common monetary system and allowing its exchange to depreciate, is exposed to special dangers. In the absence of certain knowledge where the new rate of exchange is likely to settle down, there may be considerable unsteadiness in the exchange rates, with consequent inconvenience to trade, and there may be adverse speculative operations leading to undue depreciation. The public may take fright and fly from the currency. The authorities in the fear of such eventualities may hesitate to push forward with a policy of revival. With genuine international co-operation these difficulties may be overcome.

Two further points call for notice. (*i*) We have seen that equilibrium of the internal monetary system is attained if the banking system regulates interest rates in such a way that capital construction is encouraged enough and no

more than enough to keep pace with the current rate at which the community collectively wishes to save. For various reasons connected with the technique of industry, the stage in the country's industrial progress and the wealth and thrift of her citizens, this ideal scale of interest rates may be different in different countries. To secure stability in the system it might be desirable for the English short-term money rate to be, say, 2 per cent, while in the U.S.A. it might be desirable in a time of normal advance for her short-term money rate to be, say, 4 per cent. But a common monetary system makes a wide divergence of interest rates in two well organised money markets impossible. In the circumstances supposed short-term money would flow away from England to the United States, thus lowering the prevailing rate in the United States and raising it in London. If the banking systems of the two countries resisted this tendency towards equalisation of rates, gold would begin to flow from London to New York and continue to do so indefinitely.

Absolute equality between the rates at different centres is not, indeed, usually achieved. This is due to the fact that even if the United States and England are both on the gold standard, they have not an absolutely common money. The dollar-sterling rate normally fluctuates within certain limits owing to the cost of remitting gold between the two centres. The dollar has to be slightly above par before gold flows to the United States, sterling slightly above par before gold flows to England. The difference between the highest possible dollar rate and the lowest possible is equal to twice the cost of sending gold between England and America plus the difference between the Bank of England's buying and selling price of gold (1½*d.* an ounce, *vide supra*). This means that if an English firm wants to lend money at short term in the New York market, it has to take the risk of the exchange moving in the interval. Consequently an equalising tendency only sets in if the difference between the short interest rates is more than sufficient to cover this risk.

If the difference between the buying and selling price of

gold was increased, this risk would also be enlarged. Consequently it would be possible for rates in London and New York to diverge more from one another. In these circumstances the monetary authorities in each centre would have greater scope to regulate rates at home to suit home requirements without setting up an undesirable flow of gold. The proposal to enlarge the gap between the buying and selling price of gold is due to Mr. Keynes. Such an expedient, while not being inconsistent with the retention of the gold standard, would modify its working in a most desirable manner.

(*ii*) The second point that calls for notice is this. The scheme for international co-operation has as its objective the maintenance of an appropriate rate of capital construction in the world as a whole together with stability in the value of the circulating medium which that would entail. Stability in the circulating medium may, however, be defined in various ways. As efficiency increases, is it desirable that prices should be maintained at a constant level or allowed to fall in proportion to the increase of efficiency ? The answer to this question depends on whether wages and other rewards to factors of production expressed in money are being pushed up as efficiency increases. It must be noted that efficiency may be increasing at different rates in different countries, and that the tendency towards an upward revision (in money) of wages, etc., has different force in different countries. The tendency towards upward revision of wages, etc., may not always be in exact proportion to the upward movement of efficiency. Consequently the kind of stability in the price levels that is desirable for different countries may not be the same.

But if the world is to have a common monetary system the general level of prices must broadly be behaving in the same way everywhere. Suppose that in order to secure equilibrium in the United States it is desirable that prices should have a slight downward tendency, while in England it is desirable that they should be absolutely stable. Both these conditions cannot be realised at the same time, if

England and the United States have a common monetary standard (e.g. a reformed gold standard).

An expedient may be devised for meeting this difficulty. The dollar-sterling par of exchange might be made to alter in a regular manner. Thus, if it was found to be desirable to have prices falling at the rate of 1 per cent in the United States and to have them stable in England, sterling could be made to fall in terms of dollars at the rate of 1 per cent a year. The gold content of sterling would remain fixed, while that of the dollar would rise at the rate of 1 per cent per annum. Such a regular shift would not be inconvenient to trade, and fluctuations from the par outside the ordinary limits would not be allowed.

If only international co-operation could be secured, these and other devices could easily be tried. In the absence of international co-operation each country should set about providing itself with a monetary system appropriate to its own needs. It could not hope then to have stable foreign exchange rates ; fluctuations would be due to instability elsewhere. Even in these circumstances it would probably do well to keep these fluctuations within reasonable limits.

In 1932 Parliament authorised the institution in England of an Exchange Equalisation Fund with power to borrow £150 million. In 1933 this figure was raised to £350 million. The purpose of this fund is to buy and sell gold or foreign exchange. It is thus discharging duties which are usually considered the special province of the central bank. Its operations are designed to keep the temporary fluctuations of sterling in the foreign exchange market within reasonable limits. These operations could perfectly properly have been undertaken by the Bank of England. But it was felt that at a time when our monetary policy was undefined and uncertain it was unfair to impose on that institution the risks which these operations necessarily involve in the absence of a specified long-run objective.

If it was decided to embark upon a policy of expansion in England and no expansion or insufficient expansion was

undertaken abroad, some drop in the foreign exchange value of sterling might be expected. It would recede to a new normal level. In the process of change, speculation would be likely to occur, making it move up and down in an erratic and disturbing fashion. The resources of the Exchange Equalization Fund could be used to prevent this kind of speculation from having any substantial effect on rates. When the speculative movement was favourable, the Fund would sell sterling and acquire foreign exchange or gold; when it was unfavourable the Fund would buy sterling with the foreign exchange or gold so accumulated. So long as no attempt was made to maintain sterling at an un-natural level, i.e. at a level inappropriate to the prevailing rates of monetary expansion at home and abroad, the inflow of gold and foreign exchange into it and their outflow from it should balance.

If the monetary policy was sharply defined, these duties could be transferred to the Bank of England. It is arguable on the other hand that in this matter of essentially national policy the responsibility should rest with the government. Such an argument, however, is far reaching, since it applies to all the operations of a central bank.

CHAPTER IV: COMMERCIAL BANKS AND CREDIT

By E. A. RADICE

1. General
2. English Joint Stock Banks
3. Commercial Banks in the U.S.A.
4. Credit Banks in Germany
5. Commercial Banks in France

§1. GENERAL

THE FINANCIAL institutions which are to be discussed in this chapter are those which are commonly called banks pure and simple ; but to lay down a definition of what banks are appears to be quite impossible. It is true that with the development of banking practice there have grown up in some countries systems of banking law which have laid down definitions of what banking is. But the nearest thing to a definition of a bank in England is " a person or corporation carrying on a *bona fide* banking business,"[1] and this shows clearly enough that, like many other things, a bank is in England at any rate more or less what you choose to make it.

Nevertheless to the ordinary person a bank does mean something pretty definite. First and foremost it is a place where your valuables, and in particular your spare money, can be put, and from which you expect to be able to take out intact what you have put in whenever you may want it. Thus we find that 300 years ago the Goldsmiths in London, who naturally had adequate strong rooms for their

[1] The Finance Act of 1915.

own valuables, started the practice of storing other people's as well. But just as the Goldsmiths of London found that in normal times they could lend out at interest a considerable portion of the money deposited with them, so to-day a bank is just as much an institution which lends money out as one which keeps money safe. A bank is in fact something more than either a safe place where you can deposit money, or a place from which you can borrow money : it is in essence a link between lender and borrower, between those with spare money to lend and those who want to borrow money to finance businesses. Without banks the whole process of lending and borrowing, and therefore of economic activity on a modern scale would be absolutely impossible.

But besides banks there are other types of financial institutions which also act as links between lender and borrower. In general we may say that an ordinary commercial bank deals with short term lending and borrowing (though this, as we shall see, needs qualification), while long term lending and borrowing is normally carried out by the other institutions, such as Issue Houses and Trust Companies, which are dealt with in another chapter of this book. You use a bank, in fact, when you want to deposit money: when you want to invest it you go elsewhere.[1] Similarly, we shall see that in England especially borrowers only come to banks for their current requirements, and not for fixed capital ; for the money which they require to buy stock, pay wages, etc., during the process of production and sale, and not for the money which is needed to build factories or set up permanent plant. It is true that in some countries, particularly Germany and in the United States, the ordinary banks have, to some extent, provided industry with permanent capital, so that even in this respect no hard and fast line always can be drawn between banks and other financial institutions. The distinction between short term and long term operations is however a rigid one so far as

[1] You may, it is true, buy securities through a bank, but in this case the bank is only acting as an intermediary.

the English banking system is concerned, and this distinction will be found to be a most useful one when we come to discuss the relation between banks and industry later on. Provisionally, therefore, it is convenient to think of a commercial bank as a place where people deposit money for short periods, and from which borrowers obtain money for short periods, though in certain important cases the traditional banking practice as it has grown up in England has been very considerably modified.

Banks and Credit. When the practice of depositing money with a London Goldsmith was first started, the part which the Goldsmith played as link between lender and borrower was quite simple. A deposited say £1,000 with him in the form of coin and bullion which he lent to B in the same form. Provided he saw that B was creditworthy, he could always make a profit if the interest he got from B was greater than the interest (if any) which he paid A. The first development took place when he persuaded B to take his notes (i.e. his promises to pay money) instead of actual metal, and this B would do if the standing of the Goldsmith, or banker as we may now call him, was so good that his promises to pay—i.e. his notes—were regarded by people in London as being as good as actual money. Having issued his notes to B as a loan, the banker's balance sheet would read as follows :

Liabilities	£	Assets	£
Due to A . . .	1,000	Cash (coin, bullion, etc.)	1,000
Notes outstanding .	1,000	Loan to B . . .	1,000
	£2,000		£2,000

The banker would then probably find that his outstanding notes were not quickly presented to him, but were circulating with the public, and he would then increase the amount of his notes outstanding by granting loans to other

customers, until his balance sheet—leaving out of account his own capital—became something like this:

Liabilities	£	Assets	£
Due to A . . .	1,000	Cash (coin, bullion, etc.)	1,000
Notes outstanding .	9,000	Loans to A, B, C, D, etc.	9,000
	£10,000		£10,000

The banker's total liabilities would now be ten times his cash, but provided the notes were not presented too quickly, he would be able to carry on. The amount of "credit he created" would depend on what proportion of cash he thought he ought to hold against his liabilities to be on the safe side and to have a sufficient cash margin to meet all likely demands.

Naturally this creation of currency out of mutual debts was very profitable to the banker, as he had no further expenses apart from the printing of his notes, and had a good income from the interest he charged on his loans. This led many banks to forget the fact that an adequate backing of cash was a vital necessity, and in the early nineteenth century disasters were so frequent in England, that in 1844 an Act was passed forbidding all but certain specified banks to issue notes. To-day the issue of notes is legally regulated in every country,[1] and with a few exceptions[2] has passed out of the hands of commercial banks altogether.

Although prevented from issuing their own notes, commercial banks soon found that there were other means of continuing their profitable manufacture of credit out of mutual debts. This was largely made possible by the growth of the use of the cheque. A cheque is in effect a bill or draft payable on demand. If I, for instance, have money deposited with a bank, I can make out a draft order on the bank requesting it to pay me or some other person a sum of

[1] For a fuller discussion of this see the section on Central Banking.

[2] The most important exception is of course the United States of America, where the regulations regarding note issue are complicated and quite different from those of any other country.

money when the draft is presented for payment. Payments are commonly accepted by cheque when there is an assurance that the cheque will be honoured, and this depends of course on the assumptions (1) that the bank itself is able to meet the draft, and (2) that the drawer actually has that sum of money deposited at the bank or is entitled to draw on the bank for that amount. In point of fact cheques are only rarely paid in cash. Usually the person in whose favour the cheque is made out pays it into his own account, either at the same bank or at some other bank, and the mutual indebtedness of the various banks which arises from such transactions is cancelled out through clearing associations. At the same time banks still have to be careful that they have legal tender with which to meet sudden calls that may be made upon them by their depositors. The right to draw a cheque on a bank implies the right to take out of that bank legal tender, and consequently the amount of credit which a bank can safely create depends ultimately on the amount of cash it holds, and the proportion of cash to deposits which it considers necessary to meet emergencies.

A cheque indeed depends much more on mutual confidence than did the old bank note, because it depends on the trustworthiness not only of the bank on whom the cheque is drawn, but also of the depositor who draws it. Consequently we find the use of the cheque most developed in commercially advanced countries such as the United States and Great Britain. In peasant communities on the other hand, the cheque is still very little used, and the volume of notes in circulation tends to be proportionately greater, as nearly all transactions are made with notes or coin.

Let us now turn back and consider what changes in the methods of creating bank credit have been made by the abolition of the issue of notes by ordinary commercial banks. Actually there is little essential change. Instead of issuing notes to a customer by way of loan a bank will open an account in his favour, and so enable him to draw

cheques on the bank. The customer will therefore have a deposit with the bank, or else with another bank into which he may pay the cheque. Our simplified bank balance sheet of page 164 would now read as follows :

Liabilities	£	Assets	£
Deposits . . .	10,000	Cash (coin, bullion, etc.)	1,000
		Loans to A, B, C, D, etc.	9,000
	£10,000		£10,000

the only difference in the two balance sheets being that instead of notes outstanding, we have an increase in the liabilities to depositors who have acquired the right to draw on the bank, and who have a credit with the bank of the same kind as that of the original depositor, A, who paid cash into the bank.

In the old days, then, every fresh additional loan made by a bank resulted in general in an increase in its note liabilities : nowadays it results in an increase in the deposit liabilities either of itself or of another bank. The system is of course much more complicated now than in the old days because it is impossible to tell which of the banks in the country will gain the increase of deposits which arises from the fresh additional loan given by the bank, but it is nevertheless true that the creation of credit by the banking system as a whole works on the same principle as it did before the restrictions on the issue of notes.

It has so far been argued that banks or the banking system of a country can create credit so long as a sufficient margin of cash is kept for safety, and that in essence every loan creates a deposit. It must be remembered however that the creation of loans depends on the willingness of persons to borrow, and their ability to give the banks adequate security (personal or other) for the loan. The extent to which the banks can create credit depends as much therefore on the willingness of the general public to borrow (or those members of it to whom the banks think it is safe

to lend) as upon the banks themselves. It must also be remembered that a loan from a bank may often simply result in the repayment of a loan to the same bank or some other bank—in fact this is the effect of most new loans which are made. Additional bank credit will therefore only be created if (1) the banks are in a position to expand their loans, (2) the public wants new additional loans. In point of fact large expansions of bank credit are always accompanied by great industrial and commercial activity[1] or else by heavy government borrowings as in times of war.[2]

A Banker's Balance Sheet. We have so far considered the functions of commercial banks only in their simplest outline, and we must now examine in more detail the exact position in which a bank stands to its debtors and its creditors. In other words we must take the simplified balance sheet of page 167 and apply it to the actual world of economic reality.

Like every commercial undertaking a bank has two sides to it. We may either look at it from the point of view of its assets or what is owed to it, or from the point of view of its liabilities, or what it owes. Both sides of course are continually varying, but for purposes of analysis a balance sheet is made up from time to time which is supposed to represent a true picture of a bank's assets and liabilities at a given date.

Let us start with the liabilities, for in the case of a bank, these are simpler than the assets. Like every other undertaking a bank will have capital with which to build up its business, and this is represented on the balance sheet as its liability to its shareholders. Secondly, if it is prudent, it will after a time have accumulated a reserve fund or

[1] At the end of 1923 the total of bank deposits in the United States was $42,163 millions : at the end of 1928 it was $56,766 millions.

[2] At the end of 1913 the total of British Bank Deposits was £1,142 millions : at the end of 1920 it was £2,739 millions.

surplus, which is represented as its liability to itself.[1] Similar to the reserve fund or surplus, but often shown separately in the balance sheet, is the item "undistributed profits." Finally there will be, as we have seen in the simplified example, its liabilities to its depositors. In modern banking deposits are usually of two kinds. You may either have a current account or a demand deposit account, in which case you may draw on it whenever you want to, or you may have a deposit account or a time deposit account on which you may only draw after giving notice to the bank that you wish to do so. The latter is in effect more like a savings bank account, and banks usually allow interest on such deposits.

A bank's liabilities then will be divided into these three main classes: liabilities to its shareholders (capital), liabilities to itself (reserves), and liabilities to others (deposits). In addition a bank may have what are called "contingent liabilities," that is liabilities which it may have to meet in certain circumstances. These liabilities are always in effect guarantees, which, if they appear in the balance sheet, will always be offset by corresponding amounts on the assets side. Supposing for instance that A, a customer of the bank, wants to borrow from B, and that the bank guarantees the loan. Then its liability is contingent on A's failing to repay it, which is offset by the probability of A's repaying it without having recourse to the bank. The most common of these contingent liabilities are "acceptances[2] for customers' account," which are balanced by the assets "customers' liabilities for acceptances."

We turn now to the more complicated, and, from the

[1] In addition to its published reserves, a bank will often have hidden reserves, which it does not publish. Some of these hidden reserves are often included in an item "other accounts," which is usually lumped together with deposits. Hidden reserves may also arise from the fact that certain items on the assets side, e.g. premises, are not given their full value: if they were, there would be a corresponding increase in the published reserve fund or in "other accounts."

[2] For an explanation of the term see p. 232.

BALANCE SHEETS AS AT 31 DECEMBER 1932

A LONDON BANK:

(Figures in £ thousands)

Liabilities		Assets	
Paid up Capital	15,858	Cash and balances with the Bank of England	51,681
Reserves	10,250	Balances with other Banks	10,664
Deposits and other accounts	381,847	Money at Call and Short Notice	24,818
Acceptances for account of customers	6,279	Bills	66,289
		Investments	94,048
		Advances and other accounts	153,159
		Premises	7,296
		Customers' liabilities for Acceptances	6,279
	414,234		414,234

A NEW YORK BANK:

(Figures in $ thousands)

Liabilities		Assets	
Capital	90,000	Cash and due from banks	197,892
Surplus and Profits	181,233	Investments and Securities	642,081
Other Reserves	6,512	Bills and Loans	456,157
Deposit and other accounts	1,038,917	Bank Buildings	14,322
Agreements to repurchase securities sold	8,154	Items in transit and Interest due	14,364
Acceptances for account of customers	85,969	Customers' liabilities for Acceptances	85,969
	1,410,785		1,410,785

A BERLIN BANK: (Figures in Rm thousands)

Liabilities		Assets	
Paid up Capital	28,000	Cash and balances with banks	40,464
Reserves	10,000	Collateral loans	2,517
Profit and Carry Forward	2,092	Bills, Cheques, Treasury Bills, etc.	76,705
Current and other accounts	253,320	Advances and Debtors	179,690
Acceptances	32,320	Investments, Syndicates, etc.	19,107
		Bank Premises, Real Estate, etc.	7,249
	325,732		325,732
Liability for guarantees given as per contra	7,878	Customers' liabilities for guarantees given as per contra	7,878
Liabilities for endorsements	32,934		

point of view of commerce and industry, more important side of a bank's balance sheet, namely its assets. Naturally we find that their distribution varies in different countries because not only the practice of banking but also the needs of commerce and industry vary. It is possible, however, to enumerate the main items, though, as can be seen from a comparison of the balance sheets of a London, a New York and a Berlin bank given on pp. 170-171, they are set out differently, and are called by slightly different names.

The first item to be considered is the cash which a bank holds in its till. This, as we have seen, is its first line of reserve against demands from depositors, and, even when confidence is high and business good, a bank will always deem it prudent to hold some portion of its assets in this way, though of course no interest is earned on it. In most countries credit balances with other banks, and especially with the central bank, are lumped together with cash.

Money at call and at short notice consists of loans given usually to the money market or the stock exchange for short periods. First class bills or securities are usually deposited as "collateral," or backing, for the loan. In normal times loans are readily renewable, but the essence of this type of loan is that a bank should be able to call it in very quickly.

Bills are nearly always a very important item in a bank's assets. A bill may be described as an order by the drawer to someone else to pay the drawer himself or a third person a certain sum of money at a certain time.[1] Bills are therefore similar to cheques except that normally they are not payable on demand,[2] and are in effect short term investments, i.e. investments repayable usually within three months,

[1] A more accurate definition of a bill is the following : A bill of exchange is a credit instrument generally made out as follows : It is dated and states (1) the sum to be paid, (2) the time and place of payment, (3) the name of the person who must pay, (4) the name of the person to whose order the bill is drawn (a third person or the drawer himself). A bill is transferable by endorsement. The acceptance of a bill of exchange is the act by which the drawee, by setting his name to the bill, contracts the personal obligation of paying it when it matures.

[2] "Sight drafts"—i.e. bills payable on demand are to all intents and purposes indistinguishable from cheques.

and almost certainly within six months. Foreign trade is nearly always financed by the issue of bills: in many countries (e.g. France) a very considerable proportion of internal trade is financed in this way, and in England particularly the Government meets its current requirements largely by the issue of treasury bills. A bank will usually try to arrange its "bill portfolio" in such a way that some of its holdings are always maturing, or that a considerable portion of them will mature at a time when large cash demands from its depositors are probable (e.g. on quarter days). A bill with a "good name" on it—i.e. guaranteed by a person of high credit standing—is an excellent form of investment for a bank, since it can be considered as good as cash on the day of its maturity. The fact that it is a short term security makes it extremely unlikely that it will vary much in value,[1] and in centres where there is an organised money market a good bill can always be sold on the market for its face value less a discount depending on the number of days which it has to run before it is paid and the prevailing rate of discount.[2]

Investments on the other hand, though usually more remunerative than bills, are generally considered by orthodox commercial bankers to be a less suitable form of holding unless they are easily realisable for cash and are "gilt-edged." Nevertheless, in a number of countries the practice

[1] Suppose that the prevailing rate of discount for good bills and of interest for non-terminable long term bonds is 4 per cent. Then the value of a £100 three months' bill will be £99, and the value of a £100 5 per cent bond will be £125. Suppose that the rates of discount and interest now rises suddenly to 5 per cent. The value of the three months' bill will fall only 5*s.* to £98 15*s.*, while the value of the bond will fall to £100. The shorter the term of a security, the less effect will fluctuations in the rate of interest have on its value.

[2] Rate of discount must be distinguished from rate of interest, since it is calculated in effect upon the sum to be repaid and not upon the sum borrowed. To take an extreme case, suppose the rate of interest is 50 per cent and I borrow £66⅔ for one year, then I shall have to pay £100 after one year. If the rate of discount on a one year bill on the other hand is 50 per cent, I shall only now get £50 for a bill on which I shall have to pay £100 in a year's time. Obviously the rate of discount will never be greater than 100 per cent per annum for a one year bill.

has grown of investing assets in commercial and agricultural concerns. These investments may take the form of industrial or real estate bonds, agricultural mortgages and even shares in industrial or financial companies. In comparing the balance sheets of different banks it must always be remembered that the term investments covers a large variety of things. In a large English bank nearly all investments are gilt-edged, i.e. Government and municipal stocks, etc., while in a small American State bank most of the investments may very well be farm mortgages.

Loans and advances are the largest item of the assets of most commercial banks. They are normally made for fairly short periods of time and cover a very wide field. Together with trade bills, loans form the circulating capital of industry, but are in addition occasionally given to concerns for the purpose of obtaining fixed capital pending a long term issue, the proceeds of which will be used to repay the bank loan. A large proportion of bank loans are of course granted for financial purposes too, and also to private persons.

Finally there are the items "bank premises" and "customers' liabilities for acceptances and guarantees." The latter, as we have seen, is balanced by the contingent liability "acceptances and guarantees for account of customers."

Factors Governing Banking Operations. Now it is clear that the influence of the banks upon the economic life of the country will depend on two things—the safety of bank deposits, and the way in which the banks distribute their assets—i.e. the kind of credit facilities which they grant. In Great Britain there has been of recent years a tendency to concentrate attention on the second of these factors whenever banking institutions have been examined, largely because the safety of bank deposits was never called into question. Recent events in Germany and above all in the United States have shown, however, that it is impossible to build up theories as to how bank credit should be

distributed without due regard to how such a distribution may affect the safety of bank deposits. We must therefore examine the two factors together and see how they influence each other.

Turning back to the typical bank balance sheet which we have examined, we see that the resources which are at a bank's disposal are roughly of two kinds ; its own resources, represented by its capital and reserves, and the resources of others, represented by the deposits which have been placed with it. In general a bank will have to be much more careful in its lending policy if most of the resources at its disposal are deposits placed with it by other people. Even if it is unwilling to take risks with its own resources, it can to some extent at any rate afford to " tie them up " without excessive danger. With the resources of others, however, it is otherwise. Deposits are liable to be withdrawn either on demand or at comparatively short notice. Any rumour adverse to the bank may cause a run on it, which will not merely lose it valuable custom, but may even compel it to close its doors. Deposits in fact are sums of money entrusted to a bank for safe keeping, which a bank must regard as essentially different from its own capital and reserve funds.

Consequently we find that the higher the proportion of its deposits to its total resources the more careful will a bank be to keep its assets " liquid "—i.e. of such a kind that they vary least in value and are most readily turned into cash. Stability in the value of assets is perhaps an even more important criterion than convertibility into cash. No deposit bank is ever sufficiently liquid to be in a position to pay back all its deposits in cash, and the fact that in any country the total of bank deposits—i.e. bank credit—is far in excess of the total of legal tender money makes it obvious that the same is true of the banks of a country taken together. Nevertheless, stability in the value of a bank's assets will engender confidence and prevent the withdrawal of deposits.

On the other hand, too much emphasis on the need for liquidity may hamper a bank's industrial policy. For the

very fact that industry needs to borrow from banks shows that it cannot at any given moment pay the money back. In this respect every bank which makes loans is to some extent tied up, but the higher the proportion of its own resources the less will it need to worry about being tied up. The balancing of the interest of depositors against the needs of borrowers is always a difficult problem for a bank, and one round which most controversies about banking policy centre. In England the policy of the banks is by tradition one of caution, and though it is recognised that the interests of depositors have always been safeguarded, it is often asserted that the needs of industrial borrowers have been overlooked. In the United States and in Germany on the other hand the banks have usually adopted a more forward lending policy, while less confidence has sometimes been felt —and this lack of confidence has recently been fully justified —as to their soundness from the point of view of their depositors.

The Problem of Liquidity and the Spreading of Risks. A bank which has to rely upon the resources of others will, however, be able to safeguard its depositors by spreading its risks. It is true that in times of general trade depression, when every sort of business is doing badly, lending will in general become more risky than in times of prosperity. Nevertheless, in banking, as in other forms of enterprise, the spreading of risks is an essential safeguard against loss. Not only should banks lend to different industries, but also to industries in different places.

In the nineteenth century, when capitalism was on a smaller scale and individual business men were more enterprising, industry was financed to a very considerable extent directly out of private savings, and this was particularly true of industries situated far from the big financial centres. In modern times, however, the growing complexity of capitalism has led to an increase in indirect financing through commercial banks on the one hand, and through institutions specialising in long term financing on the other.

In Europe especially people desire safety more than they did, and consequently show a preference for bank deposits.

Risks therefore have to be borne by financial institutions more than formerly, and in order for these risks to be spread it is essential that banks should not be small and localised. Recent experience in America shows only too clearly how easily small banks can be ruined by the failure of the local industries which they serve. In Germany, though the fault of over-localisation was avoided, there was a tendency for the big banks to tie themselves too much to particular industries, and this has dangers even where the units concerned are large.[1] In countries served by a smaller number of large banks with extensive systems of branches, and where the banks are careful not to involve themselves too deeply in any one industry, bank failures are much more easily avoided.

It still remains true that banks which depend largely on their own resources and not so much on the resources of others can afford to specialise their functions in a way in which deposit banks cannot. In some countries, as in France, these banks still play an important part, but with the general growth of banking habits on the part of the public deposit banks are becoming relatively more and more important, and therefore industry is becoming more and more dependent on deposit banks for the credit it needs.

Banks and Industry. It is not enough, however, that banks should merely be safe places where people can place their deposits. They are in addition the chief providers of credit, without which industry cannot carry on. And because they are the chief providers of credit, they must be in close touch with industry, watching its needs and helping its progress. Safety of bank deposits is of little value if it leads to the curtailment of industrial credit and so to economic stagnation. How far can large non-specialist deposit

[1] The failure of the Darmstaedter und Nationalbank in July 1931 was a direct result of the heavy losses of the giant wool concern, the Norddeutsche Wollkaemmerei, in which it had large commitments.

banks with numerous branches maintain this close contact with industry and adequately supply its financial needs? We shall see when we come to examine more closely the English Joint Stock Banks that this close contact has often been lacking. It will be sufficient for the moment to draw attention to the main principles which must be maintained in any national banking system which is to serve industry as a whole as well as those who have money to deposit.

In the first place it is inevitable that private banks however large should think in terms of the particular firms or persons rather than of the industry to which they are lending. When a big bank makes an advance to an iron and steel firm, it will make that advance having regard to the solvency of that firm rather than to the needs of the iron and steel industry as a whole. In cases where one firm more or less constitutes the industry (as sometimes happens in Germany) it would be inadvisable for one bank alone to take over the whole task of providing credit for that firm, because this would tend to concentrate rather than spread its risks. Other banks therefore will also lend money to the firm, and it is inevitable that a considerable lack of co-ordination in the furnishing of credit to that industry will follow. If each bank spreads its risks in order to safeguard its assets in the best possible way, each industry will be served by more than one bank. This makes any effort to reorganise and rationalise big basic industries infinitely harder, since industrial reorganisation is impossible without co-ordination of the furnishing of credit.

In the same way the fact that each bank will wish to spread its risks geographically as well causes wasteful competition and overlapping in the setting up of branches. It is absurd that one small town should have four or five branch banks when one would suffice, but the competition between the big banks will make this waste inevitable. We are forced to the conclusion then that the development of banking cannot logically stop at the point where the main credit needs of industry are supplied by a small number of banks each with a large system of branches, and none of them

specialising in any one industry. From the point of view of industry indeed the system of specialisation is far preferable, whether it be a system where small branches supply credit to local industries and can keep in day to day touch with local needs, or a system where large banks through their branches concentrate on supplying credit to one large industry or to a group of industries. In each case the needs of industry can be studied. On the other hand, as we have seen, there is a risk to the depositors.

It is necessary therefore to combine the two systems and concentrate commercial banking just as note issuing banking has been concentrated. In most countries to-day the supply of currency is concentrated in the hands of a single institution. Under modern conditions it is credit and not currency that is all important, and consequently the provision of credit must be concentrated in the same way. Only thus can risks be spread, deposits safeguarded, and adequate supervision kept over the provision of credit to industry as a whole.

Banks and National Planning. As has been pointed out in the chapter on Central Banking, it has for some time been assumed in most countries that the State should lay down regulations determining the amount of currency that can be issued. Legislation has therefore been put through governing the conditions under which central banks can issue notes. Besides this, however (see pp. 148-152), central banks can in many countries affect the supply of credit through "open market operations." Lastly the fact that the ratio of cash to bank deposits is maintained fairly constant either by law or by custom, means that the total volume of bank credit tends to bear a more or less constant ratio to the total amount of currency issued. It can therefore be said that central banks can control the volume of credit and currency issued.

But with the growing complexity of economic organisation, it is gradually being realised that something more than this is needed. Industrial life requires national planning

under central direction and control. Now while there is a growing appreciation that the investment of long term funds in industry must be centrally directed under a National Investment Board, or some such body, even some of the staunchest supporters of National Planning seem to have overlooked the fact that the central control of ordinary commercial loans and advances is just as important.

Arguments in favour of the concentration of commercial banking have already been given, but to those who hold that only by some thorough-going scheme of national planning can the complexity of modern economic problems be resolved, the case for the State control of commercial banking is even more powerful. Once it is granted that some central direction of industry is necessary—and to-day this is granted by many who would call themselves anti-Socialist—then it becomes essential that there should be control over the direction and not merely over the quantity of credit; over the kind of loans that are made (i.e. whether they be to iron and steel firms or to greyhound racing companies), and not merely over their amount. A system under which commercial banks can use the deposits of the public in lending as and how they like is clearly incompatible with even the most rudimentary form of national planning. For Socialists of course the national ownership of the commercial banks is a *sine qua non*, though it must be remembered that banking nationalisation unaccompanied by far reaching measures of industrial and social reorganisation is of little value.

So far no far reaching measures of banking control have been taken outside Soviet Russia.[1] We must now therefore turn to consider the banking systems of some of the most important industrial countries at the present moment.

We shall see that each one of them has flaws, that each has flaws of a different kind, and that each can learn from the others. This chapter is written by an Englishman, and

[1] Though recently some important steps have been taken in Germany (see p. 218).

it may well be that much of it is coloured by the special conditions of the English banking system. No hard and fast system can of course be laid down for all countries, because banking must inevitably develop parallel to industry; constitutional problems also arise; nevertheless it is true that in general terms the needs of industrial countries to-day are the same all the world over, and in no direction is reform more badly needed than in commercial banking.

§2. ENGLISH JOINT STOCK BANKS

NEARLY all the business of Commercial banking in Great Britain is carried on by a small number of joint stock banks. In Scotland joint stock banks, under the provisions of the Scottish Bank Notes Act of 1845, which confined the rights of note issue to the banks already exercising that privilege, perform their functions both by the issue of notes and by working the cheque system. In England on the other hand, since the right of note issue is a monopoly of the Bank of England, their development has been very largely dependent on the cheque system. The position of Scotland is in this respect rather peculiar, and, as the English banks are from the point of view of their resources overwhelmingly important, it will suffice to concentrate attention on them.

Most of the English joint stock banks have grown as a result of a long series of amalgamations. In the nineteenth century there was a comparatively large number of banks, mostly with branches, operating all over the country. They were in close touch with the local needs of industry and commerce, but, as English industry was well supplied with permanent capital by business men themselves, they tended to concentrate their activities to short term lending—i.e. the provision of circulating capital; and this established a tradition of British banking which has lasted till to-day. This specialisation in short term lending, together with the long established practice of branch banking are the two

essential features which differentiate British banking from that of some other countries.

The growth of London as the financial centre of the world naturally resulted in the attraction of deposits and funds to that centre. By the end of the nineteenth century, many of the country banks had already lost their relative importance, and amalgamations proceeded apace. In 1900 there were 77 joint stock banks in England and Wales, in 1913 there were 43, and to-day there are 16, of which the "big five"[1] carry on the vast majority of the business. In spite of these amalgamations, however, the total number of branches has steadily increased, and many quite small towns are now served by each of the "big five."

The control of credit in England to-day is virtually in the hands of the big five together with the other five London clearing banks,[2] and the power they wield is enormous. Owing to the general practice of keeping a fixed ratio of cash to deposits, the Bank of England, it is true, can keep a fairly good control over the quantity of bank credit that is issued. Nevertheless the joint stock banks have virtually complete control over the direction and use of that credit. The discount market relies upon them for its day to day money; the stock exchange for its short term loans; industry for its circulating capital; and the Government for its short term borrowings by way of Treasury Bills.[3] Only the long term market can be said to be not directly affected by the joint stock banks, and even here their influence is felt through their immense holdings of investments, mainly "gilt-edged."

[1] Midland Bank, Lloyds Bank, Barclays Bank, Westminster Bank and National Provincial Bank.

[2] Coutts, Glyn Mills, Martins and Williams Deacons, and an Irish bank, the National Bank.

[3] It may be noted here that only by inflation directly through the Bank of England could the Government secure funds without having recourse either to a long term loan or to Treasury Bills—i.e. to the joint stock banks.

The Resources of the Joint Stock Banks. The English joint stock banks to-day are deposit banks *par excellence*. In no other country are the providers of industrial credit to such a degree the guardians of the national savings as well. Consequently England is the home of banking conservatism. The safety of bank deposits is never called into question, but the tradition of caution has its natural consequences, as we shall see later on. For the moment, however, we must examine what the resources of the banks are (i.e. their *liabilities* from the balance sheet point of view), how they have been built up, and how they are maintained.

As we might expect, the English banks' resources are very largely the deposits which the public place with them. Before the war the proportion of " own resources " (i.e. capital and reserves) to total resources was usually a good deal smaller in the case of English banks than in the case of American or Continental banks. Even in spite of the losses of capital which German and other Central European banks suffered during and after the war, their proportion of own resources still compared favourably in 1929 with that of English banks, and this in spite of the very considerable amounts which English banks have been able to place to reserve. To some extent the crisis of 1931 altered this, and to-day the capital and reserves of German and indeed of many American banks too have fallen to very low levels : nevertheless it may be said that English banking practice is founded on the assumption of a low proportion of " own resources," while the tradition in other countries is usually very different.

One of the reasons for this is the existence in the case of all the English joint stock banks of a considerable amount of uncalled capital, or capital issued but not paid.[1] That is to say, shares may have been issued to the public at £25 of which only £5 has actually been paid up, while the remaining £20 represents a liability on the part of the holder of

[1] At the end of 1932 the total subscribed capital of the 16 English joint stock banks was £256,358,234, of which only £79,960,136 was paid up.

COMBINED BALANCE SHEET OF THE 16 ENGLISH JOINT STOCK BANKS AT 31 DECEMBER, 1932

(Figures in £ millions)

Liabilities		Assets	
Capital paid up	80·0	Cash in hand and at Bank of England	297·0
Reserves	55·3	Money at Call and Short Notice	149·3
Undivided Profits	5·9	Bills discounted	389·2
Notes in Circulation, etc. (in the Isle of Man)	·1	Advances, Loans, etc.	799·1
Acceptances	96·7	Investments	520·7
Deposits	2064·3	Cover for Acceptances	96·7
		Premises and Sundries	50·3
	2302·3		2302·3

The 16 banks are as follows :

Barclays, Baring Bros. & Co., British Mutual Banking Co., Coutts & Co., District Bank, Glyn, Mills & Co., Isle of Man Bank, Lloyds Bank, London Merchant Bank, Manchester County Bank, Martins Bank, Midland Bank, National Provincial Bank, Union Bank of Manchester, Westminster Bank, Williams Deacons Bank.

the share to pay the bank that amount, should it decide to call in its unpaid capital.

As a matter of fact it is many years since a joint stock bank has made any such call, and under normal circumstances such an event is extremely improbable. Nevertheless uncalled capital is an additional safeguard, should a bank get into difficulties.

The published reserves of the joint stock banks are equal to some 69 per cent of their paid up capital. In addition to the published reserves there is in normal times a considerable amount of hidden reserves, which it is not possible to estimate. The value of these hidden reserves is greatly affected by variations in the values of gilt edged securities. These are always valued in the banks' balance sheets at " cost or market value, whichever is the lower," so that any big appreciation in their value is not shown in the books, but goes to swell hidden reserves.

The deposits of the joint stock banks amount at the present time to about £1,900 million, or some 85 per cent of their resources. As we have seen they largely consist of credit created by the banks themselves, but their amount is limited by the amount of cash which the banks hold.

The deposits consist of current and deposit accounts. English banks as a rule do not grant interest on current accounts, but only on deposit accounts. In London the usual interest on deposit accounts is 2 per cent below bank rate, or ½ per cent if the bank rate is 2 per cent.[1] Outside London banks have usually allowed a fixed rate of interest of 2½ per cent, but this rate has recently been reduced to 1½ per cent in many places. It must be remembered however that there are important exceptions to these rules. Large depositors often obtain considerably more favourable terms, particularly when interest rates are high and there is a big demand for credit from the banks.

The proportion of deposit accounts to total deposits depends largely on the state of trade. When trade is good, money is turning over rapidly, and the public will keep a

[1] Before the war it was usual to give 1½ per cent below bank rate.

larger proportion of its money on current account.[1] In times of depression however, even when the rates of interest allowed on deposit accounts are very low, considerations of safety come first and foremost, and the public tends to place its money on deposit. The habit of placing money on deposit account has grown very considerably in recent years, as the accompanying table shows. People have been unwilling to invest money, and the initiative has been left with the banks to make what use of it they can.

The Joint Stock Banks[2] and the Money Market. The resources of the joint stock banks are used for the various purposes enumerated on the assets side of their balance sheets (see page 184). The percentages of these items to deposits are given in the accompanying table. The percentages add up to more than 100, since not all the banks' own resources is balanced by the item branch premises, but some part is kept for general purposes.

[1] Current and Deposit Accounts as Percentages of Total Deposits (London Clearing Banks)

Monthly Averages	Current Accounts	Deposit Accounts
1919	67.2	32.8
1920	63.8	36.2
1921	58.4	41.6
1922	58.5	41.5
1923	59.8	40.2
1924	58.8	41.2
1925	57.6	42.4
1926	57.3	42.7
1927	56.2	43.8
1928	55.8	44.2
1929	54.1	45.9
1930	52.9	47.1
1931	52.7	47.3
1932	49.5	50.5

[2] Here and in what follows, the general term "joint stock banks" refers to the most important of them, i.e. the London clearing banks, and, in particular, the "big five."

LONDON CLEARING BANKS—AVERAGES OF WEEKLY FIGURES

PERCENTAGES OF DEPOSITS

	Cash and Balances with Bank of England	Money at Call and Short Notice	Bills Discounted	Investments	Advances
1925 .	11·8	7·0	13·6	17·2	51·5
1926 .	11·7	7·2	13·0	15·9	53·6
1927 .	11·5	8·0	12·8	14·8	54·2
1928 .	11·1	8·5	13·4	14·4	53·7
1929 .	10·8	8·1	12·7	14·3	55·1
1930 .	10·7	7·8	14·7	14·3	53·5
1931 .	10·4	6·9	14·6	17·1	52·2
1932 .	10·4	6·5	17·2	19·4	47·1
1933 (May) .	10·6	5·0	17·8	27·3	39·9

Now there are broadly two ways in which the banks can use their resources. They can either use them by granting credit directly to industry or not. The more liquid a bank is, the less it will use its resources in granting credit to industry, and the more will it be concerned with the other method, i.e. what may generally be termed transactions with the money market. The items of a bank's balance sheet which do not directly concern industry are Cash, Money at Call, Treasury Bills and Investments.[1]

We have seen that the banks always maintain a certain amount of cash to meet contingencies.[2] It is usually maintained that English banks hold a cash to deposits ratio of one-ninth, and that therefore the control which the Bank of England has over the volume of cash (through its currency regulations and open market dealings) in effect constitutes a control over the total volume of bank deposits as well. As a matter of fact, as we see from the table on this page, this ratio has varied considerably in the past few years. In the period 1925–1931, when the Bank of England was pursuing a deflationary policy, the joint stock banks counteracted the reduction in deposits which this would have

[1] Because the investments of English banks are practically all (nearly 90 per cent) British Government Securities.

[2] Cash here and in what follows includes balances with the Bank of England.

entailed by lowering their cash ratio. This was particularly important to them in the years 1927–29 when interest rates were high, and they could profitably employ large resources. The result was that in 1931 deposits were actually £246 millions higher than they would have been if the cash ratio of 1925 (11.8 per cent) had been maintained. As a matter of fact one of the reasons why the banks were able to do this was that the proportion of deposit accounts was increasing and the proportion of deposits withdrawable on demand (and against which the cash reserve was really needed) was consequently declining. On examining the figures we find that the proportion of cash to *current* accounts remained considerably more steady,[1] and it is probably this proportion (20 per cent) that is the significant one rather than the proportion of cash to total deposits.

One of the peculiarities of the English banking system is that the joint stock banks never themselves borrow from the Bank of England. It is true that the Bank of England may affect their balances with it by open market operations, but the practice of discounting bills, in the way in which member banks in the United States for instance discount with Federal Reserve Banks, is unknown. This is largely because of the existence of a well organised discount market (see Chapter V) to which the banks lend money at call. In times of stringency the banks call in their loans to the discount market, which in turn discounts bills with—i.e. borrows from—the Bank of England. The effect of course is much the same as in the United States, but the method is more roundabout, and the result is that the Bank

[1] London Clearing Banks: Proportion of Cash and Balances with Bank of England to Current Accounts.

1925	20.5
1926	20.4
1927	20.5
1928	19.9
1929	20.0
1930	20.4
1931	19.7
1932	20.4
1933 (May)	21.0

of England, while it can and does control the kind of bills held by the discount market, has far less influence on the bill holdings of the joint stock banks.

Bills, particularly treasury bills, and investments are a large proportion of the assets of the joint stock banks. Since the war treasury bills have become relatively more important than commercial bills. In normal pre-slump years holdings of treasury bills amounted to some 60 per cent of total bill holdings, while during the depression this proportion has increased still further owing to the general fall in trade and the consequent shortage of commercial bills. The investments of the joint stock banks are nearly all "gilt-edged" securities.[1] In normal times therefore these can be considered as being reasonably liquid, though not of course as liquid as bills. The income which is obtained from them however is more stable than that which is obtained from bills, in normal times somewhat higher, and in times of depression very considerably higher. The English joint stock banks have accumulated large hidden reserves through their holdings of government securities which were bought at low prices during and soon after the war, and which now stand very much higher.

The proportions of their assets which the joint stock banks hold in bills and investments are not very different (see table on page 184). These items form nearly the whole[2] of the banks' semi-liquid assets, which are neither kept very liquid (in cash or at call) nor advanced to industry and private persons. Since the amount which is kept very liquid does not change very much, the amount kept in bills and investments tends to vary inversely with the demand from industry for advances. In times of depression, holdings of bills and investments rise, in times of prosperity they fall. Even in times of prosperity however these holdings are very large, and consequently the joint stock banks have a very considerable influence indeed both on the bill market,

[1] The exceptions are mainly investments in subsidiary banking concerns.

[2] i.e. apart from commercial bills.

particularly as regards treasury bills, and also on the market for government securities. The government is therefore in a very special way dependent on the goodwill of the joint stock banks both for its current and for its long term financing. The fact however that bills and investments are subject to competitive buying means that the banks are not in a monopoly position in this field, and that their prices, and therefore the interest rates they earn are not easily kept at an artificial level. In the case of advances on the other hand, where the joint stock banks have a virtual monopoly between them, the position, as we shall see, is far different.

The Joint Stock Banks and Industry. Since English joint stock banks, unlike banks in certain other countries, do not make permanent investments in industry—except in so far as their industrial loans and advances become frozen—it is their loans and advances that we have to examine, if we are to obtain an idea of their connection with industry. It is true that the banks do hold commercial bills, but these bills mainly represent transactions of international trade, and the proportion of inland bills is therefore comparatively small. In the past home industry and agriculture used to obtain finance by drawing bills which were bought by banks and other institutions to a much larger extent than is the practice to-day. From the banks' point of view this was desirable, for the reason that a trade bill is regarded as being "self-liquidating." Every true trade bill represents the manufacture or movement of a particular batch of goods, and when this process is finished the bill is automatically paid out of the proceeds of the sale of the goods. Nevertheless for one reason or another British industrialists have to a large extent given up the use of bills as far as internal trade is concerned, in spite of the fact that bankers would like to see some return to the old methods.

Industrial and agricultural credit is therefore given almost entirely through loans and overdrafts. The loan method is usually used in London, while in the provinces overdrafts

are the general practice. The latter is more in the nature of a general credit on which the borrower can draw up to a certain limit, while the former is a definite sum of money lent. Advances is the term usually used to cover loans and the amount of overdrafts actually used.

The total of advances to customers is in normal times between 50 per cent and 60 per cent of the deposits of the joint stock banks. They are very varied in character, ranging from small personal advances to large credits to big industrial concerns. It may be said, however, that a very high proportion of the total of advances represents credit granted to industry, trade and agriculture. During the hearing of the evidence before the Macmillan Committee,[1] Mr. Reginald McKenna, the Chairman of the Midland Bank, remarked that in 1928, 80 per cent to 90 per cent of the advances of his bank were to industry and agriculture. The experience of other banks is no doubt slightly different, but the detailed figures given to the Committee[2] by Mr. Beaumont Pease for Lloyds Bank in 1927 indicate that advances are mainly of this kind, and that risks are pretty well spread among various types of activity.

In theory at least the banks are still as careful as ever not to tie up their resources in industry. The financial standing of borrowers is carefully scrutinised, adequate security is

[1] Minutes of Evidence taken before the Committee on Finance and Industry, § 694.

[2] Loc. cit., §§ 2135 f. The exact figures given were :

	Per cent of total advances
Agriculture	9.67
Personal and Professional	27.00
Banking, Insurance and Finance	8.50
Retail Trade	7.74
Local Authorities	3.13
Iron and Steel	2.33
Coal	1.83
Miscellaneous	3.98
	64.18

The remainder were distributed among 22 other kinds of industrial and commercial concerns.

asked for, and advances are rarely granted for periods of more than six months at a time, though, subject to further scrutiny, they may of course be renewed. In general advances are only made for two kinds of purpose, firstly (and most commonly) to provide short term or circulating capital to industry for the production and marketing of goods, and secondly, and much more rarely, to provide temporary funds pending the issue of long term capital. In the second case the proceeds of the capital issue will of course be used to repay the bank.

Nevertheless, in spite of all their precautions against being " tied up," the English joint stock banks have during the post war slump become the permanent creditors of large sections of British industry. In coal, cotton, iron and steel, shipbuilding—in fact in most of the heavy industries which have been more or less continuously depressed since 1920, the banks have large amounts of " frozen advances," i.e., advances which are not immediately recoverable, and are probably in the main permanently lost. Although it is true that the banks have in most cases written off these bad debts, the fact remains that they have a first claim on the earnings of large sections of these industries. In fact therefore the banks have considerable permanent interests in industry, although they are too often unwilling to recognise the implications of this fact, and to force on the firms on which they have claims thorough schemes of reorganisation and capital reconstruction.

The very fact that each of the joint stock banks has to some extent spread its advances between different industries is indeed an extra complication. Industrial organisation to-day is not a matter of reconstructing single firms piecemeal, it is a matter of amalgamating and reorganising a number of firms, in which a number of banks are more or less interested. Nor is the tradition of secrecy which is made necessary by the existence of a number of competing banks a helpful factor. In fact the joint stock banks have often proved themselves to be either unable or unwilling to undertake the financial reconstruction of industries, largely because

they regard the firm and not the industry as the unit. What few attempts at reconstruction have taken place recently have been usually made at the instigation either of the Bank of England or of one of its subsidiaries.

But apart from the criticism which may be levelled at the refusal of the joint stock banks to take a more active part in industry, there is a further charge that is usually made against them. The joint stock banks, it is stated, have deliberately restricted credit to industry, particularly since 1925, and this has been an important factor in industrial stagnation. How far is this true?

Now the banks are, to a very large extent, limited as regards the total quantity of advances they can make by the fact that they do not normally wish to employ more than say 55 per cent of their deposits in this way, and the volume of their deposits is largely in turn dependent on the policy of the Bank of England. The evidence of bankers themselves as to whether there was in pre-slump years a genuine demand by good borrowers for industrial credit, which was beyond their powers to satisfy, is contradictory. But it is significant that in the years 1925–29 when the Bank of England was pursuing a more or less deflationary policy, the banks increased very considerably (see p. 187) their proportion of advances to deposits. The yearly averages of the advances of the London clearing banks increased from £856 million in 1925 to £991 million in 1929, although the figures for cash and balances with the Bank of England decreased from £195.7 million to £193.8 million. There is, therefore, some considerable evidence that during these years the joint stock banks actually succeeded in counteracting the deflationary policy of the Bank of England. One of the chief reasons for this was no doubt that the rates of interest which could be earned on advances were even in those years considerably higher than the rates which could be earned on bills or investments.

The lending policy of the joint stock banks during the slump is however much more open to objection. The demand for industrial credit fell off rapidly, and this could

only have been counteracted by a considerable reduction in the rates charged to customers for advances. For, even granted that advances should only be made to customers who can offer adequate security, it is obvious that there will be a larger number of good borrowers willing to borrow at 3½ per cent than at 5 per cent. Unfortunately the banks did not cut their rates sufficiently. Their most usual practice (though there are certain exceptions) is to charge 1 per cent above bank rate with a minimum of 5 per cent. This means that any fall of the bank rate below 4 per cent does not affect the rate charged for advances.

The banks defend the 5 per cent minimum charge even when the bank rate is 2 per cent on two grounds. In the first place they say that since their earnings on money at call, bills, and even investments are low in time of depression and low interest rates, and, as they have a host of fixed charges by way of salaries, etc., to meet, they have to make their profit out of advances. Against this it must be noted that at a time when all industrial profits have been drastically reduced and often wiped out, the banks have been able to maintain their dividends in a remarkable way, and are still able to pay 15 per cent or so on their paid up capital. The banks have made very good profits ever since the war, and it is perhaps not unreasonable to suggest that they might shoulder some of the burden which industry has to bear, and cease to take advantage of their monopoly position.

In the second place the banks argue that a cut in their rates for advances would not make any appreciable difference in the costs of industry. Nevertheless if these rates had been reduced by the same amount as the reduction in the interest on War Loan (i.e. from 5 per cent to 3½ per cent) the saving to borrowers in 1932, when advances averaged £843.6 million, would have been over £12½ million.[1]

[1] A certain proportion of advances in 1932 were it is true at 4 per cent —a 1½ per cent reduction on which would bring the rate down to 2½ per cent for these special cases—but this will not affect the general contention that a cut in the general 5 per cent rate would cause a considerable reduction in industrial and commercial costs.

How large this is may be seen from the fact that, according to the Ministry of Labour's returns, weekly wage reductions in 1932 were £248,250, or, taken over 52 weeks, nearly £13 million a year.

The shortcomings of the English joint stock banks as regards industrial policy can now be summed up. Firstly, their traditional policy of caution has led them to be reluctant—even when they are " tied up "—to take active steps to help the firms in which they are interested in financial reconstruction, and generally to maintain the constant connection between banking and industry which modern economic conditions require. Secondly their frozen claims on certain industries has made the reorganisation of those industries difficult to carry through. Thirdly their insistence on regarding the firm rather than the industry as the economic unit, and their reluctance—owing to their tradition of secrecy—to pool information, which would assist in a better ordered industrial development, shows them to be out of touch with the economic requirements of the present day. Fourthly, their monopolistic position as the providers of industrial credit enables them to charge particularly in times of slump excessive rates for advances, which tends to damp down industrial activity just when it ought to be encouraged.

Against this, however, we must remember the safety and strength of the English joint stock banks. Depositors have suffered no losses, and even during the present depression, the reserve position has been well maintained. These very real advantages are often so much taken for granted that they are overlooked ; but while it may be more useful to dwell upon the defects of English banking rather than to extol its virtues, it is well to bear in mind that any suggestions for remedying the defects must be so framed that they do not diminish in any way the real advantages which the present system offers to the general public.

The English Joint Stock Banks and Economic Reconstruction. If the economic life of England is to be

reorganised in a way which the conditions of the twentieth century demand—if it is to be planned and ordered rather than haphazard and chaotic, the concentration and co-ordination of commercial banking seems to be a necessary step. No doubt objections will be raised, just as they were a century ago when it was proposed to restrict the right of note issue. But since to-day it is credit rather than currency that is the all important medium for financial transactions, it seems only reasonable that the manufacture and use of credit as well as currency should be laid down by law, and that the present credit issuing bodies—i.e. the joint stock banks—should be brought under central control.

But once the principle of central control is admitted, the question of private ownership cannot enter into the picture. The position of the Bank of England as a private body with public functions is clearly an anomalous one, and in the case of the commercial banks therefore central control must mean public ownership as well. It is a matter of fundamental importance, however, that the national business of commercial banking should be directed by those people who are qualified to do so. Public control will of course mean that the general policy of the banks will be in accord with the general economic policy of the State. A Cabinet Minister, therefore, will have to be responsible for the general policy of the reorganised joint stock banks. But their day-to-day policy must clearly be outside his direct control, and should be left to a board of full time banking experts which he himself would appoint.

What would be the advantages of such a system over the present one ? In the first place instead of a large number of directors, most of them only giving part time to the affairs of their various banks, there would be a smaller number of full time experts. At present, many bank directors are on the boards of the banks mainly as representatives of various industrial interests, and it is natural that the policy of the banks should be influenced by these interests, often in a way which is not to the real advantage of the banks themselves. A board of experts, with no financial interests outside

their own job, and with a thorough knowledge of both the needs of finance and of those of industry in general is bound to lead both to increased economy and efficiency, and the elimination of the financial jobbery and of the nepotism which is even to-day a dead-weight on the proper working of British financial institutions.

But obviously the most important advantage would be that the distribution of credit to industry could be co-ordinated according to the general economic needs of the nation. Information could be pooled, industries could be dealt with as such and not as sets of isolated firms, and their reorganisation could be carried through in a way which would be impossible when the competing claims of five or more different banking institutions have all to be taken into separate consideration.

So much should be obvious, but there remains the general question of how far the new amalgamated joint stock bank should follow the traditional British banking method and restrict its business to the granting of short term credit to furnish industry and commerce with circulating capital. If adequate provision is made, either by setting up a National Investment Board or otherwise, for the requirements of long term capital, there is much to be said for keeping commercial banking within its traditional bounds. So long as British commercial banking depends—as it is bound to depend—almost entirely on the deposits of the public, its credit policy should to a very large extent be governed by this factor, and concentrate therefore on short term loans rather than on long term investment.[1]

It will be necessary of course to make special provisions for dealing with the problem of frozen bank advances. Here a lesson may be learnt from Italy. Frozen advances can best be dealt with by special institutions created for the purpose which can concentrate on making the necessary

[1] The problem of medium term loans would probably best be solved by setting up a special institution for the purpose. As suggested by the Macmillan Committee, such an institution would be of particular value to the British export industries.

reorganisations in the industries concerned, leaving the commercial banks to proceed with their ordinary business unhampered. At the moment this problem is holding up industrial reconstruction, and until the handling of these frozen advances is centralised and taken out of the sphere of ordinary commercial banking, to which they have ceased to belong, no real progress can be made.

Whatever may be the exact details of the scheme, some reorganisation on the lines outlined is necessary. The provision of credit is to-day a public service, and the banks are even now public institutions in fact, if not in form. In many respects they have attained an excellence in technique and organisation which cannot be rivalled in any other industry or service. Their defects arise out of the changed character of the economic needs of the modern world, which require an even greater degree of concentration and ordered control than exists even in the comparatively centralised banking system of England.

§3. COMMERCIAL BANKS IN THE U.S.A.

EVEN UNDER normal conditions a description of the American banking system would be a complicated task. In England the general outlines of the system can be drawn by concentrating on the main operations of the five big joint stock banks which perform most of the banking business of the country. In America on the other hand, not only are there some 18,000 separate commercial banks, but these 18,000 operate under different sets of laws and regulations. About 6,000 of them belong to a national system, and operate under federal laws, while the remainder operate under the separate laws of forty-eight different states.

At the present time, however, even a rough outline may quickly lose its value. In March 1933 the American banking system collapsed. It is certain that some reforms in it

will have to be made, and plans are being prepared with this end in view. At the moment, we can only guess at the ultimate outcome. Our task therefore must be limited to giving some account of how the system grew up prior to its collapse and of the reasons which led to its collapse, and finally to give some estimation of the present position.

In describing the growth of the American banking system the constitutional position must always be borne in mind, and particularly the jealousy of the individual states towards any encroachment on their rights by the Federal government. This explains much of the complexity of the banking system, a complexity which is not approached in any other country. From the beginning all the banks in the country operated under the laws of the various states in which they were situated, and in the early days this probably did not matter very much. The varied nature of economic conditions and financial needs in the different parts of the continent, and the dearth of rapid means of communication, made it not only unnecessary but impossible to lay down uniform regulations applicable to all banks. It was not until the Civil War that the Federal government instituted a uniform type of bank to operate in all the states. This national system arose primarily out of the need of the Federal government for funds to finance the war, but its success was also partly due to the growing cohesion and interdependence of the American economic system consequent on the building of the big railroads.

Assisted by this, and by the fact that notes issued by State banks were taxed more heavily than those issued by National banks, the National system grew rapidly in relative importance, and it was not until the turn of the century, when the total number of banks was increasing rapidly, that State banks regained their relative preponderance.

The large increase that took place in the number of banks was due to the fact that American banking is governed by the " unit banking principle." Each bank may only operate in one state and in a particular place in the state, and this

applies to National as well as to state banks. It is true that in seven states forms of branch banking are allowed, but these are so hedged round with restrictions and limitations that it can be safely said that the type of branch banking which has grown up in Europe is quite unknown in the United States. Although the defects of this system are obvious so far as banking efficiency is concerned, the desire for individuality and independence which is so marked a feature in American life has always made it extremely difficult to suggest any changes in the direction of unification or amalgamation.

The result was that except in the larger cities local industry and commerce usually relied for finance upon only one or two local banks, and these banks in turn had, so far as their commercial operations went, little interest outside the particular locality. It is true that the local banks might have banking correspondents in the large cities with whom they might deposit funds and from whom they might borrow, but ultimately their fortunes were tied up with the local economic life. And all this is still true of the vast majority of banks in the United States to-day.

One of the results of this close connection between the banks and local industries has been that American banks have not been able to concentrate on short term commercial lending in the way in which the English banks have done. This has been particularly true in rural areas. Investments in rapidly expanding American industries and railroads have certainly brought in golden profits to those who had money to lend, but the main gainers here were the Trust Companies and private banks which specialised in long term industrial financing. The burden of carrying the financing of the bonds of the smaller and less profitable industries and of farm mortgages usually has had to be carried by the commercial banks themselves. Consequently there is no such sharp distinction in American banking as we find in England between investments and short term commercial loans, and this has been another considerable source of weakness in the whole system.

The Federal Reserve System. It was to rectify some of these weaknesses—which became glaringly apparent in the banking crisis of 1907—that the Federal Reserve Act was passed late in 1913, the title of which is as follows : " An Act to provide for the establishment of Federal reserve banks, to furnish elastic currency, to afford means of discounting commercial paper, to establish effective supervision of banking in the United States, and for other purposes." The reserve banks themselves and the currency regulations of the Act have already been dealt with in the chapter on Central Banking ; our task here is to examine how the commercial banks themselves were affected by the Act, and how far the commercial banking system as a whole was strengthened.

Under the Act all National banks had to become members of the Federal Reserve System, and to subscribe an amount equal to one-sixth of their own capital and surplus to the capital stock of the reserve bank in their Federal Reserve District. State banks can also be admitted into the system if they accept the usual capital and reserve regulations of the system and submit to certain restrictions and supervision laid down in the Act. Ordinary banks in the United States therefore fall into three classes : National member banks, State member banks and non-member banks. Those in the last class operate under the laws of the forty-eight different states, while those in the first two belong to the unified Federal Reserve System. Excluding mutual savings banks, about 38 per cent of all banks were at the end of 1932 members of the system ; but these banks actually held 80 per cent of all the deposits in ordinary commercial banks. Membership of the system has in fact grown steadily since its foundation.

One of the distinguishing features both of the old National banking system and of the Federal Reserve System has been that banks are by law compelled to hold certain percentages of reserves against their deposits. For this purpose all banks concerned were divided into three classes : country banks, banks in reserve cities, and banks in central reserve

cities.[1] Under the old National Bank Act country banks had to have 15 per cent reserves, of which 6 per cent had to be kept in cash, while the remainder might be kept deposited with correspondents in reserve cities. Banks in reserve cities had to keep 25 per cent reserves of which one half might be deposited with banks in central reserve cities, while banks in central reserve cities had to keep 25 per cent reserves in cash in their own vaults. Thus part of the reserves of country banks formed part of the deposits of the reserve city banks and so on, and any large withdrawals of funds from banks in the central reserve cities had immediate reactions on country banks, since all banks would try to hold on to their cash. "This plan," says Mr. E. A. Goldenweiser,[2] " which may be called a system of interlocking reserves, was one of the important defects in our banking structure which the Federal Reserve System was intended to correct."

Under the Federal Reserve Act as amended in 1917 these proportions were drastically cut down, but all the reserves of members banks, even including gold, had to be kept on deposit with a reserve bank. The reserve proportions for the three classes of banks were changed to 7 per cent, 10 per cent, and 13 per cent for demand deposits[3] and to 3 per cent in each case for time deposits.[3] Although this reduction in reserve requirements seems to be very drastic, it must be remembered that the centralisation of reserves with the reserve banks was a very considerable safeguard. Nevertheless it did make easier the huge credit expansion for the years 1922–29. In addition to these reserves member banks must naturally hold a certain amount of till money in the form of cash, but this amount is left to their own discretion.

A member bank's reserve requirements will of course

[1] There used to be three of these : New York, Chicago and St. Louis ; since 1922 however St. Louis is no longer a central reserve city.

[2] *Federal Reserve System in Operation*, by E. A. Goldenweiser, 1st Ed., p. 79.

[3] For the purposes of the Act a demand deposit is one payable within 30 days, and a time deposit one payable after 30 days.

vary considerably. In times of good business credit will expand when possible, and deposits increase, so that somehow or other the bank will have to increase its reserves with the reserve bank. This it can do either by paying in cash—a most unlikely contingency—or, as is nearly always the case, by borrowing direct from the reserve bank. In times of depression on the other hand, when there is a large amount of "idle credit," a member bank will tend to repay its indebtedness to the reserve bank, and it may even maintain an excess reserve. No interest is granted even on excess reserves.

It will be observed that the relations between the commercial banks and the central or reserve banks differ widely in England and in the United States. In England, as we have seen (see page 188) the joint stock banks do not borrow from the Bank of England, all such borrowing—and it occurs only very rarely—being done by the discount market. In the United States on the other hand direct borrowing by member banks from reserve banks is the regular practice. The total amount so borrowed may be very large indeed in times of great business activity, though it is always limited by the reserve requirements of the reserve banks themselves.

Member banks borrow from reserve banks by discounting with them what is known as "eligible paper." For this purpose "paper" may be bills of exchange, promissory notes,[1] or drafts, and their eligibility is laid down in sets of rules which the Federal Reserve Board draws up from time to time. The loan committees of the reserve banks decide whether each particular piece of eligible paper is "acceptable"—i.e. whether it can safely be discounted. Paper may be eligible under the rules laid down by the Federal Reserve Board, but yet be unacceptable to a reserve bank if those who wish to borrow the money are known not to be dependable.

Eligible paper as laid down in the Act is in general "notes, drafts and bills of exchange arising out of commercial

[1] A promissory note is an unconditional promise signed by the "maker" to pay a definite sum of money at a definite future date.

transactions ; that is, notes, drafts and bills of exchange issued or drawn for agricultural, industrial or commercial purposes . . ."[1] Eligible paper must carry the endorsement of a member bank, and must be drawn for not more than a certain period—usually 90 days in the case of industrial or commercial paper and 9 months in the case of agricultural paper. Federal Reserve banks therefore are limited under the Act to lending for short term commercial, industrial and agricultural purposes, and they cannot supply long term capital nor finance speculation. An exception to this rule is that they may discount paper created for the purpose of purchasing or trading in U.S. Government securities, and this was how the huge government loans were floated during and after the war.

The reason for the importance of paper in member banks' borrowing is that banks in the United States usually make loans by the use of bills of exchange or promissory notes. In England, as we have seen, internal trade is usually financed by overdrafts or by loans which are mere book entries in the books of the banks. In the United States on the other hand a trader will draw a bill of exchange, or a customer will sign a promissory note against which the bank will advance money. Against the loan therefore the bank will hold a piece of paper which it can endorse, and, under certain conditions, discount with a reserve bank. This would be impossible in England where usually the only evidence of indebtedness of the customer to the bank is an entry in the bank's books, even though it may be secured by government securities, or other collateral.

Bank Deposits. Until quite recently the United States was perhaps the country in which deposit banking was most developed. Even in England the proportion of bank deposits to bank notes is in normal times rather less than the United States and this is not solely accounted for by the higher cash to deposits ratio generally held by the banks in the former. The fact is that Americans on the whole use

[1] Federal Reserve Act, § 13.

cheques more and notes rather less even than Englishmen. Wages, for instance, are quite commonly paid by cheque, where in other countries they would be paid in notes, and cheque transactions even of quite small amounts are common in retail trading, and have increased particularly with the growth of the big department and chain stores. Recent events, it is true, have caused some distrust of bank deposits, but given any stability of the banking system, it is certain that the habit of making payments by way of cheque will go on increasing.

The accompanying table[1] gives the movements in bank deposits during the last ten years. The huge increase between the end of 1923 and the end of 1928 of over 33 per cent gives some indication of the high degree of credit inflation during that period, while the subsequent fall to a level below that of 1923 shows the other side of the picture.

As in England, there has been a fairly steady growth in the proportion of time deposits to total deposits.[2] To some

[1] Total Deposits of Banks in the United States. ($ millions)

End of	
1923	42,163
1924	45,835
1925	49,224
1926	50,155
1927	52,909
1928	56,766
1929	55,289
1930	53,039
1931	45,821
1932 (September 30)	41,942

[2] Member Banks' Deposits. ($ millions)

End of	Demand Deposits	Time Deposits	Total	Percentage of Time Deposits.
1923	16,376	8,651	25,027	34·5
1924	18,468	9,805	28,273	34·7
1925	19,260	10,653	29,913	35·6
1926	18,922	11,440	30,362	37·7
1927	20,105	12,765	32,870	38.8
1928	19,944	13,453	33,397	40.3
1929	19,112	13,070	32,182	40.6
1930	18,660	13,654	32,314	42.4
1931	15,985	11,453	27,438	41.8
1932	14,965	10,527	25,492	41·3

extent this may have been encouraged by the banks themselves, as during the boom investments were profitable, and the banks would feel that they could more safely expand their investments if a larger proportion of their deposits was in the form of time deposits. Another obvious reason is that in the case of member banks the reserve proportion which has to be held is much less for time deposits than for demand deposits, so that with a given reserve, a big expansion can occur in total deposits if the proportion of time deposits increases.

It must be remembered however that in the United States quite a considerable proportion of the credit resources of the community is not held in the form of deposits with the commercial banks. Many of the big industrial corporations carry on a big banking business privately with their customers and employees, and during the boom many of them, by building up a large reserve of liquid resources in the form of cash and government securities, were able to a very large extent to finance their short-term credit requirements themselves without having recourse to the banks. In the second place, the deposits placed with private banking houses and finance companies are considerable. On December 31st, 1932, the firm of J. P. Morgan & Co. had deposits of $340 millions,[1] and it is probable that deposits of this kind may run into some thousands of millions of dollars.

Nevertheless for the average American depositor the ordinary commercial banks are the institutions which are supposed to safeguard his cash. When all is said and done, it must be admitted that the American banking system has failed miserably as far as this is concerned. Even during the prosperity period the number of banks which had to close down was considerable.[2] It is true that these were mainly small non-member banks, but though the Federal Reserve System was not affected till later, it gave some

[1] According to the evidence given by Mr. J. P. Morgan before a Senate Committee set up to investigate the working of private banks.

[2] Between 1921 and 1929 there were 5642 bank suspensions.

indication of the inherent weaknesses of the whole structure. A consideration of the final breakdown must however be postponed until after some examination has been made of the use to which the resources of the banks were put.

Loans and Investments. Apart from the general failure to spread risks which the unit banking principle involves, the great weakness of American banking since the war has been the way in which they have distributed their assets. Besides cash and reserve balances, the assets of the banks are usually classed under the general heading " loans and investments," and there is sufficient information readily accessible regarding the member banks of the Federal Reserve system to make it possible to form an estimate of the defects in the loan and investment policy of these banks. With regard to non-member banks, it is safe to assume that the same defects existed, very probably to an even greater degree.

The most striking feature of the period of expansion from 1921 to 1929—and it was during this period that the seeds of future trouble were sown—was of course the huge expansion of credit which was reflected in an increase in member banks' loans and investments from $24,121 million to $35,711 million, i.e. an increase of 48 per cent, and this in spite of comparative price stability. The accompanying table[1] shows how these loans and investments were distributed.

[1] Loans and Investments of Member Banks. ($ millions)

June 30	Investments	Loans on Securities	Loans on Urban Real Estate	All Other Loans	Total Loans and Investments
1921	6,002	4,400	875	12,844	24,121
1922	7,017	4,500	1,100	11,565	24,182
1923	7,757	4,950	1,350	12,450	26,507
1924	7,963	5,350	1,575	12,279	27,167
1925	8,863	6,718	1,875	12,062	29,518
1926	9,123	7,321	2,161	12,579	31,184
1927	9,818	8,156	2,449	12,333	32,756
1928	10,758	9,068	2,624	12,611	35,061
1929	10,052	10,095	2,760	12,804	35,711

The above table is taken from *Recent Social Trends in the United States* (*Report of the President's Research Committee*), Vol. I, page 254. It is based on the Annual Reports of the Federal Reserve Boards, but some of the figures for the earlier years are estimated.

These figures show above all the extraordinary change in the activities of the member banks which took place during these years. Ordinary commercial loans—roughly under the heading " all other loans " in the table—which traditionally should form the major portion of the assets of deposit banks fell from one half to one third of the total. It is a remarkable fact that these loans were actually less in the boom year of 1929 than in the depression year of 1921 in spite of a rise of nearly 80 per cent in industrial production. This was probably in the main due to the fact that the huge rise in profits enabled big corporations to provide their own short term credit out of surplus cash reserves,[1] and the ease with which they were able to float ordinary stock on the capital market.

The result of this however was a doubling of investments and speculative loans. The increase in loans on securities—i.e. mainly on the security of stock exchange shares—is easily explained by the phenomenal rise in security values ; industrial common stocks at their peak prices in 1929 stood three times as high as in 1924. Speculation in real estate, and in particular in urban real estate, was of a similar character. The consequence was that the banks were lending to customers on security which was inflated in value, and which after the subsequent fall in values of stocks and of real estate became in some cases practically worthless. When the slump came and customers could not repay their loans, the banks attempted to sell these securities for what they could fetch, with the result that their values were still further depressed.

A parallel development was that the banks themselves took the opportunity of making quick profits on the Stock Exchange. They more and more lost their character of commercial banks and became investment institutions. Many of them, particularly in the big cities, adopted the practice of setting up subsidiaries known as " security affiliates " to deal with the investment side of their business

[1] *Vide supra*, page 206.

and to participate in the huge profits that could be made by floating and selling securities.

In this way the whole character of American banking changed. Already in a weak position owing to their adherence to the unit banking principle, the American banks committed the second cardinal error, that of tying up their depositors' funds in assets which could not be realised, or only realised at a loss.

Before turning to the task of estimating the present banking position in America it may be worth while to consider shortly the kind of loan service the banks give their customers, i.e. the rates of interest charged on commercial loans and on loans on securities. Before the establishment of the Federal Reserve system rates of interest varied very considerably from place to place. In the big financial centres they were usually reasonably low, and tended to vary with the conditions of the money market. In rural areas, however, and particularly in the South and West, interest rates were much more rigid and considerably higher.

The Federal Reserve system brought a little more uniformity in the rates of interest charged, but differences are still considerable. The accompanying table shows that during a period when money market rates and Federal Reserve discount rates varied considerably, there was less elasticity in interest rates, and higher charges in cities furthest from New York. In rural areas these tendencies are accentuated.

RATES PER CENT CHARGED TO CUSTOMERS BY BANKS IN THE PRINCIPAL CITIES

	1929	1930	1931	1932	1933
New York City . .	5·88	4·52	4·22	4·49	4·37
8 Northern and Eastern Cities . . .	6·04	5·07	4·61	5·05	5·04
27 Southern and Western Cities . .	6·14	5·72	5·36	5·62	5·61

The above table is calculated from figures given in the Federal Reserve Bulletin for April, 1933.

No doubt the varied economic conditions in the United States make absolute uniformity in interest rates both impossible and undesirable. Nevertheless a greater degree of banking concentration would make the variations smaller than they are now. To the generally high rates charged in times of slump the same objections apply as in the case of England. Banking expenses and banking profits—and in America during the slump it is mainly the former—are a burden on the economic life of the community which is unlikely to diminish so long as private competitive banking continues.

The Present Situation. On March 6th, 1933, President Roosevelt proclaimed a national bank holiday and prevented a complete collapse of the banking system. In the previous three years thousands of American banks had to close their doors,[1] and in February 1933 the situation had become so desperate that " banking holidays " had to be proclaimed in two states, Maryland and Michigan, only to be followed two weeks later by the national holiday.

It was indeed fortunate that such prompt action was taken, as piecemeal bank closures would have had a far more disastrous effect, and soon enough confidence returned to make it possible to reopen some of the banks. By the end of March, 5,387 member banks with deposits amounting to $25,850 million had been licensed to reopen out of a total of 6,694 member banks with deposits of $28,500 millions.

What changes in banking organisation are contemplated is extremely difficult to say. All that is certain is that there

[1] Banks Suspended and Banks Re-opened

	Suspended	Re-opened
1930 . . .	1,345	147
1931 . . .	2,298	276
1932 . . .	1,456	290
1933 (Jan.) . .	241	1
(Feb.) . .	148	0

The above do not include banks closed temporarily under special or " moratorium " holidays declared by civil authorities.

will be some changes. If these changes are at all radical, they will probably take one or more of three lines, which will depend on the general economic policy of the present Federal administration.

In the first place, there might be some effort to establish a unified banking system throughout the United States. That this would be an important step in the right direction no one would deny, as it is generally recognised that effective banking supervision has been seriously hampered by the competition between member and non-member banks. There may be serious constitutional difficulties in the way of creating a unified banking system subject to effective regulation and supervision by the Federal government. It is interesting to notice however that the General Council of the Federal Reserve Board has given a legal opinion[1] that such action would be constitutional. Various reasons are advanced in support of this opinion, and perhaps the most interesting is that " the existence of a heterogeneous banking structure in which there have been more than 10,000 bank failures during the past 12 years constitutes a burden upon and an obstruction to interstate commerce ; and Congress may enact appropriate legislation to correct this condition." If it is thought that the Supreme Court of the United States would deem legislation of this kind constitutional, Congress could pass a law confining the business of receiving deposits subject to withdrawal by cheque to national banks, and so force all the commercial banks of the country into the Federal Reserve system. The system itself however has not worked so perfectly that one can be sure that its mere extension to cover all commercial banks would of itself afford a solution to the difficulties.

In the second place there may be efforts to introduce a system of branch banking. This would probably be very acceptable to the big financial interests in New York, some of whom have profited greatly in the past by building up systems of group and chain banking in the states where

[1] *Federal Reserve Bulletin*, March 1933, pp. 166 f.

they could legally do so. Nevertheless the constitutional difficulties of organising branch banking are probably even greater than those of creating a unified system.

Finally there may be some reform by way of separating commercial banking from investment and security business. Already steps in this direction are being taken by some of the large New York banks, by divorcing their security affiliates from their deposit banking departments. But in the case of the smaller banks, particularly in the rural areas, progress will be slow, even if it is found possible to provide long-term credit through other agencies.

Banking reform in the United States, if it is to be of real permanent value, should in fact be along all three lines simultaneously. Unfortunately, the serious constitutional difficulties combined with the vast power of the vested financial interests seem to put all radical reform of this kind completely out of the picture.

At the moment the only changes in commercial banking practice that have been provided for are those included in the Banking Act of 1933, known as the Glass-Steagall Act. Its main feature is the proposal to patch up the present system by guaranteeing or insuring bank deposits through an insurance corporation under Government control. From January 1st, 1934, deposits up to $2,500 will be fully insured, and when the system is fully operating (it is hoped by the middle of 1934) there will be 100 per cent insurance on deposits up to $10,000, 75 per cent up to $50,000, and 50 per cent on all larger deposits. All members of the Federal Reserve system will have to participate in the scheme, and other banks may be admitted to it provided that they become members of the Federal Reserve system by July 1st, 1936. Other provisions of the Act are that member banks with security affiliates are required to separate them off, and that payment of interest on demand deposits is prohibited.

It is obvious that these proposals do not go far enough. The way to safeguard deposits—apparently the main preoccupation of the framers of the Act—is radically to reform

the whole system, and not merely to burden the Federal Government—for that is what the insurance system will amount to—with the liabilities of weak institutions. From the public point of view there is much to be said no doubt for a Federal guarantee of deposits : but the corollary of this is that the Federal Government should control the distribution of banking assets as well, and this is impossible under a private system of banking. The present Act, if carried into effect, must ultimately lead to a publicly run commercial banking system, unless of course the Federal Government is prepared to subsidise indefinitely by way of guarantees, etc., the banking interests. The best that can be hoped is that the logical implications of the present proposals will be realised as soon as possible.

§4. CREDIT BANKS IN GERMANY

IN GERMANY, as in the United States, the effects of the world depression on the banking system make it impossible to do more than give some account of the system up to the time of its breakdown. It is true that the breakdown in Germany took place in 1931 and not in 1933, but in the intervening years the German banks in spite of drastic reorganisation have been able to do little more than keep their heads above water. It is therefore still too early to form an estimate of how this reorganisation has affected the general economic life of the country.

The Growth of the Credit Banks. Historically the activities of the big German banks, or credit banks as they are usually called, have differed fundamentally from those of the English Joint Stock banks. In particular there has been a greater degree of combination between commercial and investment banking even than in America, and in early times indeed German banks were in many ways almost the exact opposite to what according to English tradition commercial banks should be.

In the first half of the nineteenth century and before the rise of the credit banks, German industry appears to have suffered very considerably from lack of capital. This was due not so much to an actual dearth of savings, as to the fact that those who had savings—largely the big landowning families—were unwilling to use them for financing industrial enterprises, and often preferred to invest them abroad. It was with the direct object of assisting industry that the first credit banks were founded, and between 1850 and 1870 they made rapid progress. Their main task, as they conceived it, was to provide industry with permanent capital and to assist in the promotion of joint-stock undertakings ; that is, to provide investment capital rather than commercial credit. In this connection it is significant that in their early days the credit banks made no special efforts to attract deposits. They relied rather on their own capital resources to build up industrial undertakings and generally to assist in directing long-term funds into German industry.

After the Franco-German War of 1870 however the banks gradually took on more diversified functions. The foundation of the *Deutsche Bank* in 1871 had a big influence in changing the policy of the older banks. This bank was originally founded to foster German overseas trade which was to be given a big impetus by German unification and imperialist expansion, and from now on it became the most important of the German banks.

The most significant change was the gradual increase of the commercial credit side of the banks' business, which was paralleled by a growth of the relative importance of deposits as against own resources. Mr. Barrett Whale in his valuable book on German banking[1] gives the following figures. In the period 1871–75 profits resulting from the holding and sale of securities were 25.6 per cent, and from the granting of short-term credits 67.1 per cent of the gross profits of the leading Berlin banks : in 1913 the corresponding figures were 11.6 per cent and 85.3 per cent. In 1895 deposits were 51 per cent of the total working funds

[1] *Joint Stock Banking in Germany*, by P. Barrett Whale.

of the big Berlin banks, while in 1913 they were 76 per cent. In addition the organisation of Berlin as a financial centre led to a growth in the more specialised business of call loans to the Money Market and Stock Exchange commissions, etc.

As in England, the centralisation of finance brought about banking amalgamations. Many of the big credit banks had originally sprung up in the provinces, but in the 'eighties and 'nineties the movement to Berlin was rapid, until together with the four large Berlin banks five banks originally founded in other towns constituted the class of *Berliner Grossbanken.* The other financial banks naturally sought contact with the capital and formed themselves into groups round the Berlin banks. Since the war amalgamation has proceeded apace, and in the period immediately after stabilisation the largest part of the commercial banking business was carried on by six big banks which at the end of 1928 had 711 branches in Germany. These banks were the *Deutsche Bank*, the *Commerz und Privatbank*, the *Darmstaedter und Nationalbank*, the *Discontogesellschaft*, the *Dresdner Bank*, and *the Mitteldeutsche Creditbank.* In 1929 the *Commerz und Privatbank* absorbed the *Mitteldeutsche Creditbank*, and the *Deutsche Bank* absorbed the *Discontogesellschaft*, so that when the crisis came there were four big banks in the country with extensive branch systems.

The Credit Banks and Industry. It is generally admitted that it was very largely due to the vigorous policy of the banks that German industry made the rapid progress it did both in pre-war and in post-war years. Their most distinctive feature was, as we have seen, that they combined financial functions which, in England particularly, were undertaken by specialised institutions. As a consequence their connection with their customers was more intimate, and the knowledge they gained in one branch of financing was useful to them in others.

In the first place a German bank is related to its industrial customers by what is called the " current account

connection." This exists when debits and credits are not settled individually, but treated as items in an account which is periodically balanced. It involves a closer connection than is the case in England where individual advances are the rule, and German industry frequently makes use of current account advances for fixed capital charges in anticipation of raising long-term issues, as well as for working capital.

The second connection between a bank and its industrial customers is one which runs completely counter to English commercial banking tradition, that is the promotion of companies and the provision of fixed capital by way of long-term loans. There are a variety of ways in which the bank may issue capital, which correspond closely to the methods adopted by issuing houses in England, but it may be said that before the war, at any rate, the method of " private placing "[1] was commoner in Germany than it ever has been in England. It must not be thought however that the banks themselves held a large amount of these securities in normal times. Contrary to the common belief, the German banks usually managed to place their securities with the public reasonably quickly. Even in 1913 less than 13 per cent of the assets of the big Berlin banks were in securities, and in 1928 the figure was as low as 4 per cent. Unfortunately in times of depression and falling security prices the banks often had to hold on to securities or unload at a loss, and this tended to freeze their assets just at the times when liquidity was most wanted. The danger of their position was well illustrated in the recent crisis.

But perhaps the most important connection between a bank and its customer was that a bank commonly had representation on a firm's *Aufsichtrat*, or board of supervision. In Germany this board's business is to keep a general check on the Executive Board in the interests of the shareholders, but not to interfere with day to day policy. In practice however the power of the *Aufsichtrat* seems generally to have increased in recent years. In the early days

[1] For an explanation of this term see page 272.

of German industrial expansion there was a tendency for banks to specialise in certain industries,[1] and though efforts were made by the banks to diversify their industrial connections, it still remained true that up till the crisis there was far more industrial specialisation by the banks in Germany than in England. This being so, it was natural that a bank should try to eliminate cut-throat competition between firms in an industry in which it was interested, and we therefore find that German bankers usually took a lead in the promotion of schemes of rationalisation and amalgamation.

The German Banking Crisis. The vigorous policy pursued by the Credit Banks, which made necessary some tying up of their resources, naturally required a high percentage of capital and reserves as against deposits. Before the war this was the case : if we examine the balance sheets of the largest Berlin banks we find that in 1913 capital and reserves were 23½ per cent of the total of capital, reserves and deposits. The capital losses of the war and inflation period however completely altered the picture, and even at the peak of the stabilisation period, in 1928, the figure was only 7½ per cent. To meet this remarkable change in the character of their resources the German banks made strenuous attempts to alter the distribution of their assets. The proportion of securities fell, and that of advances rose, and the figures of the balance sheets for 1928 and 1929 indicated on the surface that the banks were shifting rapidly over from investment banking to commercial banking. With the help of foreign capital they started to form special finance companies to facilitate industrial long term investment[2] and to prevent their own funds being tied up.

[1] The *Deutsche Bank* specialised in the export trades, the *Dresdner Bank* in Krupps, the *Discontogesellschaft* in the heavy industries, the *Darmstaedter und Nationalbank* in land development companies.

[2] This movement was actually started in the first decade of this century in the case of the electrical industry, when several firms (e.g. A.E.G., Siemens, Loewe) set up their own financial companies with the help of the banks.

Unfortunately the coming of the crisis in 1929 prevented this healthy development. In the first place the stream of foreign short term funds dried up, which in 1931 gave place to a rapid withdrawal of foreign deposits, and secondly the banks' own advances to industry tended to get more and more frozen as the crisis continued. But perhaps worst of all the banks, frightened by the fall in security values, started purchasing shares in which they were interested so as to maintain them at artificial levels. The final crash was precipitated by the heavy withdrawal of foreign funds from Germany. The news of the heavy losses of the giant *Norddeutsche Wollkaemmerei*, in which the *Darmstaedter Bank* had big interests, accelerated the withdrawal of German deposits, and finally in July 1931 the *Darmstaedter Bank* had to close its doors.

The reorganisation of the German banking system which followed was done on government initiative and resulted in a large amount of government ownership and control. We have seen (page 215) that at the time of the crisis the main big Berlin banks were four in number :—the *Deutsche Bank und Discontogesellschaft* (D.D. Bank), the *Dresdner Bank*, the *Darmstaedter und Nationalbank* (Danatbank) and the *Commerz und Privatbank*. These were all affected in the reorganisation in addition to the two most important provincial banks, the *Barmer Bankverein* and the *Allgemeine Deutsche Credit Anstalt* (A.D.C.A.). The reorganisation consisted of (1) a drastic writing down of existing capital and reserves which had largely been lost, (2) the provision of new capital by the Reich itself and by the Golddiskontbank, a subsidiary of the Reichsbank, and (3) the absorption of the *Danatbank* into the *Dresdner Bank* and of the *Barmer Bankverein* into the *Commerz Bank*.

The details of the capital reconstruction were as follows :

	D.D. Bank	Dresdner[1] Bank	Commerz[2] Bank	A.D.C.A.
		(in million marks)		
Original Capital . . .	285	160	111	40
Original Reserves . . .	160	94	58.5	11
	445	254	169.5	51
New Capital :				
Held by Public . .	94	22	23.8	6
Held by Reich . .	0	150	11.2	0
Held by Golddiskontbank .	50	48	45.0	13
	144	220	80	19
New Reserves . . .	25.2	30	30	6
	169.2	250[3]	110	25

The position to-day therefore is that Germany has in effect only three large deposit banks (as the operations of the A.D.C.A. are more or less confined to Saxony), all of which are to some degree dependent on the government. In fact the D.D. Bank is the only bank the majority of whose shares are privately held. There is no doubt that this gigantic operation of financial reorganisation will have beneficial effects upon German economic life. Its advantages however will not fully be felt until there is some easing of the depression and the process of capital accumulation can once more begin.

§5. COMMERCIAL BANKS IN FRANCE

IN RECENT years the French banking system, in marked contrast to that of the United States or of Germany, has shown a remarkable stability. Nor has it been subject to the same amount of adverse criticism as the English system. Apart from a very small number of bank failures, depositors have been served well, and industry does not seem to have suffered as a consequence. One of the reasons

[1] Including Danatbank. [2] Including Barmer Bankverein.

[3] The capital of the Dresdner Bank is to be further reduced (July 1933) to Rm.150 millions, and its reserves to Rm.15 millions.

is no doubt that French industry has not had to face the problems of changeover which have confronted British industry in post war years. Another is that the large volume of French savings was kept at home rather than abroad, so that French industry, unlike German industry, has not been faced with a shortage of capital, but has indeed had ample supplies of it. Nevertheless some of the credit must go to the French system of organisation, which, though antiquated in many ways, seems to have served the needs of French commerce and industry as at present organised reasonably well.

The French system stands midway between the English and the German. As regards the institutions of national importance there is a diversification of functions somewhat similar to that which exists in England. On the one hand there are the private banks ("*La Haute Banque*"), and the investment banks (*banques d'affaire*) which deal largely with the provision of long term capital and the placing and issuing of securities. On the other hand there are the big deposit banks (*les grands établissements de crédit*) which in the main concentrate on short-term financing. In the provincial banks however there is much more integration, and a greater similarity with the German method.

"*Les Grands Établissements de Crédit.*" The big deposit banks in France are four in number : the *Crédit Lyonnais*, the *Société Génerale*, the *Comptoir National d'Escompte de Paris* and the *Crédit Industriel et Commercial*. Unlike the big banks in England and Germany their method of expansion was the direct setting up of their own branches rather than amalgamation with other banks. This is no doubt one of the main reasons why although the big four have very wide networks of branches all over France, there exist side by side with them a large number of provincial banks. The result is that France is if anything over-supplied with banks and credit institutions. It must not be thought however that the growth of the branches of the big banks was haphazard or chaotic. Agencies and branches both at home

and abroad were established carefully. Many of them arose during times of local crises involving the bankruptcy or failure of small provincial banks, and it is certain that by this drastic procedure the big banks often avoided the burden of having to carry weak institutions, which amalgamation so often involves. Another peculiarity of the big French banks is their use of canvassers, or intermediaries, who bring them in customers, collect bills and orders for securities, and attract deposits. Although there is no doubt a considerable amount of waste involved, this system helps to spread risks both industrially and geographically, and to aid the flow of funds between the centre and the provinces.

Although the cheque system is still little used in France, and bank deposits have not expanded to the same extent as in England or the United States, the big banks rely on deposits rather than on their own resources for their supply of funds. At the end of 1932 the total of paid up capital and reserves of the big four amounted to only $8\frac{1}{2}$ per cent of the total of paid up capital, reserves and deposits. As a consequence these banks always maintain themselves in an extremely liquid condition, and do not venture into industrial enterprises. Before the war, it is true, they played a large part in the mobilisation of French savings for foreign government financing, and many of the attacks on them were due to the methods they adopted in placing with the public Russian and other foreign bonds. The war, however, put an end to this very profitable form of business, and in post war years the deep suspicion with which the French naturally regarded all forms of foreign investment forced the big banks to concentrate on gilt-edged French government bonds for their long term assets.

Besides French government bonds, assets consist of loans to the stock exchange, deposits in foreign banks, bills and advances. French deposits abroad have been in post war years an important source of instability in international finance, but they are the natural outcome of the losses which France has suffered from long term foreign lending.

The main reason for the great liquidity of the big banks, however, is the very high proportion of their assets which they hold in bills. At the end of 1932 over 54 per cent of the assets of the big four consisted of bills and national defence bonds. In this the banks were helped by the fact that in France bills are widely used not merely for financing foreign trade, but for financing internal trade as well. These internal trade bills commonly have two signatures on them, that of the drawer of the bill, and that of a second person, usually another party to the commercial transaction involved. The banks collect such bills from all over the country through their branches and agencies, and discount them, the rate of discount varying with the credit and importance of the signatories. The banks are considerable competitors of the Bank of France in the business of bill discounting, but are considerably helped by the fact that the latter is bound to adhere to a single rate of discount, and can only in certain exceptional circumstances discount bills with only two signatories. In spite of this competition the big banks do occasionally re-discount with the Bank of France when they are short of cash. For this, they have to use a better type of bill than the usual trade bill with two signatures, namely those accepted by themselves or by the private banks. In recent years however French banks have usually preferred to withdraw money from abroad rather than to re-discount with the Bank of France.

Besides loans to the stock exchange the important types of loans made by the big banks are loans on current account and advances. Loans on current account are not secured, and consist to-day very largely of current accounts with foreign banks. "Advances" are guaranteed, usually by stock exchange securities, and are at the present time very small in amount. In the past, and particularly before the war, advances were more important, but the banks have always been cautious in granting them, and have never scrupled to cut them down drastically when occasion demanded.

Provincial Banks. Side by side with the big deposit banks there are a large number of smaller deposit banks, the most important of which are outside Paris. They have always suffered greatly from the competition of the big banks, and as a measure of defence have in many cases combined together to form regional banks with systems of branches. By co-operating in this way, and by avoiding the expenses of agencies and canvassers, many of these regional banks have expanded considerably, particularly in post war years, and are now a vital link in the French financial system, often offering services which the big deposit banks refuse to give.

The competition of the big banks before the war made it very difficult for the provincial banks to get an adequate supply of bills, the best of which were always sent to Paris for discount. This had a fortunate consequence, as it forced the provincial banks to concentrate on local industries, and to maintain contacts with their clients in much the same way as the German banks. Generally their proportion of capital and reserves to deposits is very considerably higher than in the case of the big banks, and their need for liquidity is therefore not so great. Consequently they are able to grant advances on current account for reasonably long periods usually based on a thorough knowledge of the enterprise to which the advance is made. In addition they have often placed or taken up long term securities, and, in particular, industrial debentures. The war, instead of leading, as it did in England, to a further extension of the power of the big banks, put an end for a time to the strenuous competition which the provincial banks had to face. In post war years, indeed, the provincial banks, and particularly the powerful regional banks, have in many cases developed more rapidly than the big four. In this they were largely helped by the rapid growth of French industry, which had learnt in the past that it could not rely entirely on *les grands établissements de crédit*. Thus we find that the provincial banks in the south-east have taken a large part in the development of hydro-electric power stations, the *Crédit du Nord* in the development

of industries in the devastated regions of the north-east, the *Société Nancienne* in the development of the heavy industries. It is possible in fact that some of these big regional banks may through the great part in which they are playing in building up modern industrial France attain an importance as great as that of the big four.

APPENDIX

MOVEMENTS OF COMMERCIAL BANKS' DEPOSITS AND CASH RATIOS DURING THE DEPRESSION.

(Taken from the League of Nation's Monthly Bulletin of Statistics, Special Number, May, 1933.)

I. *Percentage movement of Total Deposits (June 1929 = 100).*

At end of	United Kingdom	United States	Germany[2]	France
June 1929	100	100	100	100
December 1929	100	101	106	99
June 1930	101	102	112	107
December 1930	104	102	98	107
June 1931	99	99	83	115
December 1931	97	86	71	111
June 1932	99	79	69	109
December 1932	111	80	68	110
March 1933	106	79[1]	66	103[1]

II. *Ratio of Demand Deposits (current accounts) to Total Deposits.*

At end of	United Kingdom	United States	Germany[3]	France
June 1929	55·0	58·3	41·0	97·1
December 1929	54·0	59·4	37·1	96·8
June 1930	53·6	57·9	41·4	95·8
December 1930	54·0	57·7	40·7	96·2
June 1931	54·5	57·1	45·4	96·0
December 1931	50·6	58·3	50·3	96·8
June 1932	49·8	57·5	49·1	96·7
December 1932	50·7	58·7	46·7	96·6
March 1933	50·0	58·6	45·7	96·9

NOTE.—In Germany the ratio of demand deposits actually rose during the crisis as a result of the heavy fall in total deposits. A slightly smaller fall in the United States kept the ratio of demand deposits fairly constant. In France the volume of time deposits is very small largely because the small saver does not normally put his money into a bank, and those who use banks are mainly business people who require the constant use of their money.

[1] February 1933.

[2] All figures for December refer to November.

[3] All figures for December refer to November.

III. *Ratio of Cash to Total Deposits.*

At end of	United Kingdom	United States	Germany[1]	France
June 1929	11·3	7·3	3·1	7·4
December 1929	12·9	7·4	2·1	8·3
June 1930	11·5	7·4	2·7	9·7
December 1930	12·5	7·5	2·3	10·8
June 1931	11·7	7·6	3·6	13·9
December 1931	12·2	7·5	2·9	32·9
June 1932	11·5	8·2	3·4	33·6
December 1932	11·5	9·6	2·8	26·3
March 1933	11·5	9·2	3·2	22·5

NOTE.—The very low ratio in Germany, particularly compared with the United Kingdom : the very steep rise in the ratios in France was associated with the large reparation of cash from abroad and with the heavy imports of gold.

IV. *Ratio of Cash to Demand Deposits.*

At end of	United Kingdom	United States	Germany	France
June 1929	20·5	12·5	7·5	7·7
December 1929	23·8	12·5	5·7	8·6
June 1930	21·5	12·7	6·6	10·2
December 1930	23·2	12·9	5·8	11·2
June 1931	21·4	13·3	7·9	14·5
December 1931	24·1	12·9	5·9	34·0
June 1932	23·2	14·3	7·0	34·7
December 1932	22·6	15·6	6·0	27·3
March 1933	22·1	15·6	7·1	23·2

[1] All figures for December refer to November.

CHAPTER V: FOREIGN TRADE AND THE EXCHANGES

By AYLMER VALLANCE

IN THE COMPLEX structure of modern civilisation there are many instances in which the means have become so grossly elaborated that they over-shadow and obscure the end. This is certainly the case with that section of the monetary mechanism which is designed primarily to facilitate international commerce. Just as the inland bill market—whose original function was almost exclusively the financing of bills drawn against goods passing from seller to purchaser—has become more and more engrossed in the task of providing the short-term finance required by the State, so the foreign exchange market has been gradually divorced from its business of attending to the needs of trade. Not merely has it had to cope with the movement across political frontiers of growing masses of liquid capital in search of safe asylum, but in the current phase of crisis, with which the concluding part of this chapter will deal, the manipulation of exchange rates has become a factor in fiscal policy analogous to the employment of tariffs and bounties.

Overlaid with these excrescences, the essential purpose of the markets created originally as the monetary handmaidens of mercantile trade requires a little preliminary disentangling. Not only so ; the economic motives actuating international trade have become so complicated by considerations of a social or political character that, before an attempt is made to explore the ramifications of the machinery enabling citizens of country A to pay for (or acquire the means hereafter to pay for) goods or services in country B, it may be well to begin by enquiring why international trade is accounted economically a valuable process, and on what terms the process can be kept in being.

Why do men and nations trade? Reduced to its simplest terms the answer is that they trade in order to reap the benefits of the division of labour. The truth of this proposition becomes self-evident when it is applied to the case of a primitive community. The farmer, who needs food, clothing and implements, could provide for all these wants by diversifying his own exertions. Instead, he grows more food than his own household consumes, and exchanges the surplus for the products of the tailor, shoemaker, and wheelwright. The fact that he does so, and that the other producers are willing parties to the deal, is sufficient proof that each feels himself to be advantaged—the advantage consisting in the obvious fact that by specialisation and exchange there is an aggregate economy of effort in which all share.

The increment, be it said, is not necessarily divided on uniformly beneficial terms. For in every operation of barter, even in the most primitive market, a rate of exchange has to be established—so many pounds of wheat for every yard of cloth—and that rate will depend on several variable factors. For example, if the farmer has a good harvest or succeeds in applying a new and more efficient process of cultivation, he will tend to be willing to give more wheat for each unit of the craftsman's products which he wants; and the converse is equally true. But though gains may be unevenly distributed, there is none the less gain on balance all round. In fact, what is really being exchanged is units of effort; and unless each party recognised that he was a gainer by the deal, either in greater leisure or in greater abundance of material goods, the exchange would not take place.

This elementary statement of the motives and *modus operandi* of crude barter between individuals within a localised community may strike the reader as dwelling with needless emphasis on truisms. Yet, if wrong thinking is to be avoided in the more complicated issues that arise in the case of international trade, firm hold must be kept on the simple principles whose validity in the primitive community can be readily established. For, in the case of countries no

less than individuals, the purpose of interchange of goods is essentially to economise the aggregate effort needed to provide a given amount of material satisfaction ; but the utility of this objective is apt to be obscured by a number of extraneous considerations.

Some of these considerations are fallacies ; others have a certain degree of cogency from the standpoint of social welfare and merit closer attention. Among the fallacies we may distinguish pre-eminently the proposition that, by forgoing imports and buying instead home-produced articles, a country both acquires the goods and retains, for its own enjoyment, the money expended on their purchase. All that has happened in this case is that an international exchange of goods has not taken place ; and, if the would-be self-sufficient country carries far the process of denial of imports, it will inevitably find that, by abandoning the sound principle of specialisation and exchange, it is obliged, like an individual in a primitive community, either to work harder for a constant standard of life or to lower its standard. The idea that a nation is enriched by retaining its money within its frontiers is meaningless : trade is mutually advantageous exchange of goods (the types of goods interchanged being determined by the comparative costs of each trading country) and should not be regarded fundamentally as a deal in terms of money. Nor do imports represent " the employment of foreigners " ; in order to complete the " swop " the foreigner who exchanges his goods for ours must ultimately employ workers here, just as the shoemaker who carts a bag of wheat off the farm in return for a pair of shoes is, in effect, " employing " the farmer.

The word " ultimately " should perhaps be underlined ; for in trade between nations the actual practice of trade is not so simple as a straight deal between two parties. That is to say, a foreigner from whom a British merchant buys goods becomes entitled to an agreed amount of goods in return ; but he may elect to keep his claim on British goods temporarily in suspense (i.e. he may leave the cash proceeds of his sale in a London bank) or, alternatively, he may

spend the proceeds in some other country. Nevertheless, the ultimate result must be the exercise, by somebody, of the claim on British goods. Either the original foreign seller (Monsieur X) of goods to Britain will want a material return for what he has shipped here, or a third party (Signor Y) who has supplied goods to Monsieur X in exchange for the latter's claim on Britain will want his *quid pro quo* ; and, save to the fractional extent (as later explained) to which such claims can be satisfied by shipments of gold, Signor Y must ask for British goods. These, and only these, are obtainable by him (or other parties in succession to his legal title) on the strength of the claim for which he has bartered his own products. This proposition, be it added, " ultimately " holds good even if the foreign seller of goods elects not merely to leave the proceeds temporarily banked in the importing country, but to make a long-term investment in that country—i.e. by purchasing land, real estate, government bonds, or shares in some industrial undertaking. In such an event he cannot obtain, for expenditure in his own country, the rent, interest or dividends accruing to him except by exercising his claim on the goods of the country in which his money is invested ; and the same consideration applies if, and when, he decides to sell the land or securities which he has bought and to move the proceeds either to his own or to some other country. Admittedly imports will not elicit an equivalent value of exports if foreigners consistently lend the proceeds (by purchase of securities) to the importing country—as witness Germany's steady excess of imports in 1925–28—but the balance must eventually be restored by a return flow of goods if the foreign lender is to be repaid.

So much may be said to dispose of the discredited " mercantilist " opposition to imports. The proposition is incontrovertible that if a nation is not prepared to accept imports it cannot expect other countries to accept its exports ; and the abandonment of international trade means a definite waste of effort if a given standard of national wealth is to be preserved.

It has, however, to be recognised that, under the conditions of " capitalist " economy, a heavy social price may have to be paid for the increase in aggregate material welfare resulting from a specialisation of effort designed to secure an optimum volume of external trade. Unless labour is completely mobile and capable of transference to alternative occupations, a pronounced reduction of costs, possibly by acceptance of lower wages, in country A may have disturbing results on employment in country B. Or again, a system of free imports may present a nation with the choice of either having an " unhealthy " urban, manufacturing concentration of population or enforcing on a reluctant agricultural minority a low standard of living, essential if they are to compete with foreign peasants, but unpalatably discrepant from the standards of town dwellers in that particular State.

We have now become involved in a question of politico-social values, which has played a vital part in the present crisis, but which is not strictly relevant to this preliminary examination of the primary principles of the international exchange of goods. Here all that need be said is that for chosen social ends—to diversify employment, maintain militarily important industries, or obviate the need to secure wage or other re-adjustments in particular sections of a population—the exclusion of imports is an intelligible device ; but its operation means inevitably forfeiting, to some degree, the benefits of effecting advantageous exchanges of goods on the basis of " each according to his bent."

In the failure to recognise, or to act on the implications of this elementary truth, lies much of the economic trouble with which the world is now afflicted. The story of the devices adopted to evade the consequences of wrong fiscal policy and to endeavour to eat an unearned economic cake will be recounted later. The next step which is required in order to bring this simple statement of the A.B.C. of trade more closely into line in modern practice is to describe briefly the technique whereby the bartering internationally

of goods is financed. For the erection of political frontiers and the establishment of national currencies have created for the " merchant barterer " conditions far removed from those of the self-contained primitive community.

When goods are sold within a country, payment is easily effected by the transfer of currency—that is, bank notes or currency notes—or by the transfer of bank deposits by means of cheques. Thus, when a draper in London buys cloth from a cotton manufacturer in Lancashire he settles the transaction either by sending pound notes or, more probably, by drawing a cheque on his bank in favour of the Lancashire manufacturer. Either of these alternative means of payment is equally acceptable to the cotton manufacturer, for pound notes are useful to him in payment of wages, while he is equally ready to accept a cheque drawn in pounds, shillings and pence (that is, the currency in which he keeps his accounts) on a bank whose name and standing are familiar to him.

In the case of transactions between two countries, settlement is not so easily accomplished. Let us suppose, for instance, that the manufacturer in Lancashire (acting, of course, through a cotton broker in Liverpool) has obtained his supplies of raw cotton from a cotton merchant in the United States. Pound notes are of no use to the American merchant except in so far as he can exchange them for dollar notes, while the Lancashire manufacturer will not, in the ordinary course of business, come into possession of any dollar notes. Similarly, if the manufacturer in England draws a cheque on his bank, it will not be acceptable to the merchant in America, because it will be drawn in a currency which is foreign to him and to his accounts, and because it will be drawn on a bank which is probably unknown to him ; the cheque will be acceptable to the American merchant only if he can exchange it for a cheque on an American bank drawn in dollars and cents, or for a deposit in an American bank expressed in dollars and cents. Before international transactions can be settled, therefore, there must be some means by which pounds can be exchanged for

dollars, dollars for francs, francs for guilders, guilders for marks, marks for pounds, and so forth through the whole gamut of the world's currencies.

In practice, however, it is possible to avoid the exchange of currencies by the extraordinarily useful device of the bill of exchange. In essence, a bill of exchange is a form of cheque with two major points of difference from the ordinary cheque. In the first place, it is written out not by the debtor but by the creditor, who " presents " it to the debtor. The debtor then " accepts " the bill, that is, declares his intention of paying the sum mentioned in the bill, by signing it. In the second place, a bill is not payable on presentation, as a cheque is, but after a certain number of days (very frequently ninety days) from the date of presentation.

The way in which bills of exchange simplify international trade can be illustrated by an elementary example. Let us suppose that our cotton manufacturer in Manchester has ordered £1,000 worth of cotton from the New York merchant. The American will draw a bill of exchange for £1,000 on the Englishman and post it to him together with documents to prove that the cotton has actually been loaded on board ship on its way to England. The manufacturer, on receiving the bill, will " accept " it and hand it back to the agent of the New York merchant.

Now cotton is not the only article which is traded between Great Britain and the United States, nor does the trade consist entirely of sales of American goods to British importers. Let us suppose that an American linen merchant has bought £1,000 worth of linen goods from a Belfast mill and is looking for a means of paying for his purchase. We now have four people : the Manchester cotton manufacturer owing—*viâ* the Liverpool broker—£1,000 to the New York cotton exporter, who wants to receive dollars, and the New York linen importer, who has dollars but no pounds, owing £1,000 to the Belfast linen manufacturer. Now, if the American linen importer buys for dollars from the cotton exporter the bill for £1,000 which the Manchester manufacturer has " accepted," and sends it to the Belfast

linen manufacturer, who in his turn will receive the £1,000 from the Manchester firm when the bill falls due, everyone is satisfied. The two debtors have both paid their debts in their own currency, while the two creditors have likewise been paid in their own currencies.

This example is, of course, a simple one ; but the principle is the same in all such transactions. In the large money markets of the world, but pre-eminently in London, there is a class of merchants known as bill brokers whose sole function it is to buy and sell bills of exchange. The sellers of bills are persons in the position of the American cotton exporter or the Belfast linen manufacturer in our example, who have come into possession of bills in settlement of debts owing to them. The purchasers are, partly, those who, like the American linen importer in our example, are seeking for a means of paying debts due in foreign currencies, and, partly, a great variety of banks, companies and private individuals who want, for a very limited period of time, a safe investment secured on tangible and saleable goods. Bills are bought and sold at their face value less a discount calculated at the prevailing rate of interest for the number of days which the bill has to " run " before it falls due. This rate of discount is usually quoted as the " price " of bills, and the inexperienced reader of the financial page of the newspaper should remember that the lower the prevailing rate of short-term interest, the higher, consequently, is the " price " of bills of exchange.

In cities, such as London and New York, where there is an active discount market (as the market in bills is usually called) it is essential that all parties to the market should have full confidence in the soundness of the bills as investments or as means of paying debts ; that is, confidence that they will all be paid when they mature. But if the bills are the obligations of cotton manufacturers in Manchester, or obscure traders of all sorts from every corner of the world, it will be impossible for the participants in the discount to know all the names which appear on the bills and consequently to assess their worth. To get round this difficulty, it

is customary for firms who import goods, and consequently have bills drawn on them, to make arrangements with a bank or a financial house of well-known standing to " accept " the bills on their behalf. Many private firms in London make this their principal business and are known as " accepting houses." The accepting house—or, it may be, the importer's bank, guarantees the payment of the bill on maturity, charging a small commission for the use of its credit.

Under this system, our cotton manufacturer in Lancashire, when ordering his cotton from New York, would state that his " correspondents " were Messrs. X, Y & Co. of London, on whom the New York merchant would draw his bill. The great majority of the bills which are bought and sold in the discount market bear the endorsement of a relatively small number of banks or banking firms ; those which do not bear such an endorsement are said to be not " prime " and command a lower " price," or, in other words, cost more to discount. There is no reason why the accepting houses should accept bills only for traders who live in the same country as themselves ; and, in fact, the City of London accepts a great number of bills which arise out of trade which never sees the shores of this island, such as shipments of coffee from Brazil to the Mediterranean countries. Nevertheless, the bills are sold in the London discount market, and the London accepting houses earn their commissions on them.

It has been pointed out that there are many purchasers of bills who buy them solely as an investment. This fact enables the bill of exchange to perform another important function. In the example we took, the New York merchant can sell the bill as soon as it has been " accepted " by the Manchester firm, although payment is not due for three months. In other words, the creditor gets his money at once although the debtor does not have to pay until he has had a chance of turning the cotton into cloth and selling it. The purchaser of the bill is consequently advancing the money and " financing " the trade. In this way the discount

markets of London and New York and, to a much smaller extent, of other financial centres, facilitate the foreign trade not only of their own countries but of foreign nations as well.

The total amount of international trade which is paid for by this " offsetting " method, avoiding the necessity of making any payments from one country to another, is very considerable, but it still remains a relatively small part of the total of all trade. Moreover, there is a great volume of payments which have to be made from one country to another and which do not arise out of purely mercantile trade. For example, investors lend money to foreign countries and receive interest on their investment ; emigrants send money back to their families at home ; tourists make payment of their hotel bills in foreign countries ; defeated nations pay Reparations to the victors ; and a countless host of other transactions arises in every conceivable way. The existence of bills of exchange cannot, therefore, obviate the necessity of providing means by which one currency can be exchanged for another. This function is performed by the foreign exchange market.

The most important point to be grasped in understanding the workings of the foreign exchange market is that currencies can only be exchanged for one another. It is true that the process is often referred to as " conversion " : it is said that pounds are " converted " into dollars at such and such a rate ; but the word is misleading. Pounds cannot be converted into dollars as flour can be converted into bread, or cloth into suits ; they can only be exchanged for one another. Nor is the difference a purely verbal one ; it is the origin of a great deal of confused thinking. If pounds are to be exchanged for dollars, not only must someone who has pounds be willing to exchange them for dollars, but also someone who has dollars must be prepared to exchange them for pounds. If conversion were possible, this concurrence of a second party would not be necessary; when a baker converts flour into bread, he does not first have to find somebody who wishes to convert bread into flour.

It is this need for a bilateral transaction which gives rise

to the peculiar difficulties of international payments. For example, many people in Great Britain, France and the United States were unable to understand why the German Government was able to raise the money for Reparations by taxation in Germany, but complained of the difficulty, and later of the impossibility, of paying this money to the Allied creditors. The reason was that an insufficient number of people who owned pounds, francs and dollars were willing to exchange those currencies for marks (either in payment of imports from Germany or in order to make investments in Germany), with the result that Germany was unable to exchange its marks for pounds, francs and dollars, and the Reparation payments had to be first reduced and then virtually cancelled. The same argument, of course, applies to the payment of the War Debts to the United States.

The general statement made above is subject, however, to one partial exception : if pounds can be used to buy gold, from the Bank of England, and the gold can be shipped say, to America and there sold for dollars, pounds could be " converted " by this roundabout method into dollars, even though not a single owner of dollars was willing to exchange them for pounds. This is the essence of the gold standard (see below, p. 241). But provisions of this sort, for the purchase and sale of gold at fixed rates, have existed since the war only for relatively short periods of time. Moreover, there is not enough gold in the world to make possible the settlement of the majority of international transactions in this way ; and whenever an extended use of this means of avoiding a direct exchange of currencies has been made or threatened, the convertibility of currency into gold has been suspended in order to retain an adequate gold backing for the currency. By far the greater part of all transactions under a gold standard, and all transactions without exception when the gold standard is suspended, must either be " offset " by bills of exchange, or settled by a direct exchange of currencies.

A second preliminary point of importance is the nature of

the currencies which are exchanged on the market. A small part of the business of the market consists in the buying and selling of actual foreign currencies, that is, foreign notes and coins. But these notes and coins are wanted only for the current needs of travellers who are proceeding abroad, and for very small payments of other kinds. The great bulk of the transactions in foreign exchange which occur daily represents exchanges of bank deposits. Let us suppose, for instance, that Smith has sold 100,000 dollars to Jones at a rate of four dollars to the pound. Smith will then give Jones a cheque drawn on a bank in New York for $100,000 and Jones will give Smith a cheque for £25,000 drawn on a bank in London. A bank deposit of $100,000 in New York will have been exchanged for a bank deposit of £25,000 in London, and all that will have passed between the parties to the exchange will be two pieces of paper. In practice, Smith's cheque will take the form of a coded cable to the New York bank instructing it to place $100,000 at Jones' disposal, but this is only a method of saving time (and consequently interest on the money). When, therefore, there is mention of " buying dollars " or " selling francs," the reader must interpret these phrases as meaning " exchanging bank deposits in London for bank deposits in New York " or " exchanging bank deposits in Paris for bank deposits in London."

Another expression which is fruitful of misunderstanding is that of " money coming into the country " or " money being taken away." The only way in which money can " come into " Great Britain is by a physical importation of pound notes from abroad or, when we are on a gold standard, by the importation of gold. Apart from these importations, foreigners normally can acquire pounds (that is, bank deposits in London) only by finding other persons (either Englishmen or other foreigners) who already have bank deposits in London and persuading them to exchange those deposits for deposits in the banks of the foreigners' own countries. When " foreign money is coming into London," therefore, in the ordinary way there is no more

" money " (i.e. bank deposits) in London than previously : all that happens is that a greater proportion of that " money " is in the hands of foreigners, and Englishmen in exchange have a larger amount of deposits in foreign countries than they would otherwise have had. Only in the abnormal conditions of recent times, when an influx of foreign funds has been absorbed, as later explained, by an official Exchange Equalisation Account, has the receipt by London of foreign deposits tended to lead to an expansion of bank deposits.

The chief participants in the foreign exchange market are the banks. The banks, indeed, play a double rôle in the market. In the first place, they are the agents for the ultimate purchasers and sellers of foreign exchange, and the channel through which their orders reach the market. In the second place, they are dealers in foreign exchange. That is to say, they keep a stock of foreign currencies (that is, they have deposits in other banks throughout the world) and are prepared to buy and sell from these stocks. There is also, in large centres, a group of foreign exchange brokers, whose function is simply to put those who have dollars to sell in touch with those who wish to buy dollars, and *vice versa*.

No market is, in a sense, more intangible than the foreign exchange market. Not only do the dealers in the market accomplish their transactions by the exchange of seemingly insignificant pieces of paper, but they also rarely, if ever, see each other face to face. A foreign exchange dealer's office consists essentially of a large telephone switchboard, by means of which he can get into instant touch with the other dealers in his own market and, frequently, with other markets as well. Deals involving immense sums of money are thus arranged over the telephone, and settled by the exchange of slips of paper or the despatch of brief coded cables.

The foreign exchange market provides another facility for traders in the shape of the " forward " exchange rates. Let us suppose that a motor dealer in London is contemplating the purchase of a batch of twenty American cars.

The exchange rate at the moment is, let us say, $4 (that is, four dollars will exchange for one pound), and at that rate the dealer calculates that he can import the cars, pay the duty on them, sell them in England, make a profit on them and pay the dollar price of the cars. But by the time the cars have been shipped across the ocean, exhibited in London, sold and paid for, several months will have elapsed, and the exchange rate may be $3, in which case the dealer will have to give 6*s.* 8*d.* for every dollar of the price of the cars, instead of 5*s.* 0*d.* In other words, the transaction will be profitable only if he can rely on completing it at an exchange rate of $4 to £1.

The forward exchange market gives him this assurance. His bank will sell him " three months forward " dollars at $4 plus a slight premium. That means that the bank undertakes to sell the named quantity of dollars at an exchange rate of $4 to £1 in three months' time, whatever the rate of exchange in the market may be when that time comes. Similarly, persons who expect to receive sums in foreign currency at future dates are able to sell " forward exchange " to the banks and be sure in advance exactly how much they will receive in their own currency.

In this way, the banks relieve the trading community of the risks of exchange fluctuations. They are able to do this, in part, by offsetting purchases against sales of " forward " dollars. But the purchases will equal the sales only by accident and the banks will normally be in the position of having contracted either to sell or to buy a net amount of foreign currencies at fixed rates. It is no part of the business of banks to gamble on the foreign exchange market and they will consequently take steps to " cover their position." If they have, on balance, sold a net amount of 100,000 three months " forward " dollars—that is, contracted to sell $100,000 in three months' time at to-day's rate of exchange—they will proceed to buy $100,000 immediately and keep that sum on deposit in New York for the three months. In this way they secure themselves from the possibility of a loss on their contract. But keeping funds on

deposit in New York rather than in London may involve a loss of interest, if the prevailing rate of interest is lower in New York than in London, and this loss of interest will be allowed for when fixing the premium which is charged for the sale of " forward " dollars. On the other hand, if the prevailing interest rates in New York are higher than in London, the transaction will yield a profit to the bank, which can afford to sell " forward " dollars at a discount. Thus the existence of a premium or a discount for " forward " exchange, relative to the prevailing current rate, indicates the extent of the " interest differential " between the two centres. The currency on which the higher rate of interest can be earned will tend to stand at a discount, and *vice versa*. When the gold standard is in operation, exchange rates, as will be explained, vary only by the smallest fraction, and there is consequently less need of a forward exchange market. But when exchange rates are varying from hour to hour, the forward exchange market performs a very valuable service to international trade.

The rates of exchange between different currencies are the prices of those currencies in terms of one another ; and fluctuations of the exchange rates, just like fluctuations in other prices, are the result of changes in demand and supply. If more people on any day are prepared to exchange pounds for dollars than are prepared to exchange dollars for pounds, the competition of the owners of pounds will force up the price of dollars ; that is to say, the exchange rate will " move against " the pound from, say, $4.00 to, say, $3.90. Now several people who were willing to exchange pounds for dollars if they could get four dollars for a pound will be unwilling to do so if they can only get three dollars and ninety cents ; while several owners of dollars who were unwilling to exchange dollars for pounds if they had to give four dollars for every pound will be willing to do so at the new rate. In other words, the movement of the rate has diminished the demand for dollars and increased the supply of them (or, alternatively, has increased the demand for pounds and diminished the supply of them) ; and if demand

now equals supply, the exchange rate will remain at $3.90. If not, it will be forced to move to whatever new rate will make demand and supply equal.

Now if, when the rate was at $4.00, the excessive demand for dollars was purely temporary, the banks would even things up by selling part of their "stock" of dollars. But they cannot do so for long, or the stock would be exhausted. Nor can the banks for long prevent an excessive supply of a currency from forcing the exchange rate down by increasing their own stocks of that currency; for they would soon accumulate excessive stocks and would have to take measures to reduce them. The banks are therefore able to even out purely accidental, day-to-day fluctuations in the exchange, but they cannot do more than this; and it remains true that the exchange value of any currency, that is, its value relative to other currencies, is entirely determined by the amount of that currency which is offered for exchange into other currencies relative to the amount of other currencies which are offered for exchange into the first currency.

The gold standard, of course, is another method by which exchange fluctuations can be reduced to a minimum. When a country is on the gold standard, the Central Bank or other monetary authority is compelled by law to sell gold in unlimited amounts at a fixed price and to buy all the gold offered to it at a fixed price a fraction lower than the selling price. When the pound was on the gold standard, for example, the Bank of England was obliged to buy gold of standard fineness at £3 17*s.* 9*d.* per ounce and to sell it at £3 17*s.* 10½*d.* per ounce. The relation between these fixed prices in the different gold-standard countries determines the "mint parity" of their currencies. For example, when Great Britain and the United States were both on the gold standard, the amount of gold in the pound (as determined by the fixed price of gold at the Bank of England) was 4.8667 times the amount of gold in the dollar; the mint parity of the two currencies was consequently $4.8667 = £1. Now if the rate of exchange between two gold-standard

currencies varies more than a small fraction from parity, it becomes more profitable to buy gold from the Central Bank in one country, transport it to the other country and sell it to the Central Bank there, than to make a direct exchange of the two currencies. The exchange rates at which these transactions become profitable are known as the "gold points" and they set limits to the possible extent of fluctuations. The greater the difference between the buying and selling prices for gold in any country, the farther apart will be the "gold points" within which the exchange value of its currency can move without giving rise to imports or exports of gold. It has been suggested that the gap between the buying and selling rates might be enlarged, so as to permit wider fluctuations without movements of gold, thus preventing the wastefulness of importing or exporting gold for every minor instability of the exchanges. But if the supply of a currency is persistently greater than the demand, gold will have to be continuously exported in order to prevent the exchange rate falling below the gold point. When the country's gold reserve is exhausted, suspension of the gold standard is inevitable. In the long run, therefore, the relationship of demand and supply is more fundamental than the legal framework of the gold standard.

The next question to be answered is : what determines the demand for and supply of a currency ? Obviously there are many reasons why people should want to buy or sell a currency. For example, they may wish to buy the currency, not because they have payments to make in it, but merely because they believe that it is going to rise in value. But their action will increase the demand for the currency and tend to raise its price, with the curious result that believing it will rise has made it rise. Similarly, a belief that a currency will fall in value may make it do so. Now purchases and sales of this nature may have a very large influence at particular periods of time : for example, speculative sales of sterling played a large part in driving Great Britain off the gold standard in September 1931.

But such speculative transactions cannot, by themselves, permanently affect the value of a currency. If a certain amount of the currency has been bought solely with the idea of making a profit out of a prospective rise in its value, the same amount of the currency must be sold at some later date ; for either the rise will take place and the currency will be sold in order to realise the profit, or it will not rise and the speculator will sooner or later abandon hope for his expected profits. Generally speaking, speculative purchases or sales of a currency " reverse themselves " in a few months.

Another set of reasons for which people buy or sell a currency is connected with the movement of capital. There may be a large demand for a currency because foreigners are investing in that country ; or there may be a large supply of another currency on the market because those who own it are seeking to invest in other countries. But this type of transaction will also " reverse itself " in time. Thus the demand for a currency may be stimulated for a number of years because the country is borrowing abroad, but sooner or later the amounts which have to be paid to the creditors in interest or in repayment of capital will begin to exceed the amounts which are received by fresh borrowings. Capital payments will " reverse themselves " over a period of decades.

The third great category of international transactions is that arising out of trade. Trade, in this sense, does not only mean the actual movement of goods, which can be seen, but also includes the rendering of services by one nation to another. These so-called " invisible items " include such things as the transport of one nation's trade by the ships of another nation, insurance premiums and claims paid to or by the insurance companies of one nation by or to citizens of other countries, the payment of commissions to acceptance houses for their services in " accepting " bills of exchange which arise out of the trade of foreign nations, and so forth. Since the other two large categories of transactions are, in the long run, self-reversing, it follows that the exchange

value of a currency must in the end be determined by the demand for and supply of it arising out of trade. Our query has therefore resolved itself into a rather simpler one : what determines the volume of exchange transactions arising out of trade ?

Now the influences which determine the quantity of a country's trade are legion ; but we are here concerned only with those influences which cause the demand of traders for a country's currency to exceed the amount which other traders have to offer, or *vice versa* ; in other words, we are not concerned with the influences which determine the total value of a country's imports *and* exports, but only with those which influence the value of its imports *relative to* its exports.

One of the largest of these influences is the season of the year. Great Britain, for instance, imports a great deal of her food and raw materials in the autumn, and relatively little in the spring. Consequently, the supply of pounds tends to exceed the demand in the autumn, and the demand the supply in the spring. But if we take the average of the whole year, these seasonal fluctuations obviously disappear. Tariffs are another influence : if foreign countries impose tariffs on British goods, the volume of our exports and the demand for sterling will, at first, decline relatively to the volume of our imports and the supply of sterling. But if we restrict our imports we correspondingly limit the ability of other nations to purchase from us, and tariffs consequently tend, in the long run, to affect exports as much as imports. Moreover, as the world has learnt to its cost in recent years, tariff-making and import-restrictions are infectious, and a country's exports are likely to be throttled by other countries' tariffs as much as its imports are by its own. In general, therefore, tariffs can be said to affect the total value of trade as much as, if not more than, the relative value of exports and imports.

By far the largest consideration in determining the relative volume of imports and exports is price. If foreigners find that British goods are cheaper than their own, they

will buy relatively large amounts of British goods, while if people in Great Britain find that foreign goods are dearer than British goods they will buy relatively small amounts of foreign goods. That is, if British goods are cheap, British exports will tend to be high and British imports will tend to be low. Now the relative cheapness or dearness of British goods in foreign countries depends upon two things : the price of those goods in pounds and the rate at which pounds exchange for foreign currencies. Thus, if a certain British article sells for $4 in the United States, that may be because it costs £1 and the exchange rate is $4 to £1, or because it costs £2 and the exchange rate is $2 to £1, or because it costs 10*s.* and the exchange rate is $8 to £1. If British goods are relatively expensive in foreign countries, British imports will tend to increase and British exports to diminish, and the supply of pounds in the foreign exchange market will tend to exceed the demand. This state of affairs will be due to one of two causes : either British prices in pounds are too high, or the exchange rate is too high.

Now if the supply of pounds in the exchange market continues to exceed the demand, the exchange value of the pound, as we have seen, will fall, although the fall may be postponed by speculative transactions or by borrowing or (as on the gold standard) by exports of gold. If, while these temporary influences are at work, British prices are reduced, so that exports increase and imports diminish, equilibrium between demand and supply will be restored without a movement of the exchange rate. If prices are not reduced, the exchange rate must, sooner or later, fall until demand is once more equal to supply. In other words, the exchange rate between two currencies will in the long run —subject always to the influence of (*a*) capital movements and (*b*) speculation—tend to measure the relation between prices in the two countries. If goods and services which cost £1 in England cost, on the average, $4 in the United States, then the " equilibrium rate of exchange " between the two currencies is $4 to £1.

This proposition was most thoroughly developed by

Professor Gustav Cassel in the years immediately after the war, and named by him the " purchasing power parity " theory. The equilibrium rate of exchange between two currencies, according to Professor Cassel, is that rate which will make the purchasing power of both currencies the same (e.g. the equilibrium rate of exchange between the pound and the dollar is $4 to £1, if $4 will, on the average, buy as much as £1) ; this rate is the " purchasing power parity." The actual rate from day to day may diverge from the purchasing power parity because of the temporary influences of speculative or capital movements, but in the long run the actual rate will tend to equal the purchasing power parity, which will itself alter from time to time, as prices change.

The purchasing power parity theory, however, is subject to many qualifications. For instance, the imposition of tariffs will affect its working, and the effect of movements of capital, although in the end they are self-reversing, may postpone the working of the theory for so many years that it ceases to have much practical interest. Moreover, it is clear that not all prices influence the purchasing power parity : no fall in the cost of houses in the United States, however large it might be, would induce people in Great Britain to buy their houses from America. There is consequently the practical difficulty of deciding exactly which prices should be watched as showing movements in the purchasing power parity of the currency. These qualifications severely limit the practical applicability of the theory, but it still remains an extremely useful first approximation, and an essentially valid illustration of the fundamental principles of foreign exchange. For example, the theory reveals the futility of attempting to maintain a high level of wages and prices and also a high exchange value for the currency. This was the mistake made by Great Britain when the gold standard was restored in 1925. The purchasing power parity of the pound was below the exchange rate fixed by the restored gold parity. In the absence of an appreciable reduction of British wages and costs of

production, or alternatively a rise in the costs of manufacture abroad, it was inevitable, sooner or later, that the exchange rate should fall, although more than six years elapsed before the fall materialised.

This account of the factors which determine the rate of exchange has necessarily been brief. But enough has perhaps been said to show that the causes are complex and deeply rooted in the economy of the nations. To elucidate the factors which are operating at any moment is a task which can only be accomplished by estimates and conjectures. But if the causes cannot be specified with precision, it is an easier matter to list the effects, in the shape of the actual demand for and supply of a currency over a period of time, say, a year. Such a list is called a Balance of Payments. The Balance of Payments is frequently confused with the Balance of Trade, but the analogy is misleading. The Balance of Trade, that is, of imports or exports, shows a net balance on one side or the other : the total of imports exceeds the total of exports or *vice versa*, the difference being covered by an inward or outward movement of funds not represented by " visible " trade. But the Balance of Payments cannot show any such net excess ; the two sides of the British Balance of Payments, for example, are merely lists of all the transactions which have given rise to purchases of pounds for foreign currencies and of those which have given rise to sales of pounds for foreign currencies ; and, as we have seen, purchases of sterling must equal sales of sterling not only every year but every day.

The first item on the list is that of trade in goods, which includes every species of commodity which has been bought from or sold to a foreign country. Strictly speaking, imports should be entered in one column and exports in another, but it is usual to enter only the difference between the two. Next comes " invisible trade "—the payments for all manner of services rendered. Here again, it is usual to insert one net figure rather than two gross totals. Next comes the amount of interest paid to or received from foreigners on capital which has been invested abroad in the past. Another

item is the net receipts or payments of the Government from abroad from Reparations, War Debts or similar sources. The net total of all these items is frequently referred to as the " balance on income account."

Since the final totals must be equal, the " balance on income account " must be complemented by an equal and opposite " balance on capital account." The capital account usually contains three items. The first is gold. An import of gold has the same effect on the demand for and supply of currency as an import of anything else, but it is usually counted as capital because of its monetary importance. The second item is long-term capital, the formal loans made by one country to another, involving an issue of securities. The third item is short-term capital, which includes not only deposits made in the banks of one country by foreigners, and similar transactions, but also the informal loans which are made by creditor to debtor, when the payment of sums due is postponed.

These points may be made clearer by the official estimates by the Board of Trade of the British Balance of Payments, which are given (in a slightly modified form) in the following table. The figures are in millions of pounds ; a plus sign represents a credit, that is, a purchase of sterling, a minus sign representing a debit or a sale of sterling effected in order to procure foreign currencies for settlement of obligations abroad.

These figures show that in 1929, before the present crisis, although Great Britain was buying more actual goods from foreigners than she sold to them, the income from the services she rendered and the interest on her foreign capital not only made up for the deficit on visible trade, but left a substantial sum over for lending to foreign countries. That is to say, the amount of foreign currencies which foreigners wished to exchange into pounds in order to pay their debts in Great Britain was so large that Great Britain was able not only to pay for all her imports, including £15 million's worth of imported gold bullion, but had the equivalent, in foreign currencies, of £118 million left over, which was lent to foreigners.

UNITED KINGDOM BALANCE OF PAYMENTS

(£ Millions)

	1929	1930	1931	1932
Net balance of visible trade .	−381	−386	−408	−289
Net balance of invisible trade .	+210	+175	+140	+115
Net balance of interest payments .	+250	+220	+170	+140
Net balance of Government receipts	+ 24	+ 19	+ 14	− 25
Balance on income account	+103	+ 28	−104	− 59
Gold	+ 15	− 5	+ 35	− 18
Balance of capital account . .	−118	− 23	+ 69	+ 77

UNITED STATES BALANCE OF PAYMENTS

	1929	1930	1931	1932
Net balance of visible trade	+648	+801	+369	+247
Net balance of invisible trade	− 41	− 44	− 15	*nil*
Tourist expenditures	−638	−605	−458	−375
Immigrant remittances and charitable contributions	−272	−215	−202	−163
Net balance of interest payments	+565	+616	+548	+393
Net balance of Government receipts	+115	+160	+ 15	+ 29
Balance on income account	+377	+713	+257	+131
Gold and currency	−120	−256	+166	− 91
Short-term capital movements	+ 13	−485	−765	−371
Long-term capital movements	−319	−295	+218	+217
Balance (errors and omissions)	+ 49	+323	+124	+114

SUMMARY OF BALANCES OF PAYMENTS, 1926–29

	Balance of Trade Visible and Invisible	Interest Account	Balance on Income Account	Gold	Balance on Capital Account
GROUP A.					
United States	−213	+ 670	+457	+ 58	−505
United Kingdom	−860	+1215	+355	− 6	−349
France			+429	−189	−240
GROUP B.					
Canada	+253	− 216	+ 37	+ 38	− 75
Sweden	+ 43	+ 5	+ 48	− 5	− 43
Czechoslovakia	+ 69	− 19	+ 50	0	− 50
GROUP C.					
India	+ 80	− 114	− 34	− 67	+101
New Zealand	+ 8	− 40	− 32	+ 4	+ 28
South Africa	+ 261	− 79	−264	0	+ 53
Denmark	+ 11	− 15	− 4	+ 2	+ 2
Norway	+ 1	− 16	− 15	0	+ 15
Argentine	+ 35	− 178	−143	+ 1	+142
GROUP D.					
Finland	− 4	− 8	− 12	0	+ 12
Germany	−512	− 112	−624	− 73	+697
Austria	− 87	− 14	−101	− 6	+107
Hungary	− 38	− 23	− 61	− 1	+ 62
Poland	− 26	− 30	− 56	− 11	+ 67
Japan	− 62	− 7	− 69	+ 8	+ 61
Australia			−253	+ 51	+202

[1] Including gold exports.

By 1931 the position of Britain's Balance of Payments account had radically altered ; but before we come to the " crisis " situation, it may be useful briefly to examine the composition of another country's Balance of Payments, concerning which ampler statistical details are available. The United States Department of Commerce prepares an estimate in much greater detail. The increased number of items does not necessarily connote any greater accuracy, but it does make the estimate more informative, and it would be well if the British Board of Trade could increase the quantity of information in their estimate. The American figures are summarised on page 250 in millions of dollars, the plus and minus signs having the same connotation as in the preceding table.

The reader will notice significant differences between the two balances, yet both countries are in the same fundamental position, in that both are " creditor countries." Not only were they able before the crisis to increase their foreign investments, but they also received substantial sums in interest on their past investments. Not all countries, of course, are in this position, and the table, on page 251 which gives average figures, in millions of U.S. dollars, for the four years preceding the present crisis, illustrates the different positions of the nations.

These countries have been divided into four groups. Group A can be called the " mature creditors " ; not only do they export capital, but they receive in interest on past loans more than they lend. Group B are the " immature creditors " : two of the three are still paying interest on their past borrowings, and the third is lending more than it receives in interest ; all three are enabled to lend (or repay capital) only because they have a positive balance of visible and invisible trade. Group C may be called the " mature debtors " : they are still borrowing, but they have been able to build up a positive balance of trade, so that their borrowings are less than their interest payments. Group D may be called the " immature borrowers " : they

are borrowing (at least, all of them were borrowing in 1926–29) not only to pay interest on their past debts, but also to cover deficits on their present trade.

Classified in this way, balance of payments figures enable us to see at a glance whether a country is in a sound position or not. Countries in Group D should be young and undeveloped countries where the investment of capital can be expected to bring a handsome return and, by building up an export trade, pave the way to its own repayment. Groups C and B should represent the subsequent progress of such countries. The United States, for example, has passed through all four stages. The transformation from Group D to Group C came in the 'eighties of last century, when a positive balance of trade began to appear. The war enabled the United States to pass from Group C to Group B and become a creditor, but in the years immediately after the war there was still a favourable balance of trade, and Group A has been attained only in the last few years. Now Germany obviously does not fit into these categories : she is in Group D but can hardly be described as an undeveloped country or one where investment of capital is likely to bring a more than average return. Australia too should be at least in Class C. We conclude that neither country was in a sound position during the years in question. Similarly if a country, instead of climbing up the scale, slips downward, as Great Britain did in 1931, it is obvious that something is wrong. This table can therefore be taken as illustrating some of the causes of instability which were in existence just before the onset of the present depression.

From this outline sketch of the basic principles of international trade, the *modus operandi* of the exchange market in currencies, and the components making up the aggregate of nations' balances of payments, we may now pass on to a brief examination of exchange developments in the setting of the financial crisis which burst upon the world in the summer of 1931.

The causes of that crisis are dealt with elsewhere in this book ; here we are concerned only with its salient

consequences affecting foreign exchange dealings and trade relationships. Of these consequences the first to be observable was a great increase in the movement from country to country of "liquid"—i.e. not permanently invested—funds. The realisation in May 1931, that Germany and most of Central and South-Eastern Europe had for years been filling a gap in their balances of payments by borrowing, and that the accumulated liability patently exceeded the debtors' capacity of repayment, led first to a panic withdrawal of funds from those areas. That is to say, creditors of German banks and firms who were able to secure repayment in marks sought to sell the marks in exchange for francs, dollars, etc. In the absence of would-be purchasers of marks, the deals could not be completed except by the sale and export of the Reichsbank's gold. With the exhaustion of the Reichsbank's free stocks the means of transfer came to an end, and the agreement made by Germany's foreign banking creditors to "stand still" and to refrain—except within narrow, scheduled limits—from withdrawing liquid funds from Germany was the enforced result.

The next phase took the form of a hasty withdrawal of funds from London ; foreigners who held balances here repatriated them either because they feared the exchange value of the pound might depreciate or because their own resources had become "frozen" in Central Europe, so that they were in need of ready cash at home. Once again the result was, inevitably, an insupportable one-way demand in the exchange market. The needs of sellers of pounds were met until the last possible moment by the Bank of England, partly by selling gold for export to those who wished to exchange pounds into other currencies, partly by borrowing (in conjunction with the Government) supplies of dollars and francs from the authorities in New York and Paris. By September 21, 1931, the Bank's available resources were exhausted ; a suspension of gold exports had to be decreed.

This done, the exchange value of the pound sterling became the resultant of three factors—(1) supply and

demand to settle trade accounts, (2) the purchasing power of the pound over commodities in the British market, and (3) movements of liquid capital in and out of London. At first, the last-named factor predominated. The autumn of 1931—during which applications to banks for foreign exchange had to receive official sanction—witnessed a considerable removal of funds from London, notwithstanding the fact that those who had exchanged foreign currencies for pounds at rates equivalent to $4.86 suffered losses on selling pounds at their depreciated value. What the holders of pounds feared was a further depreciation ; and this fear of currency depreciation has played throughout the past two years a large part in the exchange market. Set recurrently in motion by apprehensions regarding the stability of this or that currency, a mass of short-term capital, exceeding by far in magnitude the trading "differences" normally requiring adjustment in nations' balances of payments, has swung across frontiers like a lump of metal careering destructively from side to side of the deck of a rolling ship.

The next consequence of the crisis on the exchange market had its origin partly in economic and partly in political considerations. The depreciation of the pound had the result—beneficial from the viewpoint of the British exporter—of making British goods, priced in sterling, cheaper to buy if the purchaser possessed foreign currencies. Thus not only was the British balance of payments eased by the deterrent effect on imports of the lower exchange value of sterling, but exports were stimulated. There was, however, one fly in this monetary ointment. The stimulus to exports would hold good only so long as British manufacturing costs did not rise proportionally to the fall in the exchange. Imported raw materials were bound to become *relatively* dearer in sterling (actually they continued to cheapen in terms of "gold" currencies), but so long as wages did not increase, the much-needed benefit to British exporters would accrue. The danger in the winter of 1931–32 was felt to be lest an extreme depreciation of the pound's exchange value, as the result of withdrawals of foreign

funds or speculative sales of sterling, might so increase the cost in sterling of imported food that wages must be raised. Hence the decision of the authorities to control, as far as possible, the pound's exchange fluctuations.

That control was exercised, first, by maintaining high bank rate and consequently attractive rates of interest for liquid funds in London. In other words, from September 1931 to the early spring of 1932 our policy was as deflationary as if we had still been endeavouring to maintain the gold standard. Next, when growing suspicion of other currencies—combined with the feeling that the pound had fallen to a level at which its purchasing power internally was " worth the money," and that the Government had no intention of running unbalanced Budgets or of embarking on inflationary measures—reversed the outward flow of funds from London, all restrictions on the purchase of foreign exchange were removed, though an embargo on public issues of foreign loans remained ; the official policy was directed towards preventing a disturbingly rapid appreciation of the pound, whose effect would have been to handicap exports and to stimulate imports artificially without any proportionate increase in the country's capacity to pay for them.

In pursuance of this policy, Bank rate was lowered during the spring of 1932 by successive stages from 6 to 2 per cent ; and in the 1932 Budget the Government took power to smooth out fluctuations in the pound's exchange value by establishing an Exchange Equalisation Account. The working of this account merits brief description.

Until its creation the Bank of England had endeavoured to check the appreciation of sterling by buying dollars, francs, etc., out of its own resources. These, however, were limited in extent, and in replacing them by holdings of foreign currencies the Bank was exposing itself to a serious risk of loss in the event of their value falling in relation to that of sterling. That risk the Government assumed, and the Exchange Account came into operation in July 1932. Its resources consisted not of actual currency but of Treasury

bills—i.e. Government I.O.U.s—for £175 million which were credited and handed to it. Its managers were officially the Treasury, in practice the staff of the Bank of England.

The Account's first step was to take from the Bank of England the foreign currencies which the Bank had acquired ; in exchange it transferred Treasury bills to the Bank, whose resources were thus left unaltered. Thereafter its procedure was as follows. When it desired to neutralise the effects of a demand for sterling in excess of ordinary demand for foreign currencies, the Account instructed one or more of the London banks to buy as its agent the francs or dollars on offer. This the London bank would do, thereby acquiring, say, £1,000,000 worth of foreign exchange and crediting its foreign customer with £1,000,000 sterling deposit. The Account would then sell to the Bank of England a Treasury bill for £1,000,000, and give the London bank, as the purchase price for its newly acquired foreign currency, a cheque for £1,000,000 drawn on the Bank of England. Thus each time the Account bought foreign exchange, the immediate result was an increase in (1) London bank deposits ; (2) the Bank of England's holding of Government securities ; and (3) bankers' deposits at the Bank of England. (For the effects on the country's credit structure see Chapter III.) Every time the Account sold foreign currency in order to support sterling the process was reversed.

How much foreign currency the Account acquired on balance in 1932 has not been disclosed ; but it became evident in 1933, when the American panic resulted in a fresh scramble on the part of nervous foreign capitalists to obtain pounds in exchange for dollars, that its sterling resources had been largely, if not entirely, converted into foreign exchange. During the early months of this year the Account increased its power to sell sterling by converting its foreign exchange holdings into gold, which it sold to the Bank of England for pounds ; but this process could not be indefinitely continued for the reason that the Bank of England, under the terms of the 1932 Finance Act, could

pay only 94*s.* per ounce for the gold, whereas its cost to the Account ranged round 120*s.* per ounce. Hence the Account's " book " losses in acting as a channel for the import of gold would rapidly mount up to the total of its sterling resources.

This does not mean that the import of gold was ill-advised. It was an asset less exposed to danger of depreciation than dollars or francs ; moreover, unless the pound's exchange value rose in terms of gold (i.e. unless the sterling price of gold fell) the Bank of England's gold holding would presumably one day be calculated at its actual sterling value. In that event, the difference between its nominal value (at $4.86) and its actual value would accrue not to the Bank but to the Exchange Account, making good its present " book " losses.

So much for the Account's technique. Has its management's policy been sound ? Abroad the criticism has been made that the British Government since the spring of 1932 has deliberately used the Account in order to keep sterling below its " natural " exchange level. This criticism, however, is unfair. Actually in the autumn of 1932, when British imports were showing their normal seasonal tendency to increase, the Account sold dollars and francs in order to supply the needs of importers for foreign exchange and so prevent a fall in the pound. What the Account has consistently tried to do has been (1) to " smooth out " day to day fluctuations in the exchanges, and (2) to act as a species of cloak-room for foreign funds deposited in London. That is to say, instead of allowing the foreign money temporarily seeking refuge here to remain at the disposal of London banks—whose normal lending operations might have resulted, as was the case in 1931, in the foreign claims becoming tied up in investment, so that sudden re-call of the money would create difficulties—the Account has held control of enough foreign currency or gold to satisfy foreigner's demands in the event of their deciding to withdraw (by selling pounds) the money lodged here. In short, it has very properly prevented the country from

treating money temporarily lent to it as resources available either for lending abroad or for payment for additional imports not covered by the proceeds of exports or "services."

From this brief description of the control exercised over the London market in sterling exchange we may now pass to the examination of developments abroad. On these developments, it should be appreciated, the depreciation of sterling, combined with Britain's new fiscal policy, exercised a considerable influence. Not only were foreign goods made more expensive by the fall in the pound for British buyers, but the Government decided to reduce, by the deterrent influence, first of high " emergency " customs duties and, later, by a more general tariff, the substantial adverse balance of merchandise trade which was estimated to have resulted in 1931. In consequence, foreign producers were forced either to forgo their previous share of the British market or to make their selling prices in sterling sufficiently competitive to offset the effects of the tariff and the pound's altered exchange value. To many countries—e.g. Denmark and Argentine—the British market was indispensable ; and to nearly all countries engaged in foreign trade it was important—the more so because the universal slump following the financial crisis of 1931 left them with few alternative market outlets. Hence the depreciation of sterling undoubtedly played a considerable part in accentuating the fall of prices in terms of " gold " currencies which continued throughout 1932, save for a brief up-turn after the Lausanne Conference.

The results on the exchange position of various countries took, broadly, two forms. An increasing number of countries headed by Sweden, Norway, Denmark, Canada and Japan, finding their gold reserves ebbing and their export prices uncompetitive, followed Britain in abandoning the gold standard and allowed their currencies' exchange value to be determined to some extent by the influence of supply and demand. Of the " off-gold " countries, the Scandinavian group tended in practice, though not *de jure*, to link their currencies to sterling—as did India, Egypt and, of

course, the Crown Colonies. To prevent, however, an undue depreciation of their currencies most of the members of the " off-gold " group—its composition was always too loose to justify its definition as a sterling area—imposed Governmental restrictions on the quantity of foreign exchange which importers or others might buy in order to purchase foreign goods or place money abroad. This second form of protective mechanism was used to an even greater degree by countries with an adverse balance of payments—e.g. Germany and Austria—whose Governments, in view of early post-war experience, were afraid for political reasons to allow the currency once more to suffer depreciation and whose external indebtedness, be it noted, was expressed in terms of gold ; and, as the restrictive effects on trade spread, even countries possessing large gold reserves, such as Holland and Switzerland, were compelled in self-defence to control, directly or indirectly, their foreign exchange markets. By the end of 1932, not only had Germany and other heavily indebted European countries had recourse to moratoria on the transfer of the service of a greater or lesser part of their foreign debt (establishing " blocked " accounts in which its payments in domestic currency were immobilised), but 24 countries (including 9 on the gold standard, and 15 " off ") had established complete official direction of foreign exchange dealings, while—apart from tariff increases—32 countries had imposed systems of import regulation by means of licence and/or quota systems.

The mechanism of direct exchange control took the simple form as a rule of decreeing that exporters must surrender to the Central Bank all foreign exchange acquired by them as a result of sales of goods abroad. Thus the Central Bank acquired a monopoly of supplies of foreign currency—paying the exporters in domestic currency at a rate of exchange fixed by itself—and it was therefore in a position to meet or refuse, at its discretion, all demands by its nationals for foreign exchange. Indirect exchange control by means of quantitative restriction of imports

began, in 1931, with pronouncements by Governments that total imports of such and such a product during a given period must not exceed a stated amount. Such decrees, however, inevitably affected some foreign suppliers more than others ; and, as retaliation followed rapidly, it became necessary to evolve a more complicated system of national quotas—supplemented sometimes by the issue of licences for individual transactions within the quota limits—in order to provide a basis for bilateral bargaining.

Now, as stated above, the motives inspiring both direct and indirect methods of regulating and restricting demand for foreign exchange were originally defensive. Nations no longer able to borrow, whose balances of payments were in deficit, either because of disproportionately large imports or because export proceeds no longer sufficed for the service of accumulated foreign debt, endeavoured to " correct the balance." In so doing by means of quantitative restriction, statesmen fell into the crude error of supposing that the objective should be to equilibrate, so far as possible, trading balances between their country and each country in trading relationship with it. That is to say, country A found that it bought from country B, say, 100 units and sold to B only 50 units. It proceeded to ration imports from B down to 50 units. As a result, B's purchasing power abroad was proportionately reduced and it bought less from countries C and D, both of whom were previously good customers of country A but were now forced in turn to buy less of A's exports. Thus A's balance of payments would fail to improve and a further vicious circle of restriction would be ordained, in the form either of import quotas or more drastic rationing of licences to buy foreign exchange. As a result, the value of world trade had fallen in 1932 to only $2,000 million (U.S. currency), as compared with nearly $5,200 million in 1929.

This " defensive " use of foreign exchange control during the crisis has been sufficiently disastrous, in that it has not only paralysed international trade but has also created, behind the shelter of quotas, vested interests which it will be most difficult to dislodge. Yet a further complication,

however, has been introduced into the situation by the use of exchange restrictions as cover for disguised depreciation of currencies.

This development can be traced most readily from the course of events in Austria. During the winter of 1931–32, Austria remained nominally on the gold standard and her currency consequently stood at a considerable premium over the pound. But whereas prices in " gold " countries fell, prices in Austria followed approximately the course of sterling prices, with the result that Austrian exporters found their foreign business declining. The authorities in Vienna consequently decreed that exporters might be permitted to sell their foreign exchange to approved importers at a premium in schillings ; and gradually this system of dealing at a private, unofficial rate—thus allowing Austrian importers to quote lower prices in terms of foreign currencies—was allowed to supersede the official exchange market. In Austria official recognition was eventually given to the " black " rate—so that *de jure* depreciation of the schilling became a fact—but in Hungary up to the summer of 1933 an official and an unofficial rate both continued to exist. In other countries also similar devices have been developed. German marks, for instance, command a lower price than the official parity if they are used for travelling purposes in Germany or for the purchase of German goods for export, and a still lower price if they are utilised exclusively for long-term investment in Germany. Similarly there are " inland " rates—at variable discounts below the official quotation—for Greek drachmas, Roumanian lei, etc.

The effect of these devices is twofold. On the one hand the export of goods from the country in question is stimulated ; on the other hand the foreign creditor of countries in which full transfer of debt service has been suspended is given the choice either of not being paid or of having to remit a portion of his claims. Thus the freeing of a portion of " blocked " accounts at a discount represents one means of lightening the burden of foreign debt.

From the point of view of external trade, however, no

immediate stimulus to exports can be devised which is more efficacious—provided competitors do not follow suit—than simple depreciation of currency ; and there were growing signs in the spring of 1933 that, if the crisis continued much longer, the world might soon witness a race in competitive depreciations. The Union of South Africa had already yielded to pressure to suspend the gold standard, not because it had an unfavourable balance of payments or that it could not have stemmed the temporary speculative flight of capital which preceded the suspension, but because its agricultural exporters were perishing through inability to compete with producers in Australia and the Argentine whose goods were priced in a depreciated currency. Finally, the United States decided deliberately to prohibit gold exports and encourage depreciation of the dollar in order not so much to help American exporters as to pave the way for management of currency and foreign exchange designed to raise the internal price level in the States for the benefit of the farmers and other producers loaded with a heavy burden of debt contracted when prices were 50 per cent higher. Since this action on the part of the United States was accompanied by legislation providing, in flagrant violation of existing financial contracts, that debts should be henceforth payable in paper dollars, irrespective of their exchange value, a lead towards currency depreciation was given to every country in which fixed indebtedness —its real burden increased by the fall in prices and incomes —had become a burning political issue.

What will be the end of the present phase of fluctuating exchanges and official control of the markets in them ? The answer is dependent on many factors impossible as yet to forecast. This, however, may be said in general terms. Continuance of a régime of defensive and offensive quotas, accompanied by various devices for enjoying the benefits of concealed currency depreciation would spell the eventual reduction of international trade to insignificant proportions. Its conduct would become so difficult that little of it would survive. Equally, the restoration of anything like the old

volume of international trade implies the restoration of stable exchanges, since merchants cannot deal successfully across frontiers if the value of the currencies in which they buy and sell is subject to unforeseen fluctuations. Next, the re-stabilisation of exchanges demands the fulfilment of two conditions—(*a*) balances of payments must be so re-adjusted that continued deficits do not menace the solvency of debtor countries ; and (*b*) the flow of trade on which balanced accounts between nations largely depend must not be liable to artificial stoppage through the erection, for the benefit of selfish national interests, of unsurmountable tariffs.

Now the fulfilment of condition (*a*) involves considerations partly economic and partly political. Debtor countries can in theory maintain stable exchanges, no matter how heavy the service of foreign debt, if they forgo imports and " force " exports sufficiently at the cost of having to accept a low standard of living. Politically, however, there are limits to the degree of impoverishment which a nation will undergo for the benefit of bondholders in other lands ; and " forced " exports are by no means always welcome in neighbouring countries. Thus in cases where a huge volume of foreign debt has been built up during the first post-war decade, it is safe to say that exchange stability demands a radical writing down of foreign obligations. As for (*b*), it is plain that nations will not forgo the right to protect their domestic agriculture or industries from disturbance by a sudden, abnormal inrush of foreign imports until they are assured that other countries will refrain from invading other markets by depreciating the currency in which their goods are priced. Thus the restoration of reasonable freedom of trade and the re-stabilisation of exchange rates form two inseparable factors in one integral problem. Without one the other is ultimately impossible ; and without both the world is unlikely to regain great prosperity. A system of " closed economics," traversing the simple, irrefutable yet too often forgotten principles set forth at the beginning of this chapter can lead nowhere save to the universal lowering of standards of comfort and civilisation throughout the world.

CHAPTER VI: CAPITAL AND INVESTMENT

By G. R. MITCHISON

MY OBJECT in this chapter is to describe the arrangements in Great Britain for the use of money in capital expenditure, to compare those arrangements with arrangements for the like purpose in other countries and to make some comments on what I describe. It is difficult to find any logical order in which to deal with the subject; but I propose, as regards Great Britain, to begin with the machinery of a public issue by an industrial or trading company. I shall deal with the terms of the offer to the investing public and with the persons concerned in making that offer. I shall then have something to say about issues by public and semi-public bodies, such as Governments or public corporations. Having in that way started the capital ball on its course, I shall notice its revolutions through the London Stock Exchange and the activities in that connection of professional investors, such as investment trusts and insurance companies. I hope then to be in a position to draw some conclusions from that picture of the collection and use of capital. Next I propose to make some comparisons with various other countries and to observe the effects of their different systems: but I shall not try to describe the latter as fully as the British system. Lastly I hope to make, as regards Great Britain, some suggestions about future development.

A Public Issue by an Industrial or Trading Company: Shares and Debentures. In Great Britain the usual type of commercial association, for which money is raised from the general public, is a public Company, in which the

liability of members is limited to the amount of their shares.[1]

Such a Company may issue shares or Debentures. Someone subscribing for shares takes, as the name implies, a share in the business of the Company : he becomes a shareholder or member of the Company. Someone subscribing for Debentures does not become a member of the Company or acquire any share in its business : he merely lends money to it. The principal and interest of the usual Debenture are therefore debts, payable out of the money of the Company, whether that money be capital or income, so far as the Company is concerned. Debentures, as debts, may also be (and usually are) secured by a charge on some or all of the assets of the Company, so as to entitle the Debenture holders, if their interest is not paid, in effect to seize or sell the assets so charged in order to get their money. Such a right is obviously inappropriate for shareholders : they already own the business and cannot seize that which they already have. Shareholders receive " dividends," not interest. Dividends are such part of the profits of the Company as it is decided to divide among the shareholders. The directors, subject to formal confirmation by the shareholders, decide what part of the profits shall be so divided and what part shall be retained by the Company.

Shares are of various kinds : for the law allows Companies to make what arrangements they choose for distributing profits between one class of shareholders and another, and there are many varieties in practice. But the standard varieties, if I may use that phrase, are Preference shares and Ordinary shares, the Preference shareholders receiving

[1] Among other types of Company I need only mention private Companies, in which the liability of members is limited but which may not make a public issue of their shares or debentures, and Companies incorporated under special Acts of Parliament, such as railway, gas and water companies : these raise their capital in rather peculiar forms, but the peculiarities involve no question of sufficient general importance for discussion here. Partnerships are obviously of little interest to the ordinary investor, if only because of the unlimited liability of ordinary partners and because, under English law, there may never be more than twenty partners in a trading firm.

a fixed dividend, before any dividend is paid on the Ordinary shares, and the Ordinary shareholders getting such further profits as are distributed.

Some American Terms. It may be convenient to explain here that in the U.S.A. " debentures " are called " bonds " : stock—not uncommon in England as a substitute for shares[1] —is even more common there, and what would be called in England " Ordinary " stock is called in America " Common " stock. Moreover shares or stock in England must have a nominal value, while in America there may be Common shares " of no par value "—a mere right to a certain proportion of the distributed profits and assets of the Company—or, as it would be called in America, of the Corporation.

An Issue of Shares in Great Britain. Now let me turn to an actual issue of shares—say, on the formation of a new Company.

Imagine the conversion of some private business into a public Company, with the object of paying off an excessive bank overdraft or of expanding the business. The owners are Messrs. A, B and C. They may perhaps arrange the formation of the Company and the terms of the issue, which we will assume to be a small one, in the office of their stockbrokers, Messrs. Shock & Stare. Messrs. A, B and C may have a business worth about £200,000, and they may wish to raise a further £300,000 for extensions and additional working capital. A possible arrangement will be that they sell their business to the new Company, the X Y Z Trading Company Limited, for £200,000, payable in Ordinary shares, and make an issue of £200,000 of six per cent Preference shares and £100,000 of Ordinary shares. By law, the issue must be made by means of a prospectus, which has to contain certain information.

[1] The difference is simply that each share is numbered and identified, stock is not.

The Prospectus: Legal Requirements. The prospectus has to be dated and to state that a copy has been delivered to the Registrar of Companies for registration : the copy to be registered has to be signed by every director or proposed director of the Company. The directors and other persons concerned in the formation of the Company are responsible for the truth of the statements in the prospectus. The X Y Z Trading Co. Ltd. will have actually been incorporated just before the prospectus is issued, and the prospectus must state the terms of the memorandum of association, under which the Company has been constituted. It must state how many shares in the Company each director is to have and how much he is to be paid for his services as a director. It must give the names and addresses of the directors, of the vendors to the Company (in this case Messrs. A, B and C) and of the auditors who will audit the Company's accounts. It must state what the vendors are getting from the Company and give similar particulars as to what is being made out of the issue by other people concerned in it, including the directors. It must identify any material contracts and state a time and place at which they may be inspected. It must also explain the rights of the different classes of shareholders in the Company and the amounts asked as subscriptions for the shares. There must be a report by accountants of profits of the business which it is proposed to buy for a period of three years before the prospectus. There are also some statements to be made as regards the application of the money raised on the strength of the prospectus.

The above requirements will be somewhat different if the prospectus is in respect of shares issued by a Company that is already in business ; and there are various other changes in the requirements—according to the character of the Company making the issue, whether the prospectus does or does not appear in a newspaper, and so on. But the above rough summary is sufficient to show the general object of the particulars which the law requires to be included. The intention is to make the promoters disclose

to prospective purchasers of the shares the money and profits accruing to the promoters. In addition to the requirements of the law, there are standing regulations of the London Stock Exchange to be complied with, if the shares, when issued, are to be bought and sold on the Stock Exchange.

Underwriting Commissions. We can assume that the prospectus of the X Y Z Trading Co. Ltd. will comply with the above requirements, and I need not describe it in detail : such prospectuses appear often enough in the newspapers. But two small points in it are worth noticing. It will offer a brokerage, probably of 3*d.* a share, to banks and brokers in respect of shares allotted on applications forwarded by them. It will also mention that the shares have been " underwritten," perhaps for an underwriting commission of four per cent and overriding commission of one per cent. Those commissions require some explanation. They are likely to be payable in this case to the brokers, Messrs. Shock & Stare, and, in return for them, the brokers by underwriting the shares undertake to pay for any shares of the issue which the public do not subscribe for. The brokers will arrange sub-underwriting contracts with various clients of theirs and other persons, to whom they will pass on the underwriting commission in return for those persons agreeing to relieve the brokers of any shares they may have to take up as underwriters. The sub-underwriting agreements, not being agreements with the Company but with the brokers, will not be disclosed in the prospectus. The brokers will keep the overriding commission. That commission in the present case will be £3,000 and the underwriting commission £12,000. In addition, the Company will have to pay certain " preliminary expenses," including stamp duty, etc., and an estimate of these will appear in the prospectus. The brokers or others concerned in the promotion of the Company will undertake to pay these preliminary expenses in return for a cash

payment or an allotment of shares : they are not likely to make a profit on that transaction.

The Persons concerned in the Issue. Let us now look for a moment at the position of persons concerned in this issue of the X Y Z Trading Co. Ltd.

The vendors, Messrs. A, B and C, are selling their business, not to the investing public, but to a Company, which they themselves are creating. If they were selling for cash, they would simply want to get the best possible price. If, as I have supposed, they sell for shares, they are concerned that the business shall succeed, but not that the public shall have a fair share of it. They want to fix the price of their business as high as possible : for the higher the price, the greater will be the vendors' share of the profits of the Company. The Company itself is in no position to bargain with the vendors. It will make whatever bargain may be decided on by those promoting it. It has, as yet, no independent voice. What check is there in practice on the vendors being paid too much for their business ? Such check as there is comes through the underwriters of the shares, Messrs. Shock & Stare. They have to find sub-underwriters ; and the sub-underwriters will want the public to subscribe for the whole issue, so that they, the sub-underwriters, may pocket their commission and not be left with shares which have not been taken up and will have to be sold at a discount. The check therefore is Messrs. Shock & Stare's estimate of what the public requires. The vendors are concerned in getting a good price, Messrs. Shock & Stare in making the issue appear attractive to the investor. In those circumstances it is natural that the prospectus should present matters as favourably as possible. The requirements of Company Law as to what it must contain are intended to ensure that there shall be enough definite facts to enable the prospective investor to form a fair judgment. On what will he in practice rely ? To some extent, no doubt, on personal confidence in brokers and directors ; but there are many investors nowadays who

feel, with some justification from experience, that the best recommendation for a director is that they should never have heard of him—that he should preferably be mute and certainly inglorious. Otherwise the prospective investor will rely, in such a case as I have suggested, on the financial success of the business in the past and the likelihood of the continuance or increase of that success. It is enough to mention two or three of the things that may make it difficult for him to form a sound judgment. The prospectus is, as we have seen, only one side of the case—the most favourable. There is no obligation to mention the real difficulties of the business, whatever they may be. Those difficulties may have arisen since the time of the profits shown in the prospectus; they may already be anticipated or they may arise unexpectedly. Only an expert in the business can say if they exist or what chance there is of their arising. Again, past profits may have been steady and sufficient. But there may be no real use in the business for the additional money which is being raised. Lastly—and most important of all—shares are issued in "boom" periods, when profits seem to be rising and when the investor's hopes are high; he finds it hard to realise that those profits will fall and those hopes be disappointed. But the best proof that, in spite of all legal requirements, a prospectus is scant protection to the investing public, lies in the losses actually incurred, especially on issues in "boom" periods.[1]

The other persons whose names appear in the prospectus are the directors, the brokers, the bankers, the solicitors, the auditors and the secretary. I have already mentioned the responsibility of the directors, other than the vendors. They are bound to disclose their own financial interest, if

[1] Take, for instance, issues of capital in the month of July 1928. Of about £9⅛ million subscribed, £1¼ million had appreciated 19 per cent in value by the end of 1932, £3½ million had depreciated 89 per cent, £3¾ million had been lost altogether and the remaining £¾ million was untraceable as the result of amalgamations and re-organisations. To put it in another form, omitting the last mentioned £¾ million, rather over £8½ million subscribed had become worth rather less than £2 million.

any, in the issue and bound to produce a prospectus which is truthful as to facts. Their opinions may be optimistic to any degree of folly, short of dishonesty, and they are hardly concerned to protect the investor. The bankers take no responsibility whatever for the issue, however large the type in which their name may appear on it. The solicitors are equally irresponsible, so far as the public is concerned. The auditors are only concerned to produce figures with such correctness as is normally required for statistics. The secretary is, of course, merely a paid official of the Company.

In the case I have suggested, the brokers to the issue would be Messrs. Shock & Stare, who are also the underwriters. As brokers, they would see that the requirements of the Stock Exchange for leave to deal in the shares were complied with ; and, if the vendors or promoters desired to sell shares or to start a market in the shares, the brokers might incidentally be employed for that purpose. They would receive a sum for their services, in connection with the issue itself—a sum which would be quite distinct from the brokerage of 3*d.* allowed to them or other brokers in respect of applications passing through their hands.

Issues, Offers for Sale and Placing. I have been describing an issue made by a Company and arranged and underwritten by brokers. There are, however, other ways of raising money for a company, and, more often than not, the necessary arrangements are made by an " issuing house " instead of by brokers. The issuing house may simply be the underwriters of such an issue as I have described. Or (a second method) the issuing house (or a firm of brokers) may buy all the shares which the Company—such as the X Y Z Trading Company Limited—desires to sell, and then re-sell those shares, either by a public offer in terms of a prospectus or (a third method) by " placing " or " introducing " the shares on the Stock Exchange. Of those three types of activity, the first does not differ in principle from the function of brokers when

acting as underwriters. The second involves an " offer for sale " to the public, and that offer is subject to legal requirements, which are similar to those of a direct issue. The extension of legal safeguards from direct issues to " offers for sale " has been a gradual process but is now virtually complete. The third type of activity is not subject to the same legal safeguards, if it is arranged so as not to involve a public " offer for sale." It is, however, subject to certain requirements of the Stock Exchange in order that leave may be obtained to deal in the shares. The usual procedure is for the " issuing house " to sell all the shares to a number of persons ; those persons form a syndicate and sell their shares on the Stock Exchange through the agency of the " issuing house," which so manages the sales as not to flood the market and endeavours to keep the re-sale price as high as possible. The profits of such a series of transactions are pooled and divided proportionately among the members of the syndicate : the members are said to have formed " a pool " in the shares.

Issuing Houses. There are various kinds of " issuing houses." In the first place, a number of the leading merchant bankers issue foreign securities, sometimes for foreign Governments or public authorities and more rarely for foreign industrial concerns. In most of such cases the " issuing house " buys the security and re-sells it by a public " offer for sale "—the second type of activity described above. The merchant bankers owe this business to the foreign connections which they have established in the business of merchant banking. They are firms of substance and of reputation ; they make some examination of the security they are buying and selling ; and they consider themselves under some obligation, as a matter of repute, to vouch for its soundness. The great majority of the foreign issues are made by Rothschild's, Morgan's, Baring's, Schroder's, Hambro's or Lazard's. The result is that comparatively few foreign issues are unsound in the sense in which the more foolish or semi-fraudulent domestic issues

of shares, made in a boom period, are unsound. There are, however, other difficulties in the system, to which I shall have occasion to refer later. Meanwhile it is worth noticing that most of the " issuing houses " of this kind act as agents of one or more foreign Governments for the issue and service of their loans.

To some extent these merchant bankers are also concerned with domestic issues. Here again, just as in connection with foreign issues they act as agents for foreign Governments, so in connection with domestic issues they often act as a kind of financial agents for large Companies. It appeared, for instance, in the course of evidence given before the Macmillan Committee in January 1930 that, since the War, Lazard's had issued about £45 million of foreign securities, £19 to £20 million of colonial stocks and about £24 million of home issues. Of the latter, some £15 million had been issued for Lever Brothers. Much of the home issues had been not in the form of " offers for sale " but " placings " through the Stock Exchange—the third, not the second, type of activity mentioned above.

Another kind of " issuing house " makes issues, usually home issues, the main part of its business. Turning, for instance, to issues made in 1932, we find the British Shareholders Trust Limited in April making an " offer for sale " of £350,000 Debenture stock of a hotel and restaurant Company, and in May underwriting an issue of £600,000 Debenture stock and £200,000 Preference shares by a Company for making tin boxes. The British Shareholders Trust Limited has been in existence since 1921, has a capital of just over half a million pounds, and is a typical instance of the kind of " issuing house " that I have in mind. It is a smaller concern than any of the above-mentioned merchant bankers, but it carries on a reputable business.

The best place to look for the third type of " issuing house " is among prospectuses issued in a boom period—especially among the prospectuses of new Companies. The " issuing house " appearing in the prospectus is usually a private Company—and often some small type

shows that the promoters of the new Company are themselves interested in the "issuing house." These "issuing houses" are in fact Companies formed by financiers during a boom period to take the profit of one issue or of several issues. There are further possibilities. Such an "issuing house" may arrange sub-underwriting contracts with other Companies, in which a promoter of the new Company is interested. The small Companies will collect the sub-underwriting commission for him, if the issue succeeds, or be unable to take up the shares, if it fails. As these sub-underwriting contracts are made with the "issuing house" and not with the new Company, particulars of them need not be given in the prospectus. That is only one of the many ways in which the formation of Companies or their association may be used to conceal the true position. Perhaps I shall not be straying too far from my subject if I mention another method often apparent in issues of shares. Company A may hold all or most of the shares in Company B and at times may derive a substantial revenue from its holding. Company A may issue Preference shares or Debentures, which appear to be well secured. The real difficulty, however, may be that there are obligations of Company B, which will have to be met before dividends can be paid on the shares held by Company A, and which are not mentioned in the prospectus of Company A. In general the growth of large holding Companies has resulted often in the issue of Company accounts, covering large sums of money but giving only the scantiest information as to the real position of the concern: for they may show only the receipts from subsidiary Companies, without disclosing the actual position of the latter.

Of course, the above types of "issuing houses" merge into one another. It is often difficult to say to which type an "issuing house" belongs, and the three types do not cover every "issuing house."

Debentures. I now turn from shares to other forms of security. Debentures, as we have seen, represent loans, and

the interest on them is generally payable out of assets and not merely at the discretion of the directors out of profits. They, therefore, tend to be a safer investment than shares. In times which seem to promise prosperity the investor prefers a share in a company, with the chance of a share in the company's prosperity. In less hopeful periods he chooses debentures, which, though they only carry a fixed rate of interest, rank for it before share dividends and usually have the additional security of a charge on some or all of the company's property. Consequently the proportion of debenture issues to share issues tends to increase in a "slump" period. Take, for instance, the years 1928 to 1931, of which the first two represented a boom period and the last two a slump. Leaving out the shares of Railway Companies and of Gas and Water Companies (which happen to raise their capital in rather peculiar forms) the figures [1] of money raised as share capital and of issues of debentures are as follows :

(£ 000's omitted)

	£ 1928		£ 1929		£ 1930		£ 1931	
Share capital	186,106	74%	153,910	77·5%	43,922	56·4%	18,187	44%
Debentures	65,412	26%	44,646	22·5%	33,929	43·6%	23,115	56%
Total issues of industrial companies	251,518	—	198,556	—	77,851	—	41,302	—

Loans of Governments, Municipalities and Public Boards.

Debentures may be a safer investment than shares ; but even so the payment of their interest depends on the Company having enough money to pay it and, therefore, on the chances of trade. The most secure investments are the loans of Governments, municipalities and public boards in this, or in any other country in which the interests of the rentier are traditionally protected : for the borrowers will be able to raise the interest on the loans by levying taxes and rates. Accordingly at times when investors prefer debentures to shares, the issue of loans by Governments and

[1] Midland Bank figures.

other authorities tends to rise in proportion to the issues of Companies. It does not follow that it will actually increase, because the highest total amounts are invested in times of boom : but it will increase in proportion. Take as an illustration the totals already given of issues by Industrial Companies in the years 1928 to 1931, add the issues of Railway, Gas and Water Companies, and compare the totals with the totals in the same years of loans to Governments, municipalities and public boards (see page 278).

It is interesting to see who are the principal borrowers among Governments and public authorities and in what way and upon what terms they borrow.

Trustee Securities. Let me begin by referring to " trustee securities," which include some loans of Governments and public authorities as well as various other stocks. They are the securities which the law considers safe enough for the investment of money held on trust. Large sums are so held in Great Britain and the legal classification[1] of " trustee securities " has had a considerable effect in directing investment into certain channels. For the present purpose a rough summary of the English classification is sufficient : it is as follows.

(1) Securities issued or guaranteed by the British Government.
(2) Stocks of County Councils or Municipal Boroughs in the United Kingdom.
(3) Stocks of the Governments of India and Northern Ireland. Colonial and Dominion stocks, which comply with certain requirements : almost all such stocks do so comply.
(4) Certain debentures and guaranteed or preference stock of British Railway Companies. Debentures, etc., of Indian Railways.
(5) A miscellaneous group, comprising the stocks of some Metropolitan Public Boards, etc., of various

[1] See, for England, the Trustee Act 1925 and, for Scotland, the Trusts (Scotland) Acts 1921 and 1926.

(£ 000's omitted)

	£ 1928		£ 1929		£ 1930		£ 1931	
Total issues of industrial Companies .	251,518	69.3%	198,556	78.2%	77,851	35.2%	41,302	46.6%
As above : Add issues of railway, gas, and water Companies . . .	21,611	6%	16,899	6.7%	43,708	17.9%	6,246	7%
	273,129	75.3%	215,455	84.9%	129,559	53.1%	47,548	53.6%
Loans of Governments, municipalities and public boards (not including loans for conversion or redemption).	89,390	24.7%	38,294	15.1%	114,600	46.9%	41,118	46.4%
	362,519		253,749		244,150		88,666	

Companies and Commissioners for water supply, of the Agricultural Mortgage Corporation (added by another Act of Parliament), and of the Bank of England and the Bank of Ireland.

Among trustee securities, issues of the British Government—other than issues of bills and the like in the " money market "—are made directly to the public, and not by way of offers for sale or placings. The usual commission of one quarter per cent, allowed to bankers and stockbrokers forwarding applications, may amount to a large sum ; for the issues are usually of considerable amounts at a time. But the expenses of the issue are a much smaller proportion of the sum raised than in the case of Company shares or debentures. The prospectuses are concise, merely defining the terms of the issue and stating how the stock may be applied for. Municipal, Colonial and Dominion securities are also usually issued directly, though some smaller issues are " placed." The prospectuses contain some information as to population, public debt, rateable value of the municipality, etc., but, not being subject to the legal provisions applying to Company prospectuses, they do not usually mention underwriting contracts. It is probably safe to estimate the expenses of such issues in England, including underwriting or profit on placing, as a margin of not more than two per cent between the amount received by the borrowers and that paid by the public.

There is one point worth attention as regards Colonial and Dominion issues. Colonial issues are all made through the office of the Crown Agents for the Colonies, acting as financial agents for the Governments concerned, subject to the general supervision of the Colonial Office. They are moderate in amount and, although the funds of the United Kingdom are not usually[1] liable in respect of such issues, the

[1] Certain loans of colonies and other dependencies (e.g. Mauritius, the Nyasaland Protectorate, the mandated territory of Palestine, etc.) as well as some obligations of the Governments of Northern Ireland and of the Irish Free State, are guaranteed, in whole or in part, by the British Government under special Acts of Parliament.

issues are made on terms nearly as favourable as British Government issues. Stock of the Government of India, though not, of course, issued through the office of the Crown Agents, is, for good or for ill, sufficiently under home tutelage to enjoy a similar status. It is, in fact, listed by the Stock Exchange under " British Funds, etc.," not under " Dominion, Provincial and Colonial Government Securities." Dominion stocks, on the other hand, are issued at the discretion of the Dominion concerned, and the market may think that the Dominion has borrowed too much or that its Government is likely to be unable or unwilling to pay interest and capital. The result is that Dominion issues in general are made on terms rather less favourable to the borrower than Colonial issues. Occasionally the difference becomes considerable—and indeed in some cases, especially in that of Australia, the burden on the Dominion is extremely heavy. I am not suggesting that the amount borrowed is excessive : much of the money is spent on productive works and in the development of State enterprise.[1] But I do suggest that the direction of such large sums of money should not be left entirely to the combined discretion of the borrowing Governments and of a number of brokers and financiers in London, who are concerned with their own profits on successful issues and not with the effect of such issues on the lending community—the people of Great Britain.

Overseas Issues. The point becomes even more marked as regards the next class of issue that I have in mind. These are " overseas issues," not being trustee securities. I mean by an " overseas issue " an issue which results in the transfer of capital abroad, to be followed by the payment of interest from abroad to this country. Such issues may be divided into three kinds—issues by Companies, issues by Indian, Colonial and Dominion municipalities and public

[1] On the 30th June, 1932, the public debt of Australia was about £1,188 million. Some £744 million had been spent on productive works. The amount required annually for the service of the debt was £10 9*s.* 7*d.* per head of the population, as against a corresponding figure of £2 3*s.* 4*d.* in agricultural Denmark.

boards, and issues by foreign Governments, municipalities, etc. So far as the machinery of issue is concerned, the first kind does not differ from other Company issues already described, and the second kind is substantially similar to corresponding Government issues. The third kind, foreign loans, we have already noticed as being particularly associated with " issuing houses " of the merchant banker type.

But the point as regards all three kinds is that the control over the amount of money raised by overseas issues and over the use to which it may be put is limited in character. Such as it is, it operates from time to time through the Treasury and the Bank of England. The Treasury may in practice forbid all foreign issues for a time or the Bank may ask for such and such an issue to be postponed. There are no formal powers. The larger " issuing houses " keep the Bank informed of the issues they propose to make and obey the Bank's informal direction : or the Treasury may let its wishes be publicly known. This form of control is not complete. An issue of shares or debentures by some combine —concerned perhaps in soap, petrol or chemicals all over the world—may result in a considerable movement of capital from one country to another. Moreover, the movement of investors' money takes place in other ways than by new issues. The Treasury or the Bank may discourage the issue of a loan for some foreign use ; but money which already is abroad, or can be transferred there, may be used in buying stock abroad and the stock may then be transferred to this country—with a result hardly distinguishable in practice from that of an issue of a foreign loan here. In the second place, the control is the control of financiers—directed more to the movement of money than to the use to which it may be put. It is only in recent years that the control has been exercised with a view to preventing the lending abroad of amounts greater than the country can really afford on the balance of trade. Even for that purpose the control seems still to be of a rather experimental character. Another important consideration in the minds of the financial authorities is to exercise

control so as not to interfere with the public issues of the British Government. " If the British Government has an operation in view it gives us (the Bank of England) the opportunity, without disclosing the fact in any shape or form, to exercise some sort of restraining hand so that the operations of the British Government will not be prejudiced by other people coming out and blocking the way," that, in characteristic bankers' English, was the evidence of a representative of the Bank of England before the Macmillan Committee. But what is really needed, I suggest, is a control more closely directed to the needs of industry and trade in this country. The money raised by an " overseas issue," whether it be by a Company or by a foreign Government, has to be remitted in effect by a transfer of goods or services. Money may be raised by the Ruritanian Government to pay for locomotives purchased in this country : there were many loans of such a character before the War. Such a loan may be immediately useful in providing employment in this country, and its further effects may be to improve the trade of Ruritania, both internally and so far as this country is concerned. Or the loan may be used to provide a balance for foreign exchange as cover for the currency of Ruritania. Or again, the loan may be used to buy textile machinery for operation by the ill-paid workers of Ruritania. Clearly the effects of those three loans, immediately and on a longer view, will be different, and though the transaction from a monetary point of view may be roughly similar in each case, the results cannot really be estimated only from the financial character of the operation : the most useful form of control would be one operated in conjunction with a control of this country's exports and imports. It is interesting to see that the introduction of the tariff system in this country has resulted in a tendency to control the uses to which foreign loans may be put, as well as their amount : the recent Danish loan (May 1933) seems to have been an instance. This chapter is hardly the place to discuss the difficulties of such control, as long as exports and imports are regulated merely by tariffs.

Reparation Loans and the Like. Before I leave the subject of "overseas" loans, I ought to mention one important type of issue. Before the War the largest class of foreign borrowers in this country consisted of agricultural countries with comparatively sparse populations or at any rate well able to use the money in developing transport or establishing industries. Australia, Canada and the agricultural countries of South America are obvious instances. The Peace Treaties at the end of the War resulted in the assessment of colossal paper debts, which the defeated countries were completely unable to pay on the ordinary balance of trade. In the same way very large paper liabilities were incurred between one country and another during the War and shortly after it as a result of efforts to carry on the War and of attempts to make good the damage caused by the War. Political pressure to extract these fantastic debts resulted in the debtor countries borrowing by public issues in the creditor countries money with which to meet the interest payments on War debts and reparations. In some cases the smaller countries found themselves ruined by the War and the financial and territorial stipulations of the Peace Treaties. In those latter cases loans had to be issued under the auspices of the League of Nations—with a view to securing better credit in foreign markets, and—in one instance at least, that of Austria—guaranteed by the larger Powers. But the most important of this type of issue were those of the larger countries. Germany appeared as a borrower in every conceivable form and in every conceivable country. The German Government borrowed, German provinces and municipalities borrowed and German industrial enterprises borrowed. The list did not end there. Under the auspices of the League of Nations or on their own account, Austria, Belgium, Bulgaria, Czecho-Slovakia, Danzig, Estonia, France, Greece, Hungary, Poland, Roumania—in fact practically every country concerned in the War, as victors or as vanquished—had to borrow from some other country in order to pay for those expensive five years. The loans were issued principally in the United

States and in this country—to some extent too, in France, Holland, Switzerland and elsewhere. For the first time this country borrowed abroad by making issues in the United States. The United States, though the creditor of the world, has transferred a large part of the loans so raised by selling the dollar bonds to London : the American public is tired of foreign investments.

Issues of this kind have had some effect on the general status of foreign loans in London. As we have seen, the loans of a foreign Government or municipality are not trustee securities. In many instances they always have been and in others they have become what, from the investor's point of view, may be tersely described as " giddy gambles." The yield of a security at its market price naturally reflects the credit of the borrower. If there is some uncertainty as to whether the borrower can or will go on paying interest and ultimately repay capital, the uncertainty is reflected in a lower price for the issue and a higher yield on the bond. If the borrower wants to borrow again, he will have to pay the sort of price represented by the yield on his existing bonds. At the moment of writing (May 1933) the yield on British Government or British municipal stocks is about $3\frac{1}{2}$ per cent. Dominion and Colonial securities yield about $3\frac{1}{2}$—4 or $4\frac{1}{2}$ per cent. Stocks of Dominion or Colonial municipalities, not being trustee securities, yield about 4–5 per cent. The difference in the case of foreign stocks is striking. Scandinavian countries, which borrow comparatively little and have a habit of paying their debts, can borrow on a basis as good as or better than that of a Dominion. The Argentine, an extensive borrower and comparatively unaffected by political considerations, can borrow on a 5—6 per cent basis. But the political issues include such figures as the following : Austria 12 per cent, German issues between 10 per cent and 15 per cent, Danzig, Estonia or Poland all about 10 per cent, Hungary up

[1] Compare the following figures (Midland Bank) of foreign Government issues in the U.S.A. : 1928, $586 million ; 1929, $120 million ; 1930, $548 million ; 1931, $41 million ; 1932, $26 million.

to nearly 20 per cent. Such yields indicate clearly that the borrowers are in extreme difficulties as regards paying interest, and in fact many other political borrowers, such as Bulgaria, Greece and Roumania, have already defaulted in whole or in part.

The Stock Exchange. I have referred above to the issue of new capital and of loans by Companies and by Governments, colonies and municipalities, etc., in Great Britain and overseas. The classification is not exhaustive ; but before looking at other types of investment, it is convenient to consider the purpose and the machinery of the Stock Exchange.

The " Stock Exchange " usually means the London Stock Exchange. There are various provincial Stock Exchanges, working on the same lines as the London Stock Exchange but doing a smaller business. The London Stock Exchange is an association of members governed by an elected committee. The members hold shares in the association, which owns the Stock Exchange buildings. They are usually called " stockbrokers," although for purposes of business they may be divided into brokers and jobbers. Most of the business is carried on by partnerships of a few jobbers or of a few brokers, as the case may be : they need to employ a considerable staff of trained clerks and to occupy offices, usually near the Stock Exchange buildings in Throgmorton Street.

Brokers (stockbrokers, in the strict sense of the term) make it their business to act as agents for persons wishing to buy or to sell stocks and shares. They earn money in the shape of commissions on purchases and sales—at rates which are in practice customary rates, subject to the Rules and Regulations of the " Committee for General Purposes." " Jobbers " are dealers in the stocks and shares. They buy from the public through brokers, hold a supply of stocks and shares and re-sell to the public through brokers. They make their commission out of profits on the difference between the two transactions. They quote, to brokers, a

buying and a selling price for stocks, in which they are prepared to deal. The difference between the two prices will be smallest in the case of stocks which are largely dealt in and not subject to great fluctuations of price : it will be large if the dealings are few and, for that or some other reason, the jobber exposes himself to the risk of having to hold the stock for some time or of finding it change considerably in market value.

Stock Exchange Transactions. Some British Government and similar securities are delivered and paid for as soon as a bargain is made on the Stock Exchange for their purchase or sale. But most Stock Exchange transactions are not made for immediate settlement. Mr. A instructs his brokers Messrs. Shock & Stare to buy him £100 3½ per cent War Loan. They receive his order on the 18th April and their clerk goes to that part of the Stock Exchange which is called the Consol Market : jobbers usually specialise in one type of security and have their " pitch," as it were, in the place where that type of security is dealt in. The clerk asks the jobber for a price and the jobber quotes, say, " $100\frac{1}{4}$–$100\frac{3}{4}$ "—meaning that he will buy at the lower price or sell at the higher. That is the official difference on War Loan and similar stocks, but in practice the jobber, for a stock having such a free market, will probably quote a smaller difference. War Loan being such common currency, the clerk is unlikely to get a better bargain out of one jobber than out of another ; so he concludes the bargain in a notebook with the jobber. Thereupon Messrs. Shock and Stare become personally liable to the jobber to pay him the agreed price, say, £100 15*s*. for £100 3½ per cent War Loan. The jobber has no concern with Mr. A, except that Messrs. Shock & Stare will give him Mr. A's name, so that the stock may be duly transferred. Messrs. Shock and Stare are entitled to be put in funds by Mr. A, in order to pay for the stock which he has instructed them to buy. Mr. A will have to pay them the price of stock, their commission of ⅛ per cent and any stamp duty that may be

payable on the transfer : there is, however, no stamp duty on War Loan. Messrs. Shock & Stare will send Mr. A a contract note, stating the above bargain and charges : Mr. A will pay them that amount and a small stamp duty on the contract note itself.

Now, suppose that on the same day Mr. B instructed Messrs. Shock & Stare to buy something more exotic than 3½ per cent War Loan—let us say £100 Debenture of the Whitechapel and Bow Railway. What differences would there be ? The clerk may have to hunt further for a jobber with some of those debentures on his books : for there is about £1,920 million of the 3½ per cent War Loan and £359,000 of the railway debentures. The jobber, if and when found, will quote a wider difference between his buying and his selling price : he is quite likely to have had those debentures for some time. The official difference on the 24th April, 1933, was 5 per cent (96–101) as against the ½ per cent of the War Loan. Lastly, if the bargain is concluded, it will be a bargain to pay for and to deliver the debenture on the next " settling day." Settling days occur about every fortnight—and we need not trouble with the various formalities which take place on and about them. Mr. B's name will not be given to the jobber until just before the settling day—or, if between the date of the bargain and the settling day Mr. B has re-sold the debenture to Mr. C, the jobber will only get Mr. C's name and will never hear Mr. B's at all.

Speculation. But really, you know, that is an almost idyllic picture of the Stock Exchange. The prudent investor, effecting small purchases of trustee securities, is dear to the stockbroker from a sentimental point of view—for of such ought to be the Kingdom of Mammon—but he is not sufficient to provide our daily bread. The speculator, on the other hand, merits a monetary rather than a sentimental affection. The commission on the ordinary shares which he will buy is higher than that on War Loan or railway stocks. Moreover, he may buy that which he does not want with

money which he has not got in the hope of re-selling at a profit—and if, on settling day, the money is still not there and the profit is equally absent or insufficient, Messrs. Shock & Stare will charge him a " contango " as the price of carrying that bargain over until the next settling day, in the hope that meanwhile the shares may rise. Or, with even greater recklessness, he may sell that which he has not got in the hope of being able to buy at a lower figure before he has to deliver it : in that case, if on settling day he has not got the stock which he is due to deliver, Messrs. Shock & Stare will probably be able to arrange to carry over his bargain until the next settling day and this time they will call their commission a " backwardation." The machinery is indeed curious ! There are other ways of doing it. The speculator may be able to buy an option to " call " for some particular stock at a particular price, or to " put " that stock on to some buyer at a particular price—or if he pays more for his option, he may have an option to " put " or " call "—that is to say, either to deliver or to buy the stock. With his " put " and " call " option he will be able to make a profit if the stock has fluctuated sufficiently either way between the date of his option and settling day. It is to be noted, however, that neither the perfection of this machinery nor the curious names of its parts prevent a large number of gentlemen on the Stock Exchange earning a substantial income out of the investing and speculating public.

Let us now proceed to Stock Exchange zoology. A " bear " is a person who desires the value of a stock to fall, in order that he may buy it—probably in order to deliver it, when he has sold it beforehand. A " bull " is the opposite —someone who desires the price of a stock to rise, in order that he may make a profit by selling it. A " bear account " in a stock means that there are a number of " bears " of it —and, if it is known that a number of people have sold that which they have not got, those who have got it will endeavour to make them pay through the nose for it—so that the existence of a " bear account " tends to raise the price

of a stock. A " bull account " is the opposite and has the opposite effect. A " stag " is someone who subscribes for a new issue, which he does not want and probably cannot pay for, in order to pay the first instalment of the price and then re-sell the partly paid stock at a profit. There may be other fauna—but I do not know of them.

The mere existence of such machinery for speculation shows that the stockbroker makes his living as much out of speculation as out of investment : indeed the line between the two is not always easy to draw. In practice the jobber is bound to speculate to some extent, because his profits depend on his choice of stock to be put on his books and on the prices at which he offers to buy or sell. He acquires a considerable knowledge of the stocks in the market in which he deals, but of course it is a knowledge from a special point of view—that of the person who is concerned with the immediate trend of prices. The broker has no such need to speculate : he may make his living out of commissions. Also he may be engaged, as we have seen, in making or sponsoring new issues, and is, in the case of a large firm, likely to make as much money out of that as out of serving clients as a broker. With whom does he have to compete ? In the first place, of course, with other stockbrokers. The Stock Exchange does not allow its members to advertise and he must get his clients by personal connections. In the second place, he has to compete with the " outside brokers " —that is to say, limited Companies or persons who advertise their willingness to deal with the public in stocks and shares. Such concerns are more often principals than brokers : they themselves buy from or sell to their customers. In theory they might serve the useful purpose of a check on the Stock Exchange. In practice the amount of business conducted quite honestly by outside brokers has not been large enough to serve such a purpose : and in too many cases their transactions have been either nothing but gambling or actually fraudulent.

Thirdly, the stockbroker has, in a sense, to compete with the Banks. More and more small investors consult their

Bank manager as to investments and make them through the Bank. In such cases the Bank employs stockbrokers and shares the stockbrokers' commission with them. The practice, while bringing business to the Banks' brokers, tells increasingly on other stockbroking firms and results in the latter looking more and more to speculation, by themselves or others, for their profits. I should mention that the difficulty of getting enough clients by personal connections leads most stockbrokers to employ " half commission men," often themselves stockbrokers, who bring business to the stockbroking firm, without being partners in it, and share the commission charged by the firm.

The Official List and Leave to Deal. There are, as we have seen, certain requirements of the Stock Exchange (enforced through its Committee) which must be met before leave is given to deal in shares. Some stocks and shares are included in the " Official List " of the Stock Exchange. The remainder, as regards which there is leave to deal, are included in a " Supplementary List." The latter includes, for instance, stocks and shares recently issued—which may later be transferred to the Official List—and stocks and shares of Companies in which the promoters retain control of the concern. The Official List is divided into various classes, in each of which there is also a Supplementary List. I have already indicated incidentally most of the classes—British funds, corporation stocks, Dominion etc. securities, foreign stocks, a large class of Industrial shares and various smaller classes of particular Industrial shares (e.g. rubber or oil), railways, mines, etc. There are, however, two classes which require some special mention.

Insurance Companies and Investment Trusts. The classes I have in mind are those of Insurance Companies and Investment Trusts. Some of the remarks I have to make apply also to the shares of Banks, Discount Houses, etc. Consider for a moment what the business of an Insurance

Company is. If it is carrying on Life Insurance, it receives premia from year to year, invests them and pays out part of the accrued total on the death of the insured person. The total so accrued consists partly of the premia and partly of the interest earned by their investment. The balance not paid out constitutes the profits of the Insurance Company. Of course the Company may be a " Mutual " association and may not retain any profits. But in any case the whole business of Life Insurance depends on the due investment of premia. The sums involved in such investment are very large indeed and are increasing.

Other forms of insurance also depend on investment. No Company can afford to look only to incoming premia to meet its liabilities. The essence of its business is to have invested reserves sufficient to meet a temporary excess of claims over premia. In fact the practice of most reputable Insurance Companies is to pay to their shareholders, by way of dividend, a sum which corresponds roughly with the interest on the Company's investments—without touching on premia. Insurance, if transacted on a large scale and by competent persons, is an extremely profitable business. The result is that the Insurance Companies are professional investors on a large scale.

Side by side with the Insurance Companies there has grown up another class of professional investors in the form of Investment Trusts. These are Companies which issue stock and simply invest the proceeds. In this way a shareholder in an investment trust not only spreads his investment, whatever its amount, over all the securities held by the trust but also knows that those securities are chosen—and changed from time to time—under skilled direction. Another type of trust, which originated in America and is less common in Great Britain, simply holds certain specified shares, so as to spread the risk of its shareholders, but does not change them : it is usually called, for that reason, a " fixed trust," not an " investment trust." In practice, also, investment trusts do a considerable amount of underwriting—or rather sub-underwriting—new issues and

sometimes, alone or in combination with other investment trusts, take up the whole of an issue of capital, there being no public offer.

The distinguishing mark of an Investment Trust Company is that it does not distribute to its shareholders any profits that it makes by buying and selling stock or shares : it only pays dividends out of the interest or dividends which it receives. The results are rather peculiar. Take, for instance, the Investment Trust Corporation Limited, a Company founded in 1888. In 1930 that Company had issued £2,000,000 four per cent and £1,000,000 five per cent debentures : its share capital was £1,950,000 four per cent preference stock and £1,300,000 deferred stock. That makes a total loan and share capital of £6¼ million. In 1930 the Company, after receiving enough to pay the fixed interest on its debentures and on its preference stock, had a sum left over, representing 26⅜ per cent on the deferred stock : it actually paid a dividend on the deferred stock of 20 per cent. The 6⅜ per cent., received but not distributed to the deferred stockholders, was carried forward and constituted a form of reserve—money saved, as it were, by the Company. The Company showed in its accounts further reserves amounting to £1,769,389. These reserves no doubt consisted largely of money received by the Company as income but not distributed as dividend. In addition, however, the Company had " hidden reserves " amounting to £1¾ million. These were really the results of successful trading in stocks and shares over a long period of years. The Company would buy £1,000 worth of X Stock at 135 and sell it at 145, reinvesting the proceeds in Y Stock at 145. It would sell the Y Stock at 157 and reinvest in Z Stock—and so on. But the accruing profit would be used to write down the value of the stock. The original X Stock cost £1,350. When it was sold, the Y stock was taken on the books at £1,350, although in fact it cost £1,450—and similarly with the transfer from Y Stock to Z Stock, and so on. The result was that the Stock on the books in 1930 appeared at a much lower figure

than it was actually worth, the difference representing the profit on previous transactions.

The above method of management has various effects. Investment Trusts handle large sums of money and can easily afford the best advice in the difficult matter of investment. In consequence they have been very " successful " in the long run, although many of the earlier ones were involved in the Baring crash and many others were in difficulties during the War. But on the whole they have provided a very real means of collective saving. In the second place, because they have been successful, their number and their resources have increased. They have become quietly, but increasingly, influential. Moreover they depend obviously on personal management and direction, so that a man who has successfully run one Investment Trust finds it easy to promote others or to become associated with them. In practice the Investment Trusts fall into groups, associated with the names of their chairmen or managers. The latter are often financial houses—merchant bankers, issuing houses or large commercial concerns. In Scotland, where Investment Trusts really originated, their managers are often firms of accountants and there is an almost traditional association with Writers to the Signet (Scottish lawyers). This has meant a new form of financial power—that of a sort of colossal shareholder, investing other people's money and doing it as a business. Thirdly, Investment Trusts have placed their money abroad to an extent impossible for the private investor. They have spread their risks not only between different classes of stocks and shares in this country, but also between one country and another. I have referred to these Companies at some length, because they provide a convenient illustration for what I have to say later about organised investment.

Investment in Land: Building Societies. Before I leave the subject of professional investors, I ought to mention investment in land and Building Societies. Considerable sums of money are invested in mortgages on land and

buildings. Most of the leading Insurance companies have large amounts invested in this way and some of the Investment Trusts began as companies for lending money on mortgage. On the whole this form of lending tends to decrease in amount with the development of the credit system in other directions. It is perhaps significant that there are English companies still concerned in lending money on mortgage in agricultural countries abroad, but that such companies operating in England are comparatively few. The Banks, however, have proved so unsuitable for making long term loans to agriculture that a semi-public corporation for doing so on mortgage has recently been instituted. Loans on mortgage by private individuals amount to very considerable sums, but there are remarkably few statistics about them available. Most of the business is probably effected through solicitors or other private agencies. Building Societies represent a rather different form of investment. They are not limited companies but societies constituted under special legislation. They raise considerable sums of money from small investors. They issue redeemable shares and their shares are not dealt in, by way of investment or speculation, on the Stock Exchange. They lend the money so obtained to persons who want to build or buy a house, their security being a mortgage on the property. Their loans are paid back by instalments, which include interest. On the whole they have fulfilled a useful, though limited, function in assisting people with limited means to buy houses instead of continually paying rent. On the other hand, their activities have impeded progress in many ways. They have been, for instance, an indirect encouragement to the private builder in his competition with the building activities of public bodies, such as municipalities. There is, I suggest, little doubt that the functions of Building Societies could be carried out in a more convenient and elastic form by such institutions as the Birmingham Municipal Bank, which pays interest on small deposits and uses them to finance purchases of houses from the Borough and other persons.

Moreover, so far as concerns houses up to £1,200 in value, local authorities have power[1] to lend money to the resident to enable him to buy his house. Surely, if that power were fully exercised and supplemented by the development of municipal banks, housing could be planned, financed and controlled through the public authorities, who are in so many respects already responsible for it.

Some General Comments. I have tried to give a rough description of the machinery for collecting capital in this country and of some of the arrangements for its transfer. It is perhaps convenient, before making a comparison with arrangements abroad for similar purposes, to notice some peculiarities of the system in this country.

It is clear that the amount of new issues in any year, even excluding issues for the purpose of converting or redeeming former issues, does not represent the amount of savings in that year. In a period of rising prices—or in any period of Stock Exchange activity—subscriptions for new issues will be to a large extent " stag " subscriptions—money used to subscribe for stock which it is intended to re-sell immediately. It is true that such stock is ultimately absorbed by people who mean to hold it ; but at such times there is always a floating supply of stock carried on borrowed money. As regards new issues, " stags " will finance their speculations with borrowed money and at the same time borrowed money will be used to carry over bargains on the Stock Exchange. When the " slump " comes, the result is a large and often sudden reduction in the paper value of stocks subscribed for and dealt in. This fall does not mean that the savings of the community have been reduced by the amount of the fall. It represents, to some extent, the disappearance from the market of borrowed money, which reappears in the form of an increase in bank deposits : for when the slump comes, the investor prefers to keep his money safe in the bank or in such security as Government loans instead of attempting to use it in Stock Exchange speculation or

[1] Small Dwelling Acquisition Act, 1899, as amended.

industrial investments. So far, however, as the fall in Stock Exchange prices is not reflected in a corresponding increase in bank deposits, it represents mere deflation—the revaluation at a lower figure of the same assets.

In this connection the position of the banks is a peculiar one, as regards the investment and transfer of capital. As we have already seen, the market for foreign loans is to some extent controlled—partly because the need for control is so obvious, partly because of the accidental influence in the foreign market of a few large issuing houses, which are also merchant bankers. The machinery of control is ready to hand in the co-operation of these issuing houses and in their dependence in practice on a close connection with the Bank of England. The market in British Government and municipal securities is also to some extent controlled by the Treasury and the Bank of England ; but the control is a financial control, operated in accordance with financial requirements and directed, not by any consideration of the use to which the money is to be put, but by the financial policy of the Treasury and the Bank. Municipal issues, for instance, may be discouraged, so as to avoid their competition at the moment with a projected Government loan. Generally speaking, municipal and other similar securities have to be issued in the intervals of Treasury operations in the market. There is little or no regulation of home industrial issues, unless from time to time the Treasury may wish to stop all capital issues other than those for Government purposes. But there is no control as a rule either over the amount of home industrial issues or over the use to which money so raised may be put. Even if the banks have evolved, or are in course of evolving, some rudimentary scheme of allotting their own advances between one industry and another, it is no function of theirs under the present system to control public issues so as to conform with any such scheme. Neither they nor the Government nor any other public authority attempt to exercise any such control. It is quite extraordinary that the obvious public duty of co-ordinating issues of industrial

capital should be completely neglected. An issuing house might, and should, fulfil important functions. It carries on its business, however, simply as a matter of money-making. Only too often it is a mushroom concern, formed for the purpose of enriching a few people in connection with some issue and destined to disappear as soon as that purpose has been accomplished. Since the banks assume no responsibility and there is no one else in a position to assume it, it is not surprising that in this country Parliament has been particularly anxious to safeguard the investor by stipulations as to the contents of the prospectus and the promoters' responsibility for it. It is also not surprising that those legislative precautions have been completely ineffective to prevent large losses by individual investors, happening, no doubt, continuously but most obviously on the transition from " boom " to " slump." After all, issuing houses, stockbrokers, the Stock Exchange and all the too numerous persons concerned in the issue and transfer of capital are out to make money in the process and experts in doing so. Though brokers may be honest and concerned to preserve their clientèle, and though the Stock Exchange may wish to preserve a general respectability in its " Official List," the individual investor in the long run has not much chance. He has to pay for the whole system of financial parasites.

At the same time the money of the individual investor does not serve to finance the speculative activities of the new issue market and the Stock Exchange. Obviously the investor, as such, does not finance the " stag "—or the jobber on the Stock Exchange, who has to carry stock on his books. In this country speculation and the Stock Exchange, so far as they are not financed out of individual capital, are mainly financed by bank loans. To some extent, these loans are made directly by banks to speculators : but also, to a large extent, they are made by banks to brokers and through brokers to the public. Especially in a period of speculation, there are very numerous transactions in which a broker buys stock to be held by his clients and re-sold after an interval. So far as the Stock Exchange is concerned, the

transaction will be met by cash payments, but, as between the broker and his client, the client will carry the stock without paying the broker. The broker will take a small parcel of some other stock from the client as security and will charge him interest on the money required to carry the stock which is intended for re-sale. On re-sale the client will settle the interest and the difference between the purchase price and the re-sale price. For instance, take some British Government stock in which the usual Stock Exchange facilities by way of " contango " are not available. The fluctuations of such a stock will be small and anyone who wishes to speculate in it will require to buy a substantial quantity. On the other hand it may cost little to do so. If there is plenty of money available on short loans at low rates, the accruing interest on the stock itself may cover the interest on the money borrowed to carry it : the stock, as the phrase goes, will pay for itself. In the same way the broker who arranges " contango " facilities, and the jobber who carries the stock on his book are doing so, in Great Britain—directly or indirectly—upon bank loans, secured by the deposit of stock. It follows that the banks, while they assume no responsibility for issues of capital or for the stock market, have in practice a considerable control over such things. They can alter the whole course of transactions on the Stock Exchange by contracting or expanding the advances which they are prepared to make for Stock Exchange transactions. The comparatively small amount of direct advances from the public to the Stock Exchange—by way of loans to brokers or the like—put the banks in this happy position of control without responsibility. Notice too that, at any rate to some extent, this form of financial control is exercised by the joint stock banks, while such direct control as there is over the new issue market is exercised by the Bank of England or through the Bank of England by the Treasury.

I cannot help feeling that the irresponsible position of the banks and the lack of control over the large volume of industrial issues, with the losses which the private investor

has suffered in consequence, are partly responsible for the wide development in England of Insurance Companies and Investment Trusts. It is surely no mere coincidence that Life Insurance is most successful in the countries in which there is the greatest speculative activity in stocks and shares. Life Insurance is a method of " safe " saving : so are investments in Building Societies : those forms of saving have grown largely in Great Britain in recent years. The Investment Trust is another comment on the losses of savings in the stock market. Investment Trusts are more fully developed in Scotland than anywhere else : the attachment of the Scot to his savings is proverbial. None the less an Investment Trust, though it may serve to protect its shareholders from minor mistakes, is no protection against the major fluctuations in the level of security prices. The history of the earlier Investment Trusts in the financial crises of the '90's and of all Investment Trusts during the War and in the present " depression " shows clearly the limits of the protection which they can afford.

Some Foreign Countries. For purposes of comparison I now propose to refer to some foreign countries. I do so, not in order to describe in detail their arrangements for the investment and transfer of capital, but in order to call attention to various points in which their systems differ from the English system : and again, for the moment, I do not suggest that the system of one country is in itself better than those of other countries or could be adopted in them without change. It is even clearer abroad than it is in England that the investment and transfer of capital is an integral part of the financial system, that no very sweeping change can be made in that part of the system without affecting other parts, and in particular that capital investment, whatever its form, is found to be so closely connected with banking that its machinery has fitted itself into the banking machinery of each country and that any change in it must, intentionally or unintentionally, involve corresponding changes in banking practice. Let me begin with the

United States, where some inheritance of the English tradition and considerable legislative interference with the development of the banks would lead one to expect a more independent investment system than actually exists.

U.S.A. A valuable source of information as regards the methods of issuing loans and the commissions and profits made in the process is the report of the inquiry into the sales of foreign bonds in U.S.A., held by the Senate Committee on Finance between December 1931 and February 1932.[1] The classic procedure in the issue of such a loan begins with the outright purchase of the loan from the borrower by one bank, the " managing bank." Let us take the case of the Dawes loan of $110 million in October 1924. The managing bank, J. P. Morgan & Co., bought at 87 per cent. They then formed an " originating group " of themselves and nine other banks or dealers, to whom they sold the loan at 87¼ per cent. The originating group then organised a " banking group " or " underwriting group " of 146 firms, who accepted participation in the loan at a price of 87¾ per cent. This group committed itself to purchase the bonds with a view to their re-sale through a " selling group." The " selling group " consisted of no less than 1094 members, mostly dealers, who did not commit themselves personally as members of the group to take up any bonds but acted as selling agents, buying from the " banking group " at 89 and selling to the public at 92. The result of these operations was a spread of 5 points between the price paid by the managing bank and the price paid by the public. That spread was divided into ¼ point for the managing bank, ½ point for the originating group, 1¼ points for the banking group (underwriting group) and 3 points for the selling group. Some bankers were members of all three groups. The National City Co., for instance, bought $16½ million worth of the loan as a member of the originating group, retained $10 million

[1]Cf. *Bankers' Profits from German Loans*, Kuczynski, Brookings Institution, Washington D.C., 1932.

worth as a member of the banking group and finally retained or sold $8 million worth as a member of the selling group. Its net profits, after allowing for overhead expenses, were $367,539 : the profits of J. P. Morgan & Co. were $865,307 as managing bankers and as members of the originating group. The total gross profits of issue, represented by the spread, were 5½ million dollars.

That is not quite the end of the story. The borrower pays certain charges—for engraving the bonds, for expert advice to the managing bank on German law, for listing on the Stock Exchange, and so on—the amount of which is not available as regards the Dawes loan but in the case of smaller loans was 1 per cent or more.

The Dawes loan was for a large amount. On smaller loans the spread was greater, amounting, for instance, in the case of $3 million bonds of Leonhard Tietz, the German retail store, to 14 points between the 83 per cent paid to (not by) the managing bank and the public issue price of 97. But, as the public demand for foreign bonds increased, competition between the banks became keener and the spread diminished. There was also a smaller spread for short-term loans. Most of the long-term loans issued in the years 1924 to 1926 showed a spread of between 5 and 9 points, while the average spread on those issued during the period 1927 to 1930 was between 3 and 4 points. In loans smaller than the Dawes loan, the originating, banking and selling group were all smaller. For instance, in seven loans each of $10 million, there was often no " originating group," but only a managing bank, while the average membership of the banking and selling groups were respectively 42 and 205.

It is interesting to observe the functions of the various groups mentioned above. The originating group in effect divides with the managing bank responsibility to the borrower for the loan. If, as frequently happens, the managing bank can carry that responsibility on its own shoulders, there need be no originating group. The bank and that group, if it exists, face, as it were, towards the borrower :

and their expenses are the expenses of those who negotiate with the borrower—commissions, for instance, of " 1 per cent paid in Europe to the agent who secured the loan for us " and " a quarter per cent to the leading bank in Switzerland in helping to secure the loan."[1] The banking group or underwriting group relieves the originating group or managing bank of the risk of the issue. There was evidence before the Senate that this underwriting group frequently did not know the terms given to the actual borrower by the managing bank and relied for its information on what the managing bank chose to tell it. The selling group effected the actual sales. Its commission was larger than the underwriting commission of the banking group, although it assumed no personal responsibility. It often included the managing bank and members of the other groups, but it was itself a more numerous body, " of which banks and bankers are really a minority, the bulk of them being distributing houses all over the country."[2] These distributing houses or " investment bankers " sell direct to their own clientèle or employ bond salesmen for the purpose, working on a commission of about a quarter per cent.[3] There is a prospectus, but it seems to play a much less important part than in England.

The procedure described above is not, of course, universal —even among the class of bonds to which I have referred. But it is sufficiently typical to serve as an illustration of the more important differences between English and American practice. In the first place, the procedure I have described results in an offer for sale : direct issues are less frequent and " placings," though they occur, are not so important in number or quantity as offers for sale. But the offers are not so similar as English offers to issues nor subject to the English statutory precautions. In the second place, the number, the variety and the commissions of the financiers

[1] Evidence of Mr. Speyer (Speyer & Co.) as regards $6 million loan of the City of Berne.

[2] Evidence of Mr. Otto Kahn.

[3] Evidence of Mr. Granberg.

engaged in the issue are larger than in England, where, as we have seen, one issuing house of merchant bankers (partly on their own account and partly by dividing their commission with sub-underwriters) would have performed all the functions of the American groups other than the actual selling. In the third place the American banks through their affiliated companies take, not only as regards foreign bonds but as regards other issues, a greater risk and responsibility than the English banks—at any rate, than the English " big five " joint-stock banks. The companies principally concerned with the foreign loans under inquiry, as managing banks and as members of the various operating groups, included, for instance, the National City Co., the Guaranty Co. of New York and the Chase Securities Corporation, companies which are—or are affiliated to—leading American joint stock banks. With the increased share so taken, the profits of the banks are larger—so large as to seem to English eyes quite disproportionate. Also the issue of loans goes with other banking business, involving short term credits and refunding operations which mean further profits to the banks concerned. In the fourth place, American stockbrokers play a different part. There are not one or two brokers to the issue, as in England, but a number of brokers effecting individual sales to various clients and in various areas. There are no corresponding persons in England. Brokers here may make recommendations to their clients, but rather in the capacity of the clients' brokers than in that of selling agents. The prospectus in England is consequently more important. One result of the American system is that the average individual allotment of each issue seems to be smaller than in England. Of the Dawes loan, for instance, more than half was retailed in parcels of between $100 and $5,000 and less than a third in parcels of more than $10,000.[1]

I have no space to describe in detail the operations of the New York Stock Exchange, but there are one or two

[1] Dwight Morrow, *Who Buys Foreign Bonds ?* Foreign Affairs, January 1927.

points that call for notice as regards the financing of dealings there. The amount of speculation in boom periods is notorious. It is in the circumstances rather remarkable that settlements of purchases and sales are not fortnightly, as in London, but daily in respect of the transactions of the previous day : Friday and Saturday are settled together on Monday. A seller may " borrow " stock for delivery, delaying his actual purchase in the hope of a lower price ; and a buyer may of course borrow money. Stock Exchange speculative purchases are mainly financed by brokers' loans, made by the broker to the client at call. Loans on call of sums over $5,000 carry such interest as the lender can exact and the borrower will pay. The brokers in their turn borrow from the banks, but only partly on call. The sound proportion is said to be one third of the brokers' advances to his clients borrowed from the bank at call and two thirds on time, for fixed periods or subject to notice. The brokers' call loans from the banks are made on the brokers' personal guarantee, day by day, and constitute a secondary banking reserve, upon which the banks draw frequently to meet their requirements. In fact brokers' loans in New York serve to some extent the purpose served by money market loans in London. Time loans to brokers or others are subject to a legal maximum rate of interest, and the broker profits by the difference between that rate and any higher rate he can charge his clients on re-lending to them at call.

France. Investment in France is so closely allied with some features of banking organisations that a short analysis of the latter forms a convenient framework for describing the investment system. French banks may be classified as follows :

(1) The Banque de France and colonial banks of issue : these are hardly concerned in the present matter.

(2) The large current account banks, corresponding to our " Big Five." They consist of the Crédit Lyonnais, the Société Générale pour Favoriser le Développement du Commerce et de l'Industrie en France, the Comptoir National

d'Escompte de Paris and the more recent Banque Nationale pour le Commerce et l'Industrie. These are branch banking organisations, and they market directly to their clients such issues as French Government stock, bonds of French colonies, departments, towns, railways, etc. : before the war, at any rate, large amounts of foreign bonds were marketed in the same way. Newspaper advertisement plays only a small part in such issues. The bonds are " on tap " at all branches of these banks over a considerable period; and though, so far as I know, no figures are available, I should expect the proportion of small subscriptions to be higher than in England or America.

(3) Two groups, known as "Banques d'affaires" and " la Haute Banque "—which have some resemblances to our merchant bankers.

Of these groups la Haute Banque is the older. It consists of about seven private banks,[1] of which the largest is Rothschilds, all founded before the middle of the 19th century : one or two others might be added. None of them has branches and, in general, none of them accepts ordinary current accounts. Their clients are the large capitalists, foreign Governments, and such railway and other industrial enterprises as they have themselves founded. They have close relations with corresponding institutions in other countries, and they use the deposits of their clients in merchant banking and in promoting such industrial developments as are of a private character or not yet sufficiently established to be financed by public issues. The conservative character of French investment has led la Haute Banque to play a less important part in financing trade and industry that the corresponding merchant bankers have played in England.

The Banques d'affaires are the result of the industrial development of France since about the time of the Franco-German War. The oldest and one of the most important is the Banque de Paris et des Pays Bas, founded in 1872 :

[1] Hottinguer (1790), Mallet (1823), Vernes (1832), Mirabaud (1822), de Neuflize (1800), Heine (before 1800), de Rothschild (1817).

others are the Banque de l'Union Parisienne (1924) and the Société Centrale des Banques de Province (1911), which serves as a banque d'affaires for the provincial banks. La Haute Banque is represented on the boards of the banques d'affaires ; which have, in fact, largely replaced it in financing industrial enterprises. They provide money, not only in the form of credits, but particularly by taking up shares, the procedure being for the bank to take up the shares on the foundation of a company, to keep them during the period of investigation and development—and with them the control of the company at that stage—and then to raise public money, either by sale of the bank's shares or by increasing the capital and offering new shares to the public. In financing in this way the early stages of an industrial enterprise the bank uses, in the first place, a greater proportion of its own capital than one of the large current account banks would think advisable : the same liquidity is not required. The following percentages of capital and reserves to balance sheet totals illustrate the point :

	1913	Average 1919 26	31st Dec. 1931
Comptoir d'Escompte . . .	13	6½	8
Credit Lyonnais	15	7½	7
Banque de Paris et des P.B. . .	18	13½	18
Banque de l'Union Parisienne . .	21	15½	22½

Secondly the banques d'affaires have to an increasing extent received deposits—usually in substantial sums for fixed periods or on notice—and these deposits are used in their operations. Between 1913 and 1926 the proportion of such deposits to the balance sheet totals of the two banques d'affaires named above rose, in the case of the Banque de Paris from 45 per cent to 78 per cent and in that of the Union Parisienne from 39 per cent to 72 per cent : the respective proportions at the end of 1931 were 70 per cent and 60 per cent. Thirdly a banque d'affaires, when dealing in large transactions, invites the participation of its own large clients and of its banking " friends."

When the time comes to raise money from the public, the shares of the new company are usually "placed" on the Stock Exchange in the same way as in England. Increases of capital by well established Companies are also frequently effected through the agency of banques d'affaires. In such cases a public subscription or offer for sale, on the lines described in the case of English companies, is more usual than a "placing." It is, however, often supplemented (as sometimes in England) by private arrangements ensuring a number of applications by large clients for the shares of the new issue. Sales of industrial debentures or shares "on tap" through the big branch banks are unusual, that method being more generally applicable to the sale of stock of public or semi-public bodies.

(4) There are still a large number of independent provincial banks in France. They may be divided roughly into two classes—the larger regional banks, with a number of branches, and the purely local banks. Of the former some are of considerable importance. The Crédit du Nord, for instance, in 1932 had about one hundred and seventy-five branches and 1,164 million francs on deposit and current account, the corresponding figures for the Crédit Lyonnais (the largest of the branch banks) being 1,450 branches and 14,578 million francs. Even such a local bank as the Banque Piérard at Valenciennes shows 151 million francs on deposit and current account. These provincial banks play an important rôle in the collection and use of capital in France—partly as current account banks, but to some extent as small local banques d'affairs. They go some way to meet the difficulty, common in England, of finding long-term as well as short-term money for provincial, agricultural or industrial enterprises on a small scale. They form a direct channel for the employment of provincial savings.

(5) Lastly, there are certain specialised credit institutions. The most important is the Crédit Foncier de France, an agricultural mortgage bank, the shares of which are dealt

in on the Stock Exchange, but which is otherwise of a semi-public character and subject to State supervision. Its business is to raise money by the issue of bonds, which are treated in practice as virtually Government securities, and to lend it on mortgage. There are also agricultural credit offices (caisses) throughout the country, using public money—but on a smaller scale than the Crédit Foncier. As regards industry, the specialised institutions are in substance banques d'affaires for the industries concerned. They are of recent growth. I may mention the Union des Mines (1923) and the Banque Cotonnière (1927)—which is at present rather a trading bank than a banque d'affaires, but obviously capable of development as the latter.

For the purposes of general comparison I need do little more than mention the Bourse (Stock Exchange). Its domestic organisation has developed in a curious and complicated fashion out of the struggle of seventy official Agents de Change, working on the " Parquet," to maintain their official status and their legal monopoly of dealings in French Government stock against the encroachments of " coulissiers," outside dealers on the Coulisse. The Agents de Change are purely brokers, not dealing with jobbers as in England but finding other brokers whose clients wish to sell that which their clients wish to buy—or vice versa. They may not deal on their own account : the " coulissiers " may and do. On the Parquet there are many " remisiers," bringing clients and sharing the brokerage commission of the agents de change. Such remisiers include conspicuously the large branch banks and the coulissiers. There is a market for cash dealings (au comptant) and a market for time dealings (à terme), with fortnightly and in some cases monthly settlements. Extensive use is made of options—" put " and " call " options, as they would be called in England. The arrangements for carrying over stock are curious, being financed not by bank loans to brokers or to clients but by a class of " reporteurs " which consists of industrial companies, banks, private capitalists and others anxious to use their money for the purpose.

Some days before the settlement the reporteur advises the Agent or Coulissier of the sum he wishes to invest and the Agent (or Coulissier) disposes it among his clients. The Parquet (the guild of the Agents de Change) is collectively responsible for loans made by a reporteur through an Agent. There seem to be no special arrangements for the loaning of stock for settlement.

Germany. At one time in Germany new companies were usually financed by an immediate public issue of shares. It is the more general practice now for one of the banks to play the part of a banque d'affaires in France by subscribing for shares in the first instance and subsequently selling those shares to the public. There is not, however, as much separation of functions as in France between the large branch banks and the banques d'affaires : the former, in Germany, concern themselves with financing and controlling the early stages of industrial enterprise. But the German banks do not seek to retain their interest in companies so financed, except in the cases of other banks and companies of a financial character : they do not, in general, seek to make their profits on industrial dividends but on industrial flotations. In respect of a large undertaking groups of banks may work together, as in America—but on a much less elaborate scale. As a text-book, published in the U.S.A., puts it—" through lack of special organisations, bond salesmen, etc., the German system of placing loans is characterised by great cheapness." The issue to the public is made either by inviting public subscriptions at a fixed price, or more commonly by introducing the shares on to one or more of the Stock Exchanges, or in the case of small issues, by placing among clients or banking friends. Public loans are generally issued in the same way, to a bank or group of banks in the first instance and by them to the public. The German banks also play a peculiarly important part in Stock Exchange transactions. They are themselves members of the Stock Exchange at Berlin and, though they employ brokers for their customers' stock exchange transactions,

they can and do " marry " such transactions, if they have corresponding orders from customers to buy and sell : such a practice is forbidden in England, America and France. They also deal for themselves on their own account. Credit on stock exchange transactions may be obtained by carrying-over arrangements, but is more usually provided directly by the bank for customers. It is clear that the German banks play a leading part in the collection and transfer of capital. They are assisted in so doing by the practice of raising money for fixed periods on mortgage bonds (Pfandbriefe), obligations of the banks which are on sale at all their branches. There are also in Germany elaborate arrangements for the banking of small savings and for agricultural credits—not altogether unlike the corresponding arrangements in France.

Conclusions and a Suggestion. What are the conclusions which I invite the reader to draw from my short references to foreign systems ? In the first place I would point out that there is nothing inevitable in the English or in any other system. The differences are very large. They centre, in my opinion, round two main points—the position of the banks in each country and the use of short-term credit. As regards the former, in England the banks, other than the merchant bankers (and they only in some cases and to a limited extent), take no responsibility. There is really no one in England in a position to take it in their place. I believe that the result appears not only in the major frauds, which have become so notorious in this country, but also in a large number of " boom " issues, either semi-fraudulent or so grossly optimistic in character as to be fraudulent in effect. Legislative precautions in such circumstances have proved obviously insufficient. Moreover the dissociation of the English banks from the long-term financing of industry has led to the need, recognised by the Macmillan Committee, of some financial co-ordinating authority. The more reputable issuing houses and the investment trusts have not proved suitable or sufficient for

the purpose. The latter are indeed interesting, as an attempted answer to the same problem from the investor's point of view. His need is to invest his money with no more risk than the investment necessarily involves—to avoid the particular risks and difficulties of any one concern. The need of the industry to borrow wisely is the complement of his need. In both cases the object is to avoid waste. How far have other countries done better? Clearly the faults of the American system are to some extent connected with the American suspicion of trustification. The smaller the banks, the more necessary it becomes to group them together. Is it too much to attribute to the American mind certain other obvious faults—an excessive complication of machinery and excessive banking profits, due to an exaggerated respect for private industry? France and Germany may seem at first sight more successful. But the difficulties there are different ones. In both countries the machinery is too much in the hands of a small number of professional capitalists. The French arrangements for Government and other such loans get across to the individual investor. But his share in the industrial flotations of banques d'affaires is small. He places his money in Rentes or in the stocking, and the counterpart of notes in the stocking is the " gros industriel," the client of the Banque d'affaires and of la Haute Banque. It is not too much to associate with the deficiencies of the French investment system such abuses as the control of the press by armament firms and other industrialists, the excessive influence of industry and finance in French politics and the menacing power of such associations as the Comité des Forges. In Germany the banker, rather than the industrialist, has too much in his hands. One factor at any rate in the anti-Semitic feeling in Germany, nourished but not originated by Hitler, is the fear and suspicion of the influence exercised by Jewish bankers over industry: unreasonable though those fears and suspicions may be, they derive support from the power of the banks in controlling industrial capital.

As regards short term credit, its primary employment in

England is in the money market rather than in Stock Exchange loans. In consequence the banks have an outlet in the money market for their reserves, and, without any responsibility for capital investment or any immediate interest, save to a small extent, in the prices of securities, they can exercise a large measure of control on the Stock Exchange by contracting or increasing their loans for speculative purposes. In America there is less alternative to Stock Exchange loans. The relative unimportance of the money market, coupled with the gross and direct interest of the Banks in capital flotations, makes it harder for them to control Stock Exchange speculation. Their failures in that respect are notorious. In France the industrialist, as "reporteur," has much of the power in his hands : I have already indicated some of the consequences. In Germany the excessive responsibility of the banks in financing industry increases both the likelihood of bank failures and the extent of their effects. The troubles of the Darmstadter Bank were a case in point : there have been others in that troubled land.

I now come to my second point. Not only is there nothing inevitable in these various systems, but they are accidental things—arising from accidents of industrial and financial development or, to some extent, from idiosyncrasies of national character. Minor reforms there have been, but no one has had the courage or vision to look at any of these financial systems from the point of view of the community concerned. They should not, I suggest, be the instruments for bankers' profits, bankers' control or industrial power that they seem now to be, but national, and indeed international systems for the proper use of the savings of the community : to that end they should be designed and shaped. Capital and investment cannot be so controlled without control of the banking system : but they need some separate organisation of their own, designed to prevent the present waste and to plan investment with a view to the use of savings in the national interest. That organisation must be national : it must have some sort of monopoly or

monopolist control in order to forward its plan. Both its profits and its purpose should be those of the community. My suggestion then is a National Investment Board, which should have control by licence over all issues of capital other than issues of British Government stock. That control should extend also to private loans of a capital character, but not to loans made in the course of ordinary banking business. The Board itself should be provided out of public funds with such capital as is at present required by an issuing house for the carrying on of its business—the margin of capital required by a financial institution, not, of course, capital for permanent investment in industry. It should have power to act as an issuing house, underwriting issues and promoting companies. It should raise money by the issue of its own stock, which might be of several classes according to the risks involved in different classes of investment. With the savings of the community, collected in the form of that stock, it should act in effect as an investment trust on national lines, purchasing securities and making advances as required. It should have power to take over securities in satisfaction of debts due to the Crown and to requisition foreign securities, held in England, so far as may be necessary for the control of foreign exchange. It should take over the duties of the Public Works Loan Commissioners in lending public money for purposes of national benefit. Lastly it should have power to control or prohibit Stock Exchange or other dealing in any security or class of securities. A National Investment Board, so empowered, would be in a position to serve as a co-ordinating financial authority for the industries of the country, to avoid the waste at present involved in the promotion of companies and in Stock Exchange speculation, and, above all, to use the savings of the community in the public interest and in accordance with a planned economy—not, as they are used at present in this and other countries, to secure private profits without regard to the advantage or disadvantage to the community at large of the purpose for which they are employed.

CHAPTER VII: MONEY AND PRICES

By E. F. M. DURBIN

1. Prices and Output
2. The Problem of Policy
3. Constant Consumers' Income and Foreign Trade
4. Conclusion

THERE is one sense in which money is worthless. It is the purpose of this chapter to emphasise this important fact. Throughout the previous chapters the importance of money has been emphasised. The part which money plays in the creation of depression, the influence which it exerts on the development of trade between nations, the complexity of monetary institutions; the consideration of these problems in the previous chapters has emphasised the intricacy and importance of money. Yet there is, nevertheless, an important sense in which money is worthless. No one wants money for its own sake. What we need for our sustenance and pleasure are the real commodities which money will buy—food and clothes and houses—and no manipulation of money can give us more of these things if all the productive resources of society are already in full employment.

It is this simple idea which constitutes the key to understanding this chapter. We want to discover, in this chapter, what monetary policy ought to be pursued in the long run. And the answer, in the broadest outline, is that the right policy, whatever it may be, will maintain full employment. Beyond this contribution, and no one would deny that it is a very important contribution, money can do nothing to solve the real economic problem. The real economic

problem is to raise the general standard of living, to give people the things they actually want, to provide these things in the right proportions and to provide as much of them as possible. The things which people want in this sense are finished commodities in the present and in the future ; bread and meat and milk to-day and the expectation of bread and meat and milk to-morrow ; new clothes and new books this year and new clothes and new books next year ; a flat in the present and the expectation of a small house in the future. Except for an abnormal minority who want treasures of gold, most people do not want *money* at all.

The most important thing which determines how much of these real things can be produced—in a physical sense—is the quantity of ultimate productive resources which are available to produce them. The physical output of food and clothes and houses is limited by the quantity of machinery, labour, and natural resources, which are available for raising coal and minerals from the depths of the earth, for transporting these raw materials from place to place, for moulding and changing their form in order that ploughs and looms and productive machines should serve up to us in ever-increasing variety the final fruits of our industry and enterprise, and the fecundity of the world in which we live. In these days of rapid machine production we are apt to exaggerate very greatly the extent to which this problem has yet been solved, and thus to miss the nature of the only method by which, in the long run, it can be solved. Even if every man and every machine were back in full employment and every obstacle to a continuous policy of full production were removed, the *physical* output of consumption goods could only be increased by the modest total of some 20–25 per cent ; and this in Great Britain, where unemployment is so high. Beyond this limit our productive capacity can only be increased by setting aside part of our productive resources year by year and sacrificing our current satisfaction to the same extent, in order that increasingly efficient machinery and labour may be produced in the

future. With this aspect of the real economic problem we are not greatly concerned in this book, but it is essential to emphasise that it is real commodities which people need and which are scarce in relation to the amount which they wish to consume—for this fact throws much light on the relation between money and prices.

A price is the quantity of money which consumers are willing to pay for a commodity. The fact that the price of ten cigarettes is sixpence means that people continually give sixpence in exchange for ten cigarettes. It naturally follows that if we only want real commodities and don't want money for its own sake at all, we shall be willing to pay away all the money we have in order that we may obtain whatever commodities there are to be obtained. In the same way a starving man would give a handful of diamonds for a slice of bread. In respect of commodities in general we are all starving men. It is this important truth which is somewhat crudely embodied in the much abused and much misunderstood Quantity Theory of Money. This theory states that people will, in the long run, exchange whatever money they have, however much it may be, for whatever commodities they can get, however few ; and that there is consequently a particularly important relation between the quantity of money and the general level of prices.

From a superficial examination of this theory it seems to follow that an increase in the quantity of money is no solution of the economic problem. If the supply of money to each individual is doubled at a time when the limits of physical production have been reached, all that will happen will be that everyone will pay away twice as much for the real things which they received before ; prices will be raised to twice their previous height and no one will be in the least better off since no greater supply of real commodities accrues to them or can be induced by the rise in prices. This has been the commonest argument against inflation, consumers' credits and the other panaceas of monetary reformers.

But it may be felt that, so far, this line of reasoning completely ignores the real *commercial* problem. No one would suggest that it is the limit of *physical* capacity which limits production to-day. Everywhere there is a surplus physical capacity. The problem is not to produce, but to *sell* an increased supply. The limit to the market is not what the producers can produce but what the consumers are able to buy. And what the consumers lack is money. Now this argument is also perfectly true and the opposition between these two views of money constitutes the main problem with which we have to deal. It is plain that although money can neither create nor destroy real productive resources, wrong monetary policies and severe changes in the general level of prices can and do very greatly destroy the power to *employ* such real resources as actually exist. This fact defines our problem for us. The problem is to discover what ought to happen to money and to prices in order that *the full employment of all the available resources throughout a long period of time may be preserved.* To solve it we must enquire more deeply into the relation between money, prices and physical output.

§1. PRICES AND OUTPUT

GIVEN full employment the relation between the quantity of money and the general level of prices seems peculiarly simple because people do not want money for its own sake. From this it should follow that if the quantity of money is doubled, *all* prices will be doubled also. But even with full employment the matter is not really so straightforward as this, and we must take account of two of the ways by which the simple form of the Quantity Theory has been improved by modern refinements.

In the *first* place it is essential to point out that a change in the quantity of money does not affect all prices equally or simultaneously. There is a flaw in the idea of a *general* level of prices. It is perfectly true that if you reduce the

quantity of money which is being spent within the economic system by 10 per cent you will reduce the *total* money price of all output by the same amount for the very good reason that the total price of all output and the quantity of money being spent everywhere in the system are one and the same thing. But this does not mean that such a movement will not exert the most disturbing influence on the *relations* between different prices. It will exert a disturbing influence because the downward movement does not affect all prices at once. There are a large number of prices which cannot change at all in a short period of time. The price of land or rent, for instance, is usually fixed for a period of years, while interest charges and even wages may be fixed for periods as long as a year or more. This means that, when the prices *of commodities* fall, the prices of the things used to produce them, such as land and labour, either do not fall at all, or fall much less rapidly—with the inevitable result that the completely variable elements, such as profits and uncontracted wages, are disproportionately reduced. Thus if the price of wheat falls by 10 per cent and the rent of land is fixed and the wages of labour do not move, the truly variable element in the production of wheat—the profit of the wheat producers—will fall by much more than 10 per cent and may even be destroyed altogether.[1] Precisely the converse is true if prices rise—profits and other variable elements will increase disproportionately just because contract prices cannot move so quickly.

Hence it follows that changes in the quantity of money which give rise to changes in prices exert a most disturbing effect on *relative* prices. In particular they cause disproportionate movements in the controlling element of the existing system—the level of money profits. If prices rise, profits will rise more rapidly, and if prices fall profits will fall more rapidly and every kind of disturbance follows upon such changes in the level of profits. This has been abundantly illustrated in the periods of inflation and deflation which

[1] If, for example, profits are only 10 per cent of the price of wheat, and all other charges are quite fixed.

have occurred in Great Britain, in Germany and even in France, since the war. Such reasoning makes it increasingly plain that changes in the quantity of money which bring about changes in the level of prices cannot affect all the elements in the economic system with the arithmetical simplicity envisaged by the Quantity Theory of Money.

In the *second* place the simpler theory must be amended to take account of the modern analysis of the *circulation* of money. It has always been realised that money did circulate in the system—that it passed from producers to consumers and back to producers again—and this fact, by itself, is of the utmost importance in understanding the operations of the monetary machine. Money clearly does circulate because we can watch that circulation every day. Producers are continually hiring the factors of production—labour from the workers, land from the landlords, and capital from all types of property owners—and the prices which producers pay for these necessary factors of production constitute at one and the same time their own money costs of production and the money incomes of society in general. There is thus an underlying tendency for the income of society to equal the final cost of production of the current output of finished commodities. Money having flowed out from producers to consumers in this way it then flows back again. People do not keep their money receipts for nothing, but pay them away for whatever finished commodities are available. Hence as long as consumers pay away to the producers of finished commodities all the money they receive from them the receipts of the producers will remain equal to their costs of production. This is the simplest and most fundamental fact about the circulation of money.[1]

But it is only the beginning of the truth, for money does not always move between producer and consumer and back to producer in this simple way. Far from it. Most payments, and all the biggest payments, are not between producers

[1] It is more fully treated in Foster & Catchings' *Profits*, Book V, and my own *Purchasing Power and Trade Depression*, ch. ii.

and consumers at all, but between producers and producers. If we examined any production unit—Sir William Morris's factory, for example—we should find that only a proportion of his costs (say 30 per cent) was paid to consumers in the form of wages, rents and profit payments. The remainder would be paid to other producers for his raw materials—coal, steel plates, wood, electrical equipment, paint, leather, transport, and all the other intermediate products which he uses. And this is multiplied everywhere and in each stage of production. Any unit of money may pass from producer to producer a dozen times before it reaches any final consumer. Take, for example, that part of the payment for the finished car which represents the payment for the miner who raised the coal which smelted the iron which was used to produce the machinery which drew the wire that forms the magneto coil of the car. In this industrial " house that Jack built " the units of money in question must pass from Sir William to the producer of magnetos, to the producer of drawn wire, to the producer of wire-drawing machinery, to the producer of iron, and finally to the mine-owner before it is finally paid out to the miner—a member of the consuming public.

While it is true that in such a system the total of the payments currently made to consumers as a whole must be equal to the costs of producing consumption goods as long as the system in all its stages is maintained in full employment,[1] it is no longer true that a simple relation between producers' costs and consumers' receipts can be maintained. On the contrary producers' total payments must be greatly in excess of consumers' receipts. Consumers only receive the small fraction of producers' payments which is paid directly to them, while all the time the great mass of payments between producers in respect of intermediate products must continue. Consumers' income is necessarily only a small fraction of producers' total money costs. Is this condition fatal to economic prosperity ? Not in the

[1] Mr. Gaitskell deals in Chapter VIII with all the mistaken theories which deny this patent truth.

least, because it is not necessary that the consumers' income should be equal to the *total* costs of production. It is only necessary that consumers' receipts should be equal to the *cost of producing finished goods*, and the immediate cost of producing finished commodities is only an equally small fraction of total costs. It is only the output of finished goods which has to be sold to consumers. All the other intermediate goods pass, naturally enough, between producers. As long, therefore, as the consumers' income is equal to the cost of producing finished goods all will be well. This should be obvious; but for purposes of monetary policy it is important to realise that the total payments in the system greatly exceed the total consumers' income.[1] Consumers receive as much as it costs to produce finished commodities, but producers conduct a lot of transactions between themselves whose volume depends upon the number of intermediate products and stages in production which are being maintained by the existing technical conditions of the productive system.

Finally, it is essential to allow for the fact that the actual system of production is not a static system—instead it is continually saving part of its money income, building up real physical capital and increasing the potential physical productivity of industry. This process of accumulation affects the relationship between money and prices in two ways. In the *first* place the whole purpose of capital accumulation is to increase the power of the existing labour and natural resources to produce finished goods of all kinds. If, in a primitive society, a man spends part of his time in building a boat or making a net the purpose of this capital accumulation is to increase, over the whole period of his work, the amount of fish that he can catch each day. The real cost of production, the amount of time and fatigue required to catch each particular fish, is thus permanently reduced. In the same way, if part of the resources of society is diverted from the direct production on hand looms of

[1] It is calculated to be ten times as great in Britain and twelve times as great in the United States.

home-spun cloth to the mining of iron, the smelting of steel and the building of new real capital in the form of power looms, the sole purpose of such accumulation is to increase the average output per head of finished cloth for the whole body of workers engaged directly and indirectly in the production of cloth. It follows from this conclusion that if money wages per head are constant and if there is no tendency for the prices of land and raw materials to rise this increase in physical efficiency will be accompanied by an exactly parallel reduction in money costs. If as a result of accumulation the community obtains 10 per cent more of the real physical products—houses and food and clothes—for the same total expenditure on the available labour and natural resources, the average costs of production will plainly be reduced by 10 per cent per unit also. Ten per cent more output is obtained for the same total cost. Thus, in general, the effect of capital construction is to increase the physical output of finished commodities and to lower their money costs of production.

That is not, however, the only effect. The process of capital construction over a period will undoubtedly increase the complexity of the structure of productive processes. The great accumulations of the last century have greatly increased the number of stages through which commodities pass in the course of production and greatly reduced the proportion of the total productive resources which is used in the direct production of consumption goods. This in its turn must mean that the fraction of the total payments which is being made to consumers, which we have already seen to be one of the most important elements in the structure of the *monetary* circulation, will be reduced. More of the resources will be invested in, and more of the payments in the system will be made in connection with, the production and cost of intermediate products ; and less will be made in respect of the production and cost of consumption goods. But since the consumers' money income is equal to the cost of producing consumption goods, this plainly involves the conclusion that the consumers' money income will become

a smaller and smaller fraction of total money costs. If, for example, the total amount of money to be spent on all types of production were constant, the total consumers' income would become smaller and smaller.

We are now in a position to see the nature of our problem. What ought to happen to the volume of money and the level of prices in a system in which a large number of payments are fixed for considerable periods of time, in which the payments for intermediate products are greatly in excess of the consumers' income, and in which saving is continually increasing physical production and reducing the proportion which the consumers' money income bears to the total costs of production? This is our problem, and three solutions to it have been proposed. It is our next business to examine them.

1. The commonest solution is the proposal that the quantity of money should be increased as the physical production of finished commodities rises so that *prices are stabilised.* To execute such a policy new money must be issued to producers, not only to prevent the fall in consumers' income which would otherwise occur as saving proceeds, but also *to force the consumers' money income up as the physical output of finished goods increases.*

2. At the other extreme it is argued that the attempt to stabilise prices is the source of our existing depressions and that what you really want to do is to *stabilise the amount of money being spent* within the system. This will involve a fall in consumers' income; and prices will fall not only because the production of finished commodities has increased but also because saving will actually reduce the consumers' money income itself—as we have already seen.

3. Finally, there is the intermediate suggestion, which I believe to be the right one, that the *general level of money incomes* should be stabilised instead of prices or the value of money, so that prices fall as productive efficiency increases, but only in the same proportion as efficiency increases.

We must now proceed to the examination of these rival policies.

§2. THE PROBLEM OF POLICY

LET ME restate the problem in its simplest form. Money is only a means. The end to which it is a means is the current output of real goods. The problem of credit policy is therefore to discover what should happen to the quantity of money and to the level of prices in order that full employment of the limited resources available for the production of finished goods may be maintained. We can reasonably choose for our policy the attempt to stabilise prices or to stabilise incomes or to stabilise the circulation, and we now have to examine and criticise these three proposals.

A

STABLE PRICES

At first sight it seems quite obvious that the best policy is the one which will *stabilise prices*, or cause them to rise very slowly. Either of these policies would appear to guarantee the full employment of all productive power, and at the same time enable everyone to enjoy a welcome increase in their money incomes as the general productive efficiency of society rises. There is not the least doubt that this policy, if it is practicable, is the one which would meet with least resistance from all the interested parties—Trade Unions, employers, the banks and the general public. It may be true, in theory, that people are just as well off if prices fall by 10 per cent as they would be if their money incomes rose by a corresponding amount; but it would be ridiculous to pretend that people would *feel* as well off. We all look to our money incomes and are scarcely conscious as consumers of a slow downward movement in the cost of living. There is therefore an immense psychological advantage in a policy which permits money incomes in general to rise. Thus, wherever a conscious policy is pursued or proposed by a Banking System or a political authority it is that of price stabilisation.[1]

[1] Cp. President Roosevelt's ultimate aim.

Despite these great advantages there are certain difficulties in the way of carrying out this proposal which appear to me to condemn it as the objective for long distance action. It would be possible, I am convinced, to stabilise prices in a perfectly socialised state or Planned Economy, because it would be possible to control the direction as well as the size of the flow of new credit which would be required to stabilise prices during a period of increasing production. But in any capitalist community or in any transitional period with which we are likely to be concerned in the next ten years the difficulties are almost insuperable. These difficulties arise not only from the practical problem of discovering what prices are to be stabilised, but also from the impossibility of controlling the effects which the issue of new credits will have upon the course of productive activity in a system in which the Consumers' Income is only a fraction of the total circulation. These difficulties arise in the following way.

In the first place credits can only be issued by the Banks of a capitalist system in the form of producers' credits ; i.e. credits to producers who can offer good security for them and who contract to pay a Rate of Interest upon them. Since these new credits represent an increase in the capital liabilities of those who borrow them they cannot be spent upon consumption goods in the period of time in which they are issued—they must be spent upon new capital constructions which offer some opportunity for the payment of the Rate of Interest contracted upon them. The producers must therefore make use of these credits to set up new capital or begin a new line of productive enterprise which offers them a reasonable hope of meeting this interest liability. The only alternative to such action on their part is the prospect of a default and forced liquidation by the Banks. Thus producers as a whole will only borrow in order to embark upon productive schemes which will show more than the Rate of Interest they have contracted to pay after they have allowed for any reduction in the price of their products which they may reasonably expect to follow upon an increase in their production. They will in no

case spend this new money upon consumption goods.[1]

This means that, in the first instance, the issue of new credits will exert a peculiar effect on the structure of the monetary circulation. It will change the relation between Consumers' Income and Total Costs. Let us imagine that in the system in question, before the increase in credit takes place, the Consumers' Income and the cost of producing finished commodities was £100 millions per week, while the cost of producing intermediate products is £300 millions per week; and let us further assume that in order to stabilise prices in this period £100 millions are issued in producers' credits. These must be spent, as we have seen, on capital goods, so that the proportions of expenditure on capital goods and consumption goods respectively change from £300 millions : £100 millions to £400 millions : £100 millions. There is, that is to say, an expansion in the demand for new capital goods; profits are made in the production of capital goods; and the real resources in the system begin to move, very slowly no doubt, towards those industries which produce capital goods.

This must all occur at the beginning of the period in which the money is entering into producers' capital liabilities and must be spent on capital goods. But after a time the money passes on through the system. It is all spent on some type of physical product and therefore passes out of the capital liabilities of the original borrowers into the gross income stream of the producers of the goods upon which the new money is spent. Since the new money is now part of people's *incomes* it is no longer certain that it will be spent on capital goods, and at once an unstable situation arises. Part or all of the new money can be spent on consumption goods—and this will affect the price level of consumption goods and raise to a disproportionate extent the level of money profits made in their production. Upon this level the amount of investment is inevitably based.

[1] The existence of credits for "hire purchase" schemes appears at first sight to invalidate my argument; but hire purchase schemes only "spread" consumers' purchasing power rather than *increase* it.

There are plainly three possibilities :—

1. The whole of the new money may be *saved* by the people who come to own it. If this happens then no further changes are likely to ensue. The expenditure on non-consumption goods has risen in the first instance from £300 millions : £100 millions to £400 millions : £100 millions ; and this ratio will be permanently maintained. There will be no expansion in the expenditure on consumption goods, and their price level will depend entirely upon the rate at which their physical production is expanding. The fact that more real saving has been induced by inflation will cause the output to expand more rapidly and the price level to fall more quickly. It is however most unlikely that the consumers as a whole will save the *whole* of their increased income. They are virtually certain to spend some of it.

2. At the other extreme it is conceivable that the owners of the new income will *spend* the whole of it. This would mean an enormous expansion in the demand for consumption goods. The amount of money which constituted a 25 per cent expansion in the total circulation represents a 100 per cent expansion in the expenditure on consumption goods. Thus the injection of the £100 millions in our imaginary case, which raised the expenditure on non-consumption goods from £300 millions to £400 millions in the first instance, involves an increase in the expenditure on consumption goods from £100 millions to £200 millions if the whole of the new money is spent and none is saved in the second period. Such a change will constitute an enormous and confusing change in the course of economic development. In the first period the increase in credit has caused a very considerable expansion in the demand for and supply of capital goods, which has no sooner begun to effect the structure of production than there is a sharp change in the nature of demand and a disproportionate expansion in the market for consumption goods. It is impossible that the system should adjust itself to such violent changes ; and it is the peculiar property of inflation by producers' credits that it

may cause these disproportionate movements in the expenditure on consumption goods. It is, however, unlikely that the course of events will be quite as extreme as we have assumed here, and we must examine the final and most probable development.

3. It is virtually certain that part of the new income will be saved and part will be spent. This means that of the £100 millions of new money which is issued £70 or £75 millions, shall we say, will be re-invested in the course of productive enterprise and £30 or £25 millions will be spent on consumption goods. Despite the consequent reduction in the violence of the movement thus engendered the movement is nevertheless of the same general character. In the first period the expenditure on non-consumption goods went up from £300 millions to £400 millions while the expenditure on consumption goods did not rise at all, while in the second period the expenditure on non-consumption goods falls from the point of highest expenditure to a new and lower point, while the expenditure on consumption goods increases and the profits made in their production expand disproportionately. The results are less extreme in degree, but they are exactly the same in kind.

It is therefore plain that the issue of new money in the form of producers' credits is bound to cause an oscillation in the relative demand for consumption goods and capital goods. In the first period these credits, just because they are producers' credits, will cause an expansion in the demand for new capital without any change in the demand for consumption goods, while in the subsequent period the expenditure of any part of the new money on consumption goods involves a direct reversal of the previous development. More will now be spent, in an absolute sense, on consumption goods and less, in an absolute sense, will be spent on new capital. The movement of real resources will tend to be reversed. This is a phenomenon of fundamental importance to the understanding of the processes involved in an attempt to stabilise prices, and to this point we must return in a moment.

In the meantime it may be of interest to refer to the views expressed recently by a certain group of economists that this analysis of the effect of producers' credits constitutes the main explanation of capitalist depression.[1] As we have seen, the issue of producers' credits involves a relative expansion in the demand for new capital followed by a *relative* contraction in this demand. There is no doubt that this alternation does correspond in general form to the alternation of booms and depressions from which the capitalist system suffers. During the boom there is a great expansion in the demand for, and production of, new capital goods, while during the depression there is a great contraction in the production of capital, without a corresponding reduction in the output of consumption goods. From the resemblance between these two general movements and the two periods of inflation, this school of economists has concluded that they are one and the same process ; that booms are to be identified with the period in which new credits are flowing out and that depressions are caused by the subsequent expansion in the demand for consumption goods and endure as long as that expansion continues. While I should agree with the general proposition that it is the issue of new producers' credit with a view to stabilising prices that causes the whole process of the Trade Cycle to occur, there is, I believe, a fatal objection to the full implications of this particular theory. To accept it in detail would involve accepting the view that *a rise in the price of consumption goods caused an absolute fall in the demand for new capital* and provoked a fall in the physical production of new capital goods. This seems to me to be quite contrary to the commonsense view that the demand for new capital depends directly upon the price level of consumption goods and to the logical necessity that an expansion of credit can bring *unemployed* resources in the consumption goods and capital goods industries back into full employment. I cannot believe that there is any sense in which an expansion in the demand for consumption

[1] Cp. Hayek, *Prices and Production*, Lecture III, *passim*.

goods at a time when there are unemployed resources in both the consumption goods and capital goods industries will do anything but increase the production of both types of commodity—consumption goods and capital goods alike. To hold this opinion of such a possibility disposes of the view that the expansion in the demand for consumption goods in the second period of an inflation will provoke a crisis. On the contrary it means that it will provoke a progressive expansion in the demand for capital and brings us back to the point at which we left the account of the process of credit expansion.

After a time it is certain that an original outflow of producers' credits will cause an expansion in the amount of money spent on consumption goods, so that the price level of these goods will rise if their output is not increasing, and will fall less rapidly if it is. We have already seen that money costs are necessarily falling as rapidly as the output is increasing (see p. 321), so that the failure of consumption goods prices to fall as rapidly as they would have done if the income of consumers had remained constant necessarily brings prices above costs. At once a general inflationary situation develops. Large profits are being made in the production of consumption goods, confidence is increased, and everywhere it is possible to embark upon schemes of expansion which are only profitable because this new level of profits has been induced by monetary expansion. Part of these new capital schemes will also have the effect of reducing costs, so that the level of profits will be still further increased. Thus the direct effect of the original credit expansion is to start the development of all sorts of capital schemes *which depend for their profitability upon the expansion of consumers' income which is currently taking place, and which will cease to be profitable unless that expansion continues.* Moreover these schemes require new money to finance them. As this new money streams out, it must in its turn increase still further the consumers' income and lead to the extension of investment. An ununstable inflationary structure is built up—independent

of any *absolute rise* in the price level of consumption goods.

In the existing system this inflationary process cannot continue for ever. It has been demonstrated long ago[1] that the Banks cannot sustain a process of indefinite credit expansion. As the total volume of money incomes expands consumers will demand and hold more cash, and this for two reasons. In the first place the poorer members of the community will increase their cash savings by building up small but larger balances of notes and silver, and in the second place everyone holding roughly the same *proportion* of their total money incomes in cash form will hold a bigger total of cash because these total money incomes are larger. Cash will therefore drain from the Banks after a certain length of time, and the Banks will be forced to stop the cumulative credit expansion which they have begun. But the moment inflation stops, the consumers' income fails to expand as it has been expanding ; and the capital expansions which have been begun on the assumption that the consumers' income would continue to expand, and that the level of profits would continue to rise, will be brought to an abrupt close. The inflationary structure at once collapses. Not only is there an absolute fall in the consumers' income due to this primary contraction, but also schemes of investment become unprofitable, and unemployment appears in the capital goods industries. This secondary development makes the whole process disastrously cumulative. It is impossible either to continue the inflation which the issue of the original credits has induced or to stop the inflation without causing a collapse in the whole structure of incomes and investment that has been built up on the expectation that the monetary expansion will continue. This is the inherent difficulty of stabilising prices.

Nor is it, in any sense, the fault of the Banks or of the banking structure. The only alternative to the contraction of credit forced on the Banks by the contraction of their cash reserves would be a *cumulative* inflation of credit, and this would ultimately raise prices despite the increase in

[1] By Mr. Hawtrey in *Currency and Credit.*

production, and would then continue to raise prices until they had soared to astronomical heights and an inflation on the German model was complete. As long as the issue of producers' credits is allowed to affect the profitability of producing consumption goods and the amount of capital investment the movement is bound to become cumulative, and the subsequent crisis rendered inevitable. It is therefore not possible to stabilise prices within the institutions of a system founded upon private enterprise.

This is not to say that in a completely socialised state, in which the profits made in the production of consumption goods need not lead the Central Planning Authority to embark upon a cumulative expansion, or even in a partially controlled system in which the increase in the consumers' income could be appropriated by taxation and devoted to capital construction, the same inherent difficulties would arise. I am inclined to think that in either case something very near price stabilisation could be secured. But in the existing system these things are not possible, and we are left with a choice between a stabilised volume of money and stabilised volume of income.

B

STABLE MONEY

Some people swinging to the opposite extreme from those who wish to stabilise prices propose the severe alternative that the *quantity of money spent* within the system *should be kept constant.* This would mean that *no* general monetary expansion would be allowed, whatever was happening to productive efficiency and the commercial organisation of production. In a society which was accumulating capital and increasing productive efficiency the price level would be forced down very rapidly, and it is this fall in prices and its various effects which we must now consider. It would arise from two general causes.

In the *first* place prices would fall just because productive efficiency and physical output were increasing. Suppose

that accumulation was going on at a steady rate, so that the supply of finished commodities of all kinds was growing at the rate of 10 per cent per year. Then in the absence of any increase in the amount of money being spent prices in general would fall by exactly this amount. Some prices might rise as tastes changed ; but in that case others would fall more than proportionately, so that, on the average, all prices would fall by the equivalent percentage. But we have already seen that there is nothing contrary either to the requirements of full employment or of reasonably profitable production in this type of falling prices. By definition costs have fallen by as large a percentage as prices, and therefore the same general margin between prices and costs can be maintained. In each period that production increases it has done so on the basis of the past level of total costs, so that any increase in output involves in itself an exactly proportional reduction in costs per unit. There is therefore no reason why prices should not fall to the same extent—profits will not be reduced and investment will not be restricted.

But the same is not true of the *second* source of falling prices. If the quantity of money is really kept constant prices will fall not only because production has increased but also because the income of consumers has fallen. At first sight it is not plain why people's money incomes should fall when the general amount of money which is being spent within the system is kept constant. But we have seen, earlier in this section, that saving will tend to reduce the proportion of total money which consumers receive, and it necessarily follows that if the total out of which this falling proportion accrues to consumers is itself constant, the falling proportion implies a falling absolute income. Now why should this happen ? Where has the money gone ?

The explanation lies in the general historical fact that the accumulation of capital tends in the long run to increase the complexity of production and increase the number of stages, the proportion of resources, and the amount of time

which are involved in the production of intermediate products. More and more of the ultimate productive resources are engaged in producing crude steel and engines and spun yarn and flour and less and less are used in the direct production of food and clothes. It is only necessary to compare the present organisation of production in a staple textile industry, such as wool, with the simpler methods of a century ago, to realise that this tendency exists. If it exists it necessarily follows that a larger proportion of a constant supply of money will be held by the producers of these intermediate products and a smaller and smaller *proportion* by the consumers. As the structure of production grows more complex these new stages and the new firms handling intermediate products will require a larger and larger fraction of the total money supply. Consumers will therefore receive and hold a smaller and smaller *fraction* of whatever money exists ; and it naturally follows that, if the *total* amount of money is constant, the consumers will receive a smaller and smaller absolute sum. More and more of the existing money is caught up and held within the general *productive* system.

Hence, if the volume of money is kept constant, prices will fall, not only because productive efficiency is increasing but also because the income received by consumers is tending to fall. Now it is my firm conviction that this second source of declining prices is directly opposed to the interests of monetary equilibrium.

To understand this we must return to an earlier part of this discussion and remove one of the unreal assumptions that we there made—namely that money which is saved is necessarily spent upon new physical capital. Consumers set on one side a part of their money income in the form of savings—the social significance of which lies in the fact that the funds thus made available *can* be used by producers to set up new physical capital and so increase productive efficiency. We have already seen that as long as all the money which is received in the various stages of production is paid out again there is a general tendency for prices to

equal costs, and also that as long as the savings are invested the average costs of production will fall by the same percentage as physical output rises. *But these general tendencies to equilibrium and full employment are rendered worthless if the money which is saved is not spent upon new physical capital at all.* And there is no direct guarantee that it will be. Savings to give employment and increase productive efficiency must be spent on new physical capital—otherwise the money is merely withdrawn from active circulation and exerts a general deflationary pressure. If money which has been earned in the course of production and has entered into producers' costs is not spent on any type of product, either consumption goods or capital goods, total prices must be below total costs and productive efficiency impaired. But what can happen to money if it is not spent on consumption goods ? Quite a number of things can happen to it.

1. *It can be hoarded in the form of cash.* If some people, particularly poorer people, use part of the income which they have earned to increase their small hoards of actual currency and not to buy anything at all, it is plain that in respect of such hoards a deflationary tendency will appear. Less will be spent on all types of goods and prices will fall for monetary reasons alone.

2. The money which is not spent on consumption goods can also be *hoarded in the form of deposits*—producers and richer people who have banking accounts may seek to increase the amounts which they hold in the form of bank money—either transferring it to deposit accounts or just leaving it on current account as they see fit. Whichever course they adopt, however, the amount of money that is spent will be reduced and prices will fall.

3. Finally, even if the money is not hoarded in any form, it is not necessarily spent in setting up new capital and giving employment, because it may be *spent on old securities or Government securities*, and this process does not directly increase employment and the production of capital. It is true that in both these last two cases forces are released which tend in the long run to increase the amount spent on

new capital. In so far as there is a general transfer of money to deposit account on the part of the customers of the banks, there will be a tendency for the banks to lower the Rate of Interest on deposit accounts and to try and lend more to producers—both of which processes will tend to diminish the amount of idle and increase the amount of active money in the way which monetary equilibrium requires. In the same way an increase in the flow of money to purchase securities will tend to raise their price and lower the Rate of Interest at which producers can borrow. This will also stimulate, to a mild degree, the investment in new capital.[1] But enough has been said to demonstrate plainly that there is nothing which guarantees a simple and inevitable equality between the amount of money saved and the amount of money spent on new capital. Everyone would, however, agree that banking policy should aim at preventing deflationary tendencies of this type from appearing. Saving and Investment should be kept equal to each other.

But it surely follows that the reduction in Consumers' Income which we have seen would follow from a prolonged period of saving is merely one case in which less is spent on new capital than is currently being saved. As the amount of money which is required to carry on the increasingly complex structure of production grows larger, part of the money which is currently being saved must be used, not to set up new physical capital and give employment, but merely to provide the additional money for financing the extra transactions which a more complex structure of production requires. This is plainly a cause of deflation. Part of the money which has entered into the producer's costs of production has not been spent either on consumption goods or on producers' goods, but has merely gone to build up balances which are retained within the structure of production. Prices will therefore fall and unemployment result at the existing level of money incomes. This cannot

[1] There is no such simple tendency to equilibrium if the increase in saving also causes the producers of consumption goods to *sell* securities because they are making losses. This is an intricate question which I cannot develop at length at this point. See Keynes' *Treatise*, Bk. III.

be consistent with the maintenance of monetary equilibrium and ought to be prevented by the expansion of credit.

It is therefore necessary to abandon this second proposal. The rigid restriction of credit to a constant total of effective money, quite apart from its practical impossibility, will not solve the problem of monetary equilibrium. It would involve a pressure upon the price level of consumption goods and upon the structure of money incomes which is purely deflationary in effect and which would lead to a wave of wholly unnecessary unemployment if money incomes were difficult to reduce. We are therefore left with the third and intermediate policy.

C

STABLE INCOMES

The right credit policy is the credit policy that prevents a cumulative and unstable inflation on the one hand, and avoids the wastage of money in idle deposits on the other. It is easy to prove, I believe, in light of the argument of the last two sections that this policy is the one which will *stabilise the level of incomes.*

1. In the *first* place we have seen that the reason that an inflation by producers' credits becomes cumulative is just because it causes consumers' money incomes to expand. It is this movement which stimulates still further the demand for capital and begins an uncontrollable expansion which must end in a crisis. If, at such a moment, it were the purpose of the banking system to check the expansion of money incomes, bankers would avoid the issue of credits which brings about this dangerous and undesirable result. Any inflationary tendencies in the system, whether they are due to a creation of credit in excess of the increasing demand for money to hold, or even if they are due to an independent reduction in the monetary requirements of the system, will both be damped down by the deflationary pressure of the Banks. Inflationary tendencies will be detected at one central point in the circulation of money and restricted in their most dangerous manifestations.

2. In the *second* place the execution of this policy will render the banking system equally sensitive to any changes which are of a deflationary character. If there is any increase in hoarded money, either through an increase in the quantity of cash or bank deposits held by individual consumers, or through a growth in the volume of deposits held by the industrial system in respect of more complex processes of production and a longer series of intermediate products, the net effect will be a reduction of the amount of money coming into the hands of the consuming public. The index of monetary policy will be disturbed at once, and the Banks will seek to offset such a movement. They will pursue an expansionist policy and seek to secure the restoration of the previous level of money incomes and the maintenance of full employment at the old money rates.

It therefore seems that the successful execution of this policy will prevent all unstable expansions of credit from taking place, and, at the same time, stop the steady reduction of prices and incomes which saving by itself would tend to cause. The execution of this policy would stabilise employment at constant money rates. But it is necessary to emphasise that this policy would *not* stabilise prices. The general level of incomes will be constant, but the volume of physical production will not be constant. On the contrary it will continually grow as investment leads to the greater accumulation of capital and the more efficient production of finished commodities. A constant consumers' income must therefore purchase an increasing flow of real physical production. Prices are bound to fall. But as we have seen *this* fall in prices is not contrary to the interests of equilibrium because it is a fall in prices which is preceded and indeed caused by a previous fall in costs. Any increase in physical production with constant money prices for the supply of real productive resources means an exactly equal fall in money costs—10 per cent increase in physical production from a given *total* of money costs means a 10 per cent fall in money costs per unit—so that the decline in money prices is associated with a previous fall in money

costs. Hence the slow and steady decline of prices envisaged by this process has nothing in common with the steep and catastrophic fall in prices which precedes and " causes "—in a proximate sense—the trade depressions from which we suffer. Prices have fallen by 30 per cent in the last two years. No one could for a moment contend that such a fall is compatible with the requirements of monetary equilibrium, and this is so just because it is plain that costs have fallen by nothing like this percentage in the same period. A slow decline in prices preceded by an equal decline in costs is an entirely different phenomenon, and necessary in my opinion to the preservation of general monetary equilibrium.

It may very well be true that in a completely managed currency system it would be possible, by a suitable combination of credits to consumers as well as to producers, to stabilise prices because it would be possible to keep costs and prices in equilibrium. But in the capitalist system as we know it, or in any system within the period of time necessary for the development of a highly skilled technique of control, it is plain that the attempt to stabilise prices by the crude issue of producers' credits will disturb that equilibrium beyond repair and initiate the most severe oscillations of productive activity. Hence I conclude that the policy which will most rapidly eliminate severe fluctuations and preserve the level of productive efficiency for the longest period of time will be one which looks to the stabilisation of money incomes rather than to the stabilisation of any other element in the system. The relation between money and prices should be such that money incomes are stabilised while real incomes are allowed to rise as accumulation proceeds by a slow and steady fall in the cost of living. The detail of the mechanism by which I believe this policy could be made to work in practice would take too long to explain and defend in this short section, but I believe that the difficulties are not insuperable and that in the future it will be possible to outline a simple plan for the successful operation of this policy. In the meantime I must refer briefly to the international implications of such proposals.

§ 3. CONSTANT CONSUMERS' INCOME AND FOREIGN TRADE

IF THE system whose monetary policy we are considering is not a system which is self-contained, but has important foreign trade linking it to the rest of the world, it is necessary to discuss the effect of any attempt to maintain a constant money income within the partial system upon the course of its foreign trade. The main difficulty is bound to arise if the foreign trade position of the country is tending to decline. Suppose, for example, that the world demand for English exports is falling. There is nothing which any system, capitalist or socialist, can do to prevent a *relative* fall in our standard of living. If the general standard of living is rising abroad it may be that this relative decline will not involve any absolute fall in the standard at home. Indeed it is unlikely that it will, but apart from a consumption of our capital abroad, it is impossible that we should go on consuming as large a quantity of imports as if the demand for our exports had remained constant. The world will not give us goods for nothing. Our standard of living must therefore be reduced in respect of our consumption of imports.

Now there are two ways in which a real standard of living can be reduced. It can be reduced by leaving money incomes constant and raising prices or by leaving prices constant and reducing money incomes. In the first case people receive the same quantity of money but cannot purchase and consume the same quantity of real goods ; while in the second case each unit of money purchases the same quantity of real commodities but each person has less of such units to spend. When the reduction in real income is due to a worsening of our foreign trade position our money incomes can remain constant and the price level of imports can be forced up or the price of our imports can remain constant and our money incomes reduced. In the most general sense this is the difference in the mechanism of

adjustment to change between countries which are on and off the Gold Standard.

If a country is on the Gold Standard the value of its currency is fixed in terms of other currencies and the price level of imports is fixed at the level of world prices. Any change in its foreign position must therefore be reflected, not in changes of import prices, but in changes in the general level of money incomes. If the demand for exports increases and capital is invested in the country in question, or interest is paid in excess of foreign purchases, then gold will flow in and a general inflationary situation will develop at home. But if the foreign trade position is degenerating for any reason—changes of relative demands or relative money costs being the most usual causes—then it is impossible for a country on the Gold Standard to stop a decline in money incomes at home. The consumption of imports must be reduced but their prices cannot be raised. Equilibrium can only be restored by the outflow of gold, and ultimately, unless the country is to be stripped of gold and driven off the Gold Standard, by a reduction of money incomes and subsequently of imports. It is the purpose of the outflow of gold to bring a deflationary pressure upon the Banks and so reduce money incomes at home.

In theory this process will lead to a restoration of equilibrium without causing a depression. Money prices will be reduced and competition will lead to the reduction of money incomes all round. This in its turn will reduce the purchases of imports at the constant world price level and also stimulate the production of exports without causing unemployment. Everyone and everything will be kept at work at falling money rates ; and since the prices are falling the only real reduction in the standard of living will come from the relative rise in the price of imports. But in the condition of advanced capitalism this simple mechanism will not work. In the presence of long period contracts for rent and interest—and above all in the face of Trade Union resistance to the reduction of money wages—the deflationary pressure will cause general unemployment. Imports will

be reduced, not by reducing prices and money rates all round, but by causing unemployment. Imports will be curtailed by curtailing the consumption of imports by the unemployed. This is the great disadvantage of the Gold Standard.

When a country is off the Gold Standard the mechanism is the opposite of this. There is no fixity in the value of a country's currency and hence no fixity in the price level of its imports. Changes in its foreign trade position exert no direct influence on the level of money incomes, but they do exert a *direct influence on the relative prices of imports and exports*. If a country's foreign trade position degenerates when it is off gold, the level of its foreign exchanges declines. The direct effect of a fall in the level of the exchanges is to raise the price of imports to the home consumer and to reduce the price of exports to the foreign consumer, by exactly the same percentage. The movement in the exchanges must continue until an equality in the value of imports and exports in the widest sense is brought about.[1] This is a simple example of the second type of adjustment. Consumption of imports has been reduced not by the general and difficult process of income reduction, but by the swift and automatic change in the level of import prices. This is the great advantage of free exchanges.

It should now be plain that the execution of the policy of Constant Consumers' Income is not compatible with the maintenance of a strict Gold Standard except by a series of fortunate accidents. If the productive efficiency of all countries on the Gold Standard is moving in the same direction at roughly the same rate and if there are no important changes in relative demand, the foreign trade position of each country will be stable. In such conditions there is nothing to prevent the maintenance of both stable incomes and the Gold Standard. But if any of these elements change it is not possible to maintain both. If the demand for British exports is falling then it is inconceivable that we

[1] See Chapter V.

should both keep up the level of our money incomes and remain on gold. The mere movement of gold does nothing to adjust the elements in the system; and unless it is followed up by a subsequent *reduction* of money incomes England will lose all its gold and a monetary crisis will supervene. It was something not unlike this that occurred in 1931. Yet we have seen that the maintenance of stable money incomes is the main requirement of internal equilibrium. This constitutes a strong *prima facie* case against the maintenance of the Gold Standard. The alternative conducive to *internal* equilibrium would be a number of self-contained monetary systems with constant incomes in their own currency and slowly fluctuating exchanges to adjust changes in the commercial relations between them.

The argument which has always been adduced in favour of the Gold Standard and against free exchanges is that the risks of international trade are enormously increased by the exchange fluctuations which are inevitably associated with free exchanges. There cannot be the least doubt that the era of uncertainty, of wild fluctuations in the currencies of the world, and of the intrusion of unforeseen political disturbances in the money markets, which followed the abandonment by England of the Gold Standard in 1931 has been wholly detrimental to the volume of world trade and is in no small measure responsible for the recent intensification of world depression. This is true of one particular *departure* from the Gold Standard and constituted an argument for its retention when we were on it, but this is not relevant to a discussion of the comparative advantages of a general system of free exchanges and the maintenance of a universal Gold Standard. In defence of the former—the maintenance of free exchanges—there are these final things to be said.

First, that in the course of time the existing system of private financial enterprise leads to the growth of forward exchanges and the specialisation of special concerns to bear the risk of exchange fluctuations. These remove the burden of risk from those engaged in foreign trade itself and greatly

reduce the cost of fluctuations and the tendency to restrict international trade.

Secondly, is it apparent that these fluctuations will be severe in a period of comparatively normal trade? The changes in relative efficiency are long period phenomena, and with the variety in world trade which exists to-day, it is unlikely that the changes in relative demand will be very severe. It is, for example, unlikely that in periods of general world expansion the fall in the demand for English exports of the old staple kinds will not be offset by a rise in the demand for the luxuries in whose production we are so skilled. If then the anticipated changes are not so very great, the long period fluctuations in the exchanges will also be slow in appearing and small in amount. A condition of very slowly moving exchanges would be compatible with a policy of *de facto* stabilisation, with periodic changes in the level at which the shorter period stabilisation was aimed. Behind such a protected exchange the policy of a constant level of incomes could be successfully executed without greatly hampering the development of world trade.

§4. CONCLUSION

WE ARE thus brought to the end of the task of this chapter. We have seen that since money is merely a means to an end there is nothing inherently right or wrong about any particular level of prices or quantity of money. The problem raised by the relation between money and prices is the central problem of credit policy—what is the credit and price level policy which will maintain full employment of the real productive resources in a society which is accumulating capital and increasing productive efficiency? A policy which will stabilise prices will lead to a cumulative inflation, while the policy which stabilises the effective quantity of money will cause the appearance of unemployment in the presence of contract frictions. This leaves the *stabilisation of incomes* as the object of a credit policy.

Such a policy will secure monetary equilibrium in a self-contained system. In order to execute this proposal in a world economy it is necessary to divide up the world system into a number of separate constant income systems, the relations between which are determined by slowly fluctuating exchanges. That this would involve some reduction in world trade it would be silly to deny ; but against such a reduction it is necessary to set the growth in world production and the world standard of living which would follow upon the elimination of the terrible internal monetary crises from which all peoples have suffered in the last ten years. To conceive a detailed plan for the general execution of this policy when the present depression is brought to an end is scarcely beyond the powers of the human mind. To conceive and to ensue it would, in my opinion, rid the world of one of the most potent sources of its distresses and open the way to a steady, an appreciable, and a most necessary increase in the standard of human life.

CHAPTER VIII: FOUR MONETARY HERETICS

By H. T. N. GAITSKELL

THIS CHAPTER is not a heresy hunt. Such a form of activity is ugly and unpopular. It implies bullying and brutality, the use intellectually and physically of the bludgeon method, the sterile tyranny of dogma. Inevitable perhaps in religion and politics, where emotional judgments are fundamental, it should be eliminated from the sphere of science, where reason plays a dominant part. Heretics there may be, but hunting should give place to argument, and in time heresy dissolves or becomes part or the whole of a new orthodoxy.

In economics "sweet reasonableness" is particularly necessary. For being an inexact, non-experimental science, it allows of many disagreements and requires greater discussion. Indeed it may well be claimed that the word heretic is not legitimate here at all. For without orthodoxy there can be no heresy; but where in economics are the orthodox to be found? There is force in this argument. Yet it is not so strong that we must abandon the title of the chapter. Economists disagree about some things. But they agree about many others. A heretic, as we interpret the word, is one who holds different views even about these latter. Two further qualities have been required—public recognition and an amateur status. All those whose names follow are comparatively well-known. None of them has ever held an academic appointment in economics. Apologies are necessary both to those whose names and work are omitted and perhaps also to those who have been included. To the former we must excuse ourselves on the grounds of space, to the latter with the assurance that the term heretic is neither derogatory nor abusive, but merely expresses

the degree of difference which has been outlined above.

SOCIAL CREDIT: THE VIEWS OF MAJOR DOUGLAS

OF the many unorthodox writers on money none occupies such a prominent position as Major Clifford Hugh Douglas, M.I.Mech.E., M.I.E.E. An engineer by profession, he became interested in monetary problems when he was "struck by certain occurrences which seemed to require an explanation, notably the fact that just before the War it was very difficult to get on with various sorts of work in which I was engaged because there was always some question of scarcity of money." During the War on the other hand he noticed "that there was no difficulty about getting money for anything, however wild cat the proposal seemed to be at the moment."[1] During the War also, we may presume, Major Douglas must have thought deeply about these matters. For his first article was published immediately after the Armistice, and only a few months later he followed this with the first of a series of books in which he has perseveringly explained his views to the general public. The popularity of his proposals has naturally fluctuated with the state of trade; in bad times the public is interested, in good times apathetic. To-day Major Douglas may well feel satisfied with the impression he has created. After nearly fifteen years, he has in his support two weekly papers,[2] certain sections of the Churches[3] and a devoted band of followers fitted with uniforms and organised in branches throughout the country.[4] On what basis does the "social credit" movement—for this is the title adopted by these followers—rest? What is the famous

[1] See Macmillan Committee on Finance and Industry, *Minutes of Evidence*, Vol. I, p. 299.

[2] *The New Age* and *The New English Weekly*.

[3] The Macmillan Committee was requested to hear Major Douglas's evidence by the Social Service Section of the Congregational Union. I am informed on good authority that his views are popular in other clerical circles.

[4] Popularly known as "The Green Shirts."

" Douglas " theory and why is it kept so firmly outside the realm of orthodoxy ?[1]

It is the contention of Major Douglas and his followers that the existing relationship between finance and industry produces a permanent tendency towards a " deficiency " of purchasing power. This " deficiency " arises from the fact that of the costs incurred in the production of commodities for sale only a part have involved the distribution of purchasing power to potential consumers. It follows that, when the commodities are ready for sale, consumers cannot buy them at prices which cover their costs of production, because the necessary purchasing power is not available. Hence, unless purchasing power is produced from some other source, the commodities cannot be sold. Major Douglas thinks that there are two sources from which the deficiency can be made up—from the sale of surplus exports and from ordinary bank loans granted for the purpose of producing capital goods. But the struggle for the first of these sources leads to war and the utilisation of the second leads to the accumulation of a vast debt which can never be repaid.

The essential process by which the tendency to deficiency arises is described by Major Douglas as follows. " A factory or other productive organisation has, besides its economic function as a producer of goods, a financial object—it may be regarded on the one hand as a device for the distribution of purchasing power to individuals, through the media of wages, salaries and dividends ; and on the other hand, as a manufactory of prices—financial values. From this standpoint, its payments may be divided into two groups :

" Group A—All payments made to individuals (Wages, Salaries and Dividends).
Group B—All payments made to other organisations (Raw Materials, bank charges and other external costs).

[1] It is nevertheless interesting to observe that Major Douglas's two first books *Economic Democracy* and *Credit-Power and Democracy* were set as text books for Economics Honours at Sydney University in 1921.

" Now the rate of flow of purchasing power to individuals is represented by A, but since all payments go into prices, the rate of flow of prices cannot be less than A + B. Since A will not purchase A plus B, a proportion of the product at least equivalent to B must be distributed by a form of purchasing power which is not comprised in the description grouped under A."[1]

Now it is most unfortunate that in this essential passage which is quoted again and again by Major Douglas and his followers and which appears to be the core of the analysis there should lurk so much ambiguity.

For, as we shall see, the passage acquires very different meanings according to the precise connotation of the word " prices " and the letters " A " and " B." So great has the confusion between Major Douglas and his critics and to some extent his followers become that the only method of explaining and criticising the doctrine is to consider the various interpretations in turn and the error or truth of these different versions.

Many critics—and particularly the " orthodox " economists—have understood Major Douglas to mean that the costs of production (which he calls the rate of flow of prices) must include all the A payments *plus* all the B payments made in respect of an article from the very beginning of the production of its raw material until it reaches the stock of the retailer. Thus, according to this view, Major Douglas would find the cost of woollen cloth by taking first the costs of the farmer who sold the wool, which we may assume to be all A payments (Wages, Profits and Rent of Land), and adding to these the costs of the spinner, which would be partly A payments but would also include the B payment involved in the cost of the wool. Then he would add on the costs of the weaver, which again would be partly A payments but which would also include the cost of the yarn bought from the spinner, likewise the costs of the merchant, which again would include some

[1] Macmillan Committee, *Minutes of Evidence*, Vol. I, p. 298.

A payments but would also include the cost of the cloth bought from the weaver. Finally he would add the retailer's cost which, like the merchant's, includes some A payments (e.g. labour of shop assistants) but also the cost of the cloth bought from the merchant.[1] This interpretation, which is by no means unreasonable, assumes in fact that while Major Douglas is referring to the prices of *consumption goods*, the phrase A + B means *all* the A payments + *all* the B payments.

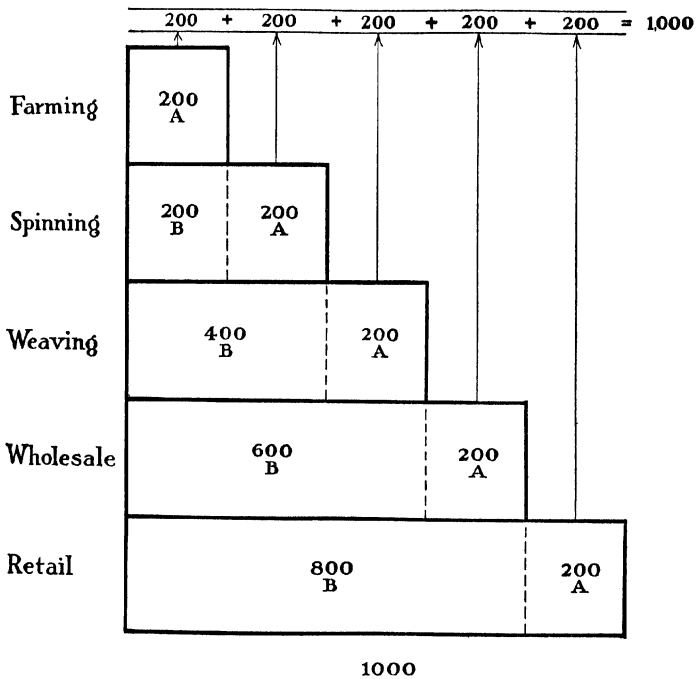
But if this is really his meaning, it is not difficult to show that the paragraph contains a serious fallacy. For it is evident that the " rate of flow of prices " or the sums which have to be charged to cover costs do *not* include all *payments* made in respect of the production of the article. The costs which have to be met by the outlay of the consumer are in fact only the costs of the final producer or retailer and his costs are simply *his* A payments—wages, salaries, dividends, etc., and his B payments—the cost of services and goods bought from " other organisations," of which the most important item will, of course, be his stock. Providing that the retailer recovers these costs, there is no reason why he should not sell his goods and continue to carry on business. The other producers, who do not sell direct to the consumer, must recover their costs too, but naturally they do not rely upon nor deal with *the consumer*. They sell to " other organisations " and receive from them a " *B* " payment. For example the wholesaler will receive his costs from the retailer and this will be the retailer's B payment, the manufacturer will receive his costs from the wholesaler and this will be the wholesaler's B payment, the same process being found in the case of all those who do not sell direct to the consumer.

Since these persons do not sell direct to the consumer, it is obviously an error to suppose that the consumer must pay their costs as well. What he must pay and what therefore the total A payments distributed throughout the

[1] I have ignored various intermediate processes in the production of woollen cloth.

system must equal are just the *single* A + B payment of the final producer or retailer.

A simple diagram will help to make this and subsequent



matters clearer.[1] If we assume that the commodities whose prices we are considering are produced in five different stages, such as the woollen cloth mentioned just now, we can represent the process of production by five rectangles which show the total costs of a certain amount of the commodity at the different stages. Now to use our original illustration, the farmer's costs which are all of them A

[1] I am indebted to Mr. E. F. M. Durbin's *Purchasing Power and Trade Depression* for the idea of this diagram.

payments made to consumers are 200, the spinner's costs are 400, 200 being paid for the wool and 200 in A payments to workers and shareholders at the spinning stage, the weaver's costs are 600, being also divided between the cost of the yarn bought from the spinner and the A payments made to labour and capital. So equally with the merchant and the retailer. It will be seen at once that the sale of the woollen cloth at prices which cover costs of production requires only that 1,000 units shall be spent, for these are the costs—A + B—of the final producer or retailer. It will be seen also that the total A payments do in fact add up to 1,000 units and that if consumers were to spend not all the A payments but all the A's + all the B's they would spend 3,000 (200 + 400 + 600 + 800 + 1,000), a sum three times as large as the costs of the final producer.

Now it is perhaps partly because Major Douglas's remedy does involve the injection of a great deal of purchasing power—though as a rule he does not propose to hand this directly to consumers—that so many critics have interpreted his analysis of the existing system in the foregoing manner. Nevertheless there are strong grounds for believing that this was not the meaning which he intended to convey. Had the " deficiency " view point been based on such an elementary mistake about the nature of costs, we should scarcely expect the copious and intricate arguments which are to be found set out in support of it, nor is it probable that the theory, had this really been its only form, would have survived for long the onslaught of its critics. It seems more likely, both for this reason, and because of certain other passages in his works, that Major Douglas is well aware that the purchasing power of consumers need only cover the costs of retailers, but that he denies that it actually does so. In other words the deficiency arises because the total A payments tend to fall below, not the total A + B payments of the system, but the A + B costs of the retailer.

Have we any reason to expect such a deficiency ?

In the first place while the statement " A must be less than A + B " was perfectly true (but as we have seen irrelevant to any problem of deficiency) so long as A meant the same thing in both cases, i.e. the *total* payments to consumers, it is no longer necessarily true as soon as we understand by A + B only the payments made by the retailer. For in this case while A, when it stands alone, still represents total A's (1,000 in the diagram), when it stands with B it represents only the A payments of the retailer (200 in the diagram). Since A therefore, means something different in the two cases we have no reason at all to conclude that A *must* be less than A + B. We must therefore rule out at once any conclusion derived from the simple arithmetical formula. To see whether a deficiency does in fact tend to arise we can put the question in another form. We can remove from both sides the A payments of the retailer and ask whether the residue left on one side is equal to the residue left on the other. Are the B payments of the retailer equal or not to the A payments made by all other producers?

At first sight at least it appears certain that this equality exists. For if with the help of the diagram we analyse the composition of the retailer's B payments, we shall find that they are simply an aggregate of A payments, of, in fact, the A payments made by all other producers. The " 800 " units which represent the cost of the retailer's stock are made up of four different A payments of 200, that paid by the wholesaler, that paid by the weaver, that paid by the spinner and that paid by the farmer. It seems, then, that there is no loophole for Major Douglas's " deficiency." Fortunately, however, he has given us, in one or two places, his reasons for disagreeing with the account which is presented here and thereby a more precise explanation of the source of deficiency.

The B payments, Major Douglas admits, are simply the sum of the A payments. But that does not prove that consumer's income will buy all finished commodities at cost of production prices. Such a conclusion leaves out the all

important element of time. It is true that the money *has been paid out in the past.* But precisely for this reason it will not be available in the present. " The money representing the B payments was wages, etc., spent in the past by the recipients in order to live. It has long ago gone back to the banks in repayment of loans, and been cancelled."[1] " While the final price to the consumer of any manufactured article is steadily growing with the time required for manufacture, during the same time the money distributed by the manufacturing process is being returned to the capitalist through purchases for immediate consumption."[2] These are merely two of several passages in his works revealing the same line of thought. But it is illustrated best of all by an example which he himself gives of this process in his latest important work. Major Douglas takes the case of a man employed on the production of linen. To produce a certain quantity of linen takes six weeks of this man's work and he is paid by his employer at the rate of £1 a week. There are no other costs and hence the cost of the linen is £6. It is true, says Major Douglas, that the whole of this £6 has been distributed, but the fact remains that in the week during which the linen is completed only £1 has been paid and that this £1 alone is available for the purchase of the linen.

" Obviously the cost of the linen must be £6, and this will be the price, plus profit, which the capitalist would place upon it. Quite obviously only one-sixth of the purchasing power necessary to buy the linen has been distributed, although ' at some time or other ' all the £6 has been distributed."[3]

How far is this example and the two quotations which precedes it an accurate account of what actually happens ? Broadly speaking the contention is that the costs incurred in the production of a commodity, which we have seen may be regarded as the total A payments made in respect of it at all stages, are less than the available purchasing

[1] *The Nation's Credit*, by C. G. M.—(a pamphlet by a disciple).
[2] *Economic Democracy*, p. 61. [3] *Monopoly of Credit*, p. 34.

power when it comes to be sold. Now the available purchasing power depends entirely on the A payments which are being made *during the period of time* when the commodity reaches the market. It is evident therefore that if the employers at the " earlier " stages of production continue to produce the same raw materials and semi-finished goods, etc., and employ the same men week after week the available purchasing power will equal the total A payments made and these will equal the cost of production of the commodity.

To put it shortly a deficiency only arises in so far as there is a discontinuity in the process and the employers in the earlier stages either diminish their A payments or stop production altogether.

Presumably when Major Douglas speaks of the money as " returning to the banks " this curtailment of production is precisely what is envisaged. But does the money, in fact, return to the banks ? It is, indeed, the case that individual loans are continually being repaid and overdrafts diminished. But the question, it must be emphatically stated, is not whether particular loans are repaid but *whether on balance the total volume of Bank credit in use by industry is continually tending to diminish.* Only if this is the case can we accept the view that there is a permanent tendency towards a deficiency. Major Douglas, in that part of the analysis which we have so far pursued, advances no arguments in support of this view. Most economists, at the same time, would accept the opinion explained elsewhere in this book that *at certain times* there is such a tendency for a decline in the volume of credit. But they would hasten to add, what Major Douglas does not appear to concede, that at other times there is a tendency for the volume of credit to increase and for a surplus to take the place of a deficiency.

So far, therefore, Major Douglas does not appear to have added very much to our knowledge of monetary processes. But to leave the matter at this point would be both misleading and unfair. For we have yet to consider the third

and most important answer which Major Douglas offers to the problem of the source of deficiency.[1]

The description of the process of production so far given both in the quotations from Major Douglas's works and in our comments upon them has implicitly omitted two important conditions which are to be found in the real world. In the first place we have assumed that the B payments consisted of sums paid to other organisations in return for materials or semi-manufactured goods[2] supplied by them. It is true that these always must form an important part of the B payments. But there are other B payments as well which cannot be ignored. In particular there is one B payment of a peculiar kind upon which Major Douglas lays special emphasis as a source of " deficiency "—that is the allowance for depreciation which is normally included in costs. Investors, the owners of factories, buildings, shops, etc., expect to receive back in their takings sufficient money to compensate for the decline in the value of their capital. Thus if a certain piece of machinery is expected to last five years, its owners will expect to receive during these five years the whole of the sum originally spent upon it together with the interest on this sum. Hence in the cost of the commodities which this machine produces must be included these depreciation payments which, in total, add up to the value of the machine. Now, the existence of such charges implies the existence of " fixed " capital of a durable character, and this in turn implies that " saving " must at some time or

[1] In certain parts of his work Major Douglas appears to be arguing only that consumers' incomes will not buy *all* products (i.e. semi-manufactured goods and raw materials as well as consumption goods). The prices to which the A and B theorem applies are regarded as the prices of *all* commodities. It is of course true that consumers' incomes are not sufficient to buy semi-manufactured goods and raw materials, but that does not mean that these articles will not be bought. They will in fact be bought by other organisations with B payments. It is true that these B payments and the A payments as well can only be made in many cases if credit continues to be provided. But Major Douglas gives us no special reason why it should not be.

[2] As in diagram on p. 351.

other have taken place ; individuals must have refrained from buying goods for immediate use and must, instead, have saved and invested their money and become the owners of this fixed capital. This process of saving and investment is the second condition of economic life which we have so far omitted.

Major Douglas, in describing how deficiency arises from this source, generally starts with the original act of saving. Perhaps the best account he has given of this matter is to be found in a recent public statement. " The source of the discrepancy to begin with is in the process of investment. Supposing there was none of this discrepancy to begin with, that is to say, if we start from zero, if you save a certain amount of money which has been distributed through the process of creating costs, then quite indisputably the goods having the price values representing the amount of money saved cannot be sold again or bought. . . . Let us say as a physical fact that in the City of Birmingham £100 of wages are distributed this week and that £50 of those are saved. The goods which were produced during this week would have at least £100 of cost in them without going into the question of allocating costs at all. Quite obviously, if you save £50, that £50 of goods which are represented by the savings cannot be bought at that moment. Now then supposing you apply that £50, not to buying more consumable goods, but to create some more capital goods, in making those capital goods the £50 will undoubtedly go out again into the consumers' market, as you yourself explained, and the consumers' goods, the original consumers' goods, can now be bought. The deficiency has been restored, but you have capital goods to the extent of £50 against which there is no distribution of purchasing power."[1] The deficiency in this case is therefore traced ultimately to the act of saving and investment, which creates fresh " values " which eventually must enter into costs, while at the same time no fresh purchasing power is created.

[1] Report of the Douglas-Hawtrey debate, *New Age*, April 6th, 1933.

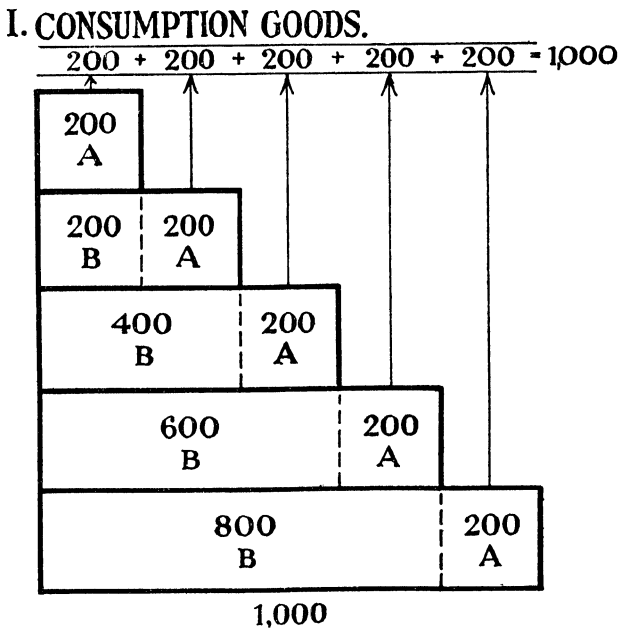
Now it is true that when *additional* new saving takes place, when—that is to say—consumers decide to spend on consumption goods a smaller proportion of their incomes, there must be a depression in the industries which produce those consumption goods.[1] Either, as Major Douglas would have it, the goods remain unsold, or prices fall and the goods are sold at a loss or at least at a reduced profit. Some economists would argue that this depression, at first local, may become general. The failure of demand for consumption goods may so affect the investment market that the savings which have been made may never be really invested. There is no increased demand for capital goods and there results a definite " deficiency " of purchasing power. But it is not on these lines that Major Douglas is arguing. For he takes it for granted that the money saved will actually be invested, will be spent on the production of capital goods. We must therefore ignore any deficiency from this source. The deficiency only appears after the new capital goods have been made and are actually in use and have, through depreciation charges, added to costs.

It is necessary, however, to correct some minor points in Major Douglas's account of what happens after the new saving takes place. First we must distinguish between the case where the saving continues at its increased rate and—to use the original example—50 per cent of the consumers' income is saved, and the case where the original saving is only temporary and society relapses into spending the whole of its income on consumption goods.

If we assume that the saving continues it is not true to say that the original consumption goods which were at first left unsold can be bought. What in fact will happen is that the permanent change in demand from consumption goods to capital goods will first leave the former trades depressed and the latter prosperous and later lead to a transference of resources from the former to the latter, until a more or

[1] It is assumed in this example both by Major Douglas and ourselves that the quantity and velocity of money in circulation remain constant.

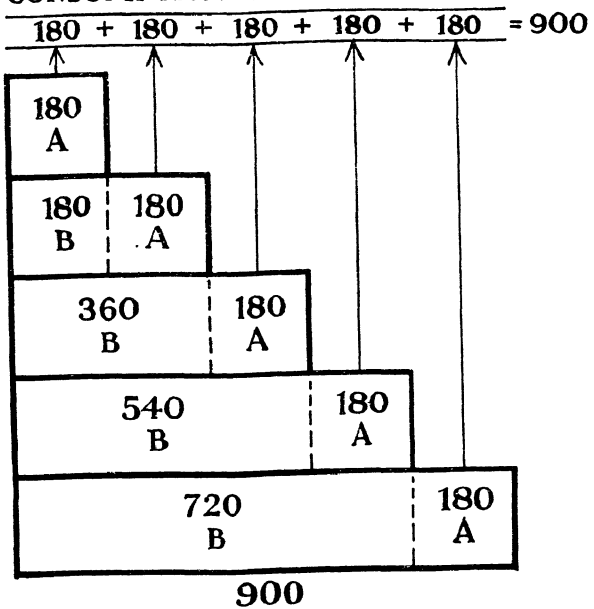
less equal level of prosperity is restored. If " starting at zero " means that we start with no unemployment, the new capital equipment will probably not be made until resources have been moved from the depressed consumption goods trades. Now there is nothing peculiar in this process. It is so far exactly paralleled by a change in demand between different types of consumption goods



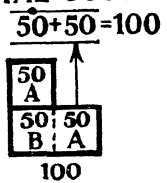
from woollen to cotton clothes or from lace curtains to radio sets.

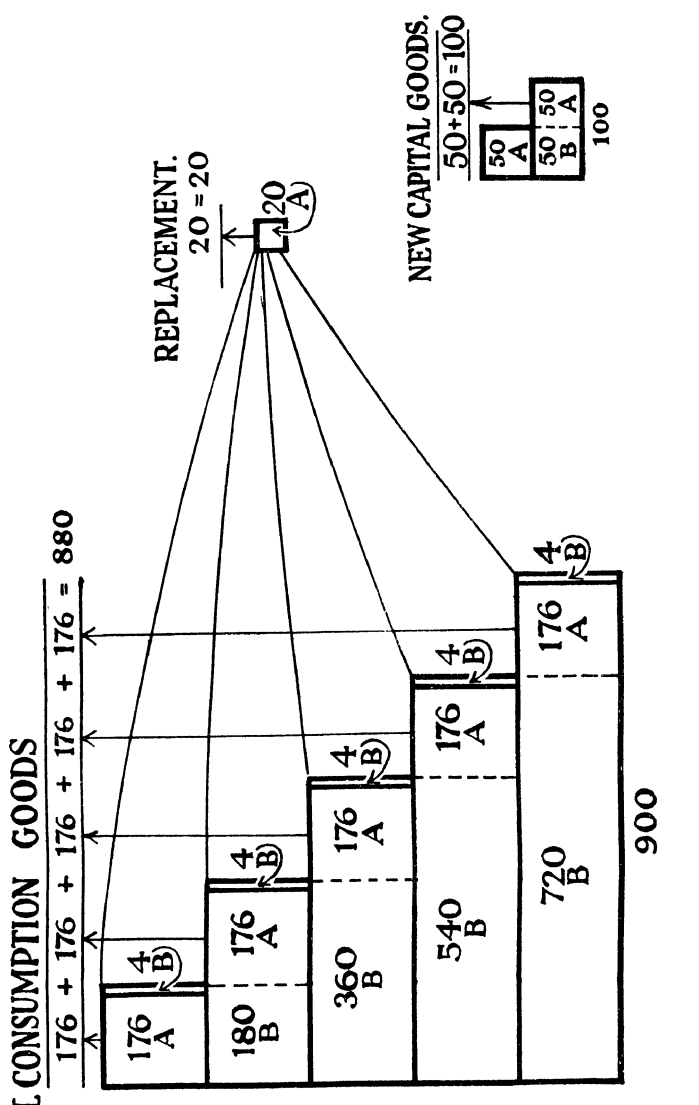
But what happens when the new machines are used in production and depreciation charges have to be made ? Is it true that, as Major Douglas says, " The machinery which has been made in the second cycle of production is now a charge on further production for which no purchasing power exists " ? At first sight it seems only too clear that this must be so, for it is the assumption that no fresh

II. CONSUMPTION GOODS.



CAPITAL GOODS.




III. CONSUMPTION GOODS
176 + 176 + 176 + 176 + 176 = 880
REPLACEMENT.
20 = 20
NEW CAPITAL GOODS.
50+50=100
176 A
4 B
180 B
176 A
4 B
360 B
176 A
4 B
540 B
176 A
4 B
720 B
176 A
4 B
900
20 A
50 A
50 B
50 A
50 B
100

purchasing power is created, and yet that part of the B payments of producers which is "depreciation" *must* increase. There is however one loophole. For while it is true that the B payments of those producing consumption goods are increased, it is possible and, as we shall see, probable that *their A* payments may be reduced to precisely the same extent. In fact, providing that the depreciation funds are used to purchase new machines to replace the old ones, this must involve a transference of resources from the consumption goods trades to the production of machines. Consequently the A payments of the consumption goods producers must be reduced and by precisely that amount which they set aside for depreciation and spend on the purchase of new machinery.

The matter can be made clearer by a series of tables showing the movement of resources, the size of A and B payments, etc., at different stages.

In diagram I we have the initial "zero" position in which no saving takes place, the total A payments equal 1,000 and this equals the cost of the final producer; as a result production proceeds smoothly.

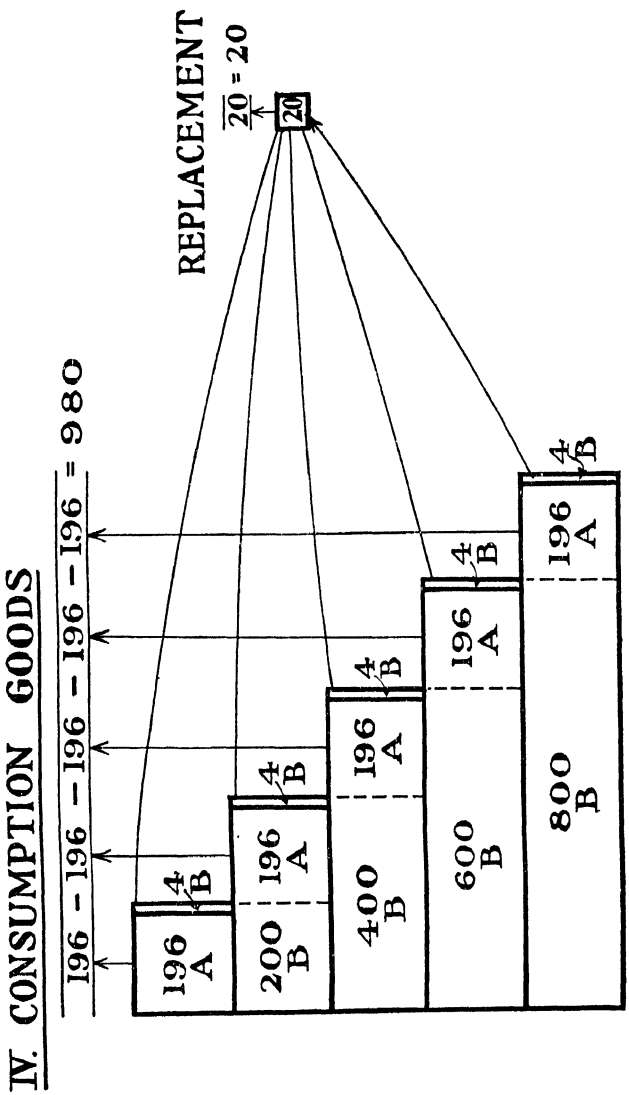
In diagram II 10 per cent of the total money income is saved and invested; resources have been transferred to the capital goods trades; the consumption goods trades are accordingly smaller; but we have not quite reached the point at which the new machines are used. The A payments in consumption goods trades are 900, in capital goods trades 100. The cost of production in the former is 900, in the latter 100. In this as in the next diagram it is assumed that 10 per cent of the total income is still being saved and invested so that the relative demands for consumption goods and new capital goods remain stable, i.e. at 900 and 100 respectively.

In diagram III we reach the crucial position. The new machines are in use. Hence in the consumption goods trades the B payments are higher on account of depreciation charges. In our example they are increased by four at each stage or 20 altogether. But simultaneously

the A payments here are reduced, precisely because resources have been transferred to produce those things on which the additional B payments are spent, that is to say —new machines to replace the old ones. They are reduced also by exactly the same amount as the B payments are increased, i.e. by 20. The gross costs, therefore, of consumption goods trades remain unchanged at 900. But does not this leave a deficiency, since the A payments are now only 880 ? The answer is that another 20 A payments which we have to reckon as consumers' purchasing power is made by those who produce the machines for replacement. Workers move from one occupation to another but the *total* A payments in the system remain the same.

At the same time saving continues at the old rate and new capital goods are produced. Two further consequences have to be noted. As the volume of capital increases, a larger proportion of the community's resources have to be devoted to the work of replacement and the process of transference just described is repeated. Secondly the output of consumption goods grows steadily and the price per unit must fall.

Now if we take the case where the saving does not continue at the new rate, there is no essential difference in the analysis. All that happens is that the resources which were employed in producing capital goods can no longer be employed there, but will have to return to their old employment and produce consumption goods. The total value of consumption goods is increased to its old level. The only change is that there is now a certain amount of new machinery and a certain proportion of resources devoted to the replacement of that machinery. The difference between this and the previous case is that now this proportion does not tend to change, because there is no further increase in capital equipment, whereas previously the proportion was constantly increasing. The position is displayed in diagram IV; it will be seen that here again there is no deficiency of purchasing power and for precisely the same reasons—that the increase in B payments is offset by a decrease in the A payments in the production of


IV. CONSUMPTION GOODS
196 - 196 - 196 - 196 - 196 = 980
REPLACEMENT
20 = 20
196 A
4 B
200 B
196 A
4 B
400 B
196 A
4 B
600 B
196 A
4 B
800 B
196 A
4 B
1,000

consumption goods, while the total A payments do not decrease since they are paid out elsewhere.

The conclusion then to which we come is that provided that there corresponds to the depreciation charges actually entering into costs an equivalent expenditure on capital goods—irrespective of any *new* saving and investment that may be taking place—there is no reason to expect a deficiency. Does this correspondence exist?

Now it is no doubt true that a single firm selected at random will very probably be merely accumulating funds against the day when it has to order the new machinery to replace the old. To the depreciation item in its costs there will not correspond any immediate outlay of purchasing power which will flow to consumers. It may simply leave funds on deposit with the banks or it may purchase securities. But while some firms are doing this it is reasonable to suppose that other firms are doing the opposite. They will actually be buying the new machinery, using up funds previously idle or else selling securities. Deficiency will only arise if the rate at which funds are being accumulated is greater than the rate at which they are disbursed. Is this likely to be the case? There is one argument which might be put forward in support of its probability. So long as new investment is taking place and the volume of capital equipment is increasing the total amount of depreciation charges must increase too. Firms will be increasing the size of their B payments. Will there correspond to this an increase in the amount spent on machinery? Now if this latter amount depended *entirely* on the funds which had *previously* been set aside when there was less capital equipment, there would be no such increase. To a certain extent this will be the case. To a certain extent an increased volume of capital will involve an increase in the funds held idle for replacement and therefore a constant excess of the total of depreciation charges over the total money spent on machines for replacement. Here it seems is the core of truth which lies within the highly confused and much misunderstood Douglas analysis. But its importance must not

be exaggerated. It is by no means certain that the funds will be idle. Directly or indirectly they may be lent to others who in using them will prevent the deficiency from arising. Moreover there are so many other influences affecting the monetary circulation that we cannot ascribe great quantitative significance to this alone. Nor can we conceivably regard it as a satisfactory explanation of familiar trade depression. Nevertheless, as a tendency which has, amongst many other matters, to be taken into account it is certainly worth observing. If it was really perfectly clear that this was the essential part of the Douglas theory, we could credit Major Douglas with having made a minor but definite contribution to monetary theory. Unfortunately both because of the other explanations of "deficiency" and also because the cure which Major Douglas offers seems to be quite remote from this particular analysis, it cannot be taken for granted that this is the case.

Before passing to that cure it will be as well to mention certain other features of a society which is accumulating capital and which lead to difficulties of a kind, even though these difficulties lie rather outside the main lines of the Douglas analysis. It has already been pointed out that an increase in the rate of saving results in a depression in the consumption goods trades which may conceivably become general. But is it so certain that depression is avoided even if the rate of saving is constant?

Is it not the case that the steady accumulation of capital enables a larger and larger output of consumption goods to be produced? Will not this increased output cause a fall in prices? And are we not constantly informed that falling prices are at the root of trade depression? If this line of argument were correct it would seem that although there may be no actual leakage, the system naturally requires an increase in the quantity of money proportionate to the increase in the volume of output. There can be no doubt that the first steps in this agreement are perfectly correct. An increase in capital equipment does lead to an increased production of commodities and this in turn must, if the

flow of consumers purchasing power is unchanged, cause a fall in prices. But is it so certain that falling prices do lead to industrial depression ? Only if at the same time costs are not reduced. Yet it is precisely this reduction of costs which the introduction of new capital equipment makes possible.

Output is enlarged, the costs as a whole may be unchanged or may even increase, but the *cost per unit* which is the vital matter will have been reduced. Thus the popular view that falling prices are *always* harmful is seen to be without foundation ; the mere fact of an increased output without any increase in the quantity of money need not lead to unemployment and depression.

There remains however one other matter to which Major Douglas occasionally refers although he appears not to lay particular stress upon it. We have seen that the view that there will be no payments to meet depreciation costs is unsound. But the existence of new capital involves not merely the payment of depreciation charges but also the payment of interest. How, assuming that the total volume of payments is unchanged, can this be paid ? The only possible answer appears to be that the introduction of new equipment will not only involve a fall in the cost per unit of output but also a change in the proportion of this cost between interest and wages. If *the rate of return on capital remains constant* or falls only slightly, the total volume of interest payments must be larger than before while the total volume of wage payments must be smaller. In other words the increase in the supply of capital combined with technical change, which serves to maintain the rate of interest, must be accompanied by a fall in the money earnings of labour, though since prices will also have fallen this may not mean a fall in *real* wages. It will be observed that in Major Douglas's terminology this is simply a change within the A payments between interest and wages which does not raise the question of A +B at all. Nobody can help observing the grave social consequences which may follow continued attempts to lower money wages, but

we must not confuse this situation with that of a " technical " deficiency.[1]

This long and intricate discussion of the famous A + B theorem and the arguments with which it is supported is now completed. We have detected at least five different interpretations and discussed them all. For the sake of clarity we will summarise them here :

1. Understanding prices to mean the prices of consumption goods, A to mean total A payments, A + B to mean total A + total B payments, the statement " A is less than A + B " is clearly true. Nevertheless this is unimportant, since we should not expect consumers to have to pay to the retailer the aggregate of *all* costs, but only the aggregate of the retailer's costs.

2. The simple argument that A is less than A + B is not self-evident as soon as we realise that A (standing alone) represents total A payments and that A standing with B represents only the retailer's A payments.

3. The argument that, while the retailer's costs are made up of A payments made in the past, these A payments are not available at the time when the commodity is ready for sale is seen to be untrue so long as production is continuous and there is not on balance a constant tendency for the volume of bank credit to diminish.

4. If costs be understood to mean the costs of *all* goods, including semi-manufactured goods and raw materials, then it is true that consumer's incomes—A payments—will not cover them. But at the same time it is not necessary that they should. For in the demand for *all* goods we can include all B as well as A payments. To say that the possibility of continuing these payments depend on the existence of Bank Loans is true but does not indicate any " deficiency."

5. If the formula be abandoned in favour of a statement

[1] Major Douglas is, of course, aware that new investment is quite frequently financed not out of genuine savings but out of Bank credits and that consequently there is initially at least an increase in the total quantity of purchasing power. But he believes that this money is repaid to the Banks before the new capital goods are used up and that the deficiency therefore again appears. (See *Warning Democracy*, p. 100, *seq.*).

to the effect that " deficiency " arises out of depreciation charges, then it will be seen that even this is not true providing that workers are employed in replacing the machinery and receive A payments equivalent to the B depreciation charges. Nevertheless constant capital accumulation makes a certain tendency to deficiency probable. For at any moment the depreciation charges made by industry will tend to exceed the actual sums spent on " replacement " machinery to the extent that there are new machines against which depreciation is charged but which are not yet being replaced. This appears to be the only case out of all those cited by Major Douglas in which a tendency to " deficiency " may actually be said to exist. It is one of many factors which have to be considered in any examination of the velocity of circulation of money.

It may seem surprising that a theory which is at once so ambiguous and so involved should have found so much support. But, apart from the attractions offered by " the cure," which we have yet to discuss, the popularity of the Douglas view is in all probability to be explained precisely through its ambiguity and complexity. For each supporter there is an interpretation which suits his intelligence and his knowledge. For the critics there is not one but a collection of heads to cut off. An opponent may destroy to his own satisfaction one of the interpretations, but another will appear in its place. Unless he be gifted with exceptional patience and enthusiasm he will turn away in helpless irritation long before the complete repertoire is exhausted. Other reformers appeal to the same sentiments—the rapidity of technical change, the mysterious and wicked power of the banks, the ease with which crisis and depression may be surmounted if only *the* way is used, but none have that defensive weapon against rational criticism—the ambiguous statement—so perfectly at hand, so efficiently controlled as the followers of Major Douglas.

As we should expect, Major Douglas's remedy for the economic situation involves some kind of compensation for

the " deficiency " of purchasing power which he is at such pains to demonstrate. But the methods by which he proposes to achieve this object are both peculiar and complicated. He rejects two well-known methods of increasing purchasing power, namely an increase in Bank credits and a direct increase in consumers' incomes, the first because it involves an increase in costs and so leaves the *ratio* between costs and consumers' purchasing power unchanged, the second because it will lead to a rise in prices.[1]

As an alternative which suffers from neither of these defects he puts forward the following plan.[2] On a certain day the Government shall decree that prices are to be *reduced* in a certain proportion. How this proportion is decided may be left on one side for the moment. Producers who sell at the lower prices thereafter become entitled to credits supplied by the Government equivalent to the difference between the new and the old prices in respect of each article sold. For these credits no interest is charged and no security required. It would probably be better to call them subsidies—though it must be understood that they are provided out of " new " money and not out of taxation. Supported in this way, producers find themselves as well off as they were before the prices were lowered. Consumers on the other hand obtain the benefit of the lower prices and are able with the same money incomes to buy more goods. In this way the glut of goods is brought to an end, stocks are rapidly diminished and new orders consequently given. Turnover, Production and Employment increase, while prices instead of rising are actually lower.

Before discussing the mechanism by which the proportion of price reduction and " subsidies " is settled, we may examine the general effects of these proposals whatever the proportion may be.

Almost all critics have been content to point out that the increase in purchasing power (which, as we shall see, is

[1] See *Minutes of Evidence*, Macmillan Committee, p. 302.

[2] Major Douglas sometimes describes his proposals a little differently. But this is their most usual form.

intended to be very considerable) must have inflationary effects. This attitude does not do justice to Major Douglas's suggestion. For it is a *condition* of the granting of the " credits " that prices should not merely *not* have risen but that they should actually have fallen ; it is therefore at least clear that any tendency for prices to rise would not be cumulative.[1] For at the first sign of rising prices no more new money is created. This point and indeed the whole problem can be best explained by an illustration. Suppose the consumers' income in a given period is represented by 100 and the proportion by which prices are to be reduced is 25 per cent. Then, after the sales of the first batch of goods, producers continue as before while consumers have an extra 25 units to spend. The character of the next situation depends on the extent to which prices rise. If the fact that consumers now have 125 units instead of 100 leads to a rise in prices then no more credits are granted. Producers receive and spend 125 instead of 100 and the income of consumers remains equal to 125, since these incomes are of course derived from the funds in the hands of producers. There is no " gigantic " inflation but merely an increase in the total money incomes and purchasing power equal to the first " credits " granted.

If on the other hand prices do not rise in the second period this may have one of two causes. Either consumers will be simply hoarding the additional available income which they possess, in which case, for the time being, there will be no change from the original position, or they may have been able to buy with it additional goods, assuming that these are available. If this has happened then the increase in total money incomes will continue. For producers receive the same or greater total receipts than before but—since prices are still below the original level—they will also receive subsidies or " credits." Their increased receipts will lead to increased expenditure on their part and so to increased consumers' income until finally prices do begin to rise and the supply of additional money produced by the

[1] Except to the extent that the velocity of circulation might be affected.

Government is cut off. The effects of no longer providing additional funds and indeed of the whole process of increasing purchasing power have been dealt with elsewhere and need not delay us here. There can be no doubt that Major Douglas's proposals are "inflationary" in a sense and would lead to "boom" conditions if they could be put into operation without panic. But there seems no reason to suppose that they would not also lead to a collapse. Major Douglas does not show how the refusal to renew "credits" on the part of the Government would differ in its effects from the refusal of the banks to renew loans and overdrafts. There would, it is true, be certain peculiarities arising out of the form in which these new "credits" were given, but the general consequences would not be essentially different.[1] One must add of course that the technical difficulties of any such price regulation would be enormous owing to the difficulty of discovering how far the price reductions were or were not genuine, for, since the prices considered are those of retail goods, the range and quality would be colossal and far greater than for those commodities which are usually included in wholesale indices.[2]

The most peculiar characteristic of the "cure" remains however to be described. It will be remembered that prices are to be reduced in a *certain* proportion. How is this proportion determined? It is clear that the proportion also determines the extent to which new money is to be created.

[1] In particular the trades producing consumption goods would be stimulated, whereas in the ordinary investment boom the trades producing capital goods receive the first benefits.

[2] This analysis omits any possible drain or deficiency such as Major Douglas supposes to exist. If there were such a deficiency and it was equal to the "subsidies" to be granted, the initial position would be Consumers' Income 100, Producers' Costs 125. Goods would be sold at 100, thus enabling consumers to buy them while producers would be reimbursed to the extent of 25 by the State. In the next stage precisely the same process would be repeated. Consumers' Income would be once again 100, Producers' Costs 125. The goods can be sold, but only if prices are lowered and the producer's "losses" financed by the State. The assumption, of course, is that initially prices (determined even in the short run by costs) are too high and that consequently goods cannot be sold. Under these conditions, where a regular deficiency exists, there would of course be no inflation.

We should therefore expect this to be based on the "deficiency" of purchasing power revealed by the earlier analysis. To use Major Douglas's symbols we should expect prices to be reduced in the proportion A : A + B and the new credits to equal the difference between the two. This is however by no means the actual proposal. "The Just Price of an article, which is the price at which it can be effectively distributed in the community producing it, bears the same ratio to the cost of production that the total consumption and depreciation of the community bears to the total production."[1]

"This price shall bear the same ratio to cost as the total National Consumption of all descriptions of commodities does to the total National Production of Credit, i.e. Cost : Price :: Production : Consumption.

$$\text{Price per Ton} = \text{Cost per Ton} \times \frac{\text{Cost Value of Total Consumption}}{\text{Money Value of Total Production}}$$

(Total National Consumption includes Capital Depreciation and Exports. Total National Production includes Capital Appreciation and Imports)."[2]

"We can say that the Just Price (i.e. the price at which retailers should sell to the public in order to reproduce the physical facts of production and consumption) is :

$$\frac{\text{Total National Consumption}}{\text{Total National Production}} \times \text{Financial Costs.}$$

An example may illustrate this. Suppose it is decided to introduce this system on 1st January of any year. It would first be necessary to ascertain the figures for total national production and total national consumption measured in terms of money for the previous period of, say, six months. Imagine that the ratio between these two is found to be 5 : 2, then the Just Price of Consumers' goods during the six months following 1st January would be two-fifths of their financial cost, calculated on the average price-level for say the preceding year. That is, consumers would buy goods from retailers at two-fifths of the usual price, and

[1] *Economic Democracy*, p. 135. [2] *Credit Power and Democracy*, p. 189.

retailers would be reimbursed the remaining three-fifths by the State, the money for the purpose being created against the real credit of the nation."[1]

It will be seen that the fraction $\frac{\text{consumption}}{\text{production}}$ could only be the same as the deficiency fraction $\frac{A}{A+B}$ if the deficiency is exactly equal to the amount of *net new investment* which takes place simultaneously. But in none of the various versions of the A + B theorem is this meaning claimed for it. If we take, for example, the most reasonable one, that the deficiency is due to depreciation charges, it is clear that these have nothing whatever to do with the new investment which is taking place *during the same period of time.* It is possible for depreciation charges to be made when there is no new investment at all taking place and the fraction by which prices are to be reduced is then 1.

Another curiosity is the estimates which Major Douglas and his followers have made of the actual size of this fraction. Even in times of great prosperity or perhaps in the early stages of a boom, when capital accumulation proceeds rapidly, it is improbable that as much as 20 per cent of the national income is saved and invested. Such a state of affairs would make the fraction by which prices are to be reduced four-fifths. But the estimates of Major Douglas and his followers range from two-fifths to one quarter and even to one-ninth. That is to say, they believe that only $\frac{2}{5}$ or $\frac{1}{9}$ of the total production of a given period is consumed. The rest constitutes addition to capital equipment.

But even more surprising is the conclusion that since the price reductions and the subsidies are to depend on the degree of net new investment, Major Douglas's remedy is to be applied most forcibly and firmly during the early and middle stages of a boom. In times of depression, when many people are inclined to argue that there is a constant tendency to " deficiency," the degree of new investment falls

[1] C. G. M., *The Nation's Credit*, p. 13.

almost to nothing and hence the fraction by which prices are to be reduced and new money created approaches and possibly equals 1. In times of boom, on the other hand, an additional and apparently quite unnecessary stimulus is to be given. It may be, of course that the fraction is misinterpreted and that it refers not to the actual amount of new investment but to some vague notion of capacity or potentiality. Or possibly the increased purchasing power during the boom is intended to anticipate and so prevent the subsequent depression. Or again it may be that new capital goods have become confused with depreciation charges. Or even that this part of the remedy is a remnant of an earlier analysis in which the deficiency was believed to be much greater, to be equal perhaps to the whole of the B payments. Such possibilities may be interesting. They cannot be said to be easily deducible from the text.

We must conclude therefore that while the remedy proposed by Major Douglas is in general a logical sequel to his " deficiency " analysis and is perhaps less inflationary than some critics have supposed, the particular method by which the size of the remedial dose is to be settled appears to have no special connection with the earlier part of his work. This is unfortunate not only in so far as it leaves the purpose of the cure rather vague, but also because we are provided with no further clue as to which interpretation of the analysis is the correct one. The critic, must, to the end, remain in difficulties, fighting not only dogma but obscurity. It is not only for his conviction but also for his methods that Major Douglas must be regarded as a religious rather than a scientific reformer.

PROFESSOR FREDERICK SODDY, M.A., F.R.S.

PROFESSOR FREDERICK SODDY, M.A., F.R.S., is as the letters after his name imply, a very distinguished man. He was the Nobel Laureate in Chemistry in 1921, is the

author of many works in this subject and to-day holds a professorship in the University of Oxford.

In the introductory pages of one of his books he tells us how he came to devote himself to the study of Economics. The story is an interesting though a familiar one. The discovery of the existence of radio activity led him " to consider what sort of a world it would be if atomic energy ever became available." He developed a theory of the part played by " energy " in history, of the importance of the discovery of coal and the power which its consumption gives. But this consumption is not merely of revenue, but of capital. " You cannot burn it and still have it, and once burnt there is no way, thermodynamically, of extracting perennial interest from it . . . the flamboyant era through which we have been passing is due not to our own merits, but to our having inherited accumulations of solar energy from the carboniferous era, so that life for once has been able to live beyond its capital." Then came the familiar question, " Why Poverty to-day ? " and the familiar decision " that the crying need becomes not for ever and ever greater accessions of physical power, but for the knowledge how to secure the fruits of what we already possess."[1] So Professor Soddy became an economist.

His writings betray certain striking similarities to those of Major Douglas. Both emphasise the great potentialities of modern technical progress, both distrust any philosophy which insists on the virtues of poverty, both reserve their most vitriolic passages for banks and bankers and both regard war as the result of a struggle for exports caused by a deficient monetary system. But there are important differences—above all in the account which they give of this monetary system—and hence in the remedies which are proposed. There are differences too in their methods of presentation, for Professor Soddy, though in some places obscure, is, compared with Major Douglas, positively limpid.[2] His general viewpoint is, also, much closer to

[1] *Wealth, Virtual Wealth and Debt*, ch. i.

[2] Professor Soddy is more polite to his fellow enquirers than is Major

that found elsewhere in this book, although in parts his conclusions are distinctly " heretical."

Professor Soddy objects, above all, to one characteristic of the present monetary system and to this he is inclined to attribute all evils. This characteristic is the power of the banks to grant loans which, because no genuine saving lies behind them, are really " fictitious." " Every accession to the quantity of wealth immobilised in a productive system must be paid for by abstinence from consumption. The owners, for the time being, of money contribute a part—usually a small part—unwittingly. The rest must be met by genuine permanent surrender of rights to consume. These conditions observed, the revenue of wealth can be permanently expanded in a scientific era, to an almost indefinite extent. It is because the *genuine* initial abstinence is burked that the existing system is what it is. This, in brief, is the solution of the economic paradox."[1] This quotation from the preface of his largest book is a clear statement of the essential point in Professor Soddy's argument. He objects, be it noticed, not to genuine loans where the lender gives up what is lent to the borrower, but to loans made by banks which are simply an increase in the amount of money in circulation.

His reasons for this objection are, it must be admitted, not entirely economic but also moral. He argues that new money should be issued by the State, for, when it is issued, " the issuer of money, who first puts it into circulation, cannot help getting something for nothing, namely the exchange value of the money." The community gives up something to the holder of the new money ; it should be

Douglas. The Professor writes, " He found himself . . . setting out to persecute the economists and ended, if not by becoming one . . . hopeful of ultimate reconciliation. At least he now has a more lively respect for the subtle pitfalls with which the subject abounds." The Major writes of " professional economists, necessarily in the direct or indirect employ of banks or insurance companies," and likewise of " The London School of Economics, an institution which combines the various qualities of being the fount of financial orthodoxy, staffed by the flower of socialistic personnel, chiefly chosen and paid by bankers and financiers."

[1] *Wealth, Virtual Wealth and Debt*, p. 10.

the community which receives this something in exchange. Historically, Professor Soddy points out, the manufacture of currency was a privilege of the Crown. But in the modern banking system currency is reduced to unimportant proportions and the bulk of the new money created is cheque money. This cheque money is created not by the Crown but by the banks.[1]

" The banks, by the cheque system, have invented a means of issuing money without coining it or even issuing a bank note, and this form of money in quantity makes the whole of the rest insignificant. They have received in exchange for it the community's goods which have been consumed by the persons to whom they ' lent ' the money, and they are owed by these borrowers for what the community has been compelled by the issues of money to give up."[2] Professor Soddy draws particular attention to the large increase in the quantity of bank money which took place during the War. He argues that the Government's wartime expenditure could have been financed by simply printing additional notes. The State refrained from doing this because it was " unsound " finance and not fair to the owners of money, the value of which would naturally fall. In fact, however, the War Loans, on which the Government has to pay interest, were financed to the extent, at least of £1,500 millions, by fresh cheque money from the banks.[3] " The State, when it borrowed in the first instance from the owner of the security, was acting in justice to the owners of money in general, so that its debt to them should not be repudiated in part as it would have been if the State, instead of borrowing it, had itself issued the money. This is precisely what the banks have now done, and we

[1] *Money versus Man*, p. 32. [2] Ibid., p. 92.

[3] It is one of Professor Soddy's remedial measures that the community should regain possession of this sum. The method by which this shall be done is, briefly, that the banks shall not renew loans when they mature but shall repay the National Exchequer with the funds thus set free. The Exchequer will then at once buy back part of the National Debt with these funds so that there is no decrease in the quantity of money in circulation. Gradually the whole of the sum which the banks really owe the Government will thus be paid off.

reach the amazing conclusion that the State is now paying interest on the loan to the banks for doing the very injury to the owners of money for which interest is being still paid to prevent being done."[1] There is no doubt whatever of the force from a purely moral standpoint of this protest against the private issue of new money. It would, it is true, be still more effective if bankers' loans continually expanded, and times of depression, when the repayment of old loans exceeds the granting of new ones, were unknown. It is true also that it is not only the banks who profit by the issue of new money. Such issues, it is well recognised, benefit all those whose incomes are variable and penalise all those whose incomes are fixed. The money, which the banks create in the first instance, passes into the hands of others in the form of abnormal profits. To this extent it is not only the banks who " get something for nothing." Nevertheless, even if it does not touch the whole problem, there is clearly everything to be said for allowing the community alone to reap the benefits which the creator of new money inevitably obtains.

Of perhaps greater interest is Professor Soddy's analysis of the economic effects of fictitious loans. These loans may be wicked, but are they also the cause of industrial depression? Professor Soddy evidently believes that they are, but his reasons for this belief are not always very clear.

At times he appears to be most concerned with the fact that these fictitious loans bear interest and that they lead to the piling up of an immense debt. But his most important argument lies in the view that " fictitious loans " make stability of the price level impossible. " The only essential quality of money is that it should be accepted everywhere without question as legal tender in exchange for wealth at a constant average price, which does not change from century to century, and this quality it has never yet possessed. The physically impossible quality which in our time has been grafted upon it is that it should bear interest."[2]

[1] *Money versus Man*, p. 92. [2] *The Inversion of Science*, p. 16.

But when we turn to the detailed argument in which the existence of " fictitious loans " is shown to be a cause of instability, we find that really it is not so much the payment of interest as the fact that money is put into circulation in advance of the production of finished commodities which prevents the price level from remaining constant. For Professor Soddy points out that when a bank makes a loan of a " fictitious " character, that is to say a loan which is not accompanied by genuine saving, it causes an increased money demand for finished goods on the part of the consumers, since no one has given up the power to consume, while at the same time, in his view, the only addition to production has taken the form of unfinished goods. Hence there is a rise in the price level of consumption goods. This effect incidentally appears to follow quite independently of whether interest is charged on the loan or not. The more interesting question is that of the sequel. In what way does the initial rise in prices lead to a subsequent fall and does this fall provoke industrial depression? On this subject, unfortunately, Professor Soddy is indecisive.[1] Sometimes he puts the blame on an external drain of gold. The rise in prices will cause an excess of imports and this will lead to pressure on the exchanges and an outflow of gold. This in turn will be followed by a restriction of credit and hence money will be withdrawn just at the moment when it is required to purchase the new finished goods. The price level will fall therefore not merely to its original level but below it, and depression inevitably follows.

If, however, all countries inflate simultaneously, then the blame rests directly on the bankers whose " financial interests are predominantly those of the creditor class." Sometimes the bankers' motives are said to be even more

[1] Apart from the explanations mentioned in the text there are certain very inconclusive statements, e.g. " There is an accumulation of new goods coming on the market, and increasing competition for sale because owing to the rise of prices the money can distribute no more goods than at first." " The mere issue of new money . . . ends in depressing the system below its former level of real production at an inflated price."

arbitrary. " To satisfy those who pretend they have lent it (money), it must be periodically drained out of the productive system and the community instead of a live industry is left with the dead corpse. It is most satisfactory to the banker. He creates and destroys the nation's money as though it were his own."[1] " Under modern democracies whose finances are a mere moneylending proposition, there is no one whatever to issue money to consumers, when there is more to be consumed, and it is at this precise moment, under the cat and mouse system, that it is withdrawn again."[2]

The first explanation is doubtless a satisfactory one. It cannot be denied that on a gold standard system, if any one country attempts to keep its price level above those elsewhere, it is bound to get into difficulties, though it may be pointed out that this will be equally true of the case where prices are stable here and falling elsewhere, as it will of the case mentioned in the text where prices rise here and are, presumably, stable elsewhere. But to put the contraction of credit down to the wickedness of the banks is scarcely in harmony with his earlier attack on them for making such large profits out of fictitious loans. For to contract credit is, firstly, to stop granting these profitable loans and, secondly, to lead, during the depression, to their repayment. If the banks appear to profit from the boom like and to an even greater extent than everyone else they will not hanker after falling prices.

Professor Soddy's analysis is then a blend of high moral indignation and careful scientific enquiry. Both the private issue of new money and the charging of interest for this money seem to be morally rather than economically objectionable. But in so far as the issue takes the form of fictitious loans, it involves the creation of new money in advance of new production, leads to a rise in prices and is economically disastrous, because for some reason the money is withdrawn again from the system and hence prices fall and the new goods cannot be sold.

[1] *Money versus Man*, p. 70. [2] Ibid., p. 75.

What is Professor Soddy's remedy? As we should expect, he believes in the abolition of "fictitious" loans. New production must be financed out of genuine saving. Only in this way can the initial rise of prices be prevented. The banks must not therefore issue loans against collateral securities; these securities must be sold by the borrower who thus obtains his money directly from the purchaser. At the same time new money will be needed by the system, when the new goods for the production of which money was saved or securities sold are ready for sale. For if no new money is created the increased output of goods resulting from the investment must cause a fall in prices. Since, believes Professor Soddy, price stabilisation is required, new money must be issued just at the moment when these new commodities are coming on to the market. But this new money must be issued not by the banks, which are private institutions, but by the State. It will be provided in the main through the medium of reduced taxation or increased government expenditure. The budget will be unbalanced to the extent to which new money is required, and the deficit will be financed from this new money which will be provided from the mint.[1] This procedure will be part of a definite policy of stabilising the price level by increasing or decreasing the money supply. Naturally if production is steadily increasing it will be an increase rather than a decrease in the supply of money which will be required. But should the price level show a rising tendency, then it will be necessary to withdraw money, either through increased taxation or through a public loan, the proceeds of which are never to be used. To guide or even to administer this policy there must be, of course, a bureau of statisticians.

[1] Professor Soddy has also suggested that new money might be provided in the form of loans. No interest should be demanded on these nor should it be required that they be repaid. He does not explain how these would be allocated between the rival claimants for them. Nor does he explain how they would not cause a rise in prices. It may be presumed, perhaps, that they are to be issued only when a fall in prices is otherwise anticipated. See *Inversion of Science*, p. 35.

Criticism of this moderately simple plan should occur readily enough to those who have read the remainder of this book. In the first place is it certain that stabilisation is even the right aim for those who determine monetary policy? Might not the increased funds obtained by consumers and which in the first instance prevented prices from falling, lead to a disguised inflation? This would be the case if the increase in production which is anticipated were accompanied by falling costs of production. Although the insistence that no fictitious loans were to be granted would certainly limit the extent to which producers could borrow it would not check an increase in the velocity of circulation. It will be remembered that rising prices were not a characteristic of the boom which preceded the worst slump in history.

But even if there were no dangers here, it must be said that Professor Soddy distinctly underestimates the technical difficulties both of the acquisition of a sound index of prices (he gives us no details of the composition of this index) and of the methods by which the new money is to be created and withdrawn.

For it is difficult to suppose that increased taxation or Government loans, which are a mere cancellation of purchasing power, would not have serious secondary consequences, at least so long as industry remains in private hands and the psychological factor in monetary matters remains so overwhelmingly important. Perhaps one of the most obvious lessons of the recent depression is the extent to which a mere change in the quantity of money, so long at least as it is of a moderate character, has little effect in face of a lack of confidence.

On his analysis we have already made certain comments. Its weakness lies in what is omitted rather than what is said. The account of the economic consequences of fictitious loans is so vague that one is inclined to suspect that the main burden of the attack is really moral; that Professor Soddy, with an almost mediæval hatred of usury and a deep conviction of the wickedness of all banking business

which involved the creation of new money, allowed himself to be convinced too easily of its economic dangers. That these exist no competent economist would for one moment deny, but a correct account of them involves statements of a more definite and closely reasoned character than those which Professor Soddy gives us.

Nevertheless, having made our criticisms, let us pay tribute to the qualities of his work. His preoccupation with " fictitious loans " may have been an accident. But the fact remains that he began in this matter in 1924 an enquiry which many orthodox writers have since pursued, that there are passages in his writing which certainly anticipate unmistakably much recent work on the subject of an ultra-respectable character ; if he failed to conclude the analysis very satisfactorily, that is not a surprising outcome of any pioneer work. Apart from " fictitious loans," his positive suggestion of price stabilisation, criticised though it may be to-day, is still an extremely respectable monetary policy. When Professor Soddy put it forward it was less widely known and more original, but also supported by some of the best known living economists. It is unfortunate from the point of view of the scientific value of his economic work that Professor Soddy was not able to curb some of his reformist fervour. For it seems certain that it was this fervour which led him to be content with such inconclusive arguments and prevented him from pursuing to the end a task begun on an especially fruitful line. " Any stick is good enough," is a motto suitable for the real zealot. And no less if his zeal is directed against bankers. Professor Soddy would have served better his own purpose of acquiring " the knowledge of how to secure the fruits of what we already possess " had he exercised in his economic studies the same detached perseverance as must have been displayed in his work in Natural Science.

SILVIO GESELL

THE NAME and theories of Silvio Gesell were until recently almost unknown in Great Britain. It was not until 1929, the year before Gesell's death, that a book of his was translated into English. Yet this book was first published in 1906, and, fifteen years before that, there had appeared the first of the long series of writings in which Gesell developed and explained his point of view to the German public.

There is much in this point of view which should command the attention not merely of a German but also of an international public. Apart from his own attractive name and still more that which he gives to his two chief proposals of reform—" Free Land " and " Free Money "—the details of his suggestions are by no means without entertainment value. His analysis, moreover, is developed with considerable logical force, is very clearly and pleasantly expressed, and bears a close resemblance in parts to views which lie in the mid-stream of English economic theory. His proposals have received the support, not only of two societies in Germany, Austria and Switzerland, but also of the well-known American economist, Professor Irving Fisher.[1] Above all there are places where they have actually been put into practice, not without certain favourable results.

Silvio Gesell was born in 1862 and died in 1930. The greater part of his life was spent either in business, particularly in the Argentine, or in writing. There was one brief excursion into politics in the stormy years which followed the close of the European War : it was cut short by Gesell's trial but subsequent acquittal for revolutionary activity.

Gesell was not just a writer on monetary topics. His field of interest was much wider, his proposals designed to reform economic society as a whole. His point of view on this general topic was that of an old-fashioned radical. He was an individualist of a progressive type, progressive, however, in what we may call a " Victorian " way ; he

[1] See his recent work *Booms and Depressions*, Appendix vii.

would have had very little in common with Sir Arthur Salter but a great deal in common with John Bright. His aim was to reform the individualist system not by restricting or controlling the economic activities of individuals but by abolishing, in what to him seemed a simple way, two things —the existence of unearned income whether in the form of rent or interest, and the industrial fluctuations generally known as the Trade Cycle. The first of these objects, which, in his opinion, would also involve the second, shows that he had something in common with the Socialists. But the point of agreement is to be found only in this—that Gesell also wished to abolish what Marx called " Surplus Value." The method by which it was to be done was substantially different. Gesell was emphatically hostile to State Socialism. " The choice," he wrote, " lies between private control and State control of economic life ; there is no third possibility. Those who refuse to make this choice may, to inspire confidence, invent for the order they propose attractive names such as co-operation or guild-socialism, or nationalisation, but the fact cannot be disguised that all these amount to the same thing, the same abominable rule of officials, the death of personal freedom, personal responsibility and independence."[1] For Gesell there was a better way out—the introduction of " Free Land " and " Free Money."

In the " Free Land " proposals there is, to be sure, little that is new. The payment of rent to private individuals is to be abolished through the nationalisation of land. This may appear to be a socialist measure. The fact remains, however, that the train of thought which leads up to it is to be found again and again in the teaching of the older individualist thinkers. Practically every one of the English classical economists regarded land as a distinct agent of production, peculiar in that the rents which it yielded were " surplus," derived from scarcity value. Many of

[1] *The Natural Economic Order*, Preface, p. 12. All other quotations in this section are taken from this book, which contains the most complete account of Gesell's views.

them took the further step of treating landlords as individuals who received incomes but incurred no cost, benefiting in a passive way from the increased demand of society for what they happened to own. If they did not go so far as to recommend nationalisation, they were generally favourable to the imposition of special land taxation. Henry George's famous analysis is in substance if not in form identical with and derived from that of David Ricardo. To all these persons and also to Silvio Gesell the nationalisation of land did not imply socialism. The public ownership of land, the gift of nature, was perfectly compatible with private property in everything else and an entirely individualist system of economic control. Like the previous owners the State would be a mere passive recipient. The active work of organisation and initiative in production, the ownership of property which was not a gift of nature would be left to private individuals.

There are however certain peculiarities about Gesell's theory. He believed that the owners of land should be compensated by the issue of State bonds on which interest would be paid. To begin with the State should collect the rents and the money so collected, in the absence of an unforeseen rise in the value of land, would all be required to meet the interest on the compensation bonds. To begin with this will mean no real change at all. Technically the land monopoly may have ceased to exist, but in actual fact tribute will still be levied and paid to individuals. The passionate attacks on landlords end in nothing more than the *status quo*. But at this point Gesell produces his *deus ex machina* in the shape of " Free Money." For it is one of the qualities of " Free Money " that it will do away with all interest payments. The unfortunate landlords who appear to be so happily compensated will find their rentier incomes dwindling, while this automatic expropriation at last places the community in full receipt of all rents. Gesell does not propose to use these funds to reduce taxation. He would prefer to introduce a system of family allowances. And, since Free Money also reduces dividends, thus making

possible an increase in wages, the worker at last becomes either directly or indirectly the recipient of the whole product of his labour.

Meanwhile Free Money, with the help of a certain type of banking policy, eliminates the trade cycle, and a society which is not only free but also just and prosperous comes into being. This is the " Natural Economic Order."

What then is this " Free Money " whose qualities are so miraculous ? It is a money which deteriorates in value, a money which will not be " hoarded," because this would mean loss to its possessor. For, according to Gesell, the possibility of hoarding money is ultimately responsible for the twin evils of interest and industrial depression which he is so concerned to abolish.

Gesell's theory of interest is simple enough. He believes that there is a natural tendency for the rate of interest to fall to zero, that the production of more and more capital goods must lower the return which capitalists can extort. He quotes Proudhon with approval : " Full steam ahead ! Let's have the building fury, give us the building plague ! . . . For some five years only have you been allowed to indulge in your building fury, and already the capitalists feel the pinch, already they are lamenting the decline of surplus value ; rents have already dropped from 4 to 3 per cent—that is by a quarter—three times five years more of untrammelled labour, and you will be revelling in houses freed from surplus value." Why was it then that this happy ending was never reached ? He gives the answer very simply and graphically himself. " Money simply will not suffer another house to be built in addition to every existing house. As soon as capital ceases to yield the traditional interest, money strikes and brings work to a standstill. Money, therefore, acts like a serum against the ' building plague ' and the ' working fury.' It renders capital immune from the menace of its own increase." Why is it that money itself is so important ? In a non-monetary economy it would be impossible, thinks Gesell, to charge interest. Those who had accumulated a hoard would have

to lend it " free," because otherwise, being a hoard of goods and therefore perishable, it would decline in value. But in a monetary economy people do not have to accumulate wealth in the form of goods. They can hold it in the form of money. Now money is not perishable and hence the lender can charge a rate of interest, can refuse to lend with no loss to himself, if insufficient interest is forthcoming. But if interest is paid because money is not perishable and we wish to abolish interest, our course of action is clear. We must make money perishable too. This is precisely what the introduction of " Free Money " will do.

It is not only in the capital market that the durable character of money has its effects. Gesell believes that it influences every type of exchange in which money plays a part. For where money is exchanged for goods the owner of the money is always at an advantage compared with the owner of goods. The reason for this is that the offer of money can be delayed, the offer of goods cannot. " Rust, damp, decay, heat, cold, breakage, mice, moths, flies, spiders, dust, wind, lightning, hail and earthquakes, epidemics, accidents, floods and thieves wage war continuously and successfully upon the quantity and quality of wares. . . . Gold neither rusts nor decays, neither breaks nor dies. Neither frost, heat, sun, rain nor fire can harm it. The holder of money made of gold need fear no loss arising from the material of his possession. Nor does its quality change. Gold which has lain buried for a thousand years remains unconsumed." In the market where commodities are sold for money, the actual stock of commodities is the supply. Once produced, argues Gesell, they cannot be withdrawn. But the demand for goods which comes from money is not fixed in this way. " The possessor of money holds demand like a hound on the leash and lets it slip at the quarry of his choice." The consequence is that " demand " obtains some special advantage. The owner of money is always in a stronger position than the owners of goods or services. He therefore demands a tribute before he will consent to the exchange. " Without this tribute

money will not be offered in exchange, and without money to effect exchanges no wares will reach their destination. If, for any reason, money cannot exact its accustomed tribute, wares lie where they are and rot. There is a crisis."

For the most part and from these quotations it appears that Gesell speaks of a tribute as something which every consumer can levy. But it is clear that since everyone is both producer and consumer, both exploiting and exploited, little significance can be attached to this, so long at least as the degree of exploitation is not altered. If the tribute is levied universally then it must affect all prices and leave their ratio unchanged. The worker " loses " when he has to sell his labour, but he gains when he buys with his earnings the goods sold by the shopkeeper. The merchant gains when he buys from the manufacturer, but he loses when he sells to the retailer.

Perhaps it is the realisation of this which makes Gesell suggest in other passages that the notion of the tribute is to be applied only to the borrowing and lending of money, so that it becomes only an elaboration of the theory of interest. It is those who in the first instance provide money for the carrying on of trade who are the real recipients of tribute, and this tribute is nothing but the unnatural interest charge. To make it possible for this to be paid, " the selling price of wares must exceed the price of purchase. At times of trade expansion . . . the difference between the two prices is then sufficient to cover the merchant's profit and the tribute paid to money. When prices are falling, the collection of the tribute becomes doubtful or impossible."

It is from this background that Gesell develops his theory of trade depression. Economic crises are caused, he argues, by falling prices. Prices can fall for three reasons, two of which are new—the third really implied in his theory of interest. The two new causes are effective when countries operate on a gold standard. The first is simply that " the supply of conditions under which gold is produced do not allow the money to be adapted to the supply of wares." The

second is far more ingenious. Gold, argues Gesell, is used for industrial as well as for monetary purposes, and among its industrial uses is that of ornament. Now, the demand for gold for ornamentation increases with the growth of prosperity. " During years of prosperity goldsmiths work overtime , during periods of economic depression people in difficulties bring them back gold ornaments for the melting pot." But this very fact brings the prosperity to an end, for it involves the destruction of the medium of exchange. " The supply of wares has increased. And because the supply of wares has increased, we destroy the demand for wares by melting down the medium of exchange, the bearer of demand."

The third reason, however, may be considered the most important. When investment takes place rapidly the rate of interest, as has already been argued, tends to fall. But this is checked by the refusal of capitalists to lend : the alternative use to which they put their money is not spending but hoarding. Thus that which checks the fall in the rate of interest also leads to a decrease in the quantity of money used and so provokes the crisis. " From these investments, from real capital, interest is expected, and the rate of interest falls if the proportion of real capital to population increases. . . . If the interest on houses, on real capital falls, the money employed in such enterprises withdraws. . . . And because money withdraws, because demand is lacking, prices fall and a crisis occurs." The policy which Gesell proposes for the abolition of interest therefore is naturally appropriate to any attempt at eliminating depression. The twin evils are twins bred of the same parent—the durability of money. To do away with the children we must destroy the parent.

To make money perishable, Gesell puts forward the following simple plan.[1] Currency notes shall not, as now, retain their face value without any action on the part of the owner. They shall depreciate in value by a certain

[1] This is actually one of the many possible variations of the plan to which Gesell himself draws attention.

percentage every week. Gesell himself proposes 1/10th per cent per week or approximately 5 per cent per annum. To avoid this depreciation in face value, stamps have to be attached to the note, but these stamps cost the holder the amount of the depreciation. Thus if the rate of depreciation were 5 per cent per annum a pound note would only be worth £1 at the end of the year if it had affixed to it 1*s.* worth of stamps. This would cost approximately a farthing a week. At the end of every year the old issue which is stamped is withdrawn and a new issue which is ready for stamping is made. The purpose of this scheme has already been explained. The owner of money who finds that he too is exchanging a perishable product will be far more willing to buy goods than he has been before. He will have to give up the unfair privilege which he has hitherto held.

Now it is on the capital market that this change will have the most important effect. For the lender of money or the purchaser of durable goods for investment will no longer withdraw when the rate of interest falls. " Money will be exchanged continually for means of production, dwellings, etc., even if such investments yield no profit (interest, ' surplus value ')."

Gesell does not propose to leave the issue of the new money to private banks. It will be printed by a National Currency Office and issued for the benefit of the public Treasury. The quantity which is issued will depend on the movement of prices. It must be the object of the N.C.O. to keep prices stable, by issuing more money when prices tend to fall and withdrawing money when prices tend to rise. The method by which this is done is the remission or increase of taxation. If prices tend to fall, taxation is remitted and the budget is financed out of the new money. If prices tend to rise taxation is increased and some of the money thus collected withdrawn from circulation.

In proceeding to comment on this remarkable suggestion, presented by its author with such clarity and literary grace, we must distinguish carefully between the immediate and

the permanent effects of Free Money, between the remedy conceived as a " recovery dose " and the remedy conceived —as it was by Gesell—as a permanent stabilising and reforming influence. Theory would anticipate and practice[1] has shown that given certain conditions the adoption of Free Money must improve a bad trade situation. But Gesell does not merely or even mainly claim this as its merit. He claims that it will reduce the rate of interest to zero and combined with budgetary and banking policy eliminate all industrial fluctuations. It is these claims and the arguments on which they are based which we must first examine.

To begin with, is it true that only the possibility of hoarding prevents a continuous fall in the rate of interest? The rate of interest is a price settled in a market, as Gesell is perfectly aware, by the forces of supply and demand, that which is bought and sold can be described as " present income," " immediately available cash," that which is given in exchange for it is " future income," " cash available only in the future." This is the case in all capital markets, in the discounting of bills, the granting of overdrafts, the purchase and sale of long dated securities, the arranging of a mortgage, etc. The rate of interest expresses in a technical but convenient way the " rate of exchange " between present and future cash. If the rate of interest is positive it expresses the premium which those who give up present income will receive for doing so.

Now it is Gesell's view that the present income of savers can and will be hoarded if the rate of interest falls very low, and this fact actually prevents the rate from falling. If hoarding were impossible, a fall in the rate of interest would not be checked by a fall off in the supply of money for investment. This, however, is really only half the argument. Gesell also argues that in fact, on account of the steady accumulation of capital, the rate of interest *would* fall to zero if hoarding were made impossible. Our criticisms of his theory fall into two sections dealing with these two separate arguments. The criticism of the first is simple

[1] See below, page 399.

enough. In laying all the emphasis on hoarding Gesell is ignoring another and equally important alternative which the lender of money has in front of him. He can also spend it. This alternative is not due to the existence of durable money. It is one which exists in the most primitive society. Robinson Crusoe may consider whether it is worth his while building a boat. To do so he must give up some of his working hours to it. This will involve a sacrifice of the fruits of these working hours. If he decides that it is worth while he *may* proceed to make the sacrifice by accumulating a *hoard* of the necessaries of life and then spend his time making the boat, living at the same time on the hoard. Gesell is perfectly right in saying that such a hoard *has* to be consumed if it is not to depreciate in value. But he fails to add that it need never have come into existence unless Robinson Crusoe decided that the boat *was* worth the sacrifice which the accumulation involved. Moreover there is no reason to assume the existence of a hoard at all. Crusoe might, instead of spending all his days, to begin with, gathering food and then hoarding some of it, have preferred to spend *a part of each day* on the building of the boat. Indeed, if the food was perishable, this is probably what he would have done. The sacrifice would be made in exactly the same way but there would be no risk of loss from deterioration because no hoard would exist. Again, only this time more or less continually, Crusoe would have to consider whether the sacrifice of his working time and the immediate income it would bring in was worth while. To-day in a monetary economy the lenders have the same choice. They can lend or hoard *or* they can spend.

At the same time it should not be inferred that no saving would be done if the rate of interest were zero, on account of the fact that all preferred to spend. It is certainly probable that *some* saving would be done. Indeed it is clear that before the mechanism of the modern capital and money markets existed a certain amount must have been saved under such conditions. We may therefore admit that the difficulties in the way of a fall in the rate of interest are

not produced to any great extent by the unwillingness of lenders.

But, as we have already indicated, this does not prove that the rate of interest *would* fall to zero. For if the rate of interest is determined by supply and demand, then for a zero rate of interest to exist it is necessary not merely that so much a year shall be saved when the rate of interest is zero, but also that precisely that amount and no more will be required or demanded at the same time. If, for example, £100 million was saved at a zero rate of interest but £500 million was wanted on these terms, those who were borrowing would compete to obtain the £100 million and their method of doing so would be to offer a positive rate of interest. If Gesell's view is correct only £100 must be demanded when the rate of interest is zero. Is this at all probable?

As we have already mentioned, he argued that there was a " natural " tendency for rates to fall, because presumably each successive unit of capital produced for co-operation with a fixed working population was less and less productive. Unfortunately in his analysis of the demand for money for investment he omitted three important factors. In the first place, while it is certainly true that if you apply increasing quantities of capital to a fixed quantity of other resources its unit productivity falls, the rate at which this productivity falls is extremely slow. A fall in the long-term rate of interest from 3 per cent to 2 per cent to 1 per cent would produce a huge demand for savings for buildings and public works and new machinery, etc. In the second place Gesell forgets the part played by technical change in maintaining the demand for capital. In the third place it is practically certain that a fall in the rate of interest to anything below 2 per cent would cause a big increase in the demand for savings for consumption purposes. This would not come from young spendthrifts running up overdrafts and getting into the hands of moneylenders, but from older people who would start selling their property and securities in order to increase their available incomes. If, for example, the rate of interest

fell to 2 per cent a man with a property income of £200 a year would have securities to the value of £10,000. If he had only 15 or 20 years to live it would require abnormal abstinence on his part not to start spending his capital and thereby doubling or even trebling his income.

For these three reasons therefore it is inconceivable that a zero rate of interest could prevail in the long term capital market. At such a rate or even at one slightly above it the demand for capital would be vastly in excess of the supply, and the rate would inevitably be forced up. Consequently we cannot accept the view that " Free Money " would abolish the rate of interest.

Can it, however, abolish industrial fluctuation? It will be remembered that a part of the " Free-Money " proposals for this purpose involve the stabilisation of prices through the mechanism of the Budget. This proposal is not new, nor especially heretical and it has in any case been discussed elsewhere. We shall therefore refrain from commenting upon it now. With it we may associate the two " gold " explanations of the depression given by Gesell and mentioned above. In so far as the crisis is due to these two causes, it is dealt with presumably by the abandonment of the gold standard and the stabilisation of prices. These views, like the case of price stabilisation, can be distinguished sharply from the more original " depreciating currency " proposal. We may concentrate our examination on the latter.

Now the cause which goes with this particular cure, is, it will be remembered, that increased investment proceeds during the boom to the accompaniment of a declining rate of interest, that this eventually leads to a " money strike " and the hoarding instead of the investing of saved money, and that consequently a fall in prices begins. Is this a true account of the matter? While there are many who would agree that the depression starts when " hoarding " takes place, there is one very grave objection to Gesell's account of the matter. During the progress of the boom, the rate of interest tends, according to his theory, to fall steadily. Yet the facts are precisely the opposite. The rate of interest

always *rises* during the boom. The boom cannot be described as a time during which investors are getting gradually more and more dissatisfied with their results. We must therefore look elsewhere for the true cause of the " hoarding." We need not, however, conclude that because of a deficiency in the analysis we must therefore reject the cure proposed immediately. On the contrary it is quite possible that it might prove a suitable remedy for a different situation. The best way to proceed will be to ask ourselves what in fact the " depreciating currency " will achieve.

It is claimed first that it will stabilise what is usually termed " the velocity of circulation of money," and secondly that this will eliminate the trade cycle. One of the obstacles which the scheme is likely to encounter is purely practical. In a world where the greater part of business transactions are conducted by cheque, it is hard to see that much reliance can be placed on a plan which deals only with currency. To the employer who is paid for his goods and pays for his materials and most other expenses by cheque, the fact that currency automatically depreciates would matter very little. Normally he will draw out cash from the bank and pay it to his workers practically immediately. Thus it is hard to see how the majority of business men will be led to pass money on at a constant rate, because stamps have to be placed upon currency notes. There are however exceptions. The retailer cannot avoid currency notes, and both he and the consumer who receives his income in this form will be affected.

But what precisely will the effect be ?

There can be no doubt that there will be an immediate improvement in retail turnover. This may spread rapidly to the other branches of production. The retailer, whose takings rise, will order more even if he is not concerned, because he pays by cheque, to avoid having to put stamps on the notes. Another immediate effect will be economy in the use of cash. Individuals will return the notes as rapidly as possible to the banks in order to avoid loss. Sellers will prefer to be paid by cheque and avoid all risk. This would,

if it were required, enlarge the cash reserves of the banking system and so make possible an expansion of credit. For this reason also we may anticipate a definite improvement in trade.

But while industry may by these means be jerked on to a higher level of output or into a new boom, it is less certain that further depression will thereby be avoided. It does not seem at all certain that the velocity of circulation, which will clearly be increased, will be stabilised. To the extent that transactions are carried on by cheque there is clearly a very wide loophole for variations, and even if notes were more widely used it does not seem to follow that velocity would be stable precisely at the new rate. Even if, for example, the holder of money must get rid of it before the end of the week, he can dispose of it *more or less* rapidly before that time comes. There will still be a choice for him to make without the fear of monetary loss. The history of the mark inflation shows the incredible speed with which money can in some circumstances circulate. It is surely the case that the speed might vary between this extreme and a low level set by the need for buying the stamps.

Nor can we be sure that even the fear of loss would in some circumstances induce individuals to spend. We can conceive of cases where prices are falling far more rapidly than the rate at which Gesell suggests that money should depreciate. In this case it would still pay to hoard. The cumulative tendency of more hoarding, lower prices, more hoarding would still be present.

Finally, as we have already seen, it is not satisfactory to assert that the depression can be put down entirely to variations in velocity or to hoarding. For we have to know what caused the change of attitude about money outlay. There is no reason to believe that " Free-Money " would be a sufficiently strong force to prevent this change altogether even if, as is conceivable, it was able to postpone it.

When therefore we realise the relative unimportance of currency compared with bank-money, the possibility of

variation in velocity even with a depreciating currency, the uncertainty that this attempt to stabilise velocity, even if it should succeed, could really master the forces behind depression, we must remain more sceptical than its originator about the virtues of Free Money. Nevertheless as a policy for a depression, especially in countries where notes are used very freely, it is theoretically perfectly sound and, as the quotation set out below shows, appears to have been successful enough in practice. Moreover it is one of the few attempts which have been made to deal with what is undoubtedly *one* of the intractable elements in industrial fluctuation. The prolongation of the depression in face of vigorous expansionist monetary policy can only be ascribed to the further fall in velocity. Any method for dealing with this must merit attention. From this account of his views and the quotations from his work it will be seen that Silvio Gesell was an amateur with a very ingenious, albeit logical mind, who unlike many of his fellows expressed himself not only vigorously but also clearly.

NOTE ON A "FREE MONEY" EXPERIMENT

The following quotation is taken from the *Week*, May 17th, 1933.

Wörgl. Unprecedented and widely significant is a case—just coming before the Austrian courts—arising out of the alarm of the Austrian National Bank over the financial revolution which has brought prosperity to the little Austrian town of Wörgl, and which the Bank fears is going to compete with its own monopoly powers. Wörgl had been moving rapidly to bankruptcy since the beginning of the crisis. Its factories closed down one after another and unemployment rose daily. Nobody did any business, and scarcely anybody paid any taxes. Then Unterguggenberger, Burgomaster of Wörgl, proposed the following plan, which was adopted. The town authorities issued to

the value of thirty thousand Austrian schilling notes in denominations of one, five and ten schilling, which were called tickets for services rendered. Special feature of these notes was the fact that they decreased in value by one per cent every month. Anyone holding one of these notes at the end of the month had to buy from the local authorities a stamp of sufficient value to bring the note up to face value. This he affixed to the back of the note, and the proceeds of the stamps went to the poor relief fund. The result was that the notes circulated with unheard of rapidity. They were first used for the payment of wages for the building of streets, drainage and other public works by men who would otherwise have been unemployed. On the first day when the new notes were used, eighteen hundred schilling worth was paid out. The recipients immediately hurried with them to the shops, and the shopkeepers and merchants hastened to use them for the payment of their tax arrears to the municipality. The municipality immediately used them to pay the bills. Within twenty-four hours of being issued, the greater part of this money had not only come back to the municipality in the form of tax payments, but had already been passed on its way again. During the first month, the money had made the complete circle no less than twenty times. There was no possibility of anyone avoiding the one per cent stamp tax on any note he happened to hold at the end of the month, since without a stamp to bring it up to face value, the note lost its entire value. Within the first four months after the issue of the new money, the town had accomplished public works to the value of one hundred thousand schilling. A large proportion of tax arrears had already been paid off, and there were even cases of people paying taxes in advance. Receipts of back taxes were eight times greater than in the period before the introduction of the new money. Unemployment is now reduced enormously, the shopkeepers are prosperous. The fame of the Wörgl miracle spread. Irving Fisher, American economist, sent a commission of enquiry to Wörgl, and the system has since been introduced in a

score or more of American townships. The Austrian National Bank, however, was highly disturbed by the whole proceeding. Now Unterguggenberger is being brought before the courts to explain himself and his plan.

ROBERT EISLER

TO SOME it will seem strange that there should be found in this chapter a discussion of the views of Dr. Robert Eisler. For Dr. Eisler has many connections with persons whose views on monetary affairs cannot in any way be called heretical. He has published in English only two works on economics ; and in the one, which is really a synopsis of the other, there appears a " preface "[1] by Sir J. Stamp, in the other a " preface " by Mr. Vincent C. Vickers, also at one time a Director of the Bank of England.[2] Dr. Eisler himself gives us in the introduction to his larger work a list of seventy-two persons, almost all of them distinguished, with whom he has discussed his views. Among these are to be found professional economists, bankers, politicians and financial journalists, some French, some German, some American, some English. Nevertheless such a background cannot hide the peculiarity of Dr. Eisler's views. To those who read further it will be seen to speak rather for the charm of his personality than the orthodox nature of his opinions.

Dr. Eisler's work may be said to fall into three parts. There is, to begin with, a theoretical, analytical section which resembles somewhat the writings of those authors whom we have already considered and which calls for comment and criticism. Then there is a section of a more

[1] This " preface " turns out, however, to be merely a quotation from an article by Sir J. Stamp.

[2] Mr. Vickers makes the following remarkable admission : " I am fully qualified to tell the public that, in my view, it is entirely mistaken if it believes that the Monetary System of this country is normally managed by ' recognised monetary experts ' working in accordance with the most scientific and up-to-date methods known to modern economists."

descriptive and technical character in which the actual course of the world depression is examined. Except in one or two places this section has little connection either with the preceding or the succeeding one. Nor does it call for anything but favourable notice. Dr. Eisler displays here his very considerable knowledge of the details of the financial crises and justifies all those contacts which are so lavishly set forth in the introduction to his book. Since there is nothing in this section which can be called heretical, we propose in what follows to omit further reference to it. The third part which contains Dr. Eisler's remedy is, however, a change over to the opposite extreme. It is both original and heretical: it has probably not, one feels, been taken very seriously by many of the seventy-two. It is also excessively complex.

There can be no doubt that in Dr. Eisler's view the cause of industrial depression is the failure of consumers' demand. He discards the conception of general over-production and emphasises the unlimited character of human wants. He concludes that " We are justified in defining the phenomenon which is popularly called ' over-production ' or ' under-consumption ' more exactly as a disequilibrium or disproportion between the producing capacity of agriculture and industry and the purchasing power of the consumer, that is, his effective demand for consumable goods."

But to what is this lack of effective demand due ?

Here Dr. Eisler, like Major Douglas, gives us a number of replies. In the first place he argues that technical change is responsible. " Ever since the introduction of machinery and engine power and specially since the last war so tremendously stimulated human ingenuity, consumers' purchasing power does not increase to the same extent as production." " However generously the individual employer may treat his workers, technical progress must continually reduce the proportion between the purchasing power of the working masses and the capacity of the industrial system to produce consumers' goods."[1] At first

[1] The quotations in this section are all taken from Dr. Eisler's larger work, *Stable Money*.

sight this appears to be a repetition of Major Douglas's view that the introduction of machinery involves a net diminution of total purchasing power. But in fact Dr. Eisler is not claiming that this is so. For he adds: " It is obvious that in a period of ' prosperity ' a proportionate increase in the purchasing power of the employers corresponds to the loss of income of the working classes. But since most of the employers can themselves consume but a very small proportion of their profits, the accumulated surplus necessarily tends, in a period of industrial ' prosperity,' to flow towards the market of new means of production, thus stimulating a further exaggerated growth of the future supply far beyond the purchasing power of the consumers." This " technical change " explanation is then really a variation of the well known " under-consumption " theory which explains industrial depression as the result of a maldistribution of income in favour of the capitalist classes, who proceed to save and invest and thereby cut off the market for consumption goods precisely at the point when their volume is increased. Dr. Eisler's variation is to attribute this maldistribution to rapid technical change. Since there are more machines, there is more money paid in dividends and less in wages, and therefore too much saving and too little spending.

It must be pointed out, however, that there is always involved in the under-consumption theory a certain ambiguity. It may be argued that the cause of the slump is maldistribution of income *at the moment* when the new goods are coming on to the market, that the cause of the trouble is a diminution of consumers' purchasing power at that point. Or it may be argued simply that there is no *increase* in consumers' purchasing power with which the increased quantity of goods may be purchased. This second version is less truly " under-consumptionist " in that it tends to ascribe the slump to a general lack of purchasing power as contrasted with the use to which the purchasing power is being put. Dr. Eisler at times appears to support it. The slump comes when " enough of the new large scale

means of production . . . are completed and begin to add *suddenly* a considerable amount of new production to the former maximum." At other times, however, he lays the emphasis on the withdrawal of consumers' purchasing power, on maldistribution rather than deficiency.

Dr. Eisler gives also what may be termed a monetary explanation. A period of increasing investment, he points out, is usually one in which the total quantity of money in circulation is increasing. This involves a rise in prices but not a corresponding rise in wages or salaries. Indeed it actually reduces the *purchasing power*[1] of wage and salary earners while increasing that of the industrialist and merchant. But since the latter spend their incomes only to a very small extent on consumable goods, " it follows that during all periods of inflation industrial producing capacity and merchants' stocks of goods must necessarily expand, while the purchase power of the overwhelming majority of consumers must shrink." The consequence is eventually a fall in prices and a deflationary or slump period.

The third explanation is the simplest but least plausible. Prices must fall because eventually inflation produces a " buyers' strike." Referring to the 1919 boom Dr. Eisler says: " But as, in spite of the spur of continually rising prices, the physical volume of production was manifestly declining . . . nothing could have been gained by letting inflation inflict further hardships upon the consumer till his dwindling purchasing power should automatically bring about, through so-called ' sales resistance,' ' buyers' strikes,' the inevitable collapse in prices."

This third point of view may be disposed of without great difficulty. A strike involves organised joint action. It is scarcely conceivable that consumers in general would so organise themselves, and in actual fact the boom certainly does not come to an end on account of *their* resistance. Far from refusing to buy, consumers in boom times are likely to be buying more rapidly than usual. It is a well known fact, referred to elsewhere by Dr. Eisler himself, that during the

[1] For a discussion of the meaning of this term see below, page 405.

boom the velocity of circulation rises. Nor is there any reason why, *until prices for some other reason have begun to fall*, consumers should change their habits.

The second explanation is far more complex. Interpretation of it depends upon the meaning we attach to the words "purchasing power." If "purchasing power" means simply "money incomes" or money outlay, then there is no difference between this version and the first under-consumption account. For on that interpretation all that Dr. Eisler says is that there is a diminution of consumers' money incomes, presumably on account of technical change, and an increase in investors' incomes, so that prices must fall. We have already indicated the ambiguity of this theory. We shall comment and criticise below.

More frequently however Dr. Eisler uses the words purchasing power as meaning *the amount of real goods* which can be bought, in other words—as money incomes corrected for changes in the price level. But it is difficult to see how a decrease in purchasing power—understood in this sense—can be said to account for the collapse in prices. The decrease in purchasing power is simply *due to* the rise in retail prices. But so long as retail prices are rising there is, according to Dr. Eisler, no slump. *Unless the money incomes of consumers fall*, a decrease in purchasing power is simply the *equivalent* of the rise in prices and cannot seriously be put forward as a cause of their fall.[1]

We are driven therefore to the conclusion that the monetary explanation really leads us in any case to the first under-consumption explanation : the slump can only be caused by the action of the investing class who stop buying

[1] As a matter of fact Dr. Eisler appears to use the term "consumers' incomes" ambiguously. If he means all money spent on consumption goods, then the real goods which are bought with this money—i.e. the purchasing power of consumers—can only fall if there is an actual diminution in the output of consumption goods, a possibility which he scarcely refers to. It seems more likely that he means by "consumers" only those who suffer from the rise in prices—that is to say the wage and salary earners and others whose money incomes do not rise. But again the mere *fact* that these individuals lose in terms of real income in a boom does not explain the slump.

so many consumption goods, preferring to invest instead, and thus creating a fall in the price level. They may be regarded as acting in this way whether the boom has or has not been associated with an increase in the monetary circulation and a rise in prices.

A detailed examination of this well known theory is out of the question here.[1] We must content ourselves with three comments, one explanatory and two critical. In the first place we may rule out that version of the under-consumption theory which is simply a demand for more purchasing power to buy the increased quantity of goods, for the simple reason that throughout almost the whole of his book Dr. Eisler does assume that this purchasing power is actually forthcoming. We may take it that it is the other version of the theory—the maldistribution of purchasing power on account of the increasing proportion of total income acquired by the rich—on which Dr. Eisler relies.

Now it is perfectly true, as this version maintains, that during the boom there is a change in the proportion of money incomes acquired by different individuals. It is true that in the *early* stages of a boom " industrialists " do gain at the expense of the rentier and wage earning classes. But in Dr. Eisler's account it is in the *later*, not the earlier stages that this changes takes place. It is precisely this crisis of over-investment and under-consumption which brings the boom to an end. Now it seems much more probable that during the later stage of a boom precisely the opposite is taking place. Wages are beginning to catch up prices. The high profits earned in the early stages are being, to an increasing extent, passed on to wage earners. In other words the income of the " consuming class " is tending to *rise* relatively to that of the investing class.

There is yet another and more serious difference between the facts of the situation and Dr. Eisler's account of them. It is a well known feature of the trade cycle that depression (and recovery) set in first in the industries producing not consumption but capital goods. The consumption goods

[1] For a full discussion see Durbin, *Purchasing Power and Trade Depression.*

trades remain prosperous for some time after the slump has set in. What appears to be lacking, therefore, is not the purchasing power of consumers but on the contrary the purchasing power of investors.

Although these objections may not be conclusive, they must create a certain scepticism. When associated with our comments on the " monetary " or " purchasing power " theory and that of the buyers' strike they induce a rather cautious approach to Dr. Eisler's third section in which his cure is put forward.

Nevertheless, here again, it is important to distinguish between analysis and cure. The cure in this case certainly follows the analysis. But the principle of the cure might well be consistent with a rather different explanation. This principle is itself a very simple one. Dr. Eisler wishes to prevent the decline in the purchasing power or real income of " consumers." His " consumers " are as we have seen those whose incomes tend to be paid by contract. He regards their loss and the " industrialists' " gain as the primary cause of depression. If, he argues, all contracts could be fixed on an " index " basis, so that their money value would vary with a change in the price level—increasing if prices rose, decreasing if prices fell—the distribution of real incomes would remain unchanged and the maldistribution and its disastrous consequences would never take place. All, in fact, that is involved is the extension of a " sliding scale " system to all incomes. The method, however, by which he proposes to put this straightforward idea into effect is extremely complicated and in places almost impossible to understand.

> " Under the new system there would be two sets of money :
>
> (1) Legal tender, called a pound or a U.S. dollar of " *current* " money or money proper (£cr or $cr), and
>
> (2) Bank or contract money of account, called a pound or a dollar *banco* (£bo or $bo). Money *banco* would be obtained by concluding a contract about a future

payment of money proper or by depositing ' current money ' with a bank or similar institution. Current money would be exclusively used for small transactions between persons not well known to each other or not in possession of a bank account, especially for the payment of wages, transport fares and occasional retail purchases."

Dr. Eisler proposes that retail prices in terms of current money shall be allowed to rise, in other words that the value of the £cr shall be allowed to depreciate in terms of retail goods, but that the retail price level in terms of *bank money* shall be kept stable. The natural consequence of this is that current money will also depreciate in terms of bank money, the rate of exchange of these two monies varying with the changes in retail prices in current money. Dr. Eisler suggests that for simplicity it might be convenient to call all current money shillings, while bank money would be pounds. The rate of exchange between pounds and shillings would be declared officially every week and would be based on variations of retail prices. Thus if in the first week the price level was 100, the rate of exchange 20*s*. (cr) to £1 (bo) and in the second week the price level had risen to 110, the rate of exchange would immediately become 22*s*. to £1.

The consequence of this would be that all persons owning " debts " whether in the form of bonds, bank deposits, fixed salaries, etc., which had to be settled in terms of bank money would not find themselves penalised by the rise in retail prices. For precisely to the extent that retail prices rose they would receive for their £'s (bo) an increased quantity of shillings (cr). The result would be that their " purchasing power " would not be diminished. The merchant and industrialist would not be able to gain at the expense of these " consumers," over-investment would not take place, and the disastrous consequences of the boom would be prevented.

Dr. Eisler however does not propose the stabilisation of

wholesale prices in terms either of current or bank money. To begin with it is necessary that wholesale prices should rise in order that producers may be stimulated to increase production. Only when the unemployed have been absorbed and productive capacity is used to the full should wholesale prices also be stabilised in terms of bank money. Nor is it intended that this rise in wholesale prices should be " compensated " in the same way as the rise in retail prices. While the individual will be compensated in his capacity as consumer he will lose in his capacity of a purchaser of *producers'* goods. " The creditor is completely protected against loss in his capacity of consumer. . . . The creditor loses, however, in the capacity of the man who wants eventually to reinvest his savings in shares or to start a business himself."

Perhaps the simplest way of examining the effects of these proposals is to take a definite example, to see what happens if the total quantity of money is increased while the new conditions about the exchange of the two monies are put into operation. Let us assume then that the normal weekly turnover of Bank deposits is £1,000 and that £1 is worth 20*s*., that new credit is created for immediate use to the extent of £100. The complete effects will depend on the extent to which this new money is changed into current money and exchanged for retail commodities. Assuming that it is all so exchanged, then we might anticipate, according to Dr. Eisler, a rise in retail prices from perhaps 100 to 110. The retailers, for this reason, increase their gross receipts by £100 or rather by 2,000*s*., their total takings rising from 20,000*s*. to 22,000*s*. If these retailers bank their money and the change of the rate of exchange between current and bank money *has already been announced*, they will find themselves credited with only £1,000, for the rate of exchange will have altered from £1 : 20*s*. to £1 : 22*s*. If now they proceed to " cash " this money again in order to pay wages they will find that they can receive 22,000*s*. for it, but they will also find that the statutory wage has also risen in the ratio 20*s*. : 22*s*., so

that they are in precisely the same position as before. They will have made no extra profit and can employ no extra men. Certainly there is no slump. But equally there is no boom. Prices will remain at the higher level, but this will have no secondary effects on employment at all. The only significance of the whole chain of transactions will be that some who bought first will gain at the expense of those who bought later within the first week.

On the other hand *if* the retailers bank their takings before the change in the exchange rate of current and bank money is announced, then bank deposits are really increased and the inflationary process tends to be cumulative. If for example the 22,000*s*. they receive is credited as £1,100, then they will have made their profits, and since they will be able to draw out at the rate of 22*s*. for £1, they can pay out in wages 24,200*s*. (22*s*. × £1,100) and so employ more men. This will lead to still higher prices and so the process will be cumulative. The " compensating money " will involve a continual increase in consumers' incomes. Actually however Dr. Eisler does not favour this interpretation, for he writes : " The retailers who have had a windfall profit . . . will bank their money on Saturday before noon and find, when Sunday's new index is published, that they have been credited by their banks with £1 only for each 21*s*., 22*s*. or 24*s*. (as the index figure may be) deposited at the counter."

We may presume therefore that he will rely for his stimulus on the rise in wholesale prices. This may, of course, come about in a perfectly straightforward way from the increased bank credit. For wholesale prices will be affected not by the volume of current but by the volume of bank money. Such a movement would be of course extremely profitable for the producers of all intermediate products. " The fact that wholesale prices rise in ' bank ' or ' contract money ' means that a manufacturer's indebtedness—his liabilities corresponding to public debt (= taxes) as well as liabilities based on private indebtedness (= rent and interest on borrowed capital)—is diminished in

relation to the value of the goods which he produces and sells." The increased profitability of these trades will consequently lead to their expansion, and here at least production and employment will increase.

Now Dr. Eisler thinks that this will take place at the expense only of the potential buyer of wholesale goods. But he is forgetting one unfortunate but also important person. That is the person who buys *wholesale* but sells *retail* goods —in other words the retailer. What is his position? He takes exactly the same gross receipts expressed in terms of bank money; his *other* expenses—rent and wages—remain unchanged in terms of bank money, but the cost of his stock increases in direct proportion to the rise in wholesale prices. The profitability of his concern therefore must steadily decline and for this reason he is scarcely likely to increase his orders. The increased output of wholesale goods will remain unsold and their prices will fall again.

As put forward by Dr. Eisler, therefore, the scheme does appear self-contradictory. The position of the retailer provides an insuperable objection. This difficulty could be met in a manner perfectly consistent with Dr. Eisler's main principle if the retailer were allowed to increase his takings in terms of Bank Money. If, when his receipts increased, as the result of a rise in prices, he were allowed to bank his money at the previous rate of exchange between current and bank money his balance would be larger and, like the other producers, he would reap high profits. He would therefore increase his orders and the slump would be avoided. This would in no way prevent the " compensation " arrangements. Owners of debts in bank money could have their supplies of current money increased in precisely the same way, so that there would be no diminution in their " purchasing power." It is true that this process would be cumulative, and that prices would continue to rise. But from Dr. Eisler's point of view this is no disadvantage.

This plan, however, although technically more feasible than the other, has grave disadvantages. It is difficult to

see how the rise in current prices, if it allowed the retailer increased profit, could fail to prolong the rise in wholesale prices. Indeed, Dr. Eisler gives us nowhere a convincing account of how wholesale prices, after rising, are to be held stable. The position appears to be scarcely distinguishable from that of the boom which Dr. Eisler is so anxious to avoid.

Finally there is the graver objection that, in laying stress on the increase in consumers' incomes in the later stages of the boom, Dr. Eisler is fundamentally wrong. For, as we have seen, it is in the investment goods trades and not the consumption goods trades that the depression first sets in. It does not appear that the success of his plan would prevent the impending collapse of the former. If on the other hand the maintenance of consumers' incomes were secured in the early stages of a boom, the expansion of the investment goods trades might be checked and that lop-sided development which many regard as the real cause of depression eliminated. While, therefore, we cannot accept Dr. Eisler's analysis, there are certain features of his positive proposals which might, in a rather different way, prove valuable.

CONCLUSION

THE EDITOR says that this chapter is more difficult than any of the others. Those who have wrestled with its intricacies will probably be of the same opinion. They will at any rate agree that the ideas of monetary heretics are frequently vague or complicated and not as a rule expressed in the clearest possible manner.

How is it that, in spite of this, they achieve such fame and popularity? As we have suggested above, vagueness and complexity are not really limitations, but, on the contrary, advantages. For they make the task of criticism tedious and difficult and enable the heretic to say with perfect truth that his views have never been refuted. At the same time the support of the plain man is not in any

way forfeited. For the most part he will not bother his head with the complicated details. He will be content to accept the broad conclusions largely on irrational grounds.

As a rule the heretic can claim that he is a practical man, in touch with the realities of economic life and vitally interested in its reform, not content to toy with abstractions behind the shelter of a professorial salary. From his position he sees the depression as the general public sees it, as a paradox, as something not to be tolerated, as a problem for which there cannot conceivably be *no* solution, as a problem which *can* be solved at once. To plain man and heretic alike the natural limitation to material welfare is essentially technical. That, quite apart from this, there should be almost as inevitable and difficult a problem of organisation, of social relations, is a vision confined as a rule to the expert who has to handle it.

It is in keeping with this outlook that every monetary heretic offers a single complete solution. The *one* thing alone has to be done. A unique master stroke is required. There is to be no painful waiting, no lowering of standards, no difficult compromises, no social upheaval, but simply the adoption of the one perfectly simple, perfectly feasible PLAN.

Finally, the heretic is able to enlist support just because he is not an expert, just because he represents and expresses the common dislike and revolt against the expert. He is a plain practical man, proving to other plain practical men that the mysteries which these exalted intellects are alone suffered to understand are matters which can be made perfectly intelligible to the rest of the community. Thus he restores the public's self-respect.

These comments are not intended to imply any criticism of heretical writing. On the contrary it is of the utmost importance that every individual should be free to express himself on economic affairs. The plain man's instinct is in this case right. Economic experts can never be wholly trusted, and only with the utmost possible freedom for criticism and construction can rapid scientific progress be made.

CHAPTER IX: INVESTMENT, SAVINGS AND PUBLIC FINANCE

By COLIN CLARK

IN PREVIOUS chapters the reader will have studied the question of the issue of money, and the effects of changes in its amount, or its velocity of circulation. The purpose of this chapter is to introduce certain new ideas in connection with the problem of the effect of money on prices and output, and to get down to the really important question : " What can Governments do ? " Apart from such powers as Governments may possess, or may take, for dealing with the note issue and control of banking credit, which are not our subject here, we must examine the effect of government spending and government economy, the effects of balancing or unbalancing the Budget, taxation, social services, conversions and loan expenditure.

We shall see that in actual fact the Government in most countries is able to exercise a very big influence on the course of affairs and on trade by the control of these factors alone, before making use of any powers to control currency or credit.

What mainly interests us here, as in most other cases, is the mysterious process by which *money* is converted into *income*. It is very little consolation to us to know that the total amount of money in Great Britain (bank credits and notes) is nearly 10 per cent higher than it was in 1929, when we are all painfully aware that practically all incomes have shown a fall since then, while millions of people who had an income some years ago now have no income at all through being unemployed.

Even from its own narrowest point of view, as tax-gatherer, any Government must have a considerable interest in the national income of the country. In his last

two Budgets Mr. Neville Chamberlain has resignedly faced, as if it were something to do with the weather, conditions of declining income and production. The national income of the United Kingdom, out of which alone taxation and local rates can be levied, was £3,380 million in 1932, as against £3,500 million in 1931 and nearly £4,000 million in 1929. Mr. Snowden, at the time of his emergency budget of 1931 on the formation of the National Government, stated that a third of the national income was taken in rates and taxes. He was not in fact correct—the proportion was only a little over a quarter—but he was right in bringing forward the declining national income and the stationary total of expenditure as the fundamental cause of the budgetary crisis.

In the U.S.A. the proportion of public expenditure to the national income is smaller (mainly owing to the smaller burden per head of public debt) ; but the fall in the national income, which has been estimated at eighty milliard dollars in 1929 and only fifty milliard in 1932, had completely upset the Budget by the latter year and caused a huge deficit.

What neither of our British Chancellors—iron or wooden—seemed to have realised is the effect which government policy can have on the size of the national income, as well as the effect which a decline in the national income, fatalistically accepted, must perforce have upon government policy. But how can any action of the Government have any effect upon the size of the national income ? the reader may ask. Must the Government not of necessity wait, taking such circumstantial measures in various departments as seem feasible, in order to assist trade, until the natural recovery of trade has again restored the national income to its former level ?

This is the heart of the problem which concerns us here. These questions—if not this very wording—might well be put into the mouth of any Chancellor or Finance Minister anywhere in the world. They cannot be answered off-hand, and if we are to get to the bottom of the matter we

must begin by making our definitions perfectly clear. This will not be a short matter.

We must begin with the " national income," which, as the " social product," or the dividend available for distribution between persons and classes, is the principal subject-matter of economics. We may define it as the net total of all incomes received by all persons and institutions. It must be noted that it is necessary to specify " net total." For certain incomes, such as interest on the National Debt or Old Age Pensions, are not earned by any current service but simply represent transfers of income between one class and another, and should therefore be excluded from the total.

These and other difficulties make it more convenient, for ordinary purposes, to use an alternative definition of the national income. This is as follows : " The national income is the current value of the whole net output of goods and services." Here again, of course, it is important to specify " net." If a pair of boots is produced we do not want to reckon the value of the hide, the value of the leather and the value of the boots as three separate items ; we only want to reckon in the value added at each stage.

A more difficult distinction arises in the case of goods which are not intended for consumption, but for capital equipment, such as machinery and parts, buildings, ships, railway equipment, electrical transmission systems and the like, and work done on them by way of maintenance and repairs. Here we must reckon the work done in maintaining our existing capital intact, or replacements to meet normal depreciation and obsolescence, as a charge which must be deducted before income is reckoned. The output of capital goods over and above these requirements should, however, be reckoned as part of the national income.

Now we see that the second definition of the national income in effect boils down to the same as the first. If we take again as our illustration the output of a pair of boots, we have to reckon the net value added at each successive stage of production. The boot manufacturer, after paying for his materials, has to pay a certain amount in

wages, in salaries, in interest, in rent (each of which represents somebody's income), and then what remains represents profits, or the manufacturer's income. The selling value of materials which he has purchased in the same way can be split up into wages, salaries, rent, interest and profit. We thus finally reach the conclusion that when we analyse this national income, defined as the value of the current output of goods and services, we find that in the end it comes to the same thing as the total of payments made to wage and salary earners and recipients of rent, interest and profit. Alternatively we can describe it as the total of payments made for the services of various kinds of labour and enterprise, and to the owners of capital and natural resources. We have not yet explained what can make the national income rise or fall, but we now have a clearer idea of what it is.

We included above in the national income the value of the output of buildings, machinery, and other forms of capital equipment. Some part of this output we saw was required to meet maintenance and depreciation, and some represented a net addition to our capital equipment. We need a convenient word to define this output, and the word generally used is " investment." It is perhaps not a very good word, but is the best that can be suggested. We may speak of gross investment if we wish to include the whole value of maintenance work and output required to meet depreciation and obsolescence, and net investment if we wish to exclude these.

Goods made for stock—provided there has not been a corresponding reduction of stocks elsewhere—represent an addition to our working capital, and should therefore be included with investment. If at any time stocks are being reduced, this represents a using-up of capital and should be debited against the total value of investment.

We can now give a few actual figures which will serve as a break in these more abstract definitions. Figures for the national income of Great Britain in some recent years have been given above. Before we reckon changes in the amount of

stocks, the figure for gross home investment in 1929 (in which year the national income stood at nearly £4,000 million) was £640 million, and net investment £200 million, if we accept the rather severe figures suggested by the Balfour Report for the amount required to meet depreciation of our existing industrial plant. It is interesting to notice that over 10 per cent of the whole of our annual output is required simply for the maintenance of existing capital equipment.

By 1931 the total of net investment (again without reckoning stocks) had fallen to £130 million, and by 1932 to £80 million. These figures show a much bigger proportional fall than the figures of the national income as a whole. As will be shown below, these figures of investment occupy a key position in determining whether the national income shall improve or decline, and they are in a very considerable degree capable of being affected by government policy, both for good and for bad.

The figures of stock-in-trade are important in interpreting short-period fluctuations, but over the last few years have not shown any very significant movement up or down.

There is one other item which is usually included with investment, which is of considerable importance to countries such as Britain and America with a considerable volume of international trade. We all know that in reckoning up the balance of a country's imports and exports we must take into account also the " invisible " exports and imports —shipping, financial services and the like—and the goods which have to pay the interest on foreign capital. Of late years both countries, after reckoning in invisible exports and the receipts from overseas investments, had a considerable surplus of exports over imports available for lending abroad. In Britain in 1928 this surplus totalled some £140 million and in 1929 some £125 million. In U.S.A. the figure stood at some $600 million, and had been nearly $1,000 million in 1925 and 1926. Now what do these represent? They represent a certain quantity of output of exports,

shipping services, etc., for which no imports are received in exchange. It represents a real net addition to capital, and should therefore be included in investment. In a period when, invisible exports and all other factors reckoned in, a country shows an adverse balance of trade, this represents a drawing upon its assets overseas and should be debited against investment. In 1931 Britain's trade balance was adverse to the extent of £100 million, but in 1932 it appears to have again become favourable. (The official estimate recently made by the Board of Trade has been shown by Sir Robert Kindersley's investigations to have been too pessimistic.)

We now require a comprehensive definition of investment which shall include all these three items, the output of fixed capital equipment such as buildings and machinery, the output of goods for stock, and the favourable or adverse balance of trade. Now that we have discussed all the implications, we may use the simple definition " the value of all output not available for consumption." We must bear in mind that we must debit the total of investment when stocks are used up or there is an adverse balance of trade, and that the above definition gives gross investment. Net investment is reckoned after deduction of the output required to meet depreciation and maintenance.

Investment thus defined, although it is the best word we can find to express our ideas, is very different from what the ordinary man understands by the word. The ordinary man considers that he has invested money if he has bought a house with it, or government securities, or any other kind of securities or fixed assets. In fact, under these circumstances, there may have been real investment taking place or there may not. If he buys a new house, and his savings directly go towards the cost of constructing it, then it is clear that investment has taken place in the form of a certain amount of output, i.e., the building of the house. If he buys an old house, and the seller of the house uses the money to equip a new business, then the buyer of the house has indirectly caused investment to take place in

equipping the new business. But we have no guarantee that this latter will happen. Suppose he buys the house from a man who has to sell it because his business was getting into difficulties, and who has to raise some cash to pay his liabilities and his current losses? In this case the buyer of the house has saved some money, and has to all appearances invested it, but what he has actually done is simply to finance the losses of some unsuccessful business. The same may apply if he buys some shares on the Stock Exchange, or government securities; the usual course followed by any company which is making losses is to sell some gilt-edged securities, which are most easily realisable, out of its reserve. The man who has saved the money is safeguarded; he has his house or his shares or his government bonds as the case may be; but the community has nothing. All these savings have been swallowed up in meeting current losses. Remember also that when a business is making losses these *must* inevitably be met either by borrowing direct or by the sale of liquid assets. In either case somebody else's savings are being used up without any tangible investment to show for them.

Real investment does not necessarily take place, although many people do not realise it, when savings are devoted to buying "new issues" on the Stock Exchange rather than existing shares. This is an error into which many may fall who should know better. Some years ago the Royal Commission on National Debt and Taxation was making an estimate of the total amount of the national savings. They included as an item in this total some £100 million of "new issues" which had been made in one year on the Stock Exchange. But when we come to examine these new issues we find that the bulk of them simply represents a reshuffling of existing assets, and very little of the money thus raised represents real new investment. Let us, for example, take at random a few recent public issues.

An issue of £400,000 by a newspaper company, £268,000 being required to repay Debenture Stock and £135,000 to repay a mortgage on their building. A land and property

owning company's issue of £199,000, of which £165,000 was required for repayment of a mortgage and the remainder for working capital. An issue of £200,000 by a greyhound racing company, of which £108,000 was required for recoupment of the amount paid for shares in another company, £17,000 for expenses of issue, and £75,000 for working capital. An issue of £950,000 by a property company, of which £40,000 was required for expenses of issue, £500,000 for repayment of a mortgage, £200,000 for loans to a subsidiary company, and the remainder for the general purposes of the company.

Of late years both in Britain and U.S.A. practically the whole of the new capital requirements, both fixed assets and working capital, of industry and commerce have been financed internally out of reserves and undistributed profits. In fact this source of saving has often provided more than the whole capital requirements of commerce and industry, and the residue has been available for foreign lending, to finance housing or municipal investment, or has been used up in loans to meet losses.

If we now recapitulate our definition of investment we can state an important conclusion. Investment we have defined as the output of goods not available for consumption. This consists of additions to fixed capital equipment over and above depreciation requirements, additions to stock-in-trade and working capital, and the net sums available for investment abroad. These three forms of investment represent the possible outlet for the community's savings. Savings, for the time being, we may define very simply as what people don't spend. Now the important and paradoxical conclusion to be drawn is that the amount of real investment taking place is not necessarily equal to the amount of savings. In bad times a considerable amount of savings will be used up in financing losses and in other ways, while in good times a large amount of investment is undertaken by industrialists financed out of creations of bank credit rather than out of the real savings of the community.

If people spend less on consumption, that is to say, by our definition they save more, there ought to be more money available for investment, for the purchase of capital goods and stocks. But in reality it nearly always happens that, when the value of consumption falls, the value of investment also falls, and when the value of consumption rises, the value of investment also rises.

How can this come about? When we come to think of it, it is for a very simple reason. We are all of us grimly aware of the fact that the productive resources of the world, or of any country, are a very long way off being fully employed at the present time. If we have a condition in which the whole of productive resources are fully employed, it then follows that any increase in consumption means that the total amount of investment has to be reduced by the same amount, and any reduction of consumption, or increase of savings, will set free exactly the same amount of resources for the production of investment goods. In America in 1929, at the top of the boom, it was probably true that productive resources were fairly fully employed; or at any rate so fully employed that an increase in production involved a considerable rise in costs. Then the conditions suggested above perhaps applied. But at most periods, and particularly at a time like the present, when it seems possible for a large part of our productive resources to remain permanently unused, there is no guarantee that a decline in consumption will lead to an increase in investment. And in fact the reverse occurs. We have indicated *how*, but we yet have to show *why* this should be the case. This will be done later.

Now that we have made thus far this survey of the fundamental problem of investment and saving, we must come back to the question of government policy. Are not these, it may be asked, matters concerning ordinary trade, and is not this rather a digression from the field of government policy and public finance?

This is not the case, for this reason. Investment by the State and Local Authorities has for many years represented

the biggest part of the total of home investment, while the remainder of home investment, the amount of foreign investment, and the total of saving are all in a considerable degree subject to government control. The total of net investment in 1929 was £380 million, of which £130 million represented investment by the state and local authorities, £125 million investment abroad, and of the balance a considerable part represented the value of private house building (municipal house building has been included in the first item). In 1932, even after very big reductions of government and municipal expenditure as a result of the economy campaign, yet still investment by public authorities represented the major part of home investment. In fact this, together with private house building, represented the whole net total, because industry in that year was not investing sufficient to meet depreciation.

These figures alone clearly show how important public policy is in affecting the amount of investment. The biggest item in the total of investment by the State and Local Authorities was municipal housing, which totalled over £40 million in Great Britain in 1929, and only about £25 million in 1932. Post Office capital expenditure has averaged some £10 million per annum throughout. The value of new public investments in roads and bridges, i.e. the total value of work done, less the maintenance costs, has represented nearly £30 million per annum.

Apart from direct investment, the Government can exert considerable control over the amount of private investment by its control over the rate of interest, and over foreign investment by tariffs, import restrictions or export subsidies.

It ought not to be necessary to explain at length the connection between the rate of interest and the amount of industrial and private investment. Investment in buildings, machinery, etc., is undertaken by the industrialist as part of a scheme of extension or replacement. His decision whether or not to do this depends on his forecast of business conditions, of his own sales, and of the cost of getting the work done. When he has reckoned all these out he gets

some idea of the rate of profit which may be expected on the new capital invested. And then of course the deciding factor is whether he can get money at a rate of interest below this, or whether on the other hand he can do better by using his own capital to purchase securities or other assets (in which case, as pointed out above, the money will perhaps not be invested at all). Statistical examination confirms this conclusion, and will show that the amount of industrial investment follows very closely the figures of current profits, the cost of new capital equipment, and the rate of interest.

The Government may not be able to affect the first two to any great extent, but it can certainly affect the third. It can do this by Debt conversions. To a less degree Local Authorities and private borrowers, if they are favourably situated, can follow its example. The technique and the results of conversions will be dealt with in the next chapter, and at this stage we need only note the effect they have in bringing down the rate of interest and in thus encouraging investment.

In housing, and in all forms of building, which is the biggest investment industry, the effects of the rates of interest are paramount. A fall in the rate of interest from 6 per cent to 4 per cent represents a difference of 3*s.* 6*d.* a week in the rent of an ordinary parlour house. Whether for the municipal or private builder this will probably represent all the difference between being able to build at a profit and not. At the time of writing (May 1933) the fall in rates of interest as a result of the 1932 conversion has had a very considerable effect already upon the amount of house building. The value of houses being built and the numbers employed in house-building have already recovered to the 1929 level, and there are very few other industries of which this could be said.

The amount of foreign investment of any country can be defined as the amount by which exports (including invisible exports) and interest receipts from abroad exceed imports, or as it is often called the " favourable balance of trade."

This represents the amount which is really available for any new foreign lending. If any country tries to lend more than the amount of its favourable balance thus available it will not be able to balance its international account and it will lose gold, or the exchange will go against it, or (what usually happens) it will have to re-borrow the deficit elsewhere, and the total of net foreign lending is thus reduced to the level of the amount really available.

It thus follows that any successful measures taken to reduce a country's imports, or to increase its exports, will increase its investment. The main difficulty about such a line of policy is that every other country in the world will be found to be pursuing the same policy at the present time. If somebody would invent a new system of mathematics whereby every country should import less and export more, he would be doing the world a great service ; but under our present rules of arithmetic it is impossible. The balances of trade[1] of all the countries in the world, some being positive and some being negative, must of necessity add up to zero.

By the rapid imposition of a fairly heavy system of tariffs, and by exchange depreciation, the British Government has since 1931 converted an adverse trade balance of £100 million a year into a small favourable balance. There is very little doubt that this has had a beneficial effect upon Britain, and has in effect counteracted to a considerable extent the decline in home investment and consumption which has been brought about by " economy." The trouble is that any increase in investment brought about by tariffs and exchange depreciation confers an equal and opposite disadvantage upon other countries. " Buying British," unless at the same time we want foreigners to buy less British exports, will have the effect of putting foreigners out of work.

There is another and better road towards the restoration of investment, which creditor countries such as Britain, U.S.A. or France at any rate might well follow. This is to

[1] Invisible exports and imports having been taken into account.

attempt to restore the activity of internal investment and at the same time to allow imports to increase rather than attempt still further to reduce them. This policy in some way spreads the benefit over different countries instead of perpetuating the conditions under which one country's gain must be another country's loss. Such a policy is more generously conceived and offers some hope for world recovery. The working out of such a policy is discussed in outline below.

On the side of consumption the Government through its Budget also has a good deal to contribute. Unemployment benefit and other social services have the effect of keeping up the purchasing power of the wage-earners in a time of trade depression. Up till the time of the financial crisis in the autumn of 1931, the value of consumption in Great Britain had only fallen some 5 per cent below the 1929 level, a much smaller fall than in any other country. The effect of the Emergency Budget of that year was to cut directly the incomes of the unemployed and of all classes of public servants, by example and by precept to suggest cuts in other wages and incomes, and also to encourage all people in possession of wealth to consume less and to save more. The result was a further considerable fall in consumption, and, as productive resources were a long way off being fully employed, this had no effect in encouraging investment, but in fact reduced it too.

In normal times the sinking funds of the State and local authorities represent one of the principal items in the total of savings, as public investment represents the major item in the total of investment. The net amount provided for sinking fund in the Budget has ranged during recent years from £80 million (in 1928, when money was being paid into the Rating Relief account as well as the sinking fund) to zero. The total amount of loan debt of local authorities in England and Wales alone in 1930 was £1,225 million, nearly the whole being productive, on which loan charges of £88 million a year were paid, nearly £50 million representing sinking fund payments. (For some reason the

Scottish authorities are very reticent on these matters. They publish the figures of the amount collected in rates promptly enough, but their expenditure and loan accounts are never published till they are many years out of date !)

Now we can go back to the question which really interests every one of us : Where does income come from ? What can make the total of the national income rise or fall ? Is it incalculable and uncontrollable like the weather ? Can government policy influence it ?

We must first clear up one line of argument, which is sometimes known as the " snowball." Suppose the Government, or for that matter anybody else, decides to spend more money. This will mean in the first place that more people are employed and will be earning wages ; suppose for the sake of argument it is 100 extra men at £3 a week each. When they come to spend these wages, that will mean a considerable amount more employment in manufacturing the food, clothing, etc., which they buy. The turnover of various tradesmen will have been increased by a total of £300 a week (unless some of the money is saved). Then again a considerable part of this will be paid out in wages in the trades manufacturing food and clothing, etc., while the remainder will represent profits. These profits again will mainly be spent in purchasing other commodities, and both wages and profits in turn will create more employment in other trades, and so on *ad infinitum*. We thus reach the conclusion that if we can manage to put 100 extra men in employment we will quite quickly find indirect employment for every one of the three million unemployed. Then on the other hand, if the Government or private individuals decide to spend less, they will not only throw the first lot of men out of work, but also indirectly another lot of men, and so on indefinitely until the whole population is out of work.

These conclusions are clearly silly. The purpose of bringing forward this argument was in order to carry it on to its logical and absurd conclusion, and to show that there must be a catch in it.

Let us go back over the ground. Suppose somebody

starts a job which involves a wage bill of, say, £300 a week. It is perfectly true that, besides the original job, the turnover of a number of other trades will be increased to the extent of £300 a week. But beyond this stage the argument fails. It does not follow that these other trades, in their turn, will have to take on any more men. Because although it is true that the amount of purchasing power has been increased by £300 a week, we must not forget that these first men employed have produced a quantity of goods which have to be sold, and the value of these goods will be about £300 a week. These goods may not be of the same nature as the food and clothing which the wage-earners wish to buy, but in the aggregate it will be true to say that traders find that the quantity of goods which they have to dispose of has increased by just as much as the purchasing power of the market. Profits, employment, and prices in the other trades will therefore not be affected.

Now I have answered this rather absurd argument in some detail, for the reason that out of this refutation springs another important conclusion. Suppose that, instead of these 100 men being employed on a job producing goods which have to be marketed, they are instead put to work on building a road, or an elementary school. In this case they have their wages and spend them, but the " goods " which they are producing are of the kind which do not have to be placed on the market at all, or at any rate so far as they are " used up " it is over a long period of years. The result in this case is that purchasing power has been increased *without* any corresponding increase in the quantity of goods requiring to be sold.

It is only in such cases as this that we can hope to get any " indirect employment " besides the employment due to the original outlay. It is only in special cases that these indirect repercussions will be considerable. We have reached the important conclusion that money spent on real investment, in the sense that we have defined it above, will tend to really increase purchasing power, and thus be a factor tending to cause a rise in prices of consumable goods, or

an increase in quantity being sold at the current price, or some result intermediate between these two.

In the same way anybody who saves money reduces the total of purchasing power for consumable goods. If all savings find their way into real investment, the situation is rectified and brought back into equilibrium. If investment is in excess of the amount of savings available, then purchasing power will be too high, and there will be a rise in prices. The object of public policy should be to keep investment adjusted to savings, and then the productive resources of the community will be used to the full.

This does not mean that we want to be " going all out," as for instance we were during the war. Although the quantity of goods produced under those circumstances was very high, we were in fact straining our productive resources beyond a reasonable limit, which was accompanied by a great deal of waste and inefficiency. This inefficiency partly took the form of the excessive demands which were made upon labour in the matter of hours worked, sacrifice of conditions, speeding-up, etc. : and partly appeared in the price and profit system, whereby capitalists in practically every industry were able to intercept a large part of the increased purchasing power of those times in the form of super-profits.

Those who regard the war period as a sort of economic golden age, in which for the first time our productive resources were employed at a reasonable level of capacity, are somewhat straining the interpretation. At the same time it is also pretty clear that we are working a long way below our productive capacity at the present time, which capacity of course we have been adding to from year to year and which is now vastly greater than it was in the war period. The position we want to aim at is that of what may be called an *optimum* level of production, or a condition under which the production per unit of labour, or effort, is at a maximum. Judged by this standard the war years, in view of the immense effort which in various forms was required from the working population at that time, were not satisfactorily productive.

Statistical investigation (which is not an easy matter in this field) suggests that we should aim in Great Britain at an optimum level of production which seems to be something like 25 per cent above our present level. If our productive capacity continues to show the same rate of growth which it has shown in recent years, this figure ought to be rising by some $2\frac{1}{2}$ per cent per annum. Any big changes in the organisation or efficiency of our industries might again raise this figure of productive capacity by an unknown amount. Moreover, productive capacity under present conditions is restricted just as much by marketing conditions and by monopoly profits as it is by technical conditions, and any improvement of the organisation of marketing, or the limitation of monopoly profits at key points, might have a further big effect in improving productive capacity.

However, simply taking things as we find them, and assuming that the present conditions of production, marketing and profit-making continue, we can still aim at an increase of production of some 25 per cent above the present level without any appreciable increase in prices. A few paragraphs back we mentioned the effect of, say, a government programme of road repairs or school-building. Such a programme would have the effect of increasing the purchasing power of the workers without directly increasing the quantity of consumption goods available. The really important question which we have to answer is this—will this increase in purchasing power enable people to obtain more goods, or will it on the other hand be filched from them again in the form of simply having to pay higher prices for the goods they buy already?

We are now in a position to answer this. So long as the current level of output is well below total productive capacity, there will be no considerable rise in prices at any rate of industrial goods and the quantity of output and consumption will be considerably increased. As output comes nearer up to productive capacity, prices will begin to rise and a condition will finally be reached in which the main part of any increase in purchasing power is used in

raising prices rather than in increasing the quantity of consumption.

As has been stated above, the U.S.A. was apparently in this condition at the top of the boom in 1929. Prices were rising slightly; but it is important to remember that owing to technical improvements unaccompanied by a rise in wages, costs had been falling very substantially. In order to maintain equilibrium throughout this period prices ought to have fallen in accord with costs, or else wages should have risen in accordance with technical improvement. In fact this was a period of headlong rise in industrial profits, due to the fall in costs unaccompanied by a fall in prices, which directly led to stock exchange speculation and hence to the crash.

It is clear that there is a close connection between the level of investment and saving on the one hand, and the level of output and employment on the other. Various aspects of it have been described above, although of course an exhaustive treatment of this matter is outside the scope of this book. In this country at the present time investment falls short of savings approximately to the extent of £300 million a year, an enormous figure. If by any method or combination of methods we can close this gap, we shall have succeeded in restoring output to its optimum level. This would represent the employment of approximately a million and a half more workers than are employed now.

Although this is not the place to go into the matter, it is clear that any Government which sets out to have anything like a complete programme for meeting unemployment must place a great deal of reliance on proposals for reducing the numbers in search of work as well as on proposals for increasing the amount of work available. The numbers in search of work can be reduced by pensions, raising the school leaving age, and such measures. Shorter hours would also have the same effect.

The more one looks at this figure of £300 million the more formidable it seems to be. Government policy will clearly have to attempt to meet it by a combination of

measures. It is sometimes suggested that the situation might be met by encouraging " wise spending " on the part of private individuals. The only persons concerned would be the well-to-do classes, because the wage-earner naturally has to spend practically the whole of his income in any case. It would require an enormously greater level of spending on the part of wealthy private individuals to restore the situation, and not many would agree that such a policy is socially desirable.

A really big programme of public works financed out of loans would have a good effect, provided of course that such work was additional to the work in hand at the present time. The biggest scope for public investment lies in the restoration of the activity of municipal housing and the rapid proceeding with slum clearance schemes, road programmes, rural water supply and sewage, small holdings and afforestation, and a great deal of new school building and replacement. All such are properly financed by loan expenditure, largely on the responsibility of the local authorities, subject to grants from the central Government. Everyone of them represents work which would permanently enrich the country, and the fact that we prefer to leave labour and resources idle rather than to undertake such work, because as we say there is not enough money in the country, merely proves that we are all mad.

A really big programme of public works would lead to a big consequential demand for productive materials such as cement, steel and bricks. The effect of increasing the purchasing power of the workers would also be to improve the demand for a great many other commodities of staple consumption. It would certainly be the business of the Government to take steps to see that profiteering did not take place in any of these commodities, and a controlled expansion of output should take place without a rise in prices. Under these circumstances there should be a controlled revival in private investment in industry in addition to the programme of public investment. It would probably prove desirable for the Government to restore

the machinery of the Trade Facilities Act, which was set up in 1921 and has recently been allowed to lapse, whereby the State assists in the provision of capital for approved schemes of investment. Perhaps not many people are aware that it was under the terms of this Act that a number of the more important recent extensions of the London tube system were made, colliery shafts sunk in Durham, Kent and elsewhere, a number of ships built and other important investment projects carried out.

We have already discussed the effect of the Budget on the amount of consumption and saving. When the Government makes cuts in expenditure, as it did in 1931, in order to restore the Sinking Fund and to meet the cost of unemployment benefit out of revenue instead of borrowing, this has the effect of reducing the national purchasing power and increasing the total of savings. If it makes cuts in expenditure in order to reduce taxation, the case may be different. We cannot tell for certain whether the effect of the remission on the tax-paying classes will be to cause them to save more or spend more. But in actual fact it is probable that a considerable part of the remission will be used by the tax-payer for repayment of overdrafts, etc., or in some way will be added to savings rather than to consumption, and so on the whole will have a deleterious effect.

And now we come to the final question; ought we to recommend that Governments should deliberately unbalance their Budgets? The effect of this would clearly be to increase purchasing power and to reduce savings, even if the unbalancing of the Budget took the form of a remission of taxation rather than an increase of expenditure. In this latter case it is also possible that a remission of taxation, although it might have some effect in increasing savings, might at the same time afford some encouragement to private investors.

The effects which a Government has to face if it unbalances its Budget are almost entirely psychological. Like so many psychological questions in economics, the less you

know about it the more you know. What is called a psychological movement in economics generally represents the least common denominator of the intelligence of those concerned. If you can interpret accurately what will be the reactions of the most wooden banker in the City of London and of a foreign investor most ignorant of English conditions, then you will understand the kind of factors which a Government has to face if it decides to unbalance its Budget as a method of restoring internal purchasing power. It is very unwise for any Government to unbalance its Budget unless in the first place it has some such organ as the Exchange Equalisation Fund to protect its foreign exchange, and in addition to this some control over both the banking and investment systems at home in order to prevent excessive selling of government securities. Even with these safeguards, the policy cannot be carried very far if it causes too great a disturbance of current financial opinion, unless at the same time the Government is carrying through very big and successful constructive methods in other fields.

There is of course a good deal to be said for the traditional British method of securing a balanced Budget in difficult times, which has been adopted on various occasions by each of our last three Chancellors. This method may be described as a compound of hypocrisy and brass cheek. It involves making sternly upright statements about the need of balancing the Budget in face of difficulties and in face of the world, and then doing it by including a number of items which any honest system of accountancy would call appropriations from capital accounts.

The alternative way in which the Budget can be used to increase the amount of consumption is by increasing taxation and using the money for financing social services. This is a much less hazardous policy than that of deliberately unbalancing the Budget. It may lead to some attempts to transfer capital abroad, which would have to be checked by exchange regulation or in other ways, but it will not produce any internal crisis due to fear of inflation, which

might be the effect of certain other measures. An increase of taxation might have some effect in reducing private investment, although this would not be very considerable, and also, as we have seen, private investment does not represent a very large proportion of the total. Such a policy moreover would certainly have the effect of bringing savings down more closely towards the level of investment.

Lastly, there remain the questions of policy in relation to overseas investments. Britain is still one of the creditor countries, and at present we are open to the reproach which a few years ago we were levelling against France and America, namely that we are refusing to lend abroad but are preferring rather to take our income in the form of gold. It is possible, however, that something will come out of this World Economic Conference which will make feasible some restoration of overseas investment, but the main planks in a programme of monetary recovery, so far as the matters dealt with in this chapter are concerned, must be a big policy of public investment, some plan of recovery for private investment, and the expansion of the purchasing power of those who need it most, by social services and by a forward wage policy which keeps pace with technical progress.

CHAPTER X: DEBT

By E. L. HARGREAVES

INDEBTEDNESS is to be found in probably every type of society which has achieved any measure of economic progress. In its simplest form wealth or purchasing power is transferred from one person to another with the stipulation that at some later date an equal amount of wealth or purchasing power be re-transferred from the second individual to the first. And although certain societies have objected to the payment of interest on religious or political grounds there will usually be interest payments at the rate of so much per cent per annum on the principal sum advanced so long as the loan is outstanding. With the progress and development of the corporate form of economic organisation, however, lenders and borrowers need not be individual persons ; they will in fact frequently be corporate bodies, such as joint-stock companies. Developments in the field of political organisation have similarly extended the field of corporate borrowing. In place of the borrowing of a monarch on his personal security we now have the vast loans of public authorities, such as states and municipalities, based upon the power to levy taxation over particular areas. The whole structure of indebtedness is of course supported by a legal framework, by which the payment of obligations is enforced. This means that the law has to define and make precise the relations between creditors and debtors, and to decide such important questions as the nature of a debt and the conditions under which the payment of obligations may be suspended. An elaborate code has thus arisen for securing the rights of creditors by claims on the property of the debtor under a system of mortgages, although the mortgage is only a particular case of the fairly general rule that the borrower is required to pledge some form of security for the loan which he proposes to raise. It will be seen that one of

the differences which arise in the case of international debts is the absence of a legal authority which can enforce payments between nations with the result that unless creditors are prepared, as they sometimes are, to back their claims by force, they must submit to a discussion of the position with their debtors.

Although there are various types of obligation secured in various ways there is a general form which debts take which it may be worth while considering. What is advanced by lender to borrower and what correspondingly the borrower stipulates to repay is not so much wealth in the form of a definite quantity of certain goods or services but so many monetary units, pounds, dollars, francs, marks, etc. Similarly the rate of interest is calculated as a rate per cent per annum on the money sum advanced. An obvious but nevertheless important result of this aspect of the form of debts is that changes in the purchasing power of the monetary unit alter the meaning of the obligation. A rise in the value of money makes a debt more burdensome in terms of goods and services and *vice versa*. Gold of course forms no exception to this statement. A debt contracted in terms of gold becomes more or less burdensome according as gold appreciates or depreciates. Only if it were agreed that obligations should be contracted and enforced in terms of purchasing power in general, measured for example by an index number of prices, would this difficulty in any way be met. For private debts the creditor has rights to interest and repayment of principal enforceable by law, usually backed up by some claim, e.g. a mortgage upon the assets of the debtor. This means that in the case of a business which has borrowed money, after the operating expenses have been met, the creditor has a prior claim on any net income which may accrue. The proprietors of the business, the shareholders for example, cannot draw anything until the claims of the debenture-holders or bondholders have been satisfied. The result of this state of affairs is that companies which have a large amount of indebtedness and a fluctuating revenue from their operations show great fluctuations in

the profits they yield to their owners. In a severe business depression the trouble may go still further, and there may not be enough income to meet even the claims of the creditors. The question then arises whether the creditors should enforce their rights and foreclose on the assets of the business. This seems the natural thing to do, but the answer becomes less clear when the property in question is valueless outside the business. Bondholders in a railway company who have a mortgage on the property are in such a position, and they find it better to apply for a receivership and to wait in the expectation that under the management of the receiver the railway will return to a profit-earning position. The intensity of the present slump has raised the whole question as to whether businesses should bind themselves to pay interest on borrowed money in this way without regard to their profit-making capacity, and whether it would not be desirable that those who lend money for business operations should realise that their income must depend upon this factor rather than upon an obligation enforceable in a court of law.

The purpose of borrowing is a more important matter perhaps than the form which debts take and it is here essential that certain popular misconceptions associated with the word " debt " should be cleared away. " Getting into debt " seems an undesirable thing for the individual because of its possible consequences, and it is quite natural that the thing should be regarded as undesirable in general. The individual, however, realises that there is a difference in the situation where he borrows from a Building Society in order to buy a house. For a business man, of course, borrowing is one of the obvious ways of obtaining the capital which he requires, and indebtedness, whether to debenture-holders, bondholders or banks, is a universal feature in business finance. A distinction has thus been drawn between " productive " and " unproductive " debt, between borrowing that has for its purpose the creation of capital wealth and borrowing that is merely an anticipation of future income. Borrowing of the former type is the natural

way of financing capital development, since capital development requires the immediate use of goods and materials, while the capital itself will not have been produced and be ready for use until a much later date. Where industries are specialised, what have been called " the roundabout processes of production," the processes of production which take time, are financed through borrowing. In this way the time gap is bridged. One must be careful, however, not to identify the capital assets which are the result of " productive " borrowing with assets which yield a money income or profit. The individual is clearly justified in borrowing in order to build or to buy himself a house. Similarly public authorities may be justified in borrowing for the purpose of creating works or improvements, even though these things may yield no direct profit to the authority concerned. In a time of slump like the present borrowing for such purposes is additionally justified by the fact that it would create additional income and employment and thus directly benefit the State through diminished expenditure on relief of unemployment and increased revenue from taxation.

Unfortunately borrowing by public authorities has been predominantly of the unproductive type, and there is therefore a good deal of justification for the individual's fears about the growth of public debts. This is not of course true of the borrowings of all public authorities. The debt of local authorities in Great Britain is on account principally of housing, transport and other services of a productive character. What is ordinarily termed " an unbalanced budget " arises when there is a failure to cover the expenditure of the State out of the proceeds of taxation and certain miscellaneous items of revenue. The budget is not unbalanced in the sense that there is an unbridged gap between income and expenditure ; the budget is balanced by the raising of loans or by the issue of paper currency. In a period of war when there is a very large excess of expenditure over the revenue derived from taxation resort is usually had to both methods—the raising of loans and the printing

of currency. (When the currency is created by a bank or other note-issuing authority from which the Government raises loans, as is usually the case, the process is simply one of borrowing.) The result of these operations is that war loans are raised in terms of a monetary unit which has been depreciated by currency inflation. Hence large nominal sums are borrowed and the national debt is multiplied many times over. The growth of public debts during the Great War is shown in the following table :

		1914	1920	
			(a) Nominal Amounts	(b) In terms of pre-war purchasing power
United Kingdom	£ mn.	650	7,829	2,454
United States	$ mn.	1,188	24,298	9,999
France	Francs mn.	34,188	285,836	54,238
Germany	Marks mn.	5,158	220,300	14,825
Italy	Lira mn.	15,766	94,762	15,176

Prices had, however, risen by 1920 very considerably, though in different degrees, in all countries, and hence the debts of that date stated in terms of money of pre-war purchasing power would have represented much smaller sums as the last column in the table shows. After 1920, however, there arose considerable differences in the real burden of public debts on account of the differences in the monetary policies pursued by different countries. In those countries where the value of the currency was forced up, usually in the attempt to regain a pre-war gold parity of the monetary unit, the burdensomeness of the debt was very much enhanced. In Great Britain the burden of the debt stated in terms of pounds of pre-war purchasing power had risen from £2,454 million in 1920 to £4,577 million in 1925. In those countries where currency depreciation was accepted, as in France, considerable increase in the nominal amount of the debt added relatively little to its burdensomeness. In the countries of Central Europe where inflation proceeded to the point of destruction of the currency the burden of the debt was completely abolished. The process amounted to a levy upon the holders of the debt to the full extent of their

holdings. Holders of private obligations suffered of course equally along with public creditors, and in some cases it was felt that the expropriation had inflicted such injustice that some compensation must be made to those whose claims had thus been annihilated. In Germany, for example, a scheme was introduced for the " valorisation " of debts, whereby creditors became entitled to a fraction of the original gold value of the obligations due to them.

The difficulties which these vast national debts caused were immensely aggravated by the creation of large international debts, due on the one hand from the powers defeated in the war to the victorious powers and on the other among the victors themselves. Whatever view may be taken about the burden of national debts and the manner in which it makes itself felt, it is clear that a far more serious burden is imposed when the debt is due from one country to another. Not only has taxation to be imposed, as in the former case, but in order to transfer the sums due the debtor country must achieve a surplus on its balance of international payments to the amount required. This means either that it must import less or export more, and/or that it must invest less abroad or borrow from abroad. Obviously the difficulties in achieving a reduction of imports or an increase of exports to the amount required may be very considerable, so that the country in question may be driven to borrowing in order to secure the surplus. Thus we find that Germany managed to make the transfers required of her under the Dawes Plan by borrowing, principally from America. The existence of the international debts has no doubt modified the direction of the flow of international trade, but their influence has been masked to some extent by counterbalancing changes of this nature, i.e. changes in the direction of investment.

The principal international debt charges arising out of the war have been (a) Reparations imposed upon the defeated powers, principally Germany, by the Allied powers, (b) the debts due between the Allies themselves, the ultimate creditor being the United States of America.

The aggregate value of the Reparation obligations due from Germany was originally fixed in 1921 at 133,000 million gold marks, a sum which was at the time widely recognised as far too high relatively to what was practicable in the way of annual payments. A new arrangement had soon to be drawn up, namely the Dawes Plan of 1924, whereby the annual payments to be made by Germany rose from 1,000 million gold marks in 1924–5 to 2,500 millions in 1928–9. The latter figure was to be regarded as the standard payment, but no date was set for the termination of the payments and hence their capital value remained undetermined. Five years later, in 1929, a fresh arrangement was made, the Young Plan, which refixed the German annuities and definitely established a final date at which they should cease. The new scale of annuities was to begin at 1,708 million gold marks in 1930–1, rise to 2,429 millions in 1965–6 and terminate finally in 1987–8. These arrangements all occurred before the world slump, and the Reparations problem was by no means finally settled. The slump with its collapse of trade and prices necessitated a complete revision of the position and the situation was only partially relieved by President Hoover's proposal of June 1931 for a year's moratorium on all intergovernmental debt payments. A year later, in July 1932, after the situation had still further deteriorated, the Lausanne agreement was negotiated which abolished Reparations and substituted therefor the obligation of Germany to hand over to the Bank for International Settlements bonds to the value of 3,000 million gold marks, bearing interest at 5 per cent per annum and a one per cent sinking fund for their redemption. The German balance of payments stood the strain imposed by the heavy burden of annuities under the Dawes Plan because, as has been seen, large borrowings from abroad, particularly from the United States, took place over this period. It was estimated that for the years 1924 to 1930 the total amount of capital imports into Germany was 18.2 thousand million marks, distributed as follows :

Long term borrowings		9.1
Short	,,	6.2
Unclassified	,,	2.9

The total amount of foreign investments in Germany at the end of July 1931 was put at 23 thousand million marks, Germany's investments abroad amounting to 8½ thousand million. In 1929 the Wall Street boom diverted American capital from Germany ; and although the German balance of trade began to show an export surplus in 1930 the subsequent depression with its accompanying fall of prices made reparation payments on the old scale quite impossible. It may be noticed that under the Dawes Plan provision was made for varying the nominal amount (in gold marks) of the Reparations liability in accordance with variations in the purchasing power of gold. This feature was omitted in the Young Plan and there was therefore nothing to diminish the increased severity with which the burden would have been felt as a result of the fall of gold prices.

The problem of Reparations has naturally been closely linked with the other problem of debts due between the allied countries. It was felt by the debtor nations among the Allies that at the very least they should receive sufficient sums on Reparations account to enable them to meet the payments due to their creditors. Since the United States of America represented the principal and ultimate creditor the attitude of the government of the United States proved to be the deciding factor in the problem of inter-governmental indebtedness. The British government definitely established this point in the celebrated Balfour Note of 1922 by asserting it as a principle of policy that just so much and no more would be demanded from the debtors of Great Britain as would be sufficient to meet the payments due from her to the United States. Hence the arrangement which was negotiated in the following year for the settlement of the obligations outstanding between Great Britain and the United States on account of the vast sums borrowed from America for war purposes was of special significance. Great Britain agreed to pay for the first ten years annuities

of approximately 160 million dollars, rising in 1933 to 180 millions, and maintained at that level until the extinction of the debt in 1984. These terms were more favourable than those originally proposed by Congress, but they imposed a heavy burden upon this country. The subsequent arrangements, however, for the settlement of debts due both to Great Britain and to the United States have been far more favourable to the debtor than this first settlement. During the next four years funding agreements were reached by America and Britain with their principal Continental debtors which amounted to a remission of more than 50 per cent of the amounts due. (In the case of the British debt the remission had amounted to only 18 per cent.)

To a considerable extent, therefore, the Allied countries in Europe have been simply the channels through which German Reparations payments flowed to the ultimate creditor, the United States. Reduction or cancellation of Reparations liabilities has largely been contingent upon a corresponding reduction or cancellation by the government of the United States. The period over which the Reparations annuities were fixed was determined by the period over which annuities to America would be paid. From this standpoint, moreover, the significance of the American loans to Germany during the operation of the Dawes Plan stands out still more clearly.

The problem of the payment of these inter-governmental debts, as has been shown in the case of German Reparations, raises problems similar to those which are involved in the payment of commercial debts due abroad. The balance of payments for the creditor and debtor countries has to be readjusted in order to meet the new situation. Alterations in the volume of exports or imports or both are the most obvious, though not the easiest, way in which the new equilibrium can be achieved. Such alterations imply changes in the prices of exported and imported goods and in the levels of money incomes which it may be very difficult to bring about, and which require the pursuit

of an appropriate monetary policy in the countries concerned. Where the gold standard has been in operation, as has usually been the case during the period under consideration, the monetary policy required has frequently imposed an almost unbearable strain upon the whole economic system.

For some time the situation was met by borrowing. Equilibrium was achieved not by the methods which have just been referred to, but by the principal creditor country, America, lending to the principal debtor country, Germany. But it is pretty clear that it is unlikely that this arrangement will lead to equilibrium in the long run. The sums required to meet the charges for interest on and repayment of the new debt piled on top of the existing debt charges impose a still greater strain upon the balance of payments for the debtor country. Even over a fairly short period it is probable that the inflow of capital from the creditor country will be a matter of some uncertainty. The failure of confidence or the greater attraction of investment elsewhere (not necessarily at home) will divert the flow on which the debtor country relies to achieve equilibrium in its balance of payments. In the long run it is clear that people will not continue to invest in the country under these conditions.

It may be asked, however, in what way a Reparations-paying country, such as Germany, differs from a country in which a large amount of capital from abroad has been invested for development purposes, such as Canada or Australia. The answer is in the first place that the Reparations annuities imposed a liability upon Germany without any corresponding advantages. The capital borrowed by other debtor countries will have been used to a large extent to develop their productive capacities, and this in turn will react either directly or indirectly upon their capacity to increase their exports or to produce for themselves commodities which they have hitherto imported. Of course it is easy to think of cases where this would not be true. Capital raised to finance wars or expenditure on armaments or to erect public buildings is not going to have any

influence in improving a country's balance of payments. Again there may be misdirection and waste of capital borrowed whether at home or abroad. In all these cases the debtor country finds itself in difficulties similar to those which surround the Reparations-paying country and the problem of the balance of payments arises. In the second place the payment of Reparations involved the finding immediately of large sums for transfer abroad. In the case of the other countries foreign investments were gradually built up in them, and time was allowed for the readjustment required to enable interest and sinking fund payments to abroad to be met. No quick diversion of resources was necessary, as in the case where a sudden obligation was imposed to transfer sums amounting annually to many millions of pounds.

Alike, however, in the case of Reparations and of other debts whether governmental or commercial, due from one country to another, certain difficulties have arisen in recent years which have very much aggravated the situation. There is first of all the well-known fact of the tremendous fall since 1929 in the level of gold prices, which has immensely increased the burden of all debts. It is worth observing in this connection that the provision contained in the Dawes Plan for varying the Reparations annuities in accordance with changes in the purchasing power of gold was not maintained in the Young Plan. The result of this situation is that debtor countries have to achieve an even more violent deflation of prices and money incomes if they wish to maintain equilibrium on the gold standard. In point of fact many have chosen the easier alternative of suspending payments. In central European countries under such circumstances the gold standard has only been maintained by a deliberate control and rationing of foreign exchanges. The fall of prices has particularly hit those debtor countries which rely for their exports and for meeting their payments abroad on certain primary commodities, foodstuffs and raw materials, the prices of which have fallen more than in proportion to the prices of other things.

Thus Australia, whose exports consist principally of wheat and wool, has been placed in great difficulties by the severe fall in the prices of these commodities. It is clear that in the case where the demand for a country's exportable commodities is very inelastic the situation may arise where no reduction in the price the country is prepared to accept for her exports will enable her to meet fixed obligations payable abroad in terms of gold. Another factor which has aggravated the situation has been the commercial policy which certain countries have pursued. Clearly equilibrium can only be achieved in international payments if creditor countries are prepared to take the goods of the debtor countries and refrain from excluding them by prohibitions and tariffs ; unless, of course, the creditor countries prefer not to be paid and are prepared to make loans to the debtor countries, an arrangement which, as has been shown, can have little degree of permanence. A commodity which the creditor will no doubt be prepared to take is gold, but there are limited stocks of gold available for the purpose of settling international balances. In point of fact, however, creditor countries have recently pursued a policy which tends to render equilibrium difficult to achieve. High tariffs have been imposed as in the case of the Hawley-Smoot tariff introduced into the United States in 1930 ; and in the case of Great Britain tariffs have been imposed where formerly a system of free trade prevailed. Policies of this sort adopted by the creditor nations undoubtedly make the position of the debtor countries extremely difficult. Taken by itself, perhaps, this protectionist policy would not have very serious repercussions ; but taken in conjunction with the existence of international indebtedness and the collapse of international lending it sets up a strain which the world's economic system can barely stand.

A false picture would be presented of the situation if it were suggested that Reparation liabilities or even these plus other inter-governmental debts constituted the only source of trouble. In addition there have been large borrowings for various purposes which have given rise to a mass of

debt, the interest on and repayment of which must be settled by transfers abroad. Some of this borrowing has been for long periods, but a great deal has been of the short period type and has been represented largely by short-term balances transferred from one monetary centre to another. The attraction of relatively high interest rates has drawn balances to a particular centre from which they are likely to be withdrawn as soon as the attraction disappears. At the end of the inflation period in Germany in 1924 the scarcity of capital coupled with newly developed opportunities for investment gave rise to high interest rates and the influx of foreign, particularly American, capital. In general the large volume of international investment which then took place contributed to the boom conditions which continued down till 1929. The borrowing countries prospered and difficulties were felt rather by Great Britain, a creditor country, in attempting to maintain her pre-war scale of foreign lending. Under these conditions overborrowing naturally occurred and the seeds of future trouble were sown. Germany increased her foreign indebtedness very considerably ; the public debt of Australia (Commonwealth and States) amounted by 1930 to over £1,100 million, of which more than half was due abroad. The breakdown of international lending which subsequently occurred would in any case have necessitated awkward readjustments, but the difficulties of the situation were aggravated by the great fall of prices, to which the breakdown itself contributed, and by the restrictive measures which have been described. The debtor countries found themselves in a position where not only was their development with the aid of imported capital restricted, but they were required to make payments abroad which imposed an increasingly heavy burden upon them, particularly under the conditions created by the commercial policies of the creditor countries. In these circumstances the existence of a large volume of short-term indebtedness constituted an additional problem. After the general collapse a " crisis of confidence " occurred in which doubts were felt as to the

capacity of debtors to meet their obligations. This failure of confidence affected debtors generally, but it had particularly severe repercussions in the international sphere. Short-term balances were withdrawn from the countries in question which thus seriously endangered their monetary position and placed the greatest difficulties in the way of maintaining gold standards which had been restored at great cost after the war. In Europe a financial crisis developed in the spring of 1931 which ultimately led in the case of Germany to a " standstill " agreement with foreign bankers, severely restricting the withdrawal of short-term balances and credits, an agreement which after a year and a half is still in operation. The repercussions of this crisis on Great Britain are well known. The London money market had lent largely to Germany, and this fact coupled with the fact of an unbalanced budget, which was widely advertised, led to a failure of confidence and a withdrawal of balances in the summer estimated at £200 million. The resulting abandonment of the gold standard by Great Britain was naturally not only the cause of its abandonment elsewhere but also the ground for an extension and intensification of the failure of confidence.

This discussion of the question of international debts has led to a consideration of the problems connected with the payment of private as well as public debts due abroad. In many ways the problems are similar and the analysis of them must proceed along similar lines. But it should be clear that in general it is desirable to separate the field of public from that of private debts. The relations of the State to the public creditor differ in many important respects from the relations of the private borrower, whether individual or corporation, to those from whom the money has been raised. This will appear more clearly when we come to consider the various ways in which the burden of debts can be reduced or abolished. Apart from such considerations, however, there is the fact that the public borrower has the power to raise revenue by the instrument of taxation in order to meet the service of the loan, a power

denied to the private borrower. Among other results of this situation it follows that the public authority is not in the position that the private borrower usually is of considering the application of the sums borrowed to some " productive " in the sense of money-yielding enterprise. Private borrowers do of course raise loans to cover a current excess of expenditure over income which they hope to pay off out of future income, but even in this case their position is different from that of the public authority which can levy taxation. In all other cases the private borrower will not only consider the productive investment of the money raised but will also compare the price he has to pay for the loan with the return which he expects on the investment. Obviously although public borrowers may and frequently do raise loans for productive purposes they are not so much affected by these considerations. Nor is this a disadvantage, for it means that public authorities will be prepared to employ capital in projects which are of importance to social welfare although they may not be able to yield the current rate of interest on the money invested. But there is the further point that as a matter of historical fact the debts of States have been incurred in the vast majority of cases not for the purpose of investment but in order to carry on war. It has been a case of the " unbalanced budget." The vast expenditures of war have usually far exceeded the resources which States derive from taxation and from other miscellaneous sources of revenue, and the gap has been bridged by borrowing. Consequently States have frequently not been too particular about the prices which they have paid for the loans raised. What is true of war has often also been true of peace. States with budget deficits or even with programmes of reconstruction have had to pay dearly for loans, particularly from foreign lenders who have had doubts about the economic future of the country in question. This would anyhow have tended since the war to keep up the long-term rate of interest and to prevent its readjustment in a downward direction towards the level set by the return on fresh investment in business enterprise. This tendency has,

however, been accentuated by the necessity of refunding in the case of war debts and war loans. During the war loans were raised for short terms and a very great increase took place in the floating debt which matures in periods of less than a year. The existence of this mass of short-term indebtedness requiring continually to be funded or refunded has affected very powerfully the conditions in the investment market and has had an unfavourable influence upon the terms on which fresh loans could be raised.

However different may be the purposes for which public and private loans are raised and the nature of the security for their payment, they still have this feature in common that they are reckoned in terms of monetary units and are settled by the handing over of a certain quantity of legal tender. There have been exceptional cases in periods of monetary disorder, as occurred for example in Germany in 1923, when loans were raised in terms of some commodity such as coal or rye and payment was made in variable quantities of legal tender sufficient to purchase a fixed quantity of such commodity ; but such an arrangement is far removed from the normal state of affairs. As things are, payment will be made in legal tender currency or in other media of payment convertible into such currency to a nominal amount equal to the sum originally stipulated in the loan contract, and the courts will uphold such payments. Consequently debtors benefit and creditors suffer from a depreciation of the monetary unit, while the converse is true of monetary appreciation. It has already been shown how, in spite of the fact that the nominal amounts of national debts grew very considerably during the period of the war, their burdensomeness as measured in terms of pounds of pre-war purchasing power did not increase to anything like the same extent. Similarly, through the influence of currency depreciation the burden of private debts was very much reduced. Where uncontrolled inflation was pursued, industry was able to profit from the situation and to wipe out a large proportion of its fixed charges. In some cases the movement went so far that the

currency became worthless and the burden of debt charges disappeared. In all these cases severe hardship was inflicted upon creditors and they could claim that justice demanded some revision of the situation. The most glaring example was that of persons who had made advances when the currency was on a gold basis and had to accept repayment in worthless paper. There were, however, serious difficulties in the way of revision. In the first place some scale would have to be constructed indicating the gold value or the commodity value of debts at the time they were contracted. Payment would then have to be made in an amount of the depreciated currency representing an equal gold value or commodity value. But at a time of severe depreciation the currency was hourly losing its value and by the time the arrangement had been made and the payment effected the creditor would have again suffered. In the second place there is a market for debts and they are continually changing hands. The attempt to do justice to creditors would involve the extraordinarily difficult task of ascertaining the dates at which obligations were bought and sold and not simply the date at which they were originally incurred. No attempt was made to deal with these problems until currency collapse had occurred, but in Germany at any rate a scheme was subsequently drawn up which awarded creditors compensation up to 25 per cent of the gold value of their claims.

Inflation has led to the violent expropriation of creditors, but the process of deflation though much more prolonged has produced equally undesirable effects from the standpoint of debtors. Its influence in aggravating the burden of public debts, both domestic and foreign, has already been described. We may now consider the measurement of the increased burden imposed and the repercussions within the sphere of private debts. In those countries where inflation was checked the rise of prices came to an end in 1920 and subsequently a severe fall occurred in 1921 and 1922. Thus in Great Britain the index of wholesale prices (1913 = 100) fell from 307 in 1920 to 197 in 1921 and 159 in 1922. The

index of the cost of living (1913=100) fell from 255 in 1920 to 222 in 1921 and 181 in 1922. The fall of prices in the United States though not so great was still very considerable. Thus the value of a debt calculated with reference to the wholesale index nearly doubled between 1920 and 1922; calculated with reference to the cost of living it increased by 40 per cent. After the return to the gold standard in 1925 a further fall of prices though of much smaller dimensions took place, but it was not until the crisis of 1929 that the catastrophic fall of commodity prices occurred.

	1924=100			
	Wholesale Prices		Cost of Living	
	U.K.	U.S.A.	U.K.	U.S.A.
1929	82	97	94	99
1930	72	88	90	94
1931	75	84	84	84
1932	61	66	82	—

Thus by 1932 debts contracted in Great Britain in 1924, calculated with reference to the wholesale index, had increased 64 per cent in value. If the calculation be made with reference to the cost of living index the increase is 22 per cent.

We have already seen some of the consequences of this enormous rise in the value of money in dealing with the question of public debts. Along with falling prices have gone falling output and employment and the consequent reduction of national incomes expressed in terms of money has been very great. The increased burden of public debts has therefore been felt in the form that a constant amount of revenue has had to be raised for the service of the debt from a diminished national income.

The difficulties of the situation are of course aggravated by the fact that not only do smaller outputs and lower incomes yield smaller revenue but also where progressive taxation is in operation the lower incomes are taxable at lower rates. In these circumstances it is not surprising that budgetary difficulties have been encountered, considerable

budget deficits have been incurred, and search has been made for new sources of revenue which may be exploited.

In the sphere of private debts a different set of problems emerges. It has been seen that these debts are usually incurred on account of capital investment and that borrowing in order to meet an excess of current expenditure over current income is not to be regarded as typical. Indebtedness viewed from this standpoint becomes part of the problem of the financing of business enterprise. The questions which are raised are those concerned with the basis of the capitalisation of a business and the form which that capitalisation shall take. But no very definite answers can be given to these questions. It might indeed be accepted as a principle that the debt should be adequately covered by the realisable assets of the business valued upon a conservative basis ; but company finance shows that there can be no general rule as to the proportion which the debt should bear to the share capital. In different industries and even in different concerns within the same industry we find varying proportions existing between these elements in the total capitalisation. The result of this state of affairs is that considerable differences exist with regard to the proportion of profit available for distribution to different groups of shareholders after debt charges have been met. Much will depend upon whether the concern in question is specially liable to the fluctuations of the business cycle. If it is so liable and if the proportion of indebtedness to capitalisation is relatively high the shareholders will experience considerable fluctuations of income. In a good year when the gross income of the concern is large there will be a large surplus available after the debt charges have been met. In a bad year the interest on the debt will absorb the whole of the income and there will be nothing left over to pay a dividend on the shares.

As we are concerned primarily with the problem of indebtedness we may concentrate our attention upon the position of the holders of industrial debentures or of bonds, obligations bearing a fixed rate of interest and repayable within a certain period. As has already been suggested it is

to the interest of the holders of such obligations that they should be well covered as to the principal sum by the assets of the business, and that its income should show a good margin beyond what is required to meet the fixed interest and repayment charges which become due. Businesses attempt to meet their creditors' demand for security by giving them a mortgage upon the fixed assets, such as plant and buildings, while with regard to income as well as principal the chief security is a limitation upon the amount of debt created as an element in the capitalisation of the concern. But it is often doubtful whether the security of the mortgage is worth much, the property in question having value only as a part of the business regarded as a going concern and being otherwise so much scrap-iron. Moreover fluctuations in general money values which have already been described intervene to render obsolete a valuation originally placed upon the property when the debt was created. Businesses capitalised in the boom period prevailing immediately after the war, on the basis of the high prices associated with the inflationary monetary policy then being pursued, have found great difficulties in paying their fixed debt charges in the subsequent period of depression and falling prices. It is of course equally true, though the case is naturally less likely to occur, that companies floated in periods of low prices find their debt charges light when a rise occurs and are able to repay their obligations out of the handsome profits which they are earning. But the question still remains, whether the alteration has occurred on account of fluctuations in money values or whether it has occurred through changes in the fortunes of the industry or of the concern, what is the special position of the creditor and what is his relation to the business? The answer seems to be that his position depends not so much on any particular form of security which may be created for him, but upon the priority of his claim. He has the first claim upon the income of the business after the operating expenses have been deducted (if there are different groups of creditors the order of their priority will have to be arranged) and upon

the assets if the business is wound up. It is important therefore to observe that the security for the payment of the fixed sums which are due to him on account of interest and principal rests ultimately upon the capacity of the business to earn profits and that his interests are therefore more closely associated with those of the proprietors than appears to be the case at first sight. It is however clear that the existing legal forms of company organisation and the legal rights of creditors tend to put a false complexion on the matter. The creditor's claims seem to be satisfied so long as these legal rights are enforced, the security which the mortgage appears to provide is not tampered with and the fixed interest sums due are met.

The problem of the indebtedness of business, whether organised in the corporate form described above or not, has thus raised the whole question of contractual payments. The ultimate source from which payments can be made and incomes received is the earnings of business. These earnings are liable to fluctuate upwards and downwards in unforeseen ways, and although these upward and downward swings may compensate one another on the whole this is not true of any particular industry or of any particular concern in an industry. Moreover the swings themselves may be of considerable duration and amplitude. Under these circumstances the system of contractual payments gives rise to serious difficulties. Debt charges raise the problem generally in a more acute form than do the other payments settled by contract because they are fixed for long periods irrespective of changes in business conditions. The rigidity of wages has frequently been referred to, but it is clear that they are on the whole a good deal less rigid than interest charges. Within the existing legal framework of society, wage rates are capable of being revised at fairly short intervals, whereas debt charges are placed outside the scope of revision. No doubt the system of contractual payments is justified in general by the fact that it secures to a large number of persons relatively fixed incomes while other persons are prepared to take the fluctuating incomes

which arise under this arrangement. But the system is much less easy to justify when account is taken of the fact that fixed incomes for some are associated with unemployment and loss of income for others, and when the period over which the income is fixed varies so considerably. Yet although it has been widely felt that social justice can hardly be satisfied by demanding in a period of bad trade and falling prices reductions of wages on the one hand while at the same time tolerating high interest charges on the other, the problem cannot be easily settled within the existing structure of economic relations. It is natural to think of the creditor who bought bonds when the value of money was low, say at the close of the war, and who has since then profited considerably from the subsequent appreciation of the monetary unit. The interest which he now receives will purchase much more than the interest which was originally due to him, and the same would be true of the principal if he sold out or was paid off. But this in a good many cases is a very much simplified picture of the situation. As has been pointed out already many debts have been sold and resold and thus the gain to be derived from appreciation has been distributed over a number of persons. It would not be just to make the final holder sacrifice the whole of a profit which he had shared with others. This fact also damages the arguments of those who maintain that creditors since the war have been merely receiving back what was taken away from them during the war. These arguments ignore the shifting of holdings and the transformation of creditors into debtors, and *vice versa*. It is therefore not easy to suggest some simple solution of the problem, although it is possible that an arrangement might be made for creating bonds and debt bearing a rate of interest fixed not in terms of money but in terms of general purchasing power as measured by some index number of prices.

Attention has been mainly concentrated upon long-term debt, as this brings out more clearly the difficulties presented by the rigidity of a system of debt charges upon industry. There are of course debts of all sorts of duration, ranging

from those which mature in a day to those which are perpetual, and of which the principal need never be repaid. Obviously, short-term debts do not give rise to quite the same sort of problem as has been dealt with above. They are not so liable to have their value altered by changes in the purchasing power of money, since these changes normally take some time to occur. That does not mean of course that they are completely exempt from these influences, and in a period of rapidly changing money values they will be seriously affected. In Germany, for example, in the summer of 1923 when the value of money was depreciating hour by hour a very rapidly maturing obligation might be practically worthless when it was paid off. But as a rule the problems associated with short-term debts are of a different character. The debtor here is exposed to the danger of a withdrawal of credit, a fact which usually leads to the level of interest rates on short-term loans being lower than that on those of the long-term variety. It was shown by reference to the withdrawals of credits from Germany and Great Britain in the summer of 1931 what serious repercussions this might have on a country's international position and upon the maintenance of an effective gold standard. But there are dangers internally from a large volume of short-term credits. The collapse of a boom or the failure of confidence will lead to a calling in of these credits which may be on such an extensive scale as to make it impossible for debtors to pay. Bankruptcies occur, the breakdown of confidence spreads and general business depression sets in.

The principal dealers in short-term debts are bankers. Money is lent to them by depositors which they in turn re-lend to various short-term borrowers. This statement must not be taken to deny the usually accepted fact that bankers themselves create credit, it being remembered that the money they create must, if this process is to continue, be re-deposited with them. Nor must it be forgotten that bankers invest in long-term debts by buying securities. The actual short-term debts which they deal in are of various

kinds—loans to dealers on the Stock Exchange, bills, and short-period advances and overdrafts. These credits may of course be granted either at home or abroad. Along with the banks, although of secondary importance, are the other institutions of the Money Market. The importance of the banks lies in the fact that in the process of granting these short-period credits they create deposits which are the largest element in the aggregate of the means of payment at the disposal of the community.

The question of what form of assets the banker shall hold raises difficult problems of banking technique, but it is well known that it is regarded as a principle of sound banking that he should not invest in assets that are illiquid and difficult to realise, at any rate without much loss of value. Hence the notion arises that the sort of things the banker should hold are obligations of early maturity, based if possible on some operation concerned with the production or sale of goods the proceeds from which will be sufficient to meet the sums due. The long-term loan or the mortgage should be avoided. The principle underlying this attitude is of course based upon the fact that the banker himself owes large sums to his depositors which are payable either at sight or at very short notice ; it is therefore held that the advances which he makes should be in such a form as to lead to a steady and continuous flow of repayments. Clearly the position of the banker is much stronger if he observes this principle in the distribution of his loans, and conversely the strength of his position will enhance the confidence of his depositors. But it is also clear that the existence of the banking system depends upon the readiness of the public to leave money on deposit and not to demand its withdrawal, that is its conversion into currency of which only limited quantities are available. Unfortunately the failure of confidence is likely to spread once it has made its appearance and a general run on the banks may take place as has occurred recently in the crisis which was experienced by the United States. The whole problem, which cannot be discussed here, is closely bound up with the

organisation of the banking system and with the different banking policies which have been adopted.

Along with a large quantity of short-term obligations, however, the banks hold a certain proportion of long-term securities, and they are thus in a position to bring some influence to bear upon the relative rates of interest on long- and short-term investments. If a relatively high level of long-term interest rates prevails the banks can refrain from purchasing short-term obligations and invest instead in long-term securities, while conversely with a relatively high level of short-term rates they can sell their long-term investments and buy short-term obligations. Naturally under the profit incentive they will to some extent act along these lines. In periods of depression when there are few commercial bills coming forward and the demand for advances has fallen off, banks will buy securities on which the yield is much greater. In times of boom the reverse process will occur, securities will be sold and money will be invested in bills and advances. It must be noticed, however, that these changes have been masked since the war by the existence of a large volume of short-term government debt, in the shape, for example, of Treasury Bills which offer an alternate form of investment to commercial bills. It has, however, been a striking feature of the situation in recent years that in spite of the very low short-term interest rates prevailing there was no corresponding fall in long-term rates. There appeared to exist a plethora of funds which failed to find their way into the more permanent forms of investment. It is not a sufficient explanation of this situation to say that as a result of the crisis and the slump long-term borrowers failed to come forward. Clearly the collapse of confidence and the business depression discouraged borrowing for the purpose of investment in fresh capital. But a principal obstacle in the way of borrowing was the failure of long-term interest rates to fall in the way that might have been anticipated. Relatively to the profitability of new investment borrowers found that the interest rates which they were required to pay were too high. One may

therefore suspect that the banks did not pursue in a sufficiently vigorous manner the type of policy that was required under the circumstances. But criticism must be tempered by the consideration that the banks were very seriously hampered during this period. In the first place there was the occurrence of the phenomenon, which had existed in some fields since the post-war business depression, of frozen credits. In such cases the fact had to be accepted that the debtor could not pay and that the loan was not capable of withdrawal. Rather than force on bankruptcy it was considered better to maintain the loan outstanding and to hope that with business recovery the debtor would be able to pay. The intensification of business depression has, however, falsified these hopes and the resulting situation is far from satisfactory. On the one hand it would probably have been better in many cases that the position should have been wound up and that the debtor should not have been " nursed " in the hope of recovery. On the other hand it has put the banks in a strong position to resist schemes of reconstruction which might involve some sacrifice of their claims and endanger their position as creditors. Nevertheless, whatever may be said about the position which has been reached, the fact remains that the banker's control of the situation and power to pursue a more liberal credit policy have been impaired. Other factors whose influence has tended in the same direction have been the failure of confidence and the financial crises which have occurred. The banker has had to put foremost among his objectives the attainment of a position of liquidity, and this has definitely discouraged the purchase of long-term securities. More generally, a restrictive credit policy has had to be pursued at a time when the general business situation called for an expansion of credit.

The problem has been considered so far mainly from the standpoint of the creditor. The question still remains as to what policy debtors should adopt in distributing their borrowings between the long-term and the short-term types. The answer depends upon a number of issues, such as the

state of the capital market, the levels of short-term and long-term interest rates, the ease or difficulty of raising a loan in one way rather than the other, the purpose to which the money is to be applied. Moreover there will be differences in policy as between public and private borrowers. Thus in the war when large sums of money were immediately required the British government resorted to short-term borrowing as the quickest means of raising what was wanted. Subsequently a long-term loan was floated and the short-term obligations were thus converted into medium- or long-dated securities. But short-term borrowing still continued, by the issue of Treasury Bills and the creation of Ways and Means Advances, and grew in volume until at the close of the war the Floating Debt amounted to over £1,000 million. Along with this went an increase of the Note Issue. When, however, deflation was decided upon as the means of regaining the pre-war gold parity a reduction in the Floating Debt was brought about by funding, partly into medium-term, partly into long-term obligations. Naturally the policy adopted will depend largely upon the levels of money rates. When long-term interest rates are low, the time is suitable for the funding of a large proportion of the Floating Debt. On the other hand if short-term rates are also low there is a temptation to maintain outstanding a large volume of Floating Debt, as borrowing in it can take place probably even more cheaply. Short-term rates are often liable however to considerable fluctuations, and thus large and unforeseen variations may occur in the charge of the National Debt between one financial year and another. It is moreover considered dangerous that too large a quantity of short-term government debt should be on the market, on account of the difficulties in which the government would find itself if the holders of the debt presented it at maturity for redemption. There is the possibility that the government would be forced to an inflation of the currency in order to meet the claims presented to it. Difficulties connected with the maintenance of international equilibrium may also be experienced if a large amount of foreign

short-term balances liable to sudden withdrawal have been attracted to the country by the opportunity for investing in short-term government debt. On all these grounds a reduction of the size of the Floating Debt has usually been considered desirable, as soon as it can be achieved either by funding into long-term issues or by repayment out of revenue. Undue emphasis, however, on the distinction between Funded and Floating Debt must be avoided. Government securities mature over various periods, ranging from a few months in the case of Treasury Bills, through five-year Treasury Bonds, to the permanent debt represented by Consols, the principal of which need never be repaid. Before the war the fixed debt was almost entirely in Consols, but during and since the war the practice has been to issue securities the principal of which must be repaid at a certain date but which may be repaid at an earlier date at the option of the government. As these securities approach their redemption dates they present the same sort of problem as do Treasury Bills and Ways and Means Advances. Provision has then to be made for their repayment either out of revenue or more usually by reborrowing the sums required. The fact that reborrowing operations are continually impending naturally affects conditions in the investment market and the terms on which other borrowers can raise loans.

These facts suggest that some of the dangers which have been associated particularly with the Floating Debt have perhaps been exaggerated. When the medium-term and long-term securities reach their period of redemption there is normally no doubt that the government will be able to reborrow the money, and fears are not expressed that it will be driven to inflation in order to pay off the debt. Certainly the terms of reborrowing may be unfavourable, though it is probable that if the right moment has been selected the terms will be more favourable than those on which the original loan was secured. Is there, then, any fundamental difference between this situation and that in which a large Floating Debt is involved? The difference is undoubtedly smaller than appeared at first sight, and is one rather of

degree than of kind, but it still exists. The holders of securities of longer term are likely to be those who desire fairly permanent investments and who do not wish to be paid off; the holders of Treasury Bills, on the other hand, are likely to be those who desire a temporary investment and who will withdraw their funds as soon as some more profitable opportunity is offered. During a period of depression the Floating Debt will be carried at low rates of interest, but when a business revival sets in money will be withdrawn and invested in other channels.

Not only, however, may the dangers associated with the maintenance of a large Floating Debt have been exaggerated, but there may be other dangers arising out of a reduction of the Floating Debt in periods of business depression. The investment of a bank's resources in the purchase of Treasury Bills gives rise to the creation of bank credit which represents the principal element in the purchasing power of the community. The repayment of Bills destroys this credit and tends to bring about a corresponding deflation of purchasing power. A similar deflationary effect is experienced as a result of the repayment of Ways and Means Advances from the Bank of England. Conversely an expansion of the Floating Debt in the form either of Treasury Bills or of Ways and Means Advances tends to have inflationary consequences. These considerations are of course only one aspect of the general principle, that credit and purchasing power expand and contract with the growth and decline in the volume of indebtedness created through the banking system.

To some extent the choice for the private borrower between short-term and long-term credits is determined by considerations similar to those which influence the policy of the State. Thus the private borrower will take advantage of a low level of interest rates for short-term credit to raise capital in this way, and will afterwards "fund" the debt by the issue of long-term securities when a favourable moment presents itself. But the proportion of short-term to long-term indebtedness will naturally vary considerably as between

different types of business. Obviously where the assets of the business are mainly of a fixed character, plant, buildings and so forth, the borrowing will be principally for long terms; while in businesses where there is a fairly rapid turnover of capital, for example in the sale and distribution of goods whether for production or consumption, short-term borrowing will be mainly employed. Fluctuations in short-term interest rates, which frequently occur, will accordingly have a much greater effect upon some businesses than upon others, and there will be marked differences for the former in the cost of borrowing as between one period and another.

But there is this important difference between a government and any one private borrower that the transactions of the government are on such a large scale that it is able to some extent, by its choice of distribution of borrowing between long- and short-term, to influence the relative levels of interest rates. In particular the policy of the government with regard to the Floating Debt affects short-term rates of interest in the Money Market. This has been seen clearly in times of business depression when the reduction in the volume of commercial bills has given considerable importance to the Treasury Bill as a channel for the investment of short-term funds. This influence can be reinforced through the co-operation which exists between the government and the central bank which will lead the latter to pursue a discount and credit policy appropriate to the situation. Furthermore there is another direction in which the influence of the State can be brought to bear. Control can be exercised over fresh investment, new issues can be restricted, and the abundance of funds seeking employment will create a condition of ease in the Money Market. It is not of course necessary in these circumstances that the government should be merely seeking to influence the level of Money Market rates; more probably it will be trying to produce a favourable situation for the flotation of a long-term loan; but the result of its operations will be felt in the Money Market.

The question finally arises as to how the burden of debts contracted in the past may be reduced or abolished. But in the first place some attention should be devoted to considering how far and under what circumstances debts are burdensome, and how far therefore their reduction or removal is economically desirable. We have already seen that where the money borrowed is employed on some " productive " object the income that arises normally provides the source from which the debt charges may be met. Difficulties of course occur when the investment in question is productive in the wider sense of making a contribution to social or economic welfare, but not in the narrower sense of yielding a money return, or at any rate a money return sufficient to cover the charge. The charge has then to be defrayed from some other source, usually from taxation, which imposes it upon the community. While it is clearly wrong to regard such debt as an uncompensated burden it is no doubt desirable to aim at its ultimate redemption. Where the borrowing is for productive purposes the burdensomeness of the debt appears through an appreciation in the value of the monetary unit in terms of which it was contracted ; while conversely an actual gain would be experienced if depreciation occurred. In other words it seems definitely misleading to regard a debt *as such* as burdensome where there is simply a contract to pay interest and repay principal to those who have lent money to business enterprise. Debt charges are then no different in principle from any other element in business costs. With regard to the creation or repayment of the mass of indebtedness which centres round the banking system certain monetary repercussions are experienced, which have already been mentioned. The expansion of this indebtedness is identical with that creation of credit which is the source of the purchasing power available for the community. The reduction of the indebtedness involves the destruction of credit and the cancellation of so much purchasing power. Hence the extension and the repayment of bank loans are fraught with inflationary and deflationary consequences which make indebtedness in this sphere a

matter of special importance. In fact the problems which it raises are those of banking and monetary policy in general and therefore fall outside the scope of the present discussion.

In the case of unproductive debt the burden is clearly seen, particularly where the obligation is due abroad. Money has to be raised, usually by the imposition of taxation, to meet the charges for interest and repayment and, in addition, where the debt is due outside the country, sums have to be transferred abroad and the balance of payments has to undergo a corresponding adjustment. The burden of the taxation is clear and unmistakable, but even where the charge is met by cutting down other expenditure a loss will probably arise which will have to be taken into consideration. Where the payment is made abroad there will be a direct loss to the nationals of the debtor country, and a corresponding gain to the nationals of the creditor country, though there will be indirect advantages and disadvantages for which allowance must be made. In addition to these considerations there are the further considerations which have been dealt with above, which are connected with alterations in the purchasing power of the monetary unit. It has already been shown how the recent appreciation in the value of monetary units and the corresponding fall of prices have enormously increased the burden of public debts, which are mainly of an unproductive character.

When we come to consider methods of reduction it is clear that they can be divided into two sorts, those which do and those which do not involve interference with the legal claims of creditors. There are on the one hand certain arrangements for the reduction of the principal or interest of debts which are perfectly consistent with the maintenance of the claims of creditors. There are other arrangements which involve the sacrifice of creditors' claims. This is purely a legal issue. Thus the repayment of internal creditors in depreciated paper currency is legally valid, although in point of fact serious injustice is thereby inflicted; and such a repayment falls within the scope of the first sort of method.

In the case of public debts, however, the significance of the distinction is not always apparent. Where the State is dealing with its internal creditors, i.e. with creditors who are nationals of the State in question, there is no need for it to resort to an infringement of their legal claims. In the first place legislation can be passed reducing or cancelling the claims of holders of the public debt. Such a measure, however, is only likely to occur when there has been a revolutionary change of government and a decision has been taken to annul the contracts entered into by the previous government. Usually the same result is reached by a series of measures which do not necessarily aim at a wiping out of public debts. The State by its control of the monetary system can bring about such an increase in the quantity of legal tender as will reduce or even destroy the real value of its obligations. In the case of external debts payable in gold or a foreign currency the situation is obviously different. Here default and repudiation do occur, as, for example, when the Soviet government repudiated the Russian external debt.

The measures which may be taken without any infringement of legal claims are, apart from the considerations mentioned above, common both to public and private debtors. When reduced to their simplest terms they involve either repayment of principal or conversion of the rate of interest from a higher to a lower level.

Various arrangements have in practice been adopted and various proposals have been put forward with regard to the repayment of public debts. Fundamentally, however, these arrangements and proposals involve the raising of sufficiently large sums by taxation as to secure a surplus of public revenue over public expenditure out of which the payment of the principal due may be made. Usually a sinking fund has been set in operation which secures the annual setting aside of a certain sum to be applied to a reduction of the debt either by repayment or repurchase in the market. It has frequently been the practice to make the sinking fund cumulative by adding the interest of the

redeemed debt to the fund, thus very much increasing the rate at which debt is cancelled. In this case the actual arrangement normally adopted is to set a fixed debt charge which includes the sums required for interest and management, plus a certain amount towards the repayment of the debt. Thus in 1928 the Chancellor of the Exchequer instituted a fixed charge of £355 million for the service of the debt. If the charge is held at the level fixed the debt is repaid at compound interest, since the interest set free on the portion redeemed is added to the amount available for redemption. The vast increase in national debts as a result of the war has, however, led to the view that even a cumulative sinking fund is too slow in its operation and that therefore a big effort must be made to pay off a large sum within a fairly short period. Proposals have been put forward that there should be a levy on accumulated wealth the proceeds of which should be devoted to debt redemption. These proposals, which were raised at the close of the war, were supported partly by the consideration that should a fall of prices ensue the burden of the debt would be greatly increased and that therefore it was desirable to achieve repayment while prices were still relatively high. As we have seen the anticipated fall of prices has been experienced, thus affording a justification to those who demanded a capital levy after the war. In periods of prosperity some assistance towards debt redemption can be derived from large revenue receipts and consequent Budget surpluses ; in this way the United States achieved a considerable reduction of debt after the war. In Great Britain on the other hand bad trade and unemployment have made it impossible to secure much help from this source. More recently the crisis and the slump have everywhere produced Budget deficits and have thus actually increased public indebtedness. Thus money is borrowed not for the purpose of investment in business enterprise but for the purpose of covering deficits which have arisen through the collapse of investment and the consequent depression.

Another way of reducing the burden of indebtedness is

by reducing the interest charge which it involves. This can be done when a fall of interest rates occurs by converting the debt from a higher to a lower rate of interest, provided that it is possible to repay the principal of the debt. Thus the British government has recently converted almost the whole of £2,000 millions of War Loan from 5 per cent to 3½ per cent. The method adopted is to offer to the holders of the debt the alternative between accepting the lower rate of interest or repayment of the principal. If the moment for the presentation of the scheme has been wisely chosen it may be assumed that the creditors will be unable to find investments of equally good security yielding a better return than the new rate of interest offered to them and will therefore accept it rather than demand repayment; and where repayment is demanded the government will presumably be able to borrow the sums required at something like the lower rate. These assumptions are of course highly simplified and much depends upon appeals to the debt holders founded on patriotism, but it remains broadly true that the success or failure of the scheme is bound up with the general state of trade and employment and with the situation in the capital market. The government itself can also contribute towards the success of the conversion operation by controlling the capital market and by securing through the co-operation of the Central Bank a low level of rates in the Money Market.

Where provision is made for interest and repayment temporary relief can of course be secured by withholding repayment, where this is possible. In periods of difficulty sinking funds are usually suspended and this affords some relief from the burden which the debt charge imposes. Difficulties sometimes exist where, as part of the original contract, specific sinking funds are attached to certain loans. There is then a contractual arrangement that a certain sum shall be put aside towards the redemption of a particular loan. It is, however, possible while formally maintaining the arrangement to render it ineffective by borrowing the sum required to meet the sinking fund, and

thus to avoid the necessity of raising revenue for the purpose.

It has already been pointed out that the burden of a debt can also be reduced by an inflation of the currency. The nominal debt charges are still met, but their burden when calculated in terms of the goods and services which the currency will buy is less than before. It is possible that the process may be continued, as was the case in Germany in 1923, up to the point at which the currency becomes completely worthless and the debt is extinguished. Such a policy is really a disguised form of taxation, which falls upon the holders of the National Debt in an amount proportional to their holdings. It is, however, one of the peculiar disadvantages of inflationary measures that they hit not only the holders of public debts but all creditors. Inflation therefore is a particularly unfortunate method of dealing with a situation brought about by the excessive burden of public indebtedness. It should of course be noticed that inflation does not provide a way out of the difficulty if the debt is payable in terms of gold or some foreign currency.

Private debtors can adopt policies similar to those pursued by public debtors and can reduce their debts either by repayment of principal or by conversion of debt from a higher to a lower rate of interest. Industrial borrowers must provide out of the profits of the business the sums required for a sinking fund, which may be cumulative as in the case of sinking funds on public debts. Again, if interest rates have fallen and provided that the principal of the debt can be repaid, a conversion operation can be undertaken, the sums required to pay off the existing debt being reborrowed at a lower rate of interest. It may be noticed that in the case both of public and private borrowers, where a fall of interest rates is anticipated, some guarantee frequently has to be given to lenders against the possibility of repayment before a certain date in order that the money may be raised. Otherwise the lender would fear that the borrower would immediately take advantage

of the fall in order to convert the debt. The obvious disadvantage of such arrangements is that they serve to maintain a high level of interest charges although changes in economic conditions have made it possible to borrow at lower rates. This fact is significant because in a period of falling prices and business depression falling interest rates are usually experienced and the conversion operations which are thus made possible offer the chief opportunity of reducing debt charges which are then felt to be peculiarly oppressive.

In periods of inflation, for private as for public borrowers the real value of interest payments is reduced, and repayment can be achieved with less difficulty. On the other hand where a fall in the value of money and a rise of prices are anticipated there will be a tendency for interest rates to rise, thus offsetting to some extent the influence of depreciation. But it is clear that for any considerable rise of prices to be completely offset in this way a big shift of interest rates would have to occur, in fact quite beyond what is normally experienced. The result is that periods of rapidly rising prices are definitely favourable to borrowers and reduce the cost of their debt charges. The converse is true of periods of rapidly falling prices, when interest charges do not fall proportionately and a corresponding burden is imposed.

In the other general set of circumstances which has been distinguished reduction of debts, with reference either to interest or to principal or to both, is achieved in ways which interfere with the original claims of creditors. For public borrowers, as has already been seen, this line of action where it is pursued is likely to be taken with reference to the claims of external creditors. The external creditors may of course be either individuals or governments. In the first place there may be straightforward repudiation of the debt. Such action is, however, likely to lead to political interference by the creditor country, particularly where the debtor country is weaker and not capable of putting up an effective resistance. Economically it is dangerous because

it will probably make it difficult for the repudiating country to obtain fresh loans when it requires them. Much more frequently the line of action taken is to default upon the debt. This involves the withholding of interest or repayment that is due at a particular time or over a particular period without necessarily implying the final refusal to pay anything at all which repudiation signifies. In many cases after a default payment has not been resumed, but the resumption of payment is not precluded by the failure to meet the obligation. Naturally the same sorts of difficulties, both political and economic, which are experienced when repudiation is practised are also likely to occur in cases of default, though on a smaller scale. Nor are such difficulties diminished when foreign bondholders happen to be organised and can bring pressure to bear through bodies and institutions which represent their interests. Where loans are made to countries politically and economically weak and there is a danger that payments may be withheld guarantees are often demanded and the loans secured by a mortgage on some particular portion of the public revenue, as for example the Customs, which can be appropriated if a default occurs. In similar cases which have occurred since the war where loans have been made for the purpose of reconstruction, the payments required to meet the service of the loan have been guaranteed by a group of States interested in the scheme. In both sets of cases, it is clear, the loan may be an instrument for the exploitation of or political interference in the borrowing country. In point of fact, on account of the depression and the difficulty of making transfers abroad and securing the necessary adjustments in the balance of payments, defaults on external debts have been widespread. It was estimated at the beginning of 1932 that the loans of sixteen countries (excluding Russia) were in default, the arrears of interest amounting to over 1,000 million dollars. The debtor countries concerned were largely in South America, and their difficulties had been aggravated by the collapse of the prices of foodstuffs and raw materials which formed their principal exports.

The case of private debtors is different. They remain subject to the ordinary legal processes, and failure to pay can be met by action in a Court of Law. Where a mortgage exists for the security of the loan the creditor can foreclose on the assets which are thus secured. In any case, where failure to meet the obligation occurs the debtor can be forced into bankruptcy or liquidation. The claims are enforceable at law and thus although they may not be capable of being maintained at their original level a legal settlement of them can be secured. There is no corresponding method for dealing with the readjustment of public debts, since appeal to an international court or tribunal would be a purely optional matter. There has thus grown up around the payment of private debts an elaborate system of legal rules and undoubtedly greater importance is attached by the business world to their enforcement than to the enforcement of public debts. Courts, however, take no notice of the real value of contracts and obligations and are satisfied so long as payment to the extent of the nominal amount agreed upon is made. Consequently they fail in dealing with situations where changes in the purchasing power of the monetary unit have occurred.

Although these methods for the enforcement of claims are available, nevertheless their value to creditors is frequently doubtful. Clearly it is not always to the interest of creditors whose claims are not satisfied that businesses should be liquidated or that assets mortgaged to them should be realised for whatever they will fetch. It has already been shown that in many cases the property in question has little value when separated from the business as a going concern. This is clearly the case with regard to railways where the practice has been, when failure to meet interest on bonded debt has occurred, to appoint a receiver to take over the concern on behalf of the creditors.

Other arrangements may also be made, such as the scaling down of interest charges which are obviously too high relatively to the earning capacity of the business ; the postponement of repayment until more prosperous times ; the

sacrifice at any rate temporarily of the right to receive interest in exchange for a prior claim on whatever profits may be realised. Such arrangements involve interference with the legal claims of creditors with regard either to interest or to repayment of principal. Probably the most significant of them is that which completely transforms the character of the claim and substitutes a prior charge on earnings, if they are realised, for a fixed rate of interest and fixed sum for repayment. The creditor-debtor relationship is then destroyed and the creditor becomes a part proprietor sharing in the profits along with the other proprietors, only on preferential terms. In fact he becomes under the conditions of joint-stock company organisation simply a preference shareholder, ranking ahead however of the other preference shareholders for purposes of payment. Such modifications are no doubt at times the best way of dealing with a difficult situation, provided that there is a likelihood that the business will recover its earning power and that the adjustment is not a bolstering up of a fundamentally weak concern. But it is not likely that the arrangement will be easily or smoothly reached. Creditors are unwilling to sacrifice their claims and accept an inferior status, and where there are different groups of creditors special difficulties arise in adjusting their respective claims.

This discussion of the nature of indebtedness and its place in the economic system reveals the existence of two outstanding problems—the problem of debts due abroad, particularly inter-governmental debts, and the problem of falling prices and the appreciation of monetary units in terms of which debts are calculated. The problem presented by national debts as such is of much less importance.

The problem of debts due abroad is concerned, as has already been shown, with the wider problem of the balance of international payments. Where changes occur gradually it is possible for debtor countries to build up the export surplus which they require to meet the service of their obligations. But recently there have been great changes, particularly in the field of international movements of

capital, which have disorganised the situation. Where there was a steady flow of capital from creditor to debtor countries adjustment was secured in the balance of payments ; but, when this flow suddenly ceased, disequilibrium appeared, and the difficulties which the debtor countries experienced in making payment were aggravated by the obstacles, such as tariffs, etc., which the creditor countries put in their way. Inter-governmental debts rendered top-heavy a structure which it would have been anyhow difficult to support.

The other factor, that of falling prices, has made itself felt in the case of all debts, public and private, domestic and foreign. It has increased burdens which already existed and has imposed burdens where none were felt before. Taken in conjunction with the other problem and with the fact that the prices of the commodities which the majority of the debtor countries tend to export have shown a specially severe decline, it has led to a breakdown in the mechanism of international trade which has only been aggravated by the restrictive policies which have since been pursued.

The conclusion that emerges is that the structure of indebtedness must be adapted to the requirements of the economic situation as a whole. Where, relatively to the altered level of prices and incomes, the structure is too heavy it must be reduced or perhaps entirely abolished. In many cases it is impossible and in others undesirable that creditors should enforce their claims. Moratoria provide a temporary relief, but the existence of indebtedness still offers an obstacle to the return of confidence. The only alternative is some set of monetary measures which would raise the level of prices and incomes. But this would by no means solve all the problems that have been raised. The relations of creditor and debtor countries and the volume and flow of international loans still present difficulties. A readjustment of these relations and a control of capital movements, however difficult it may be to achieve, seems to provide the only ultimate solution.

CHAPTER XI: THE SOCIALISATION OF BANKING

By G. D. H. COLE

IN THE more advanced industrial countries, and especially in Great Britain, there has arisen in recent years an acute controversy over the question whether banking and financial institutions ought to be left in private hands or to be transferred to some form of public ownership and control. In Great Britain, where this controversy has been most acute, the demand for the socialisation of banking has come chiefly from those Socialists who see in a socialised banking system an indispensable instrument both for the carrying through of any co-ordinated plan of industrial development, and for the extension of public ownership and control over productive industry. Banking, it is urged, is above all in the modern world the key industry which affects every other; for no industry can be carried on without adequate supplies of credit, and these the banks alone are under modern conditions able to provide. Accordingly, the banks have to a great extent in their hands the shaping of the national industrial system; for they are in a position not only to make credit in general cheap or dear, and scarce or abundant, but also to direct credit to one industry or firm rather than another, and so to cause or to prevent industrial expansion in this or that field. A national planning authority, if it were unable to exercise control over and through the banking system, would, it is urged, be wholly unable to make its will effective or to impose any coherent direction upon the general course of economic policy. For these reasons Socialists in Great Britain have come more and more of late years to the conclusion that the socialisation of the banking system is not merely a necessary part of any transition to Socialism, but that it must come at a very early stage in the process of transition, because the socialised banks will be

among the most important instruments for effecting socialisation elsewhere, and meanwhile of pressing the policy of a Socialist Government upon industry as a whole.

The demand for some form of socialisation of banking has not, however, even in Great Britain, been confined entirely to Socialists. For a number of non-Socialists, including some who are bitter opponents of Socialism, have urged strongly the socialisation of the Central Bank. These non-Socialist advocates of banking reform are for the most part as strongly opposed to any public ownership or control of joint stock deposit banking as they are favourable to public ownership and control of the Central Bank. Their argument is that the control of the volume of credit, which is the most important factor in determining the level of prices, is effectively in the hands of the Central Bank, which is thus able to create conditions leading either to business expansion or to monetary stringency and trade depression. This power, it is said, the Central Bank in Great Britain, as in other countries, has been far too much disposed to wield not in the interests of national industry but rather in those of the money market and of a traditional doctrine of " sound " monetary policy. In the years since the war, the Central Banks have been for the most part pronouncedly deflationist ; whereas industry in general has been pressing as a rule for a more abundant supply of credit as a means to economic expansion. For these reasons some business men have joined the Socialists in advocating the socialisation of the Central Bank, in the hope that the bringing of it under the auspices of the State would enable its policy to be linked up more closely with the desires of the business world, and would make possible more effective pressure for credit expansion than can be exerted upon the Bank of England to-day. These non-Socialist advocates of socialisation are, however, usually determined to exclude, if they can, any form of actual governmental or parliamentary control over the working of the socialised Central Bank. They would prefer it to be brought under the control of a statutory corporation, dominated by business men, and therefore more

regardful of the needs of industry than of the claims of the money market, or perhaps of a Chancellor of the Exchequer intent upon bringing down interest rates with the object of facilitating the conversion of the National Debt.

There is, of course, nothing at all revolutionary or socialistic in the idea that a country's Central Bank should be either a national institution or subject to some form of public control. The Federal Reserve System of the United States was set up by the Federal Reserve Act of 1913 as a publicly controlled and in the last resort publicly administered institution. The Federal Reserve System is in effect, and has been from the start, socialised, though representatives from the private banking and business communities are called upon by the public authority to take a share in its actual administration. The Federal Reserve Board is a Government Board consisting of Government nominees; and in the Federal Reserve Banks the element of control exerted from the centre is sufficiently large to give them the essential character of public institutions. They are, moreover, in effect non-profit-making, or at any rate their policy is definitely directed by considerations of public advantage and not to the making of profits in any direct sense.

Nor does America stand alone in this respect. The Central Banks of most countries, even where they are in form private institutions, are already subject to a very large measure of State control over their policy. Thus the Bank of France, while it is owned by a body of private shareholders, gets its Governor by State appointment, and is subject to constant control by the French Treasury. The Reichsbank was made in form a private institution when it was reconstituted under the Dawes Scheme of 1924; but in this case too it is in effect controlled by the German Government, and the actual amount of control over its working is far larger than appears in its paper constitution. The same is the position with most of the smaller Central Banks of Continental Europe. They are to a large extent public institutions, even where they are not actually owned by the Government.

It has, however, commonly been insisted, as new Central Banks have been established or old ones reorganised all over the world during the years since 1918, that direct governmental interference with their operations should be excluded to the greatest possible extent. The international bankers, who have been largely responsible for drawing up the constitutions of the new Central Banks, have been throughout insistent on this point, especially in the case of the needier countries ; for it has been held to be indispensable to deprive the needy Governments of the means of using their Central Banks as agencies for meeting their expenses by the printing of additional currency or by the mere inflationary expansion of credit. For this reason international bankers, as a condition of helping in the establishment of the Central Banks in the needier countries, have usually insisted that there shall be drastic restrictions, incorporated in the national legislation, upon the right of these banks to issue currency, or even to create credits beyond a certain proportion to their reserves. These regulations have indeed to some extent been broken down in consequence of the world slump ; but in the creation of the new structure of post-war central banking what was uppermost in the minds of those international financiers who were chiefly responsible for bringing the new institutions into being was the desire to hedge round the powers of the new banks so as to prevent especially those forms of inflation which it was feared would result from giving the Governments unfettered control over the workings of the banking system.

In spite of these precautions the degree of governmental control over Central Banks is in practice very great, above all in those countries which have had to face the most difficult financial conditions, owing either to their tribulations as debtors or to the unsoundness of their own banking structure. Thus, as we have seen in a previous chapter, the incidence of the crisis upon Germany compelled the German Reich not only to interfere in the affairs of the Reichsbank, but also to come to the assistance of the ordinary

deposit banks, establish stringent control over them, and in some cases guarantee their depositors and equip them with fresh liquid resources in order to enable them to carry on at all. Under somewhat different conditions the Federal Government in the United States had, in the banking crisis of the early months of 1933, to institute a universal system of supervision and control over the many thousands of banking institutions in America. Moreover, wherever control of the foreign exchanges is instituted under the auspices of the Government, as it has been over a large part of the world during the slump, this control involves drastic interference with the activities of the ordinary banks, and while it may be exercised by the Government through the instrumentality of the Central Bank, necessarily requires constant supervision of what is done through the Central Bank by the Government itself.

Indeed, monetary and governmental questions have in the period since the war been so interlinked in practically every country that a separation between the powers of the Government and the functions of the banking system has been altogether impossible. More than once it has become plain that the only real alternative to Government control of the banking system has been, not the separation of the financial and political powers, but rather the control of the political by the financial authority. The British Labour Government of 1931 is by no means the only Government that has been brought down since the war by the action of the financial world. For example, the same fate overtook the short-lived Socialist Government of Norway, and bankers' pressure upon Governments has been a familiar feature of the world's history during the past dozen years. It is no easier for banks and Governments to separate their spheres of jurisdiction to-day than it was in Medieval Europe for Pope and Emperor to live side by side without clashings of authority.

In these circumstances the question appears nowadays to many people to be not whether bankers ought to be allowed to carry on their own business without public

interference, but whether Governments or banks are to have the last word in matters in which they are both inevitably concerned. Above all, this view has come to be widely held as monetary questions have loomed larger and larger in men's minds among the causes of world prosperity and depression. For if men feel, rightly or wrongly, that the good or ill fortunes of themselves, or their class or group, and of the community in which they live, are bound up with the policies pursued by the banks, they are certain to assert with increasing vehemence their right to the ultimate control of financial affairs, and to be acutely suspicious of what is being done by the banks when, for any reason within or without the bankers' control, matters are going wrong.

Before the war all over Europe the vast majority of people took the banking system for granted. This was not so in the United States, where the memory of the crisis of 1907 and of earlier banking crises was still fresh, and the entire system had just been reconstructed under the Federal Reserve Act of 1913. America, indeed, presented on the eve of the war the curious paradox of being in commercial and industrial matters the country in which faith in private enterprise was carried to the most extreme point, and at the same time in financial matters the country which was attempting to subject its banking system to the highest degree of unified public control. But in practice the powers conferred on the Federal Reserve System by the Act of 1913, stringent as they appeared on paper, were a good deal more limited than the powers actually exercised by the Central Banks in some European countries, and notably by the Bank of England over the English joint stock banks and the London money market. The difference was that, whereas the power of the Federal Reserve System was statutory and was enforced openly under the auspices of the State, the Bank of England remained in form a purely private corporation exerting control not by any authority conferred upon it by Act of Parliament, but by a position which it had acquired gradually over a long period of

years, and by its close connections with the leading personalities of the London money market. Moreover, while in theory the Bank of England and the British Treasury were wholly distinct authorities, in practice the connection between the two was so close that it was uncommonly difficult to say from which source financial policy really emanated. The position of the Bank of England as the Government's banker, and the position of the Government as depending largely on advances obtained through and on the advice of the Bank of England, so bound the two together as to make them in effect partners in the execution of a common policy. It was never at all clear what was to happen if they disagreed; and in practice financial questions were before the war so little matters of public controversy, and Treasury officials were in so close agreement with banking officials concerning the principles of sound finance, that differences, when they arose, were settled behind the scenes without the rest of the world usually knowing anything about them.

In the post-war world this is no longer possible. For since the war, in every country, questions of banking policy have come to be issues of public controversy in which Government and citizens are inevitably involved and have to take sides. It is still difficult to say in Great Britain whether the Treasury dominates the Bank or the Bank the Treasury, but it is quite clear that any large divergence of opinion between the two would have immediate political and financial repercussions over a very wide field. In America too it may have been doubtful up to the last two months whether the final control of financial policy rested with the Government or in effect with the officers of the Federal Reserve System; but Mr. Roosevelt seems to have resolved this conundrum during the opening days of his period of office as President of the United States. Whatever may happen in the future, there is no doubt that at the present time American financial policy is controlled by the administration and not by the bankers.

Round what points does the undoubtedly strong desire

on the part of the public to secure some means of influencing banking policy revolve ? Above all, it concerns the question of the degree of liberality which banks, and above all Central Banks, ought to exercise in the granting of credits, and the policy which they ought to pursue in influencing the level of internal prices. These two questions are of course to a great extent the same. In periods of economic activity industrialists are always anxious to secure extended credits from the banks, and inclined, if any steps are taken by the banks to restrict credit, to hold the bankers responsible for damping down production and thus preventing prosperity from advancing as fast as the available productive resources would allow. The bankers, on the other hand, argue that the expansion of credit can at most be desirable only up to that point at which the available productive resources have been brought into full use, and that any expansion beyond this point is bound to be merely inflationary, and to react upon prices without any proportionate increase in the volume of production.

But the bankers are in a further difficulty, for they have in practice found it impossible hitherto to expand credit up to a point which will ensure the full use of productive resources without a great deal of the additional credit created with this object escaping out of the industrial into the financial circulation, so as to cause a speculative boom in stock market prices and in real estate before the legitimate claims of industrialists for advances have been fully satisfied. The bankers, even when they recognise as desirable the object of securing the full utilisation of the available productive resources, are thus torn between their recognition that this is desirable and their fears of provoking a speculative boom which will speedily pass beyond their control and lead in due course to conditions which will compel them sharply to contract credit, and thus bring about a slump equally difficult to check at the appropriate point. For this reason bankers often hold that it is highly undesirable for the banking system to be brought in any way under the control either of Governments, which are bound to be

amenable to public pressure, or of business men engaged in industry and commerce, who are likely to desire an undue expansion of credit in prosperous times and thus to create the conditions leading to an inflationary boom. Bankers often hold that they, working with their traditional knowledge and sense of responsibility, are far more likely to preserve an even balance than either Governments, at the mercy of public clamour, or industrialists, intent on quick and easy profits.

The reply that is usually made to the bankers is that they are neither so disinterested nor so all-wise in their management of monetary affairs as they are apt to suppose. For the bankers, especially where, as in London, they have connections with the financial houses, are certainly interested persons, though their interests may diverge from those of the business world as a whole. Nor does the recent history of world monetary policy suggest that bankers are to be trusted without question, even apart from their pursuit of the special interests of the financial classes. For they seem to have divided themselves in practice into two groups, those who have attempted under the very different conditions of the post-war period to impose almost unchanged the financial policies which were in force in the pre-war world, at the cost of involving countries in deflationary measures and widespread unemployment, and those who have attempted to apply new theories of monetary management with the idea of stabilising the price-level. Neither of these policies has in fact worked out satisfactorily. Banking deflation in Europe has been a powerful factor in accentuating depression, while the attempt to stabilise prices in the United States in the years before 1929 does not look well now that it is seen in the light of subsequent economic happenings.

The world's difficulty to-day is that it can safely put its trust neither in the traditional methods of banking policy nor in such new experiments in monetary manipulation as have been actually made. Previous chapters of this book have been largely concerned with exploring the current

problems of national and international finance ; and they should have sufficed to convince any reader that, whether banks are to be controlled by private persons and corporations or by Governments and public corporations under Government control, it will be by no means an easy matter to discover either correct rules for their working or persons who can be relied upon to administer them efficiently and to the general satisfaction.

Nevertheless, as it is now generally recognised that the way in which the banking system is controlled and directed, and the policies applied through it, are of absolutely vital moment to the citizens of every State, the demand for public control over the operations of the banking system is likely to increase. For neither democracies nor autocracies will under modern conditions be prepared to let the banks go their own way without attempting to intervene in their operations. Democracies will press for public control of the financial system in order to influence the prosperity of industry and the possibility of progressive programmes of social reform, or perhaps in order to carry through large-scale changes making in the direction of Socialism ; but autocracies on the Fascist model are not likely to be behind-hand in exerting public control over the banking system, for the " totalitarian " State envisaged by the followers of Mussolini and Hitler is no more able to dispense with the control of the banks than the Communist State of Russia or the Socialist States envisaged by the Labour movements of Western Europe.

In considering this growing demand for the socialisation of banking it is best to divide the subject under four heads —the socialisation of Central Banking, the socialisation of deposit banking, and the socialisation of other financial institutions connected more closely with the money and with the capital markets ; for each of these four sections of the system raises distinct problems, and in each socialisation would involve the setting up of quite different types of machinery and control.

As we have seen, Central Banking is already under a large

measure of State control. Technically, complete socialisation of the world's Central Banks is a quite simple matter, though in practice it would rouse so much opposition as to involve many difficulties. For there is in each country only one Central Bank, or at most, as in the United States, a number of banks bound together closely into a single system. It would be technically quite easy to transform these Central Banks, where they are at present in the form of private organisations, into public institutions under collective ownership and control. No one, I think, proposes that they should be simply transformed into Civil Service Departments like the other departments of State. Wherever schemes for the socialisation of Central Banking have been brought forward they have contemplated the future conduct of the Central Bank as a publicly owned corporation, using a capital owned by the State and administered by persons nominated in the last resort by the State ; but they have also made provision for a specialised institution through which the control is to be actually carried on. Thus, if the Bank of England were to be socialised, it would be quite a simple matter in a technical sense to take over, presumably with compensation, its existing share capital, and to replace the present Board of Governors by a new Board nominated by the Government. This, however, is only the beginning of the problem ; for the question at once arises whether the new Board that the Government is to nominate ought to consist simply of persons chosen by the Government at its own discretion, or rather of representatives appointed on the nomination of various groups and sections within the community.

The original scheme put forward by the British Labour Party for the socialisation of the Central Bank envisaged the appointment of a representative Board, consisting of nominees formally ratified by the Government, but chosen in effect by the recognised organisations of employers and merchants, workmen and consumers. The Board was thus to be made far less representative of the money interest, and far more representative of the interests of industry and

commerce, than the present privately appointed Board has ever been. But the Labour Party seems now to have departed from this principle, and to hold that it would be better to have a Board consisting of persons appointed by the Government on grounds of personal competence and suitability rather than of representatives of distinct and possibly divergent economic interests. For it is held, as I think rightly, that a representative Board, built up on the basis of representing a number of distinct and clashing interests, would be most unlikely to administer efficiently the affairs of the Bank, or to be strong enough and well enough equipped with financial knowledge to pursue a clear and consistent course amid the many complications of current financial and economic affairs. A socialised Central Bank will need to be a strong bank, run by persons adequately equipped with financial knowledge, and able, however much they are under the ultimate control of the Government, to tender to the Government sound financial advice. A representative Board based on divergent interests can on this ground be definitely excluded as a satisfactory solution of the problem of Central Banking, either under private or under public ownership.

If, however, a socialised Central Bank is to be conducted under the auspices of persons appointed by the Government for their technical competence and personal suitability rather than as the nominees of divergent interests, it still remains an open question how great and how detailed the control actually exerted by the Government over the bank's operations ought to be. This is in practice a question which cannot be settled by any paper constitution. It will inevitably have to be worked out in the light of actual experience. Broadly, however, it seems desirable that, in the first place, the ultimate control of matters of high policy should rest with the Government, but the detailed administration of this policy be left free from Government interference in the hands of those appointed to control the affairs of the Bank. In the second place, it seems desirable that the Government, having the right of appointing the Board, should have

also the right of dismissal—the right, that is, to change at any time the persons placed in control of the administration. Thirdly, it seems desirable that there should be a Minister of State responsible for answering in Parliament for the affairs of the Bank, but that Parliamentary discussion of financial matters should not usually range over points of detail, but should be confined to matters of policy. This could doubtless be secured on much the same lines as it has been secured already in Great Britain, in the case of the British Broadcasting Corporation, or to some extent in that of the Central Electricity Board. Fourthly, it seems clear that the affairs of any socialised Central Bank will have to be closely co-ordinated with those of any other economic authorities acting under Government control in pursuance of a co-ordinated public economic plan. But this question is best left for further consideration later in this chapter.

A socialised Central Bank will obviously be, apart from its activities as the Government's own banker, the authority for regulating the general volume of credit available for use within the banking system, and therewith for influencing the level of prices within the community and for the management of the foreign exchanges. For, as we have seen in an earlier chapter, wherever a Central Bank is in effective existence, the control of the general volume of credit rests for the most part with it, and not with the deposit banks or the other financial agencies. If, therefore, a Central Bank is socialised and so brought under public control, it is obvious that the community will henceforth be responsible—and that the Goverment, as the representative of the community, will be held responsible by the public—for whatever is done in influencing both the plenty or scarcity of the national supply of money and the rate at which that money can be exchanged for the currencies of other countries.

The conditions under which both these functions would be carried on would of course depend on the extent to which the world was conducting its affairs with the aid of an international monetary standard ; for if a country were on the

gold standard, or on some similar international standard effectively pegging the exchanges within narrow limits, its internal policy in the issue of credit would clearly have to conform to the requirements of this international standard. It would be in a position to manipulate the supply of credit only to the extent to which it could do this without upsetting the exchanges. This is the ultimate condition which applies to any country which adopts a metallic standard for its currency, and allows free conversion of its currency into metal, and free export of the precious metal ; and no socialisation of the Central Bank can possibly alter this fundamental condition of adhesion to the gold standard. If, on the other hand, countries are off gold, and their exchanges are left free to fluctuate in accordance with the policies pursued by their own and other Central Banks, this limitation disappears. The freedom of the Central Bank to expand or contract credit is then conditioned not by the effects of credit policy on the movements of gold, but by considerations of the internal price-level and its relation to the price-levels prevailing in other countries, and also of the effects of relative currency fluctuations on international debts and capital movements of every sort and kind.

The proposal to socialise the business of deposit banking raises considerations which differ greatly from those which we have just been discussing. For whereas the control of the Central Bank affects mainly the total amount of credit available for use in the community, and therewith the levels of prices, the conduct of deposit banking affects rather the ways in which this available supply of credit is distributed among different claimants. If a Central Bank, by means of its open market policy, its regulation of the rate of discount, and its influence on other rates of interest, makes a certain amount of credit available for use in the community, the deposit banks have a strong incentive to put all the available money into use ; for otherwise they find themselves in possession of assets on which they are unable to earn any profit. Accordingly the expansion of the supply of credit by the Central Bank will usually cause the deposit banks to be

on the look-out for fresh opportunities for using their resources. This is true even more in Great Britain than in the United States ; for whereas in the United States the member banks of the Federal Reserve System are commonly in debt to the Federal Reserve Banks, and can meet an expansion of Federal Reserve credit by paying back a part of the sums which they have borrowed from the Federal Reserve Banks, in Great Britain a quite different situation exists. The British deposit banks are always in credit with the Central Bank, and must therefore try to find a use for any additional resources which its policy places at their disposal. It does not, however, follow, even in Great Britain, that an expansion in the available supply of bank credit will cause a corresponding expansion in the amount of advances actually made, for the banks may be unable to find a sufficient number of borrowers whom they think credit-worthy. This is most likely to happen in times of acute industrial depression, when idle balances are liable to silt up in the deposit banks despite the desire of the bankers themselves to make use of them if they can find a profitable outlet. This point, however, has been developed elsewhere in this volume, and there is no need to consider it further here.

Under normal conditions the deposit banks find themselves with a certain amount of credit which they are able to create, and with no difficulty in finding sufficient uses for this credit. The question then is which claimants for a share in it they are to satisfy, and which they are to refuse. Clearly by distributing their credit in different ways the banks are in a position to cause expansion or contraction of one industry as against another, or to direct a larger or smaller proportion of the total volume of credit to industry as against other uses. Under modern industrial conditions, practically no branch of industry or commerce can be carried on or expanded without the use of bank credit. Accordingly, if the banks refuse advances or limit the supply of additional advances to a particular industry or branch of commerce they are in a position greatly to restrict its operations ; and equally they can do the opposite by

viewing with favour an expanding tendency in any particular branch of industry or trade.

Let us suppose that a country, either under Socialist or under capitalist auspices, is trying to carry through some sort of national plan of economic development. This clearly involves not only a plan of the general rate of advance over industry as a whole, but also a proportionate planning of the degree of development which is to be contemplated in each distinct branch of industry, and to a certain extent in each separate establishment. Obviously any such national plan involves a distribution both of available new capital resources provided out of saving and of short-term bank credits, in accordance with the detailed requirements of the plan. It would be absurd to institute a plan for industry without at the same time planning the financial aspects of the necessary industrial development. For this reason the whole system of deposit banking, as far as it deals with advances to industry and commerce, must be brought within the scope of any national plan that is to have a chance of working effectively.

It is true that bankers often disclaim any discrimination between industry and industry in their methods of making advances. They have regard, they tell us, not to the nature of the industry in which the money they advance is to be employed, but to the credit-worthiness of the borrower and to the adequacy of the security which he is in a position to deposit. They disclaim entirely any control over the course of industrial development, or any desire as bankers to have a say in the formulation of industrial policy. This disclaimer grossly misrepresents the facts, even as matters stand ; for bankers do in fact by giving or withholding advances exert a large influence over the course of general economic development. It is true that this is done at present in all capitalist countries—or at any rate in both Great Britain, France and the United States ; for the same can hardly be said of Germany or Italy—without the presence of any coherent economic plan in the bankers' minds. It is done at haphazard ; but it is done all the same, to a large and

increasing extent. It is, however, possible for the banker to assume this attitude of irresponsibility for industrial development only because in the countries in question no national economic plan is actually being pursued. If countries did decide to plan their economic activities, the bankers would have either to act directly and without question under the orders of the planning authorities in granting or withholding credits, or themselves to assume a large part of responsibility for the formulation and execution of the national plan. Thus, if planning were being carried out under the control of some authority representing the community, this authority would have to be in a position to control the banks to an even fuller extent than it would need to control any individual industry; for the policy followed by the banks would affect all industries, and, unless it were in conformity with the requirements of the national plan, the entire working of the plan would be speedily upset.

This is why Socialists, who are the foremost advocates of national planning, nowadays for the most part put the socialisation of deposit banking as well as that of Central Banking in the forefront of their schemes. They realise the impossibility of socialising simultaneously and at once even all the major industries. But in order to institute their national plan they must begin at once to build up a system of control which will apply not only to industries already socialised, but also to all essential industries which remain in private hands. An indispensable part of this system of control lies in the authority of those responsible for the plan over the banking system; for the bankers are in direct touch with every important enterprise in the country, and it is largely through the control of banking policy that the control of the national planning authority over each enterprise can be made speedily effective.

There are indeed some Socialists who are reluctant to accept this view because they are fearful of the complications which the socialisation of joint stock banking would involve. They contemplate the immediate socialisation of

the Central Bank, which seems to them relatively a simple matter ; for the Central Bank has not very many customers, and deals mainly with other banks and financial institutions. It is hoped that, by controlling the Central Bank, the Government will place itself in a position to exercise indirectly a sufficient amount of control over the other institutions with which the Central Bank is in regular relationship. Socialists who take this view are unwilling to accept the further responsibility of socialising the deposit banks mainly because they feel that such a step is likely to be unpopular not only with the great majority of business men —who are not likely to favour a Socialist policy in any event—but also with a large number of people who keep their private accounts with the banks and are by no means desirous of having their financial affairs known in detail to the public authorities. There is undoubtedly an element of truth in this contention. The socialisation of deposit banking is likely to be unpopular with large sections of the middle class, who will fear that, if the State keeps their accounts, the State will know too much about their financial affairs when it comes to collect the taxes. But this objection is of no great substance : indeed, it is obviously desirable that the opportunities for tax evasion should be made as small as possible in order that tax burdens may be distributed fairly.

A second objection that is often advanced is that depositors will not feel the same assurance of the security of their deposits if the care of these is taken over by the State. Especially in Great Britain it is remembered that in the General Election of 1931 an entirely unreal scare was got up at the expense of the Labour Party concerning the safety of deposits in the Post Office Savings Bank. There was never the smallest foundation for this scare, which was one of the most unscrupulous pieces of electioneering Great Britain has seen. But it was undoubtedly effective in frightening a large number of small depositors ; and it is suggested that any attempt to socialise the deposit banks would lead to a scare of far greater magnitude. If, however, Socialists are

determined to carry through the socialisation of industry on the basis of an orderly transference of enterprises from private to public ownership, and of the working-out of a comprehensive national economic plan, it is obviously useless for them to run away from measures which are indispensable to the carrying through of their plans merely on the ground that these plans can be so misrepresented as to cause a scare among the electorate. The way to meet such a difficulty is to give a clear exposition of the policy which it is intended to pursue, accompanied by a public and explicit declaration that the entire authority and credit of the State will be placed behind the security of the deposits lying in the banks, and that the State ownership of the banking system will not be made use of as an instrument of extra-legal confiscation of any sort.

There is, however, a further difficulty. The centralisation of deposit banking in Great Britain in the hands of a small number of great banks—mainly the "Big Five"—has undoubtedly made it somewhat easier for the large borrower as against the small borrower to get bank credit. For it has led to a limitation of the discretion allowed to the local bank manager and to a greater centralisation of control over the granting of advances. It is contended that the further centralisation of the banking system in the hands of the State might accentuate this tendency, and that the State, in its determination to finance its national plans of economic development, would ignore even more completely the interests and needs of the small producers and concentrate the supply of credit upon those great enterprises with whose success the fulfilment of the plan is chiefly bound up. It is, of course, quite true that the process of socialisation is destined to lead to the progressive disappearance of small-scale enterprise in many fields of industry and commerce. Socialists do envisage the gradual restriction of the sphere of enterprise open to the small independent producer or trader. Indeed one of the points which they have always stressed in arguing that Capitalism is a wasteful system is that the multiplication of small

enterprises involves a great diffusion of energy which could be better used elsewhere, and the production of many classes of goods under less advantageous conditions than could be secured by a greater degree of standardisation and specialisation under conditions of large-scale enterprise. This gradual contraction of the sphere of small-scale enterprise —but not by any means its total disappearance—is clearly bound up with the advance of Socialism in any shape or form ; but there is no reason to suppose that the State would wish to bring about any contraction of small-scale enterprise save in definite accordance with the requirements of an approved national plan. For, unless this contraction did proceed in accordance with the plan, the loss of the products previously made by the small independent producers could not be compensated for by the expansion of large-scale industry. These considerations will not of course reconcile to the socialisation of banking those who wish that small-scale private enterprise should retain to the full its present importance in the economic system. Anti-Socialists may advocate the socialisation of Central Banking, but none but convinced Socialists are likely to stand, at any rate in the highly industrialised countries, for the socialisation of deposit banking as well—however much they may at times be inclined to grumble at the stranglehold which the private banker has succeeded in establishing over their industrial operations.

Yet I am conscious that what I have said in the last paragraph may be falsified for certain countries by the unpopularity of the banking system ; for if the small man finds that the banks are already largely controlled by great capitalist trusts which extend their favours to large-scale industry and commerce at his expense he may come to consider the State as more likely to protect his interests than the private banker, and therefore to favour the socialisation of joint stock banking as a means not of advancing towards Socialism, but rather of preserving small-scale enterprise against the encroachments of mass production and syndicated trade. This might undoubtedly happen in either

Canada or the United States, or in a Fascist State such as Germany or Italy ; but it would be most unlikely to happen in Great Britain. For Great Britain, at any rate, the socialisation of deposit banking is probable only as part of a definite and conscious advance towards the execution of a Socialist programme.

If joint stock banking were to be socialised, on what principle would it be worked ? It would probably be undesirable, at any rate at the outset, to attempt to amalgamate all the existing banks into a single national institution under unified control ; for this would involve the setting up of an organisation too large and cumbrous to be effectively manipulated on the morrow of the change of ownership. In the long run what would probably happen would be that all the existing separate banks would disappear, but that their places would be taken not by a single unified bank, but by a number of closely related banking institutions which would specialise for the most part in particular types of finance. This, for example, is what seems to be happening in Russia at the present time. In the early stages of socialisation it would probably be found convenient to preserve, as far as possible, the existing structure of the privately owned deposit banks wherever these have been already consolidated by a considerable amalgamation movement. Thus the Government could take over each existing bank as it stands and continue it in separate existence under the co-ordinating direction of a new public banking authority. In Great Britain probably each of the great deposit banks would maintain its separate existence for some time ; but redundant branches could be gradually closed and particular types of business transferred from one institution to another in order to further the process of specialisation.

In the United States the position is somewhat different ; for there the great weakness of the present banking system lies not only in the existence of " National " and " State " banks side by side under different laws, but also in the enormous multiplicity of separate banking institutions and

the absence of a system of branch banking on the European model. Accordingly in America, if the deposit banks were taken over by the public, there would presumably be at once a large-scale process of amalgamation and reconstruction designed to introduce order in place of the existing chaos. But, even so, it is unlikely that anyone would attempt to unify the entire banking system of the United States under the control of a single gigantic bank. It is far more probable that reorganisation would follow for the most part the lines of the existing divisions and subdivisions of the Federal Reserve System.

The object of a socialised system of deposit banking would be in the first place to provide a secure means for the general public of depositing surplus cash, and in the second place to set up an institution which could act as the financial section of a national economic planning authority. In relation to the first of these functions it is probable that the socialisation of banking would bring about before long a considerable extension of the bank-using section of the population ; for the State would probably elect at any rate to experiment in the payment of wages by cheque, and would encourage the keeping of bank accounts by persons in receipt of incomes below the existing limits of the bank-using classes. In these conditions the Post Office Savings Bank would presumably be unified with the socialised deposit banks, each of which would maintain a savings department designed to meet the needs of the small saver. Alternatively there might be, side by side with the socialisation of deposit banking generally, a system of municipal banks closely co-ordinated with the national system.

In pursuance of its second activity in connection with the national plan, the socialised banking system would aim at distributing its advances in accordance with the requirements of the plan and under the direction of the planning authority. It would have to meet the needs of the unified administrations of industries already socialised, either directly or by means of public or semi-public corporations. In dealing with industries which remained unsocialised, it would

presumably " ration " credits, both to these industries as units and to the separate enterprises included within each of them, in accordance with the general conditions laid down in the national plan, but with a large amount of discretion in dealing with individual cases, especially those of relatively small enterprises. This discretion would have to be very large in the early stages ; for it can be regarded as certain than the national plan would not, during the first few years of its operation, include anything like the whole of industry and commerce. It would apply primarily in the first instance to the great basic industries and services, and would be only gradually extended to cover the secondary industries and trades. In the meantime the socialised banking system would work only under general and broad indications governing the distribution of credit among the various claimants.

It is often urged that any attempt to make the distribution of bank credit conform with the requirements of the national economic plan would run directly counter to the principles of sound banking. For, if the banker is to ration credit in accordance with the plan, how can he ration it in accordance with the relative credit-worthiness of the various applicants? The State may wish, in accordance with its plan, to expand production in the woollen industry, or in some branch of the engineering industry. But the banker may hold that the firms engaged in these industries are less worthy of credit than others which he is compelled to refuse because their demands for credit do not comply with the scheme of distribution involved in the plan. This is undoubtedly true ; but the banker's contention that he cannot bank " soundly " unless he is free to follow his own individual estimate of the credit-worthiness of each applicant is obviously quite inconsistent with any system of national planning at all. For in effect it involves a claim by the banker to make the plan unworkable at any point at which he happens to disagree with it. That such a clash of views might and would probably arise between the bankers and the authority responsible for the

execution of any national plan is an overwhelmingly strong reason why a decision to introduce a system of national planning does necessarily involve the socialisation of deposit banking as well as of the Central Bank.

For national planning does involve the conferring upon the planning authority of the effective power to decide which enterprises are to be regarded as worthy of receiving the finance required for productive operations. In other words, national planning involves that the credit-worthiness of a particular enterprise shall be settled by the national planning authority, and not by the banker, save to the extent to which the banks are themselves represented upon that authority. It is of great importance that the banking system should be so linked up with the other agencies involved in the working out of any national plan as to make its influence felt upon the decisions which constitute the plan ; but it is utterly out of the question, if the plan is to be made effective at all, to leave the bankers outside it with a sort of *tribunicia potestas* to veto any decisions that they do not approve.

The deposit banks, however, even apart from their primary business of keeping their customers' deposits, are by no means exclusively concerned with the direct making of advances to industry and commerce. The American banks make also large advances for stock exchange operations ; and many of them also engage to a great extent in the flotation of new capital issues as well as in the discounting of bills. The British deposit banks have far less concern with capital issues, and do far less business in the direct financing of stock exchange operations than the American banks. But the London banks, as we have seen, both do a great deal of bill discounting directly, and also provide, jointly with the foreign banks with offices in London, the major part of the resources used in the bill market by the separate bill brokers and discount houses. A socialised banking system, even if the only institutions actually socialised under it were the Central Bank and the deposit banks, would thus fall heir directly to a large mass of activity in the

discounting of trade bills, and indirectly to a still larger body of business done by discount houses and bill brokers with the aid of money borrowed from the deposit banks. It would be possible for the socialised deposit banks either to take over themselves the entire business of discounting bills, freezing out the separate discount houses and bill brokers by withholding advances from them, or to continue to work the existing mechanism by making advances to the discount houses and bill brokers in much the same way as now.

It is probable that in the early stages of banking socialisation this latter course would be followed. But obviously no complete control of the distribution of the available credit between the various branches of industry and commerce is possible unless the discount market for loans and overdrafts is brought effectively within the scope of the national plan. For although internal trade bills are very little used in Great Britain at present, whereas they are greatly used in France and the United States, it would obviously be possible, if the making of advances by the deposit banks were taken over by the State, for business men who were refused advances in accordance with the plan to evade the restriction by resorting to the use of internal bills. In the long run, therefore, the planning authority would have to take over the direct control of the bill market as well as of the deposit banks ; but it is likely that for an interim period it would involve less confusion if the existing arrangements were allowed to remain in being, under the changed conditions which would arise when the bill brokers and discount houses had to look to the socialised banks for the liquid resources with which to carry on their work.

Bill discounting is the point at which the deposit banks are in closest touch with the other financial institutions which together with them make up the money market. In any policy that is put forward for the socialisation of banking it has obviously to be considered not only how far bill discounting should be taken over along with the business of the deposit banks, but also how far the other financial

agencies which exist to a certain extent in every developed financial centre, but above all in London, should also be taken over by the State. Apart from the discounting of bills, the most important remaining activity, as far as the provision of short-term credit is concerned, is that carried on by the great acceptance houses described in an earlier chapter. These institutions do not, in their capacity as acceptance houses, make actual advances of money. They only lend their names to their customers, in return for a consideration, and so make the " paper " of these customers more eligible for discount. Their work is very highly specialised, and depends on an accurate and detailed knowledge of the standing of business houses in every part of the world. It has been built up over a long period and for the most part on a basis of very specialised contacts, and it is concerned largely with working for foreign clients. It is therefore obviously a much harder business to take over than that of bill discounting, in relation to which the deposit banks have already a great deal of experience. It would certainly be unwise for a Government which was setting out upon the business of establishing for the first time a socialised banking system to attempt at that stage to take over the work of the acceptance houses, over which it would be able to exercise a quite sufficient amount of control by its possession of both the Central Bank and the great deposit banks. The fusion of acceptance business with deposit banking might come at a later stage ; but it is certainly the branch of short-term financial business which is likely to remain longest in private hands.

The remaining chief activity connected with the City of London and with the other great financial centres of the world is concerned with long-term financing, and especially, in the case of London, long-term Government financing. This is the business of sponsoring and arranging for new issues of capital. There are, as earlier chapters of this book have shown, very great differences from country to country in the relationship which exists between the banking system and the long-term financing of industry. In most countries

the making of new capital issues is largely carried through with the aid either of the ordinary deposit banks or of more specialised institutions which also do in practice a substantial amount of deposit banking. There is, for example, in the United States no such sharp division as exists in England between deposit banking and long-term industrial financing, although there has been for some years past a tendency for the larger American financial institutions to some extent to split off at least a part of their long-term capital operations and conduct them through "security affiliates," and this tendency has been greatly accentuated by the experience of the American banks in the crisis of 1933. German banking has shown to some extent a similar tendency towards a division between the business of deposit banking and that of long-term industrial finance.

But nowhere is the distinction anything like so sharp as in Great Britain, where the ordinary deposit banks have as a rule little to do with the provision of new capital for industry, and this is undertaken mainly under the auspices of highly specialised new issue houses which are often practically *ad hoc* bodies, created simply for the purpose of carrying through a series of flotations. Under British conditions, if it were proposed to socialise wholly or in part the business of providing new capital for economic development, it is most unlikely that this would be done directly through the deposit banks. British proposals for the socialisation of the business of providing long-term capital always take the form of proposing the establishment of a National Investment Board distinct from, though of course co-ordinated with, the Central Bank and the deposit banks. Such a Board, it is proposed, should take over the work of the existing Government institutions which are concerned with long-term capital—the National Debt Commissioners and the Public Works Loans Board, which already makes advances at long term to a number of British local authorities. These bodies would, it is held, provide the nucleus of an organisation which could be rapidly extended so as to cover a far wider field in the financing not only of

municipal authorities and existing public service corporations, but also of industries as they were brought under schemes of socialisation, or even of privately owned industries which it was desired to develop in accordance with the requirements of a co-ordinated national economic plan.

A National Investment Board, working under these conditions, would have to possess authority to raise capital from the public by borrowing, as such existing agencies as the Central Electricity Board are already authorised to do ; and the Government would be in a position, if it so desired, to guarantee these National Investment Board issues in whole or in part, in the same way as it has in the past guaranteed certain Public Utility issues—for example, in the case of the London Underground Railways. The Investment Board, thus raising its capital from the public, would then be in a position to re-invest it in approved schemes of economic development. It might further be given, or some body closely connected with it might be given, the authority to license new capital issues made by private concerns, so as to ensure the distribution of the available capital resources of the community in some degree of accordance with the requirements of a planned industrial system. Of course this sort of control, even if it were extended over the whole of the new issue market for public issues of capital, would not by any means cover the entire amount of capital that is being currently applied to industrial development. For in the first place, a substantial amount of capital is provided privately without recourse to a public issue, especially in the case of the smaller concerns ; and this could hardly be brought in the first instance under the control of a National Investment Board on the lines proposed. Secondly, British industry has in recent times financed itself to an increasing extent without recourse to the capital market by means of reserved profits, which, being kept in the business, are spendable at its discretion in such a way as not to be readily amenable to control. It might, however, be possible, in the case of industries not socialised—for in the case of socialised

industries no difficulty would of course arise—to exert some control over the using of these reserved profits for industrial development by adjustments of the system of taxation. For example, it might be desirable to allow rebates in respect of new capital expenditure approved by the National Investment Board on the taxation which is otherwise levied upon reserved profits under the British tax system. For, whereas in the United States sums placed to reserve are not subject to income tax, in Great Britain such sums have hitherto been taxed at the standard rates —a system disadvantageous to the small shareholder, who is made to pay in such cases at a higher rate than that for which he is really liable, but advantageous to the large holder, who escapes surtax in respect of amounts placed to reserve.

This question of the control of investment has been discussed more fully in earlier chapters of this book, and I do not propose to pursue the subject further here. It is, however, clear that there is a very close connection between the provision of long-term capital and the short-term financing of industry. Above all, it is evident that in the formulation of any national plan of economic development it would be necessary for the planning authority to assure itself that both short-term credit and long-term capital would be distributed in accordance with the requirements of the plan. This of course involves the planning of industry in accordance with the volume of savings, i.e. new capital resources, available for industrial development.

Under present conditions the amount of new saving is not planned at all. It takes place at the discretion partly of individual receivers of income, who decide to save a certain proportion of what they receive, and partly of business houses, which can place at their own will larger or smaller sums out of their profits to reserve. But to these two main sources of current saving must be added certain others. For many types of borrowed capital, and especially for many forms of public and semi-public loan, it is the practice to provide fixed sinking funds, so that year by year fairly

regular amounts of capital are being repaid to the long-term creditors who hold these forms of security. There is of course nothing to stop the recipients of this money from applying it, if they so desire, to current spending ; but by far the greater part of it is in practice likely to be re-saved, and thus to provide a flow of fresh funds available for investment. This applies particularly to the large sums which are annually repaid in respect of British overseas loans. Moreover, the volume of national saving has acquired in recent times a growing degree of fixity on account of the rapid increase in insurances and similar annual payments which income receivers bind themselves to make regularly over a period of years. These contractual payments, flowing annually into the coffers of insurance companies, building societies and similar institutions, tend to make the volume of saving less variable than it was when the amount saved depended more exclusively on the immediate decisions of individual income-receivers and business concerns. Undoubtedly the importance of these more fixed types of saving tends to grow with the increase in the size and importance of the middle classes. But insurance as a habit has tended to spread up as well as down the social scale ; it has been affected, for example, by the habit of insuring against death duties and of using large life insurance policies as a means of transmitting wealth to the next generation.

This growth of insurance has made the insurance companies, in Great Britain as well as in America, a factor of growing importance in the provision of new capital for investment ; for as the insurance companies receive an increasing supply of funds from their customers they obviously need a field for the investment of these funds on an ever-increasing scale. The sums accumulated by a comparatively large number of small savers are thus canalised in the hands of a small number of great capitalist institutions, which are in a position greatly to affect conditions in the investment market as a whole. To a large extent the insurance companies place their funds in gilt-edged securities, though they also play in Great Britain,

and to a much larger extent in the United States, a part in the financing of industry and trade—of instalment purchase for example. There is on these grounds a very strong case, if any institution in the nature of a National Investment Board is to be set up in connection with the working out of a national economic plan, for the socialisation of the main business of insurance and the bringing of these large funds under direct public control, subject of course to a State guarantee to the policy-holders. For the socialisation of the main business of insurance, including industrial insurance, would at once equip the National Investment Board, even apart from direct borrowings from the public, with large mobile funds, which it could use in pursuance of the aims of a national economic plan. Moreover, the insurance business, at any rate over a large part of its field, has now become to such an extent a matter of well-defined routine as to be highly suitable for public operation ; and there is undoubtedly great room for further economies in its working, especially in the field of industrial insurance, where far too large a part of the premiums at present goes in the expenses of keeping a huge body of agents and canvassers on the road. The socialisation of insurance would doubtless be unwelcome to the insurance agents—for it would certainly bring with it a stiffening up of the entire organisation of industrial insurance—but there seems to be no branch of financial business so obviously suitable for bringing at an early stage under direct public ownership and management.

Throughout this chapter the socialisation of banking, apart from the special case of the Central Bank, has been discussed in relation to the working out of a national plan of economic development leading definitely in the direction of Socialism. As we have seen, anyone who contemplates the socialisation of deposit banking, at any rate in Great Britain, is likely to contemplate also the speedy socialisation of a substantial number of the basic industries and to desire banking socialisation largely for the leverage which it will give in bringing about the socialisation of industry.

For Socialists do not regard the monetary problem as capable of being solved by itself in such a way as to set the economic system to rights. Banking holds in their view a key position ; and they believe that it is impossible to advance far towards industrial socialisation until the State has taken the banks firmly into its hands. But it would be in their view fruitless to take over the banks and still to leave the key industries under private ownership and control ; for the root economic problem is that of the production and distribution of goods and is not in its essence monetary. It is indispensable that the monetary system should correspond to the needs of the economic system, and that purchasing power and credit should be made available in the proportions required for the purchase of a current volume of production corresponding to the ability of the community to supply goods and services. But the fundamental problem is so to reorganise the industrial system, including not only the actual business of production but also the distribution of incomes in connection with the productive process, as to secure an adequate and balanced flow of goods and services on the one hand, and of incomes for their purchase on the other. The working of the banking system, though indispensable, is auxiliary to this fundamental object ; and Socialists consider that it is the business of finance to fit in with and fulfil the requirements of a planned industrial organisation—in other words, to be the servant and not the master of the industrial system.

Socialists do not, however, suppose that they will be able to socialise the entire industrial system at a blow. They contemplate that the process of socialising the various industries and services will have in practice to be spread over a considerable period of time, beginning with those industries and services which are most vital to the community and exercise the most widespread influence on other factors of production, and then spreading gradually through other forms of large-scale enterprise down to smaller concerns. Many Socialists consider that, provided the great basic

industries and services have been thoroughly socialised, the future method of conducting the smaller industries can be safely left open, in that these will in practice have to conform to the conditions imposed upon them by the socialisation of the controlling sections of the industrial system. Some forms of small-scale enterprise may even remain permanently under private control ; and others may be left in private hands for a considerable period after the socialisation of large-scale industry has been carried through. But in the first instance not even all the great mass-producing industries and services would be taken over ; for the Socialists contemplate making a beginning with a few key industries, and perhaps with a few others in which the difficulties of private control are most pressing, and there experimenting with varying forms of public operation and control, in order to gain a practical experience of the problems of socialisation, with a view to applying it progressively over a wider field.

As we have seen, most Socialists nowadays hold, for reasons given earlier in this chapter, that banking, including deposit banking, is among the services which will have to be taken over at the very earliest stage. Clearly this involves that, for some time after the banks have been socialised, they will find themselves in relations on the one hand with socialised industries and services, and on the other with large as well as small industries, services and enterprises which remain in private hands. The conception of a Socialist national plan thus has to include not only the co-ordinated financing and control of enterprises already socialised, but also the direction by the national planning authority of the major activities of non-socialised industries and services. The socialised banks are regarded as of vital importance in the carrying through of this policy ; for, as we saw, by the terms on which they give or withhold advances they will be in a position largely to implement the decisions of the national planning authority with regard to the conduct of non-socialised enterprises.

This of course involves that the socialised banks will be

making on a large scale advances of credit to industries still conducted under the system of private enterprise, and that the National Investment Board will be similarly authorising capital issues by private business concerns, or perhaps even advancing capital to them out of the resources at its disposal. Some Socialists have raised objection to this on the ground that it would involve the State in too much responsibility for the successful working of private capitalist enterprise, and would tend to undermine the driving force of the new Socialist system. But while this objection has obviously some weight, it is clearly impossible to carry through the socialisation of the economic system by other than revolutionary means without a transition stage of this kind. Indeed, even in Russia various forms of private enterprise survived and had to receive financial assistance from the socialised banking system in the years following the Revolution. If the change to Socialism is to be brought about, as most Socialists outside Russia believe, by Parliamentary and non-violent methods, a transition of this sort has evidently to be contemplated. In these circumstances the question of socialising the banks at the earliest possible stage in the transition acquires a special importance; for, as long as the banks remain in private hands, it is difficult to see how a Socialist Government can build up any really effective control over the operation of private business, or how anything in the nature of a national economic plan can be carried through and enforced. Nor is there any reason to believe that an intermediate system, in which complete banking socialisation would coexist with a dualism in industry between socialisation and private enterprise, would be unworkable. To suggest that it would is in effect to dismiss as impossible the getting of Socialism by constitutional means, or indeed by any means other than sudden and complete revolution.

Precisely because the socialisation of banking does occupy so strategic a position in the transition from private enterprise to a Socialist economy, any attempt to bring it about is certain to encounter very strong resistance from those

whose interests are bound up with the survival of the capitalist system ; for if the banks were socialised, a Socialist Government would acquire with them a tremendous power of intervention in every type of business enterprise both large and small, and a widespread power of control and planning over the entire economic field. Individually, the financiers are often unpopular with the industrialists, especially with the smaller industrialists, who consider that they do not get fair treatment in the granting of advances, and that the banks press them unduly for repayment when they find themselves in a difficulty caused by a depression of trade. There is therefore a considerable amount of " anti-banker " feeling in the business world, and this is likely to be at its strongest in periods of industrial depression. It can easily be brought to the length of demanding the socialisation of the Central Bank and the drastic reform of banking policy ; and, as an earlier contributor to this volume has shown, it is liable to break out into all sorts of panaceas for economic troubles by way of some one simple and infallible formula for the issue of currency or credit. But this large body of " anti-banker " opinion is usually unwilling to go to the length of advocating the socialisation of the banking system as a whole ; for the small business man, though he may have no love for his banker, is usually even less enamoured of the idea that the local bank manager should become a servant and agent of the State. Accordingly, however strong his " anti-banker " feeling may be, he generally stops short of accepting the Socialist policy of banking socialisation, and it is this reluctance to accept socialisation which most easily drives him into the arms of the currency cranks. For the cranks commonly promise him an abundance of credit for the carrying on of his business, combined with a complete absence of inquisitorial bureaucracy, and of any threat that the sphere for profit-making business enterprise will be curtailed.

It is for these reasons unlikely that the socialisation of deposit banking, to the extent to which it becomes an election issue, will help the Socialists in winning over the

support of the class of small business men ; and in countries such as Great Britain, where this class is large and powerful, it is the fear of antagonising them which causes some Socialists to hesitate to advocate complete banking socialisation and confine their propaganda for the present to urging the socialisation of the Central Bank alone. I have tried, however, to show in this chapter that no considerable advance towards the effective socialisation of the economic system is possible while deposit banking is left in private hands. If I am right in this view, it follows that those Socialists who refuse to advocate it are in effect prepared to postpone the attainment of Socialism because of their fear that the necessary Socialist measures may be electorally unpopular. It would, however, be useless for the Socialists to win an electoral victory on conditions which would prevent them from taking the steps which are really required for the carrying out of their policy ; for it is better for a country to be governed by persons who know what they want to do and are trying to do it than by a Government which is unprepared to act on its own beliefs. It is not desirable that Socialists should get into power until they can get there under conditions which will enable them to make a whole-hearted attempt to establish Socialism. I regard this question of banking socialisation as the critical issue, in that I feel sure that any Socialist Government which is not prepared to tackle thoroughly the question of the banks cannot be a Government that means seriously to advance towards Socialism, and correspondingly that any Government which does mean this will have to include among its first and most vital measures the socialisation of deposit banking as well as of the Central Bank.[1]

[1] It will be seen that I have made in this chapter no attempt to deal in detail with the structure and working of a Socialist banking system. Much in this field remains to be worked out ; but those who are interested will find much enlightenment in Mr. G. R. Mitchison's booklet, *Banking*, in the " Socialist Programme " Series issued by the Socialist League (3 Victoria Street, London, S.W.1). I have also discussed the question further in an essay in my volume, *Economic Tracts for the Times*.

CHAPTER XII: CONCLUSION: THE MONETARY FACTOR—AND THE OTHER FACTORS

By G. D. H. COLE

SOME PEOPLE will tell you that the outstanding controversy to-day in the monetary field, as in so much else, is between Nationalism and Internationalism. Indeed, on the face of the matter, the sharpest cleavage in monetary policy seems to be between those who aim above all at a monetary system which will secure the stability of internal economic conditions, and those who stress above all else the importance of a stable medium of international exchange. Both sides profess to desire stability ; but they mean different things by it, or rather stress different aspects of the wider problem of stabilising monetary conditions. Often each side argues that it is impossible to have both sorts of stability ; for if the international value of money is fixed in terms of gold, or some other international standard, clearly no one country can prevent its internal prices from fluctuating when prices are fluctuating in other parts of the world : whereas, if a country " manages " its monetary system on a national basis, to suit its own national conception of its needs, the rate of exchange with other currencies is bound to fluctuate in accordance with changes in relative monetary and economic conditions.

For a long time past, the school which regards exchange stability as the most important consideration has been dominant among both bankers and economists, and has been able to lay claim to the title of economic and financial orthodoxy. This is indeed implied in the almost universal adoption of the gold standard before the war, and in the tremendous efforts that were made to return to it between

1918 and 1929. The strength of the claim to orthodoxy has been again very remarkably illustrated in 1933 by the attitude of outraged virtue taken up by the countries still on the gold standard when President Roosevelt rejected first their demand for immediate stabilisation of the exchanges, and then their demand that he should at least make a public and solemn profession of his faith in the dominant financial religion of our times. The men of the one true faith held up their hands in pious horror at the blasphemies of Mr. Roosevelt's famous message. They threatened withdrawal from the World Economic Conference, and did their best to cause it at once to adjourn. For to their minds there could be no good got by discussing any economic question with dangerous heretics who refused to admit unequivocally that gold alone was God.

That there is a great deal to be said in favour of exchange stability is evident. Above all, it is important to those who buy and sell across national frontiers, and to those whose business it is to finance these international dealings. For fluctuations in the relative values of different currencies obviously introduce a speculative element into all international transactions, both in goods and in the provision of the necessary finance. They also upset the expectations—based on experience of stable exchanges—of investors in foreign securities, and of debtors on international account. It is easy enough to understand why merchants and manufacturers engaged chiefly in foreign trade, those financiers who specialise largely in foreign dealings, and those bankers who have grown up under the gold standard system, and adjusted their methods to it, should ardently desire the return of the exchange stability which they once regarded as normal, which they seemed to have regained after intense efforts in 1929, and the lack of which is causing them so much trouble, uncertainty, and anxiety to-day.

But it is not self-evident, even if it is arguable, that exchange stability is the most important of all monetary considerations—so important that everything else ought to be sacrificed to maintaining it. For it is also of profound

concern to a vast number of people in every country that money should preserve at least a fair amount of stability in its internal purchasing power ; and it is also important that a country should be able to regulate its policy in the issuing of currency and credit in accordance with the needs and situation of its own economic system, and should not have its internal monetary conditions unnecessarily upset by forces arising outside and perhaps running quite counter to its domestic needs. The " Nationalists " in matters of monetary policy have a case, though they appear as heretics when they state it against the accepted dogmas of the bankers and the classical economists.

It is sometimes argued that there is no real inconsistency between the two kinds of stabilisation, that of the exchanges and that of internal monetary conditions. For it is said that, if the world as a whole would but pursue a unified monetary policy, by means of close co-operation between the Governments and Central Banks of the lending countries, no divergences need arise such as would cause disequilibrium either in the foreign exchanges or in the internal monetary conditions of any country. It is, of course, perfectly true that, if the whole world had not merely a unified monetary system, but also a completely unified economic system, to the exclusion of all tariffs, restrictions on the mobility of men and goods, and other artificial regulations affecting economic conditions, there could be no foreign exchange problem at all, and no more question of monetary complications between country and country than there is to-day between London and Manchester—or shall we say New York and San Francisco ?

But is a unified currency system necessarily desirable in a world which is not unified in an economic sense ? We may hold that the world would be able to produce the greatest quantity of goods if it became completely a free trade area, so that commodities of all sorts could move freely from place to place without regard for national frontiers, so that men could move with exactly the same freedom, capital cross frontiers without let or hindrance,

tax systems be unified so as to avoid all artificial influences on the location of economic enterprises, and standards of living be left free to work themselves out under the conditions which complete mobility of labour, combined with world-wide freedom of collective bargaining, would create. But we all admit that such a world, whether it be theoretically desirable or not in an economic sense, is practically quite out of the question. Even if the extremes of Economic Nationalism to which we have become accustomed of late should prove to be only a passing phase—and it is by no means a foregone conclusion that they will—we shall have still to reckon—as we have had to reckon in the past—with national frontiers and tariffs erected round them, restrictions on the free mobility of both men and capital, different tax systems affecting economic growth, and countless other political influences shaping the separate economic life of the various countries.

In these circumstances, it is not self-evident that an international monetary system is to be preferred to one managed by each country, or perhaps each group of countries, in accordance with its conception of its own needs. For, except where special restrictions on dealings in foreign exchange are in force, money in the world of to-day possesses a much higher degree of mobility than anything else. No tariffs restrict its international migration, as they do that of goods ; and in fact, during recent years, we have been experiencing a constant migration of short-time money from one financial centre to another on a quite unprecedented scale. Boom conditions in one country cause an inflow of money from others : slump conditions set up a drain, if there is anywhere more promising for the money to go. Or, if fear rather than hope of gain is the dominant motive, money flies from countries where it is suspected that it may lessen in value to countries which are pursuing from the standpoint of the money-owner a " sounder " monetary policy.

On the basis of free trade ideas, it is good that money should be free to move ; for it will tend to move towards those places in which it can be most profitably employed,

and so to create more wealth than if its migration is artificially restrained. This would be well enough, if all the other conditions of mobility were present ; for it would mean that men, as well as money, would move to the parts of the world most capable of satisfactory economic development, leaving the less hopeful areas drained of inhabitants as well as of new capital resources. This situation would indeed involve serious difficulties for the countries which underwent the process of drainage ; for the movement of men and money would leave them, out of attenuated resources, to support a disproportionately large number of elderly and unproductive persons. But it can be argued that this would be only a problem of transition, and that the long-run result would be a better economic distribution of the world's man-power as well as of its capital resources. To a great extent, a process of this order did go on through the greater part of the nineteenth century, and did above all play a great part in the peopling of the American continent.

But what is to happen if money is free to move, and men are not, and if the international movement of money is facilitated by the enforcement of an international monetary standard, whereas the movement of goods is restricted everywhere by tariffs and embargoes, and that of men by drastic immigration laws as well as by differences in the social services and conditions of labour in the various countries ? What is to happen if countries can attract capital for investment, not by superior productive efficiency, but by lower wages, and if countries with high wages repel immigration, and keep out foreign products, in order to protect their own workmen and industries ? For in that case money moves, but men do not ; and the result is to intensify disequilibrium, and to stimulate the demand for more extreme Economic Nationalism as a remedy.

There was a time when such a situation would have been largely self-corrective, because industry could not have expanded with the aid of more money, unless it had been able to get more men as well. But that situation scarcely exists to-day. In the less developed countries there is an

abundance of cheap labour available ; and in the more developed the growth of mechanisation has made possible a great expansion of output without the need for additional man-power. In these circumstances, migration becomes much harder than it used to be, far less because of an unwillingness to move out of the countries which need to provide the emigrants than because there is no country willing to accept large-scale immigration. Production advances faster in one country than in another, but exceptional productive efficiency is no longer associated to the same extent with a transference of man-power from countries offering less to those which offer greater economic advantages.

It is, in these circumstances, less important that money moves than that men do not. For it is unlikely that a country which is in a position greatly to increase its production out of its own human and physical resources will ever be held up seriously for lack of money, when once it has reached the stage of possessing a developed banking system of its own. Such a country, being in a condition of superior productive efficiency in relation to other countries, is obviously also in a position, not only to save voluntarily new capital resources more easily than others, but also, with the aid of its banking system, to create additional financial resources by way of expanded credit, and so stimulate investment, without thereby raising its prices above those of the rest of the world. If each country were working its own independent monetary system on the basis of a fixed supply of money, prices would be falling fastest in the country of most rapidly advancing industrial efficiency ; and the same would be happening if this country, in common with others, were tied to an international monetary standard so rigid as to restrict its freedom to create additional credits, even when it could do this without raising its prices beyond the world level. But when, as under the gold standard as it has been worked hitherto, or under a purely national standard not pegged to gold, there is freedom to create further credits, a country will obviously not allow its productive development to be stifled for lack of money, as long as it can create

more money without getting its prices out of adjustment with those of other countries. It will create the credits, at least up to this point, and so take advantage of its special productive opportunities.

That it should do this is to some extent an advantage to other countries ; for the additional credits, when they work round to create an expansion in consuming power, will prevent the superior efficiency of production from causing prices to fall as fast as they otherwise would in the country in question, and will thus diminish the pressure of this country's competition with less efficient countries in the world market. It will also make the more efficient country a better market than it would otherwise be for other countries' products, unless it also raises its tariff to a more deterrent height.

But when the more efficient country is working under the gold standard, a limit is set to its power to create additional credits; for it cannot do this to such an extent as will raise its prices above those of other countries without setting up a drain of gold. This should not interfere with its power to develop its resources so as to secure maximum production ; for *ex hypothesi* its price-levels, apart from the creation of additional credits, will be tending to fall below those of other countries on account of its increasing efficiency and falling costs of production. But neither can it afford to let its prices fall below those of other countries ; for otherwise it will tend to heap up gold, save to the extent to which it offsets this tendency by a continuously expanding investment of capital abroad. It has therefore a strong incentive so to manage its credit policy as to keep its price-level in equilibrium with those of other countries—an effort which, even without deliberate management, will be largely secured under the traditional working of the gold standard system.

This would be well enough, if efficiency within a country tended to increase at a uniform rate in all industries, and if the prices of all types of goods were equally amenable to monetary influences. But neither of these conditions is in

fact satisfied. There will be many industries, even in a rapidly advancing country, in which efficiency will be increasing no faster than in other countries; and the effects of an enlargement of credit will be quite different upon different industries, both because their elasticity of demand differs and because some of them have to sell their products in a competitive world market, whereas others do not.

If, then, in face of falling costs, prices in general are to be kept in equilibrium with prices in countries in which costs are falling more slowly, or not at all, this involves higher prices for some goods in comparison with others. For if there are goods which have to be sold in a competitive world market, and the efficiency of production of these goods in the advanced country is not increasing as fast as in other countries, their prices will tend to fall. If, then, the "general level of prices" is to be kept in equilibrium with the world level, the prices of other goods will have to be raised to compensate for this fall. But this may mean that the prices of those goods whose costs of production are falling fastest will have to be raised more than the prices of goods whose costs are falling less fast; and, when this occurs, the equilibrium of production will obviously be upset. For the high profits obtainable in these industries will cause a rush of capital towards them; and this will lead to a competition which will tend to bring down their prices. But, if prices in general are to be kept at the world level, any such tendency will have to be counteracted by further issues of credit, which will cause the same problem to recur. Moreover, under these conditions the maintenance of the price-level will encounter increasing difficulties; and additional money created for the purpose of maintaining commodity prices will tend to flow away into other uses, e.g., speculation in the stock markets, so as to create the need for yet more credit unless the general level of commodity prices is to be allowed to fall. Thus, despite the fact that the country may have an abundant supply of gold as a basis for its currency, and that there may be no sign of

a rise of commodity prices above the world level, an actually inflationary situation may arise, in the sense that the banking system is under the necessity of cumulatively creating money which cannot be used for additional production, but serves merely to encourage a speculative mania certain to lead to disaster in the long run.

But now suppose that the country whose position we are considering is not on the gold standard, or on any other international monetary standard. In this case, it is free to pursue its own internal price policy without any limitations imposed by a fixed value of its currency in terms either of gold or of other national currencies. It need not therefore try to keep its prices in its own money in any fixed relation to world prices ; for any deviations will be corrected by movements of the foreign exchanges. What then can it do ?

It is often argued that a country in such a situation is free to aim at a fixed purchasing power of its national currency, that is, at a stable general level of internal prices. But, if it does this, it will encounter many of the same difficulties as we exposed earlier. For, if efficiency is advancing at different rates in different industries—and in some perhaps not at all—the tendency for the prices of some goods to fall will have to be counteracted by raising the prices of others, and the attempt to do this by the creation of additional money will tend to set up a disequilibrium in the economic system, and to encourage speculative activity. Moreover, if world prices are tending to fall, and some industries have to sell their products in the world market, it will only be possible to raise or maintain the prices of their products to the extent to which the national currency depreciates in terms of other currencies, and a demand for relative currency depreciation will therefore arise from the exporting industries, irrespective of the true equilibrium value of the currency as determined by its general purchasing power. Accordingly, the attempt to maintain the general level of prices in a country, under conditions of rising efficiency and falling costs, will

tend to set up a movement towards deliberate currency depreciation in the interests of the exporters, and of all who have to sell their products at world prices, but are not experiencing such a fall in costs as will enable them to do this at a satisfactory profit.

It has, however, to be remembered that rising efficiency and falling costs are not necessarily the same thing ; for costs include wages. If a country which is rapidly increasing its efficiency raises wages fast enough to offset both rising productivity and the tendency to decrease the quantity of labour by greater use of machinery, so as to keep the volume of consumers' demand at a level corresponding to the rise in productive capacity, costs may increase instead of falling as efficiency rises. In this case, there will be no need for the deliberate infusion of additional credits for the purpose of maintaining prices ; but more money will in fact be needed because more goods will be changing hands at no lower prices as productivity grows. Such a rise in wages would indeed keep the economic system working smoothly if certain conditions could be satisfied—if, that is, the magnitude of the rise in wages corresponded to the rise in productivity in each industry, so as to keep relative costs unchanged, and if there were no classes of goods which had to be sold at falling prices in the world market under conditions determined by external forces. But in fact the rise in wages is most unlikely to be proportionate to the rise in productivity in different industries ; for labour is largely competitive between industries. Nor is it desirable that the workers in an industry where productivity is increasing fast should reap, as against the rest of the community, including workers in other trades, the entire benefit of the superior increase. For that, apart from considerations of justice, would neutralise the tendency towards larger use of those goods which can be produced under the most advantageous conditions. Nor again is any advanced country so isolated in its economy as not to have to sell some of its products at world prices ; and, when it must do this, the fall in the purchasing power of the sellers

of such goods reacts on the demand for the product of other industries, and helps to force their prices down. At least it does this unless the currency can be so depreciated that the sellers at world prices get more of their own currency for less of other currencies, and have their purchasing power kept up because the domestic prices of other goods do not rise in proportion to the amount of the currency depreciation. This, however, involves that the currency shall be artificially depressed below its real equilibrium value—a situation which can hardly be maintained over any considerable period of time, though it may be kept up for a while by the aid of a flight of capital from the country in question.

This seems to show that the stabilisation of the general level of internal prices, plausible as it seems as an ideal, is not in fact an object which can be pursued by a country, either on or off the gold standard, without very considerable dangers. But it by no means follows that the rejection of the policy of complete stabilisation of the general level of internal prices should lead us back to a faith in the infallibility of the international gold standard. For the gold standard involves, for any country which adopts it in its traditional form, not stabilisation of internal prices (which indeed it effectively prevents in the long run) but the pegging of internal prices to the world level. It means that the prices of commodities within the country, or at least of those commodities which are internationally competitive, must coincide with world prices, and that the general purchasing value of money must be at an approximate parity with its purchasing value in other countries. The gold standard thus fixes both the prices of a number of classes of goods, and to some extent the general level of prices in the country, by reference not to the internal conditions of production, but to world conditions.

These conditions may, however, in face of the rigidity or immobility of the non-monetary factors, be radically unsuited to the needs of the particular country. It is, therefore, necessary to consider whether there is a third alternative

to the policy of exchange stabilisation on the one hand and that of internal price-stabilisation on the other.

I hold that there is, but that this alternative cannot be wholly monetary. Its object must be to follow a price-policy corresponding to the needs of the country concerned, and to deal with the problems presented both by the internal price-system and by the foreign exchanges in such a way as to promote this policy.

Very broadly I hold that, as the efficiency of production increases, it is always undesirable to attempt to stabilise the general level of internal prices by any method which involves an artificial rise in the prices of some goods and services above their costs of production in order to compensate for a falling tendency in the prices of goods in general—a tendency which may be due to changes in the conditions of production of other goods or of a collection of goods including those whose prices are again raised by monetary management. But at the same time I hold that it may be desirable to counteract a tendency of prices to fall by raising costs of production by artificial means ; for such a policy can be so managed as not to destroy equilibrium, but to preserve it.

There are two principal methods by which costs can be raised—higher wages and increased taxation. Let us, for the moment, leave taxation out of account. If in a country of advancing productive efficiency wage-costs per unit of product are actually falling as productivity rises and mechanisation grows, it is a fatal policy to hold up prices artificially ; for this is bound to lead to a fall in demand from the general body of the consumers, to an undue piling up of profits in the first instance, and thereafter to a crisis as it becomes more and more difficult to keep prices up in face of falling demand and employment. If then wages are allowed to fall in this way, no attempt should be made to offset the tendency for the prices of the goods which are being produced more cheaply to fall, by pumping out additional money in order to keep up the general level of prices. A falling wages-bill, or a stationary wages-bill, in face of

rising productivity, necessarily leads to disaster unless prices are allowed to fall as well.

If, on the other hand, the wages-bill rises in full proportion to the increase in productive efficiency—which involves a faster rise in wage-rates in order to offset growing mechanisation—there will be no tendency for either costs or prices to fall in general, though there will be constant shifts in the costs and prices of particular goods. But to the extent to which the wages-bill does fail to rise in proportion to the rise in productivity, prices must be allowed to fall too, if disequilibrium is not to be created.

Actually, then, the benefits of advances in production can be shared in any desired proportion between costs and prices. But it is disastrous to pursue a price-policy which is out of balance with the change in costs, or a cost policy which is rendered unworkable by the policy pursued in the monetary sphere.

Of course, a rise in taxation falling directly upon industry will have the same immediate effect on costs as a rise in wages. Whether it will have the same further effects will depend on how the proceeds of the tax are applied. In order to keep the required balance, they must be so used as to lead to the same increase in the demand for goods as would have arisen if the money had gone directly in higher wages. This said, we can for the present argument leave taxes aside, and confine our attention to the wages-bill.

If, as a result of a general policy of higher wages, the wages rise in the industries in which costs are not falling, as well as in those where they are, the effect will be to raise costs and prices in these industries, and so to offset to some extent any falling tendency in the industries where efficiency is growing. Indeed, this will occur to a marked extent, because the less rapidly advancing industries will in many cases be those which employ most labour in relation to total output. This will tend to decrease relative consumption of their products, and to cause expansion in the demand for the products of the more efficient industries—which is on the

whole desirable, though it may cause temporary unemployment needing to be counteracted by public action. This unemployment will tend to arise because demand will be shifting from less to more highly mechanised industries.

In general I hold that, on the supposition that a country is setting out from a situation in which prices and costs are in equilibrium, and productive resources fully employed, the best policy is, as a rule, to allow price-levels to fall as productivity increases, but not to the full extent of the increase in productivity, the balance being preserved by a deliberate policy of raising wages to the required extent, and also, where necessary, by using the instrument of taxation.

But the situation is very different if a country is setting out to determine its price-policy in a period of depression. For if prices are low in relation to business indebtedness and other fixed costs, and there is widespread unemployment, the first task is to restore the lost equilibrium in a way that will bring the idle men and other productive resources back into effective use. This involves, in the first instance, taking steps designed to bring prices up again to a satisfactory level, not only by monetary reflation but also by an accompanying policy of higher wages and increased public expenditure calculated to expand the volume of demand in terms of money and goods alike. The question of the right proportions in splitting the benefits of increasing efficiency between lower prices and higher wages arises as a practical issue only when production, employment, prices and wages have all been brought up to a level which secures a balance based on the full utilisation of the available productive resources.

The practical difficulties in the way both of this initial reflation and of the subsequent management of prices have been discussed in earlier chapters of this book. In this conclusion it is only intended to emphasise the danger of attempting to control the purely monetary factors in the situation in isolation from the rest. If once a departure is made from the classical method of letting all the factors

alone—and we have seen enough of the working of that method to be thoroughly dissatisfied with it—it becomes necessary to control all the factors, or at least all the really important factors ; for interference with one, while the others are left unregulated, is certain to result in a fatal lack of balance in the working of the economic system. This is the final answer to all those writers who believe that their own infallible schemes of monetary manipulation will avail to cure the world's troubles without any interference with the working of the rest of the system of un-uncontrolled private enterprise.

Above all, the close connection between commodity prices and wages must not be disregarded. It used to be supposed that, as economic efficiency increased, the main mass of consumers—who are also the producers—would necessarily get the benefit of it either in lower commodity prices or in higher wages. But this is, under the conditions of modern industrialism, a quite unsafe conclusion ; for the rapid growth of mechanisation in both industry and agriculture means that the total wages-bill may fall even when wage-rates are rising, and that competitive pressure for jobs may force down wage-rates, or greatly slacken their advance, at a time when it is of vital importance to the stability of the economic system that they should rise faster than ever before. For it can by no means be assumed under normal conditions that retail prices, on which the purchasing power of the consumers' incomes depends, will fall in proportion to the reduction in wages-costs. It is indeed clear that they will not, save in times of depression ; for mechanisation means a rise in the relative magnitude of capital costs and fixed charges, which do not issue to the same extent in demand for goods, but do keep up the costs of production in face of a falling wages-bill.

Accordingly, any community which sets out to control its price-level by monetary means will find itself under the necessity of controlling its wage-level as well, and of insisting, as the Americans are now attempting to do, on a wage-policy in harmony with the monetary policy which is

being simultaneously pursued. It would be possible to press this argument much further, and to show how the effective manipulation of the price-level involves, as the Americans are already finding, intervention in many other fields, both for the prevention of speculative excesses and for the preservation of balance in the rate of advance in different parts of the economic system. But for the present let us leave the question here ; for my object is not to discuss the full implications of the policy of reflation, but only to point out, at the conclusion of this book, the intimate relationship between the monetary factor in the economic system and every other factor which has to express itself in terms of money.

A SHORT BOOK-LIST

* Elementary. † More Advanced. ‡ Difficult.

Ch. I. MONEY IN GENERAL

*D. H. ROBERTSON Money
*E. CANNAN Money
†R. G. HAWTREY Currency and Credit
‡J. M. KEYNES A Treatise on Money

Ch. II. MONEY AND THE CRISIS

*G. D. H. COLE The Intelligent Man's Guide Through World Chaos
*G. D. H. COLE and MARGARET COLE The Intelligent Man's Review of Europe To-day
†H. V. HODSON Economics of a Changing World
*F. W. HIRST Wall Street and Lombard Street

Ch. III. CENTRAL BANKING AND CURRENCY

†R. G. HAWTREY The Art of Central Banking
*T. E. GREGORY The Gold Standard and its Future
†C. H. KISCH and W. A. ELKIN Central Banks
†MACMILLAN COMMITTEE ON FINANCE AND INDUSTRY Report

Ch. IV. COMMERCIAL BANKING AND CREDIT

*W. LEAF Banking
*H. WITHERS Bankers and Credit
*R. MCKENNA Post-War Banking Policy
†R. G. HAWTREY Currency and Credit
•†MACMILLAN COMMITTEE Report

Ch. V. FOREIGN EXCHANGES AND FOREIGN TRADE

*G. CLARE Money Market Primer (revised 1931)
†R. F. HARROD International Economics
†P. B. WHALE International Trade
†T. E. GREGORY Foreign Exchange
*R. A. HODGSON Introduction to International Trade and Tariffs

Ch. VI. CAPITAL AND INVESTMENT

†F. LAVINGTON The English Capital Market
†H. FEIS Europe, the World's Banker
L. L. B. ANGAS Investment
*C. DUGUID The Stock Exchange

Ch. VII. MONEY AND PRICES

*W. T. LAYTON Introduction to the Study of Prices
†E. F. M. DURBIN Purchasing Power and Trade Depression
‡F. A. HAYEK Monetary Theory of the Trade Cycle
*J. C. STAMP Papers on Gold and the Price Level
†P. W. MARTIN The Problem of Maintaining Purchasing Power
‡D. H. ROBERTSON Banking Policy and the Price Level

Ch. VIII. MONETARY HERETICS

C. H. DOUGLAS Economic Democracy
C. H. DOUGLAS The Monopoly of Credit
F. SODDY The Inversion of Science
F. SODDY Wealth, Virtual Wealth, and Debt
J. H. BÜCHI Free Money [Gesell]
S. GESELL The Natural Economic Order
R. EISLER Stable Money
R. EISLER This Money Maze

Ch. IX. CAPITAL, SAVINGS AND INVESTMENT

‡J. M. KEYNES A Treatise on Money
*G. D. H. COLE Gold, Credit and Employment
*G. D. H. COLE Saving and Spending (pamphlet : *New Statesman*)
*J. E. MEADE Public Works in their International Aspect (pamphlet : *New Fabian Research Bureau*)
INTERNATIONAL LABOUR OFFICE Unemployment and Public Works

Ch. X. DEBT

†E. L. HARGREAVES The National Debt
*G. D. H. COLE and R. S. POSTGATE War Debts and Reparations (pamphlet : *New Statesman*)
*F. V. BIRCK The Scourge of Europe
LEAGUE OF NATIONS Reports for Stresa Conference, 1932

Ch. XI. THE SOCIALISATION OF BANKING

*G. R. MITCHISON Banking (pamphlet : *Socialist League*)
†G. D. H. COLE Economic Tracts for the Times
†G. D. H. COLE The Next Ten Years in British Social and Economic Policy

Ch. XII. CONCLUSION

No Special References

BANKS AND MONETARY SYSTEMS OF VARIOUS COUNTRIES

†C. A. CONANT History of Modern Banks of Issue
†H. P. WILLIS and B. H. BECKHART Foreign Banking Systems
*K. LE CHEMINANT Foreign and Colonial Banking Systems
†P. B. WHALE Joint Stock Banking in Germany
†A. ANDREADES History of the Bank of England
†E. A. GOLDENWEISER The Federal Reserve System in Operation
*J. P. DAY The Money and Banking System of the United States
†D. T. JACK The Restoration of European Currencies
†C. H. KISCH and W. A. ELKIN Central Banks

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