

THE BANKING & CURRENCY

PROBLEM

IN THE UNITED STATES

VICTOR MORAWETZ

Cornell University Library

BOUGHT WITH THE INCOME
FROM THE
SAGE ENDOWMENT FUND
THE GIFT OF
Henry W. Sage
1891

A. 2324.06

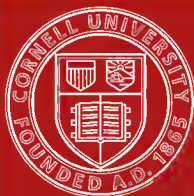
15/III/09

Cornell University Library
arV12631

The banking & currency problem in the Un



3 1924 031 250 370
olin,anx



Cornell University Library

The original of this book is in
the Cornell University Library.

There are no known copyright restrictions in
the United States on the use of the text.

THE BANKING & CURRENCY
PROBLEM
IN THE UNITED STATES

BY
VICTOR MORAWETZ

FRANKLIN
UNIVERSITY
LIBRARY



NORTH AMERICAN REVIEW PUBLISHING CO.
FRANKLIN SQUARE, NEW YORK, N. Y.

MCMIX

D

ms
Copyright, 1909, by
THE NORTH AMERICAN REVIEW PUBLISHING CO.

All rights reserved.
Published January, 1909.

CONTENTS

	PAGE
THE PROBLEM	I
CAUSES OF "MONEY STRINGENCY"	7
THE CREATION OF BANK CREDITS	12
BANK RESERVES AND THEIR CHARACTER	15
BANK RESERVES AND LIABILITIES IN THE UNITED STATES	20
INCREASE OF RESERVE MONEY	22
MAINTENANCE OF THE GOLD STANDARD AND OF CASH PAYMENTS	25
ISSUE OF BANK-NOTES	27
EFFECTS OF ISSUING BANK-NOTES	28
DIFFERENCE BETWEEN NOTES AND OTHER INSTRUMENTS	32
REGULATION OF THE BANKS	34
INSUFFICIENT RESERVES AND OVER-EXPANSION OF CREDITS	36
MINIMUM RESERVES OF NATIONAL BANKS	38
OVER-EXPANSION WITH REGARD TO THE GENERAL CREDIT SITUATION	43
CENTRAL REGULATION NECESSARY	45
THE CENTRAL BANK PLAN	50
CENTRAL BANK NOT PRACTICABLE IN THE UNITED STATES	52
INDEPENDENT BANK-NOTE ISSUES	55
THE CURRENCY SITUATION IN THE UNITED STATES. . .	58

CONTENTS

	PAGE
REGULATION BY TAXATION	62
REGULATION BY GOVERNMENT NOTE ISSUE	66
THE EUROPEAN SYSTEM OF COMMERCIAL CREDITS	69
GUARANTEE OF BANK DEPOSITS	72
STATE BANKS AND TRUST COMPANIES	79
HOW CENTRAL REGULATION CAN BE SECURED	84
PLAN FOR CENTRAL REGULATION IN THE UNITED STATES	87
BRANCHES AND AGENCIES	89
MEETINGS OF THE BOARD OF MANAGERS, ETC.	90
LIMIT OF NOTE ISSUES UNDER PLAN	90
REDEMPTION FUND UNDER THE PLAN	91
SEPARATE RESERVES FOR THE NOTES	94
OPERATION OF THE PLAN ILLUSTRATED	97
UNIFORM OR SEPARATE NOTE ISSUES OF THE BANKS	102
SECURITY OF THE NOTES	107
COLLATERAL SECURITY	110
PROTECTION OF UNITED STATES BOND VALUES	114
TAXATION OF NOTES UNDER THE PLAN	114
EXISTING BOND-SECURED NOTES	117

THE BANKING AND CURRENCY
PROBLEM
IN THE UNITED STATES

THE BANKING AND CURRENCY PROBLEM IN THE UNITED STATES

THE PROBLEM

FOR many years the country has suffered from recurring periods of severe financial stringency. During these periods interest rates have been excessively high, and business men have lost heavily through inability to obtain necessary loans and discounts from the banks. At times wide-spread panic and general suspension of payments by the banks have resulted from runs upon a few banks by their depositors. Only recently we have emerged from a disastrous panic which forced the suspension of nearly all the banks, and, by the destruction of confidence and credit, arrested business activity throughout the country and caused vast losses to the people. This panic brought to a

THE BANKING AND CURRENCY PROBLEM

violent close a period of unprecedented prosperity, in which manufacturers and merchants had not unduly expanded their obligations for the purpose of carrying unsold stocks of goods. On the contrary, production had been barely able to keep pace with demand for the products of industry.

Such extraordinary financial disturbances do not occur in other civilized countries. They indicate that something is seriously wrong with the system of banking and currency in the United States. The National Monetary Commission was created for the purpose of devising a remedy that will prevent similar disturbances in the future.

When a doctor is called in to prescribe for a patient, his first step must be to discover the disease that causes the symptoms of which the patient complains. Similarly, before the Commission can intelligently prescribe remedies it must ascertain what is wrong with our present financial system. The first step must be to discover the true cause of our financial troubles. The next step should be to devise a remedy that will remove the existing cause of trouble, but will not itself introduce a new source of trouble or of danger.

Occasional bank failures and runs upon isolated banks by panic-stricken depositors do not prove that anything is wrong with our system of banking and currency. A bank may become insolvent and

IN THE UNITED STATES

may fail in consequence of dishonesty or incompetence of its officers; and the depositors of a bank may become panic-stricken in consequence of some false report, though there be nothing wrong with their bank. No system and no legislation can make bank managers honest and prudent, or guard against the penalties of dishonesty and imprudence, and no system can enable a bank to keep in its vaults enough cash to pay off all its depositors at once if they make a run upon the bank. But if the failure of one bank or of several banks, or a panic among their depositors, results in the suspension of practically all the banks, as happened recently, something must be radically wrong with the whole system, or in the method of conducting the banking business in the United States. A system of banking that fails to make adequate provision against unexpected contingencies, such as the suspension of one bank or of several banks—a system that works satisfactorily only in financial fair weather—clearly is unsound and inadequate. Such a system is as unsafe as a ship that can sail only in fair weather and is likely to founder during the first storm. We have in the United States a banking system that in normal times has served us well—a satisfactory system of fair-weather banking. What we need is a system that will carry us safely through periods of financial stress and storm.

THE BANKING AND CURRENCY PROBLEM

The immediate cause of a stringency in the money-market, of excessive interest rates, of inability of the banks to grant the credits needed for the transaction of the legitimate business of the country, or of a general suspension of cash payments by the banks, is that the banks either have expanded their deposit liabilities or have reduced their reserves beyond the limit of safety. It is obvious that if the banks keep their reserves of cash large enough in relation to their deposit liabilities, or (putting it the other way) if they keep their deposit liabilities small enough in relation to their cash reserves, so that at all times they will be able to pay cash to depositors who demand cash, the banking situation as a whole will be safe.

But to keep the banks in a safe condition, and to prevent bank failures and panics, is only part of the problem. It is necessary, also, to devise a system of banking that will meet the requirements of trade and commerce. The business of the world is based on credit, and the banks are the instruments by which this credit is created. Modern enterprise and business activity would be utterly impossible without an enormous volume of bank credits. The aggregate deposit liabilities of the National banks alone amount to more than \$5,000,000,000, and their loans and discounts amount to about that sum, while the aggregate

IN THE UNITED STATES

individual deposit liabilities of all the banks and trust companies in the United States, including the National banks, amount to more than \$13,000,000,000, and their loans and discounts to more than \$10,500,000,000. These enormous volumes of bank credits cannot be diminished without diminishing the business prosperity of the country; and unless the volume of bank credits can keep on expanding still further there must be a check to the future development of the country and to its business prosperity.

Our banking troubles cannot be prevented by the simple means of compelling the banks to keep larger minimum reserves or by restricting their power to grant credits. All possibility of bank failures could be prevented by abolishing the banks altogether, but that would be killing the patient in order to destroy the disease. The risk of bank failures and of panics might be reduced to a minimum by requiring the banks to keep on hand very much larger reserves of money than now in proportion to their deposit liabilities, but this would merely compel the banks to reduce their loans and their deposit liabilities so as to bring about the required relation between the reserves and the deposit liabilities. From self-interest the banks make their reserves as large as possible, because the amount of their reserves determines the amount of

THE BANKING AND CURRENCY PROBLEM

credits they can grant and consequently the amount of money they can earn by making loans and discounts. A law requiring the banks to keep larger reserves in proportion to their deposit liabilities would not enable them to increase their reserves by a dollar; it would merely contract their power to grant credits, and this contraction of the power to grant credits would create a financial stringency and raise interest rates. If carried too far, it would arrest business and destroy enterprise. Safety of the banking situation undoubtedly must be secured, but it is no less important to provide for the largest volume of bank credits consistent with safety, so that business prosperity may not suffer. The problem, therefore, is not merely to make banking safe and to prevent future panics; the problem is to devise a system that will permit of the largest possible expansion of bank credits consistent with safety.

No system of banking and currency can be sound or prove of lasting value unless it shall accord with the elementary principles of economic science approved by the leading financial experts of the world. Failure to realize the full force and effect of these established elementary principles, and to apply these principles correctly and consistently, has been the source of many popular fallacies that have prevailed in the United States. It is desir-

IN THE UNITED STATES

able, therefore, in discussing the banking and currency problem, to state and to explain briefly some of these elementary principles, although they may be familiar to students of economic science.

Causes of "Money Stringency"

The entire currency of the country consists of approximately three thousand million dollars. Of this sum less than three-fifths is ever in actual circulation among the people. A little more than one-third, or approximately twelve hundred million dollars, is held by the banks and trust companies as a reserve for the payment of their depositors on demand, and more than two hundred million dollars are held by the Government. The aggregate amount of currency actually used by the people of the United States as a circulating medium—that is to say, the aggregate amount carried in their pockets, or kept in cash-drawers or in safes for use in business, or hoarded in secret places—fluctuates from time to time. The amount thus used as a circulating medium by the people at any one time depends wholly upon the will of the people and upon their need of a circulating medium. No currency plan would in the least increase or diminish the amount of currency actually used by the peo-

THE BANKING AND CURRENCY PROBLEM

ple as a circulating medium. Any one who has a bank-account, or who has property for sale, or who has credit enabling him to borrow, always can obtain currency from the banks, unless they break their contracts with depositors and violate their legal duty by refusing on demand to pay in currency checks of their depositors. Though the currency of the country were doubled in volume, this would not put a dollar into the pockets of any man, except as received by him in payment for labor or property, or as a gift, and the amount of currency actually in circulation would not be increased by a dollar. People would not carry in their pockets more currency than at present. On the other hand, whenever the currency in circulation exceeds the amount which the people want to carry in their pockets, or to keep in their tills and in cash-boxes, or to hoard, this excess will be deposited in the banks and trust companies. The reserves of the banks and trust companies are merely the surplus of currency left over after supplying these wants of the people for currency as a circulating medium. Therefore, it follows that as the amount of currency used for actual circulation fluctuates, so also the bank reserves will fluctuate, except so far as these fluctuations may be compensated by the importation of gold, or by the issue of bank-notes, as hereafter will be pointed out.

IN THE UNITED STATES

Various causes produce these fluctuations in the amount of currency used as a circulating medium. When business is active and labor throughout the country finds profitable employment, more money is kept in circulation to pay wages and to make other cash payments, and people carry more pocket-money than in dull times. Usually about Christmas-time there is a special demand for currency on account of the requirements of holiday trade. But the largest fluctuation is caused annually by the requirements of the West and South for cash to make payments incidental to harvesting and to moving the crops. It is difficult to determine accurately the extra amount of cash needed for this purpose, but it is estimated that to move the crops there is required, annually, approximately two hundred million dollars, or about 7 per cent. of the entire currency. After a few months the extra amount of currency, being no longer needed to move the crops, is returned to the banks and trust companies and again becomes part of their reserves.

As the whole amount of currency used as a circulating medium by the people never exceeds three-fifths of the entire currency in the country, it is obvious that the currency is ample for the uses of the people as a circulating medium. When it is said that money is tight, or that a stringency exists in the money-market, this does not mean that there

THE BANKING AND CURRENCY PROBLEM

is insufficient currency in the country to meet the needs of the people for a circulating medium. It means, really, that people cannot obtain loans and discounts from the banks, because the banks are unable to grant further credits, their reserves of lawful money being insufficient. It means either that the banks and trust companies have expanded their deposit liabilities in relation to their reserves to the limit of safety, or to the legal limit, and that they cannot lend their credit any further by the creation of deposit liabilities, or else that they feel compelled to call in loans so as to increase their reserves or to reduce their deposit liabilities. It does not mean that the people cannot have all the currency they want for circulation, unless, as recently, the banks actually suspend cash payments. Even when the banks suspend cash payments, and there appears to be a currency famine, as in the recent panic, the real cause of the trouble, and the source of danger, is not the inability of depositors to obtain currency from the banks. This inability to obtain currency was an inconvenience, but not very serious, because, generally, debts could be paid by check. The seriousness of the panic arose from the fact that the banks, having expanded their deposit liabilities in relation to reserves beyond the limit of safety, were compelled to call in loans that could not be paid immediately without enormous sacrifices, and

IN THE UNITED STATES

were compelled to refuse to make loans and to grant credits for legitimate and necessary business purposes.

Tight money, or a stringency of the money-market, whether general or sectional, may result from one or more of the following causes—*viz.*, (1) the banks may be unable to grant further credits, or they may be compelled to reduce the amount of their credits, because their reserves have been reduced by unusual withdrawals of lawful money, as may happen when a large amount of money is used to pay duties and other taxes and is locked up by the Government, or when a large amount of currency is withdrawn either for use as a circulating medium in the West and South to “move the crops,” or to be hoarded by panic-stricken depositors, or when a large amount of gold is drawn for export; or (2) the banks may be unable to grant additional credits, because through extraordinary activity in business the aggregate amount of credit desired has been increased to the limit permitted by their reserves of lawful money; or (3) the persons who desire credit may be unable to furnish satisfactory assurance or security to such banks as may be able still to grant credits.

It is obvious, then, that our currency question is really a question of bank credits and bank reserves. The problem is, *while preventing any un-*

THE BANKING AND CURRENCY PROBLEM

safe expansion of credits or the issue of any unsafe currency, to find a way, (1) to avoid a depletion of bank reserves and the consequent large reduction of bank credits in times when lawful money is withdrawn to pay taxes and is locked up by the Government, or when lawful money is largely withdrawn for use as a circulating medium to move the crops, or to be hoarded; and (2) to enable the banks, in times of great business activity, to expand their deposit liabilities and their loans and discounts, and also adequately to increase their reserves of lawful money.

The Creation of Bank Credits

The National banks owe to their depositors in the aggregate six or seven times the aggregate amount of currency held by these banks. The banks and trust companies of the United States, including the National banks, collectively owe to their individual depositors (not including deposits of one trust company or bank in another trust company or bank) more than thirteen thousand million dollars, payable on demand, this sum being about twelve times the aggregate amount of currency held by all the banks and trust companies, or more than four times the entire currency of the United States.

In dealing with the banking and currency prob-

IN THE UNITED STATES

lem, it is of paramount importance to bear in mind that, in large part, these so-called deposits in the banks and trust companies are created without the actual deposit of any money. The expression "bank deposits" often is misleading to those who are not familiar with the actual course of banking operations. In very large part the deposit liabilities of the banks and trust companies are created by mere book entries representing loans of the credit of the banks for a consideration received by them in the form of interest.

As a rule, when a borrower applies to a bank for a loan he does not want to carry away the amount of the loan in currency. What he wants is a credit so that from time to time in the course of his business he can draw his checks upon the bank. Accordingly, the bank discounts the borrower's note, and credits his deposit account with the amount of the note, less the interest, as though he had actually deposited that sum, although in fact he never deposited a dollar in money. The borrower receives from the bank only a deposit credit, and usually there is a tacit or expressed understanding that he will not draw against this credit except from time to time, in the course of his business, and that as long as he continues to be a customer of the bank he will allow a reasonable balance to remain undrawn. The bank receives no money,

THE BANKING AND CURRENCY PROBLEM

but by means of a book entry its nominal deposits are increased by the amount of the loan, less the interest, which, commonly, is deducted in advance. The real transaction is simply an exchange of credits between the bank and the borrower. If, however, the transaction should take the form of an actual payment of money to the borrower, this money soon would be deposited again in the banks, either by the borrower or by other persons receiving it in the course of business, and thereupon from time to time the same money could be loaned out again and be redeposited. The deposit liabilities of the banks would be increased on each occasion when the money, after having been paid out by the banks by way of a loan, is returned to them as a deposit.

By these processes the deposit liabilities of the banks may be increased almost indefinitely without increasing the amount of money held by them. The only absolute limitation is that imposed by the necessity of holding as a reserve an amount of money sufficient to supply depositors with the sums they are likely to withdraw for use as currency, and to enable the banks to settle with one another such balances as cannot be settled by exchanges of checks through the clearing-houses. In large part the business of banking consists of making loans and of discounting notes payable *with interest at future dates* in consideration of the assumption of

IN THE UNITED STATES

deposit liabilities payable *on demand, without interest or at a low rate of interest*, it being understood that a large part of these deposit liabilities always will be allowed to remain unpaid.

The business of the country cannot be carried on without the use of a stupendous amount of credit. Bank credit serves this purpose where the credit of individuals would not be acceptable. The great service rendered by the banks is that they furnish in acceptable form the vast amount of credit which is essential to carry on the business of the country.

Bank Reserves and their Character

While a very large part of the aggregate deposit liabilities of the banks always is allowed to remain unpaid, and while the great bulk of the transactions of the banks can be effected by set-off through the clearing-houses without the actual delivery of currency, yet prudence requires every bank and every financial institution to keep on hand sufficient currency to enable it to meet all demands for currency that are likely to be made upon it, having regard to all the prevailing conditions. In England the amount of currency that the banks must reserve in their vaults to meet their deposit liabilities is not fixed by statute, but is left to the judgment of the banks. In the United States the laws require the

THE BANKING AND CURRENCY PROBLEM

National banks and the various State banks and trust companies to keep on hand certain minimum reserves proportionate to their deposit liabilities. The requirements of the laws as to minimum reserves vary widely with respect to the different classes of banks and trust companies, and each State has prescribed its own rules.

The character and sufficiency of bank reserves must be considered with regard to the banking situation as a whole as well as with regard to the affairs of each separate bank.

Thus, a deposit claim of one bank against another bank—that is to say, its right to call upon such other bank for the payment on demand of a sum of money—may be treated as a reserve, if we leave out of consideration the position of the banks collectively and the general banking situation. But, obviously, the liability of a bank to pay money to another bank would not increase the collective ability of all the banks to pay all their depositors and would not in the least strengthen the general financial situation. When a particular bank strengthens its own reserve by drawing upon its deposit with another bank, it weakens to the same extent the reserve of the bank upon which it draws. Therefore, when there is a general money stringency—that is to say, when the banks throughout the country have expanded their credits to the limit

IN THE UNITED STATES

of safety—the deposits of certain banks in other banks are not good as reserves, and do not in the least strengthen the general banking situation. We had an illustration of this during the recent panic, when the credit situation had become strained throughout the entire country. The Western banks having large deposits with the New York banks began to draw against them, thereby diminishing the reserves of the New York banks; but as the latter, quite as much as the Western banks, needed their reserves, the money stringency in New York soon reached the breaking-point, and all the New York banks suspended cash payments. Under these circumstances the deposits of the Western banks were of no use to them as reserves.

Similarly, bank-notes may be treated as a reserve, if the position of the bank holding such notes be considered without regard to the general banking situation; but, having regard to the situation of all the banks, it is clear that such notes are not good as a reserve. A bank-note is merely a promissory note payable in money on demand. Bank "A" holding notes of bank "B" may consider such notes as good as money so long as bank "B" is solvent and pays its obligations on demand; but it is obvious that when bank "A" obtains money from bank "B" by requiring it to redeem its notes the reserves of bank "B" will be diminished exactly as

THE BANKING AND CURRENCY PROBLEM

much as the reserves of bank "A" are increased. That, having regard to the entire banking situation, bank-notes are not a good reserve becomes apparent upon considering the case of several banks exchanging their notes, and each bank calling upon the others to pay their notes in lawful money.

As long as financial conditions are normal, call loans may be regarded as a good reserve, because a bank can obtain cash promptly by calling such loans; but call loans do not strengthen the general banking situation, and, therefore, when there is a severe money stringency, they are not good as a reserve. When a bank calls a loan, the borrower either must borrow the same sum from some other bank, although required to pay a very high rate of interest, or he must obtain the required sum by selling property, and in that event the purchaser usually must draw the money from the banks. Therefore, when a bank strengthens its reserve by calling a loan, the practical effect is to draw the money from other banks and *pro tanto* to weaken their reserves.

For similar reasons, as long as financial conditions generally are not strained, bonds or other securities that have a ready market may serve as a reserve, because by selling such bonds or securities a bank can obtain money; but reserves of that

IN THE UNITED STATES

character do not strengthen the general credit situation and are not available when most needed by the banks that hold them. When a bank sells securities in order to obtain lawful money to pay its depositors, the purchaser usually must draw the purchase price from the banks. The selling bank thus would obtain lawful money by drawing indirectly from the reserves of other banks. Therefore, when there is a general money stringency, bonds or other salable securities are not good reserves. During the recent panic many of the banks and trust companies, including some of those which failed, owned large amounts of high-class securities, but this did not help them or relieve the general situation, as the combined lawful money reserves of the banks and trust companies were inadequate.

Deposits by banks in other banks, bank-notes, call loans, and bonds or other securities are not, properly speaking, bank reserves at all. They are only the means of obtaining reserve money for particular banks by drawing this money from the reserves of other banks. In considering the general financial situation, deposits of banks, bank-notes, call loans, and securities held by the banks should be disregarded. For the ultimate payment of bank-deposit liabilities the only true reserve is legal-tender money.

THE BANKING AND CURRENCY PROBLEM

Bank Reserves and Liabilities in the United States

At all times the demand liabilities of the banks in the United States are very largely expanded in relation to the reserves of money held by them for the payment of these liabilities.

According to the reports of the Comptroller of the Currency, on August 22, 1907, and on November 27, 1908, the demand liabilities of the National banks alone were approximately as follows, omitting all liabilities of National banks to other National banks:

	August 22, 1907. 6,544 Banks.	November 27, 1908. 6,865 Banks.
Individual deposits.....	\$4,319,035,402	\$4,720,284,640
Due to State banks and bank- ers, trust companies and savings-banks (net amount)	610,652,912	812,351,826
U. S. deposits (net amount)...	156,306,310	118,348,294
National bank - notes (net amount)	520,709,334	561,414,595
Total	\$5,606,703,958	\$6,212,399,355

At the same dates the aggregate amount of money held by the banks was as follows:

	August 22, 1907.	November 27, 1908.
Specie	\$531,107,750	\$656,528,775
Legal-tender notes.....	170,515,782	188,230,744
In 5-per-cent note redemption fund	27,305,679	29,809,485
Total reserve.....	\$728,929,211	\$874,569,004

IN THE UNITED STATES

The aggregate collective money reserves of all the National banks on August 22, 1907, amounted to about 13 per cent., and on November 27, 1908, to about 14 per cent. of their collective liabilities payable on demand, not including liabilities to National banks. The aggregate amount of gold and gold certificates included in these reserves on August 22, 1907, was \$404,799,628, or about 7 per cent., and on November 27, 1908, was \$512,207,371, or a little over 8 per cent. of their demand liabilities to others than National banks.

According to the report of the Comptroller for 1907, the collective individual deposits of all the 19,746 reporting banks and trust companies in the United States, including the National banks, on or about June 30, 1907, amounted to \$13,099,600,000, while their aggregate reserves of cash of all kinds, including bank-notes, amounted to \$1,113,742,316.

Thus the collective cash reserves of all of the reporting banks and trust companies amounted to about 8.5 per cent. of their collective deposit liabilities to individuals. On or about June 30, 1907, the aggregate amount of gold and gold certificates held by all these banks and trust companies was only \$570,692,702, or about 4.4 per cent. of their aggregate deposit liabilities to individuals.

There are no reports from other countries furnishing definite information as to the aggregate

THE BANKING AND CURRENCY PROBLEM

deposit liabilities and aggregate reserves of their banks, omitting from the liabilities, as well as from the reserves deposits of one bank in another bank and bank-notes held by the banks; but it has been estimated that the aggregate amount of gold held by all the English banks is about 6 per cent. of their aggregate deposits, not counting deposits of one bank in another bank or bank-notes held by the banks.

The Bank of England, alone, generally holds a reserve of about 50 per cent. of its deposit liabilities, and a larger separate reserve for its notes; the Bank of France, a reserve of about 80 per cent. of its deposit liabilities and notes; and the Imperial Bank of Germany, a reserve of about 40 per cent. of its deposit liabilities and notes.

Increase of Reserve Money

As bank reserves are held for the payment of the deposit liabilities of the banks, they should consist of legal-tender money, or of such other currency as the banks can require their depositors to accept. Similarly, in the absence of some stipulation to the contrary, it should be implied that banks may pay their depositors in any kind of currency which, by statute, is declared to be good as a reserve against deposit liabilities.

IN THE UNITED STATES

By statute, gold coin and gold certificates of deposit, silver coin and silver certificates of deposit, and Government notes, are declared to be good as reserves of the National banks. Gold coin, silver coin, and Government notes are made a legal tender for the payment of debts. The gold certificates and silver certificates are not made a legal tender, but they can be issued only against a like amount of gold and silver deposited with the Government, and are convertible on demand into gold coin or silver coin. Therefore, there is no good reason why such certificates should not be used as bank reserves in place of the coin itself, which is legal-tender money.

Though the Government notes are merely promissory notes of the Government, and though the bullion value of each silver dollar coined by the Government is only about fifty cents in gold, both the Government notes and the silver coin are at a parity with gold coin. The Government notes are at a parity with gold because the Government has promised to pay them in gold, and keeps an adequate reserve of gold to insure their payment on demand. While the Government has not definitely promised to redeem the silver dollars in gold, yet they are at a parity with gold because their supply is limited, because they are receivable for customs, taxes, and public dues, and because,

THE BANKING AND CURRENCY PROBLEM

by Act of Congress, it is made the duty of the Secretary of the Treasury to maintain these silver dollars at a parity with gold.

At the present day few persons would be so unwise as to favor an increase of the issue of silver dollars, which are declared to be legal-tender money, though intrinsically worth only about fifty cents in gold. People have not yet forgotten that, not many years ago, the continued coinage of these silver dollars cost the country hundreds of millions of dollars, and by causing doubts as to the stability of the gold standard of value precipitated a great financial panic. It will be pointed out hereafter that the issue of additional Government notes would be equally dangerous and unwise, even though the Government should undertake to maintain a large gold reserve for their redemption.

If, then, the issue of more legal-tender silver dollars and Government notes be excluded, the only way of increasing the aggregate amount of money in the United States available as bank reserves is by adding to the stock of gold. As gold cannot be created by statute, it follows that the only practicable way of increasing the aggregate amount of money available as true bank reserves is by obtaining additional gold from the mines, or by importing it from abroad, either by means

IN THE UNITED STATES

of foreign loans or by means of exports of cotton or grain or other property, or of stocks and bonds.

Maintenance of the Gold Standard and of Cash Payments

There is a radical difference between the maintenance of the gold standard of value and the maintenance of cash payments by the banks. Maintenance of the gold standard of value means that all the legal-tender currency other than gold—in other words, the Government notes, or greenbacks, and the silver currency—shall be kept at a parity with gold, so that any one having Government notes or silver dollars and desiring gold, can obtain for the Government notes or silver dollars an equal sum in gold dollars. It means that all paper and silver currency, which debtors are required by law to accept in payment of their claims, shall be maintained at a value equal to gold coin, so that debts cannot be paid in a depreciated currency. On the other hand, maintenance of cash payments by the banks means that the banks shall continue to perform their contracts to pay their depositors and note-holders on demand in any kind of currency in which the bank deposits are payable.

If there were no Government notes and no silver in our currency—if gold were the only legal-tender

THE BANKING AND CURRENCY PROBLEM

money of the United States—no question ever could arise as to the maintenance of the gold dollar as the standard of value. A default on the part of the banks to pay their deposit liabilities on demand would not in the least affect the standard of value. Under these circumstances the deposit liabilities of the banks might fall in value and might sell at a discount, but the standard of value would remain unchanged. During the recent panic, when the banks suspended payments, gold and other lawful money at one time was quoted at a premium of three per cent.; but of course this did not mean really that gold had risen to a premium and that the standard of value had changed. It meant that the obligation of the banks to pay depositors on demand (which obligation was in default and could not be collected for the time being) had fallen below its face value. It meant that a check on a bank for one hundred dollars was worth only about ninety-seven dollars in actual cash, because cash was wanted and the bank could not, or would not, on demand, pay the check in cash.

The issue of notes by the banks would not affect the standard of value, though the banks should suspend payment and the notes fall to a discount, unless the bank-notes were made a legal tender. A person entitled to a sum of money could refuse

IN THE UNITED STATES

the notes and could insist upon payment in gold or other lawful money, or he could accept bank-notes at their current depreciated value. Before the war many issues of bank-notes were current at various rates of discount, but nevertheless the gold standard of value remained unchanged.

Issue of Bank-Notes

While there is no practicable way of increasing the aggregate amount of lawful money in the country except by digging gold out of the ground or by importing it from abroad, there is a way of rendering available as bank reserves part of the gold and other lawful money already in circulation among the people. This result can be brought about through the issue of bank-notes, which are merely promissory notes of the banks to pay lawful money to bearer on demand.

If the public have entire confidence that whenever these notes are presented for payment lawful money can be obtained in exchange, people will accept the notes as equivalent to lawful money and the notes will serve as a circulating medium in place of lawful money. The lawful money in place of which the bank-notes are used as a circulating medium thereby is made available as a reserve for the banks. Though the aggregate amount of law-

THE BANKING AND CURRENCY PROBLEM

ful money good as bank reserves cannot be increased by an issue of bank-notes, the portion of the existing lawful money available as bank reserves may be increased by substituting bank - notes for lawful money in circulation.

Effects of Issuing Bank-Notes

When the deposit liabilities and loans of the banks already are expanded to the limit of safety, having regard to their reserves, a withdrawal of lawful money from the reserves may cause an enormous shrinkage of the credit power of the banks. On the basis of the average expansion of bank credits in relation to reserves, the withdrawal of \$100,000,000 of reserve money may involve a shrinkage of more than \$500,000,000 in the credit power of the National banks alone, and a shrinkage of more than \$1,000,000,000 in the collective credit power of all the banks and trust companies. If, however, when an unusual amount of currency is demanded by the public for use as a circulating medium, the banks could issue notes instead of paying out lawful money from their reserves, they could by this means prevent the depletion of their reserves and could avoid the necessity of reducing largely their loans and discounts and their deposit liabilities. Therefore, the issue of bank-notes is a potent

IN THE UNITED STATES

means of preventing a reduction of reserves and a contraction of the credit power of the banks when an unusual amount of currency is needed for circulation.

The issue of bank-notes is available, not only as a means of preventing a reduction of the reserves of the banks and the consequent large contraction of their credit power, but also as a means of increasing bank reserves, and of causing a large expansion of the power of the banks to grant credits. If, when there is no demand for an unusual amount of circulating currency, bank-notes could be issued and kept in circulation in substitution for lawful money, the lawful money displaced by the notes would accumulate in the banks, thereby increasing their reserves and causing a large increase of their power to grant credits. If \$100,000,000 of bank-notes could be put out and kept in circulation in place of a like amount of lawful money, this lawful money would be added to the bank reserves and the credit power of the banks would be increased more than \$500,000,000, according to the present average expansion of credits of the National banks, and more than \$1,000,000,000, according to the present average of all the banks and trust companies. In the case of State banks and trust companies which are permitted to hold National bank-notes as reserves, it would not be necessary even to go through this process of substituting the

THE BANKING AND CURRENCY PROBLEM

bank-notes for lawful money in circulation. The notes would be an addition to the amount of currency in the country directly available as reserves for these State banks and trust companies.

In order to serve their purpose, bank-notes must be kept at a parity with gold and other lawful money. As long as this parity continues, it is immaterial to the people at large whether they receive lawful money or bank-notes, and rarely, if ever, do the public present bank-notes for redemption in lawful money. The National banks, however, always prefer lawful money, because lawful money is good as a reserve, whereas bank-notes are not good for that purpose. For that reason the National banks, whenever practicable, keep lawful money and pay out their own notes, or the notes of other banks.

When the people have in their possession more currency than they need, they deposit the excess in the banks, without discriminating between lawful money and bank-notes, which to them are of equal value. The National banks, however, assort this currency and, whenever practicable, keep the reserve money, while paying out notes to depositors who call for currency. A constant process of sifting the currency thus goes on—the lawful reserve money being accumulated by the banks which put the notes in circulation in place of reserve

IN THE UNITED STATES

money. When there is a demand for an unusual amount of currency for use as a circulating medium, the banks, if they have power to issue notes, pay out notes to meet this increased demand. When the additional currency thus created is no longer needed, people do not pick out the bank-notes and return them to the banks and keep the reserve money in circulation, but, to the extent of the excess of currency in circulation, the reserve money and the bank-notes are deposited indiscriminately. The banks again sift the currency so deposited and retain the reserve money, but when currency is demanded for use as a circulating medium they again pay out notes.

This process of substituting bank-notes for lawful reserve money in circulation goes on continually, and is bound to go on so long as the National banks prefer to pay out bank-notes rather than reserve money, and the public are indifferent whether they receive notes or reserve money. Through this process about six hundred million dollars of National bank-notes are kept outstanding year in, year out, even when the aggregate amount of the currency is unnecessarily large and when interest rates have fallen to a minimum. It is through this process that practically all the gold in Canada has been accumulated in the banks, while the currency in circulation among the people consists almost

THE BANKING AND CURRENCY PROBLEM

entirely of bank-notes, subsidiary silver, and small Government notes.

Facility of redemption of bank-notes would not prevent this process of substituting bank-notes for lawful reserve money in circulation, because as long as bank-notes are worth as much as other currency the public do not present notes for redemption; and when a bank presents notes to another bank for redemption this operates merely as a transfer of reserve money from one bank to another bank. No doubt if bank-notes could be redeemed in lawful money, promptly, and without expense to the holder, each National bank receiving notes of other banks would present them for redemption instead of accumulating them in its vaults. But this would not diminish the amount of notes in circulation among the people, or tend to check the gradual substitution of notes for lawful money in circulation as long as the banks can issue notes and lawful money remains in circulation. It is to be borne in mind, also, that State banks and trust companies which, by law, can hold National bank-notes as reserves would have no incentive to present the bank-notes for redemption in lawful money.

Difference between Notes and Other Instruments

In recent discussions it has been urged by high authority that, as a bank-note represents merely

IN THE UNITED STATES

a liability of the issuing bank to pay on demand a specified sum, an issue of bank-notes has the same effect as the creation of a like amount of deposit liabilities, or the issue of cashier's checks or certificates of deposit; and that undue expansion of bank credits through the issue of bank-notes can be prevented by requiring the banks to keep against their outstanding notes the same reserves as against their deposit liabilities. This appears to be a dangerous error. By issuing circulating notes the banks, indirectly, may increase their reserves of lawful money and their credit power in a way that is not possible by means of cashier's checks or certificates of deposit, or by means of checks drawn upon the banks by depositors. It is true that the liability of a bank to pay its notes on demand is essentially the same as its liability to pay its cashier's checks or certificates of deposit, or its liability to pay checks of its depositors; but bank-notes are a practical substitute for lawful money as a circulating medium, whereas certificates of deposit, cashier's checks, and checks drawn by bank depositors are not available for that purpose, except to a limited extent. Theoretically, it might be possible to dispense with the use of our present currency as a circulating medium and to use only cashier's checks, certificates of deposit, or checks drawn by bank depositors; but

THE BANKING AND CURRENCY PROBLEM

we know that the people of the United States always require the use of more than fifteen hundred million dollars of gold, silver, greenbacks, or banknotes, and that neither checks nor certificates of deposit are a practical substitute for this currency required by the people. In practice it is not possible for the banks to prevent a depletion of their reserves and a resulting money stringency by offering to issue cashier's checks or certificates of deposit in lieu of paying out currency when currency is demanded. For the same reason cashier's checks, certificates of deposit, and checks drawn by bank depositors cannot drive lawful money out of circulation into the National bank reserves. By issuing circulating notes to take the place of lawful money in circulation the banks may cause an increase of their reserves and a large expansion of their power to grant credits, but no such consequences can result from the issue of cashier's checks or certificates of deposit, or by the creation of deposit liabilities, for these are not practical substitutes for lawful money as a circulating medium.

Regulation of the Banks

In the main, the banks in the United States have been managed honestly and with signal ability, and they have served the country well. The ultimate losses of depositors in the banks and the trust

IN THE UNITED STATES

companies have been remarkably small, having regard to the fact that there are approximately twenty thousand banks and trust companies doing a banking business, and that many of them were established in newly developed sections of the country by men who had little or no previous experience as bankers.

The main causes of failures of individual banks are dishonesty, bad business judgment, and over-expansion of liabilities in relation to reserves. Dishonesty and bad business judgment never can be wholly prevented by statute. No legislation can make bank managers honest and wise, or prevent occasional bank failures resulting from dishonest or foolish management. Sound judgment and a large measure of discretion are essential to the successful management of the banking business, and any attempt, by statutory rules and regulations, to prevent bank managers from committing errors of judgment or abuses of discretionary powers is bound to prove a failure.

However, there are practices that ought to be prohibited by law because they tend to errors of judgment or to actual fraud. Thus the laws should prohibit the managing officers of a bank from borrowing from their bank or from dealing with it, directly or indirectly, for their own benefit; and also should prohibit dealings between a bank and

THE BANKING AND CURRENCY PROBLEM

a company in which its managing officers are personally interested. Furthermore, the best practicable provision should be made for the prompt discovery and prevention of dishonest or unsound banking methods. The examinations of the banks by the Comptroller should be made more thorough, and statutory authority should be given to the clearing-house associations in the various cities to examine the affairs of their members and to exercise a large measure of supervision, including power to stop any course of business that is imprudent even if lawful.

Insufficient Reserves and Over-Expansion of Credits

The question of the sufficiency of bank reserves, or, in other words, how far the banks can safely expand their liabilities in relation to reserves, must be considered in two aspects. It must be considered with regard to the position of each bank severally, and it must be considered also with regard to the position of all the banks collectively and to the entire credit situation.

The sufficiency of the reserves of any particular bank, considered without regard to the entire credit situation, depends largely upon the character of the deposit liabilities and assets of the bank. Thus, as a rule, safety would require a bank to keep on

IN THE UNITED STATES

hand against very large deposits of single depositors a larger percentage of reserve than against an equal aggregate of small deposits of many depositors, for the danger that the reserves of a bank may be exhausted by the withdrawal of a few large deposits is greater than that of exhaustion by the withdrawal of a large number of small deposits. Again, safety would require reserves against deposits that fluctuate widely in amount, or that are known to be only temporary, to be larger than those against deposits of a more permanent character. For this reason reserves against deposits of other banks and against deposits of stock-brokers, or others engaged in a fluctuating or uncertain business, should be larger than those against savings deposits or against ordinary mercantile deposits. Again, the character of a bank's loans and investments has an important bearing upon the sufficiency of its reserves, considered without regard to the credit situation as an entirety. Thus, under normal financial conditions, a bank whose bills receivable consist largely of good call loans convertible promptly into cash, or of good short-time commercial paper maturing from day to day, would be safe with a smaller amount of cash in its vaults than a bank whose assets consist largely of time loans or other investments that cannot be converted promptly into cash.

THE BANKING AND CURRENCY PROBLEM

It follows that the question how far any particular bank may safely expand its liabilities in relation to reserves is a question of sound business judgment, and can be determined only by those familiar with the entire business of the bank and with the character of its deposits and of its assets. For this reason it has not been found advisable in foreign countries to prescribe, by statute, the minimum reserves which each individual bank shall keep in relation to its deposit liabilities.

Minimum Reserves of National Banks

The statutory minimum reserves of the National banks vary according to location. National banks in *central reserve cities*—*i.e.*, New York, Chicago, and St Louis—are required to keep in their vaults an amount of lawful money equal to 25 per cent. of their deposit liabilities. Banks in *reserve cities* are required to keep reserves nominally equal to 25 per cent. of their deposit liabilities, but of these reserves only one-half need be in lawful money, and the other half may be in the form of deposits with banks in central reserve cities. *Country banks* are required nominally to keep reserves equal to 15 per cent. of their deposits, but of these reserves three-fifths may be in the form of deposits with

IN THE UNITED STATES

banks in reserve cities or central reserve cities and only two-fifths need be lawful money.

This classification appears to be based upon no sound principle and, from every point of view, to be arbitrary. If the object of requiring the banks to keep minimum reserves is to provide for the safety of the entire credit situation, no deposits of banks with other banks should be counted as reserves. Deposits of one bank with another bank do not augment the total reserves of the banks available for the payment of all their deposit liabilities, and do not in the least strengthen the general credit situation. Such deposits merely enable some banks to strengthen their reserves by exhausting *pro tanto* the reserves of other banks. If, however, the object is to provide for the safety of the several banks considered individually, without regard to the general credit situation, then no test is furnished by the location of the several banks, whether in a central reserve city, or in a reserve city, or elsewhere. The ability of a bank to pay its depositors, on demand, in cash, depends, not upon the location of the bank, but upon the nature of its assets and of its deposit liabilities. Again, if the object is to provide for the ultimate security of bank depositors, and not merely for the ability of the banks on demand to pay cash, then the test of safety would be a comparison of the amount of

THE BANKING AND CURRENCY PROBLEM

the capital and surplus of the bank with its liabilities, because the capital and surplus of a bank is the only margin of security for the ultimate payment of its liabilities.

The framers of the National Banking Act required the reserve city banks to carry cash reserves larger than those of the country banks, probably, because it was contemplated that the country banks would keep part of their reserves in the form of deposits with the reserve city banks, and that the reserves of the latter thus would serve as reserves not only for their own deposit liabilities, but also in part for those of the country banks. The banks in the central reserve cities were required to keep their 25 per cent. reserves wholly in cash, probably, because it was contemplated that the reserve city banks would keep half of their minimum reserves in the form of deposits with central reserve city banks, and that the reserves of the latter thus would constitute, in part, ultimate reserves for all the banks. It is obvious, however, that if a bank in a reserve city, or in a central reserve city, does not owe deposits to other banks, and if its deposits consist principally of steady commercial deposits, safety would not require it to keep as high a percentage of reserve as a bank that owes deposits to other banks. For the purpose of ascertaining the collective condi-

IN THE UNITED STATES

tion of the banks and the general credit situation, the system established by the National Banking Act, and the reports of the Comptroller under this Act, at best, are misleading, because part of the reserve money held by the banks is counted twice, and some of it three times.

Therefore, it is desirable to reconsider and revise the provisions of the National Banking Act, prescribing the minimum reserves to be kept by the various banks. Having regard to the general banking situation, deposits of one bank in another bank should not be counted as reserves. Money is the only ultimate bank reserve. Having regard to the safety of the several banks considered separately, the minimum reserves of the banks should be determined, not by their location, but by the character of their deposits and of their assets.

A sounder plan would be to require the banks to keep against deposits of other banks and of trust companies minimum reserves higher than those against ordinary deposits of individuals, and to require the whole of the minimum reserves to be kept in lawful money in the banks. For example, it might be provided that all National banks shall maintain lawful money reserves amounting to 30 per cent. of such of their deposits as may be owing to other National banks, State banks, trust companies, and private bankers, and 10 per cent. of

THE BANKING AND CURRENCY PROBLEM

all other deposits, with power in each clearing-house association, upon obtaining the approval of the Comptroller of the Currency, to increase the latter percentage, temporarily, as to all or any banks that are members of the clearing-house association. It might be provided, also, that no bank may incur deposit liabilities to an amount in the aggregate exceeding five times the amount of its capital and surplus. The foregoing percentages are indicated, not for adoption, but merely for the purpose of showing how the reserve requirements of the banks could be placed upon a sounder basis.

Necessarily, any statutory rule must be arbitrary, for the extent to which a bank can safely expand its liabilities depends largely upon the character of its loans and other assets, and upon its entire business. Unfortunately, in the United States an impression has grown up that because certain minimum reserves are prescribed by law any bank safely may make loans (especially call loans) and may create deposit liabilities to any extent found profitable, if only the minimum reserves prescribed by law be maintained. If this impression had not grown up in the United States, and if our bankers, to the same extent as bankers in Europe, were governed by conservative traditions, there would be strong arguments in favor of adopting the

IN THE UNITED STATES

foreign plan to fix no minimum reserves by statute, but to allow the managers of each bank, from time to time, to determine what reserve the bank shall keep. However, under existing conditions, probably it would be unwise to adopt the foreign plan and to abolish all statutory reserve requirements.

Over-Expansion with Regard to the General Credit Situation

The managers of each bank have the power to regulate the amount of its loans and discounts and the expansion of its deposit liabilities in relation to reserves, having regard to the condition of the particular bank which they control; but in the United States bank managers have no power to regulate the expansion of credits of all the banks with a view to the security of the general credit situation, and have no power, through the issue and redemption of bank-notes, to prevent sudden and wide fluctuations of the credit power of the banks resulting from the fluctuations of the volume of currency used as a circulating medium. Though the managers of fifty, or of a hundred, out of the seven thousand National banks may be of the opinion that, having regard to existing or prospective conditions, the expansion of credits has gone too far, they have no power to accomplish any substantial result. They

THE BANKING AND CURRENCY PROBLEM

could restrict the grant of credits by their own banks and so lose profitable business that would go to other banks, but they could not materially improve the general situation. This was the case prior to the recent panic. For months before the panic many intelligent managers of banks and trust companies knew that the credit situation throughout the country had become strained, and accordingly, by restricting credits and by making call loans instead of time loans, many of them endeavored to strengthen their own institutions, but they could do little for the protection of the general credit situation.

The main problem of the National Monetary Commission is to devise an adequate means of regulating and of protecting the general credit situation, so as to avoid sudden and wide fluctuations in the amount of credit available for the transaction of the business of the country. The regulation of the banks, severally, with a view to the prevention of dishonesty and unsound banking practices, and the regulation of reserves with regard to the condition of the several banks considered separately, are matters of minor importance. The reserves and the expansion of credits of each separate bank can be regulated intelligently only by the officers of the bank conversant with its condition and the character of its business. Even if some of the banks oc-

IN THE UNITED STATES

asionally should expand their liabilities too far in relation to their reserves, no great harm would result if the banks throughout the country, considered collectively, have not over-expanded. If bank credits generally have not been over-expanded, as was the case during the recent panic, when all the banks had to suspend, any individual bank that has a sufficient amount of good bank assets usually can replenish its reserves and relieve its difficulties by selling part of its assets, or by borrowing from other banks.

Central Regulation Necessary

The point to which bank credits throughout the country may be expanded with safety depends upon many circumstances and varies from time to time. A ratio of reserves to liabilities may be perfectly safe under certain conditions and quite unsafe under other conditions. It is a fatal mistake to assume that bank credits always can be expanded with safety to the maximum allowed by the reserve requirements of the National Bank Act. Recent experience has shown that though the minimum reserves required under the National Bank Act are sufficient in ordinary times, they are not sufficient at all times, and that credits may be expanded beyond the limit of safety although the legal ratio

THE BANKING AND CURRENCY PROBLEM

of reserves to liabilities be maintained. It is not sufficient to consider merely the rate of interest in Wall Street. It is not sufficient to consider the rate of interest and financial conditions throughout the United States. It is necessary to consider the whole world. The financial and commercial relations between the leading countries of the world are so close that any shock affecting financial conditions in one country would be felt by them all. A great war, or a financial crash in any country, would affect financial conditions throughout the whole civilized world.

It is necessary to consider, also, the prospective expansion of business and the prospective demand for credits and for currency throughout the world. Furthermore, allowance must be made for events that cannot be foreseen. There are times when exceptional conditions render necessary an exceptional expansion of bank credits, or of the currency, as a temporary measure of relief, as, for example, when a panic is threatened by reason of the sudden withdrawal of currency in unusual amounts to be hoarded by depositors who have lost confidence in the banks. In such case, however, safety would require that, as soon as the immediate need of the extraordinary expansion shall have been removed, bank credits and the currency shall again be contracted to a normal limit.

IN THE UNITED STATES

The currency situation, also, is a condition having an important bearing upon the safety of further expansion of the currency by the issue of bank-notes, or of further expansion of bank credits in relation to reserves. If, by reason of great activity in business or other cause, an unusual amount of currency is in circulation, the ratio of reserves to deposit liabilities may, with safety, be lower than when only a normal amount of currency is in circulation and there are grounds for anticipating, in the near future, additional withdrawals of currency for use as a circulating medium. Moreover, a ratio of reserves to liabilities that would be safe when little or no bank-note currency is in circulation may be perilously unsafe when a large part of the currency in circulation consists of bank-notes, because, under such conditions, bank credits already have been expanded by the substitution of notes for money as a circulating medium.

There is no country in the world where the volume of currency in circulation and the demand for bank credits fluctuate more widely than in the United States. This is due to the great expanse of our territory, to the annual harvest requirements of the agricultural sections, to the prevailing business activity and enterprise, and to the rapid and unequal increase of population and wealth in different sections. Furthermore, there is no country in the

THE BANKING AND CURRENCY PROBLEM

world where intelligent control over bank credits and bank reserves is needed more than in the United States. There are in the United States nearly seven thousand National banks, besides twice as many State banks and trust companies. Each of these institutions acts for its individual interest alone, independently of the others, and the prevailing tendency of each at all times is to expand its credits to the limit permitted by law. The country banks lend their surplus resources in the form of deposits at interest to the banks in the larger cities, and the banks in the principal money centres commonly expand their credits as much as practicable by lending on call such sums as they deem it unsafe to lend on time or by discount of commercial paper. Each bank with a deposit in another bank assumes that, in case of need, it can strengthen its reserve by drawing upon this deposit; but it fails to consider that, when thus it strengthens its own reserve, it must to the same extent weaken the reserve of the other bank, and that the deposits of banks with other banks add no strength to the general credit situation. Each bank that has loaned money on call assumes that, in case of need, it can strengthen its reserve by calling such loans; but it fails to consider that, generally, when a loan is called the borrower is obliged to borrow the same sum from some other

IN THE UNITED STATES

bank, although a high rate of interest may be exacted, and, therefore, that call loans affect the security of the entire bank situation practically to the same extent as time loans.

In the United States there is no way of regulating the supply of bank credits and of holding part of the potential supply in reserve for periods of financial stringency. Consequently, nearly always there is either an over-abundance of money (meaning credit which the banks are ready to lend) or a money famine. It has been argued that the volume of credits granted by the banks depends upon business activity and upon the consequent demand for credit and not upon the power of the banks to grant credits, and, therefore, that low interest rates have little effect in causing an expansion of bank credits. Experience, however, shows that the contrary is the case, at least in the United States. It is true that, when there is loss of confidence and when business is depressed, interest rates are low, because there is less currency in circulation and more in the bank reserves, while at the same time the demand for bank credits is diminished. It is true, also, that low interest rates will not stimulate speculation and enterprise unless people have confidence and are ready to speculate and to embark in new enterprises. But we know by experience that when people are in a mood for speculation and

THE BANKING AND CURRENCY PROBLEM

for business expansion low interest rates operate as a powerful stimulus to speculation and business expansion. A leading banker has said: "In the long run commerce suffers more from the periods of over-abundance (of money) than from those of scarcity. The origin of each recurring period of tight money can be traced to preceding periods of easy money. Whenever money becomes so over-abundant that bankers, in order to keep it earning something, have to force it out at abnormally low rates of interest, the foundations are laid for a period of stringency in the not far distant future, for then speculation is encouraged, prices are inflated, and all sorts of securities are floated until the money-market is glutted with them." *

The Central Bank Plan

The leading nations of Europe have learned by experience that no rule of mechanical application can be laid down and no automatic system can be devised, and that the only practicable way of regulating the general expansion of bank credits so as to provide for exceptional conditions, as well as for the ordinary requirements of commerce, is to

* From an address by Mr. James B. Forgan to the Texas Bankers' Association.

IN THE UNITED STATES

invest boards of experienced men with some measure of power to control the expansion of bank credits, and in particular with the power to regulate the issue of bank-note currency. In each of these countries the regulation of the credit situation is effected by means of a large central bank, which, subject to Governmental control, is considered charged with general supervision of financial conditions. The systems of banking and currency adopted by the leading commercial nations of Europe differ in various particulars, but all have in common this one feature—a large central bank vested with some measure of power to control the general expansion of bank credits. This control can be exercised by the central bank in the following manner:

(1) By acting as a bank for the discount of commercial paper, and by raising or lowering its discount rate, the central bank, to a certain extent, can regulate interest rates and the expansion of credits throughout the country and the flow of gold to or from the country. It is by this method that the Bank of England regulates the credit situation in England.

(2) By issuing its notes the central bank can prevent a withdrawal of bank reserves for use as circulating currency and a consequent financial stringency, and by diminishing the volume of its outstanding notes it can check over-expansion

THE BANKING AND CURRENCY PROBLEM

when the occasion for the issue of the notes has passed. The central banks of France and of Germany regulate financial conditions by this method as well as by changing their discount rate.

Central Bank Not Practicable in the United States

Many able bankers are of the opinion that in the United States we should secure the necessary central control over the expansion of bank credits, and should provide for the stability of financial conditions by adopting the European plan—namely, by establishing a great central bank.

In order to accomplish the desired purpose by means of a central bank, it would be necessary to create a bank of colossal magnitude and to confer upon it a monopoly of the power to issue bank-note currency. The eminent Senators and Congressmen who constitute the National Monetary Commission will be best able to judge whether it would be politically practicable to secure the enactment of the legislation necessary to establish such a bank. In the opinion of the writer it would be impossible. Our experience with the former Bank of the United States shows that the people of the United States would not consent to the creation of such a central bank. The people could not be convinced that it would be desirable, or that it would be safe to give to any

IN THE UNITED STATES

man or to any set of men the power to control the vast resources of such a bank, and to dominate all the banks and business interests of the country.

However, even if it were practicable to obtain the necessary legislation, it would not be desirable to establish such a great central bank. The practical control of such a bank, as in the case of every successful institution of that kind, would soon pass into the hands of one man or of a very small number of men. Although, to-day, the best man or set of men might be in control, there would always be danger that the control might pass into undesirable hands. And even though provision could be made so that the control of such a bank always would remain in the hands of the wisest, the most honorable, and the most disinterested men, it would not be possible to satisfy the people throughout the country that the vast resources and powers of the bank were used only for the best interests of all the people and without partiality or favor to any section of the country, or to any class or set of people. The administration of such a bank would be a source of endless sectional differences and dissensions, and soon it would become a political issue. The South would want the bank, by means of loans, to help the planters to accumulate and to carry their crops of cotton and tobacco so as to force higher prices. The West would want the bank to

THE BANKING AND CURRENCY PROBLEM

use its resources to enable the farmers to raise the price of corn and wheat. The large money centres would want the bank to help bankers and brokers to carry stocks and bonds when speculation runs high at the stock-exchanges. Claims would be made on the one hand that the bank was unduly favoring the country banks, and on the other hand that it was unduly favoring the banks in the large cities. In every period of financial stringency and of high interest rates, an outcry would come from every part of the country that the central bank should relieve the situation; and if the managers of the bank should deem it unsafe to yield to this outcry by expanding credits still further, their refusal to act would be charged to selfish motives, or to collusion with the so-called money interests of Wall Street. We have not the traditions which in foreign countries have established public confidence in the management of their great central banks and have made them useful and desirable institutions.

A great central bank would be out of harmony with our business habits and our political methods. Centralization of power undoubtedly furnishes an effective means of accomplishing things in business as well as in politics. Results that can be effected easily by an autocrat can be obtained only with difficulty and haltingly by individual effort and

IN THE UNITED STATES

under a system of popular government. But if, in order to preserve our institutions, we must lose some of the advantages of great centralization of power in business as well as in matters of government, the price is not too high.

For these reasons it is submitted that in the United States the central bank plan is not practicable or desirable, and that the desired central regulation should be attained by other methods.

Independent Bank-Note Issues

Divers plans have been proposed for the regulation of the credit situation in the United States by the issue and redemption of notes of the various banks, and it has been argued that, were facilities adequate for the speedy redemption of the notes, satisfactory regulation of the amount of the currency and of the expansion of bank credits would result automatically. The objection to these plans is that they furnish facilities for expansion, but fail to provide against over-expansion and furnish no means of regulating the credit situation.

It has been asserted that in Canada and in Scotland the power to issue credit currency has been given to the several banks without any central control and that in those countries the system has worked well. In all Scotland there are but eight

THE BANKING AND CURRENCY PROBLEM

banks, each having numerous branches, and their aggregate note issues do not exceed fifty million dollars. In Canada there are but thirty-four banks, each also having numerous branches, and their aggregate note issues vary from seventy to a hundred million dollars. Both in Scotland and in Canada the banks act in harmony in carrying out an agreed policy. To argue that because this system of independent bank-note issues works satisfactorily in small and conservative Scotland, with its eight banks under the wing of the great central Bank of England, and in Canada, with its thirty-four banks acting in concert, therefore the same system would work satisfactorily in a country as large as the United States, with twenty thousand independent banks and trust companies, including seven thousand National banks having deposits of more than five thousand million dollars and already having outstanding bank-notes amounting to about six hundred million dollars, exhibits a large measure of optimism and little regard for the judgment of other nations and for the lessons of our own experience.

The great commercial nations of the Old World, England, France, and Germany, have not found it safe or practicable to give to all the banks the power to issue circulating notes as in Scotland and in Canada. Our own experience indicates the re-

IN THE UNITED STATES

sult that would follow were the power to issue additional notes to be given to each of the seven thousand National banks in the United States, free from central control. The result would be that, at all times, each bank, without regard to the general credit situation, would put out as many notes as practicable, and thus there would be injected into the currency a wholly unelastic—that is to say, non-contracting—issue of bank-notes. This is precisely what has happened in consequence of giving to the banks the power of issuing their present bond-secured notes. These notes are redeemable at the will of any holder who wants to redeem them, but by experience we know that individuals do not present bank-notes for redemption, and that the banks always are trying to keep them in circulation. The same result would follow if the banks were authorized to issue credit notes, or any other form of bank-note currency that has been proposed, free from intelligent central control.

As has been pointed out, facilities for obtaining the redemption of bank-notes would not prevent the substitution of notes for lawful money in circulation, but would prevent only the accumulation of notes in the vaults of the National banks. The amount of notes in circulation would increase as long as the banks could issue notes and as long as there was lawful money in circulation that could be superseded

THE BANKING AND CURRENCY PROBLEM

by bank-notes and collected in the bank reserves. The desired elasticity of the currency would not be brought about until practically all the lawful money in circulation was collected in the banks, only bank-notes remaining in circulation. This is the situation in Canada. The reason why the note issues of the Canadian banks contract as well as expand with the demand for circulating currency is that practically all the gold has been driven out of circulation into the banks, while only bank-notes, subsidiary silver coin, and small Government notes are used as circulating currency.

The Currency Situation in the United States

According to the report of the Comptroller of the Currency for 1907, the aggregate amount of gold coin in the United States on December 31, 1906, was \$1,593,300,000, of which \$1,081,500,000 was held in the United States Treasury (principally against gold certificates) and in the National banks, and \$511,800,000 was in circulation. In the revised estimate of the director of the mint, on August 1, 1907, the estimates previously published as to the amount of gold coin in circulation appear to have been reduced \$135,000,000. Of necessity any statement as to the amount of gold actually in circulation must be a mere estimate or guess. The

IN THE UNITED STATES

coin in circulation cannot be counted, and the reports of the mints are not conclusive, as a considerable amount of gold coin is consumed in the arts or is carried out of the country. The paper currency and silver in circulation are subject also to gradual diminution through destruction and loss; but not much silver coin is consumed in the arts or carried out of the country, as the bullion value of silver dollars is only about one-half their coin value.

The annual report of the Comptroller of the Currency contains a table purporting to set forth approximately, as of December 31, 1906, the stocks of gold, silver, and uncovered paper currency, and the amounts *per capita* in the principal countries of the world. The method of determining what portion of the paper currency in each country was uncovered is not explained, and it is not probable that in each case the same method was adopted. The amount of gold in circulation in the United States, certainly, was largely overestimated, and the amount of uncovered paper (being the National bank-notes and Government notes, less the coin reserved for their payment,) appears to have been understated. Nevertheless, the figures furnished in this table indicate:

(1) That in the United States the currency contains a smaller percentage of gold and a larger

THE BANKING AND CURRENCY PROBLEM

percentage of silver and paper than the currency in the United Kingdom, France, and Germany;

(2) That in the United States the volume of uncovered paper currency is larger in proportion to the volume of gold and also larger *per capita* of population than in any of those countries; and

(3) That in the United States the percentage of the currency that does not consist of gold, but is declared legal tender and must be kept at a parity with gold, is larger than in any of those countries.

If power were given to the individual banks in the United States to issue additional bank-notes, free from central control, each bank would issue and keep outstanding as many as practicable of these notes, and, for the reasons given in the preceding pages, the result would be to substitute bank-notes for legal reserve money in circulation and correspondingly to increase the bank reserves. The increase of the bank reserves effected in this manner would not of itself be harmful, but the ultimate consequences might be very serious. In the United States there are twenty thousand banks and trust companies, and each of these institutions, acting in its own interest without regard to the general credit situation, habitually makes loans and discounts and expands deposit liabilities to the utmost practicable extent whenever profitable. Judging

IN THE UNITED STATES

by past experience, if through an issue of bank-notes the bank reserves should be increased, the banks would compete in expanding credits and in increasing loans and discounts to the utmost practicable extent, thereby causing interest rates to become excessively low. As a consequence, gold would be exported to countries where interest rates are higher and where the gold can be employed more profitably, while in the United States speculation would be stimulated and bank credits would be expanded until the reserves held by the banks and their power to grant credits shall have adjusted themselves according to the demand for credits.

It may be urged that very low interest rates (which, however, would be only temporary) and exports of unnecessary gold would do no harm, and that it is sound economy to carry on the business of the country with as little gold as possible. It may be profitable, but it is not safe. The United States is the richest country in the world, and it can afford to use in its currency, relatively, as much gold and as little paper and silver as any other country, if, by so doing, it will increase the safety and stability of the general financial condition. To-day, in the United States, relatively less gold and more silver and paper are used than in any of the other great commercial countries, although financial conditions are far less stable than

THE BANKING AND CURRENCY PROBLEM

in those countries. It would not be prudent still further to diminish the percentage of gold in our currency in order to save the use of a comparatively small amount of gold as a circulating medium, for this could be done only by substituting silver or notes for the gold. The immediate effect would be to cause an inflation of bank credits, and the ultimate effect would be to render less secure the maintenance of the gold standard of value and to weaken the foundation of the whole structure of bank credits in the country.

Regulation by Taxation

Plans also have been proposed to regulate the banking and currency situation by authorizing the National banks, in case of emergency, to issue additional notes for use as currency, upon payment of a high tax imposed to prevent the banks from issuing the additional notes except during a period of severe money stringency. These plans are supposed to follow a German precedent which has worked with marked success, the Imperial Bank of Germany being allowed to issue its notes in excess of a prescribed limit, only upon payment of a tax at the rate of 5 per cent. per annum.

That these plans follow the German precedent is an error. If the German system were adopted,

IN THE UNITED STATES

no doubt, we should have sounder financial conditions in the United States than exist to-day; but the merit of the German system does not lie in the imposition of a 5-per-cent. tax on outstanding bank-notes. It lies in the adherence to sound banking methods and in the control of the banking situation by the Imperial Bank. The Imperial Bank is a great central bank controlled by the Government, and is vested with the power as well as with the duty to regulate and to protect financial conditions throughout the empire. It commonly holds reserves amounting to 40 per cent. of its aggregate deposit liabilities and note issues. Even in times of money stringency, the uncovered note issues of the German banks, both absolutely and *per capita* of population, are less than one-half as large as the uncovered note issues of the National banks outstanding at all times. Furthermore, never under any circumstances can the Imperial Bank issue notes to an amount exceeding three times the amount of coin held in its reserves.

The only effect of taxation upon bank-note issues is to render them expensive and to prevent the banks from issuing notes before interest rates have become high. But the prevalence of a high rate of interest in Wall Street, which probably would induce the issue of notes, would afford no test or

THE BANKING AND CURRENCY PROBLEM

indication of the probable safety of an issue of more notes or of a further expansion of credits. At best, a highly taxed issue of bank-notes is a so-called "emergency circulation" available only in times of stress and panic. It is of no avail as a means of preventing a money stringency and possible panic. It does not furnish a means of increasing the bank reserves or of restraining the banks from unduly expanding credits in times when money is easy, so that they may be able to reduce their reserves or to expand their credits when a period of stringency is threatened. Taxation does not add in the least to the security of bank-notes or to the ability of the banks to pay their depositors and note-holders in lawful money on demand.

The Aldrich-Vreeland Act was passed May 30, 1908, as a temporary measure of protection against severe money stringencies or panics that might occur prior to the enactment of a permanent measure pursuant to the recommendations of the National Monetary Commission. Therefore, this Act should not be criticised as though it were designed to be a permanent addition to our currency laws. However, it is proper to observe that the Act furnishes no means of regulating bank credits, and that it contains no provisions intended to prevent the over-expansions of credit which cause money

IN THE UNITED STATES

stringencies and panics. The Act authorizes the National banks, under certain conditions, to issue additional notes upon payment of a tax upon such notes when in circulation, at the rate of 5 per cent. per annum for the first month with a monthly increase at the rate of 1 per cent. per annum for each subsequent month until the rate of the tax shall have reached 10 per cent. per annum. The Act includes no provision for increasing the bank reserves during periods of easy money, nor any inducements to the banks to hold back part of their power to grant credits for use in times of money stringency or panic. At best, the Act is a measure to mitigate money stringencies and panics *after the event*.

The apparent purpose of the Act was to enable the banks to avoid a depletion of their reserves and the resulting violent contraction of their credit power when depositors withdraw a large amount of lawful money for use as a circulating medium or to be hoarded. These, however, are not the only conditions under which the banks can issue notes under the Act. The banks are enabled to issue the notes in case of any severe money stringency, though resulting from an expansion of credits beyond the limit of safety. The banks can issue the notes whenever the prevailing interest rate shall be so high that they can afford to pay the tax

THE BANKING AND CURRENCY PROBLEM

imposed by the Act rather than to diminish their reserves and curtail their loans.

Regulation by Government Note Issue

It has been argued persistently that the issue of notes for use as currency, like the coinage of the precious metals, is a Governmental function that should be exercised exclusively by Government, and that it should not be delegated to the banks. It also has been urged that financial conditions can be regulated adequately through the issue of Government notes. The answer to these contentions is that it is not true that the issue and redemption of Government notes to supply and to regulate the currency ever has been considered by any nation to be a Governmental function, and that it would be wholly impracticable to regulate financial conditions by the issue and redemption of Government notes. No nation ever has resorted to an issue of Government notes, except in times of stress and trouble and low national credit, and invariably such issues have proved in the end a source of trouble and danger. Our own Government notes were issued in war times, and subsequently caused untold financial troubles and losses to the people of the United States. At present these notes have been rendered innocuous by the

IN THE UNITED STATES

limitation of their issue and by the Government's pledge to redeem them on demand in gold and to maintain a large reserve of gold for that purpose. To extend the issue of such notes would be to invite a return of the financial evils from which, for more than ten years after the war, the country grievously suffered.

How could an issue of Government notes be made elastic, so as to contract when contraction is necessary for the safety of the credit situation of the country? How could an issue of Government notes be used as a means of regulating the general credit situation? How could it be used, when interest rates are very low, as a means of preventing the over-expansions of credits which cause subsequent money stringencies and panics? The present volume of Government notes and National-bank notes is excessive in dull times. Is it proposed in dull times to redeem and cancel some of the existing Government notes and National-bank notes? If not, then an issue of more Government notes would mean only further expansion. But, even if regulation were possible by the issue and redemption of Government notes, can any one having the least familiarity with actual conditions and with the teachings of history believe that it would be safe and wise to vest in the Government a discretionary power to increase or to diminish the currency of the

THE BANKING AND CURRENCY PROBLEM

country, so that the amount of the currency and the expansion of bank credits, from time to time, would be dependent wholly upon the will of the President or of the Secretary of the Treasury?

This plan suggests other questions that demand consideration. How would the Government put its notes out? It could not give them away. Either it must suspend the levying of taxes and pay its debts by issuing its own promissory notes, or it must lend its notes to the banks. On what terms and on what security would the Government lend its credit to the banks; and with seven thousand clamorous National banks, how could this be done without favoritism?

Again, would the Administration be empowered to issue notes without limit? If not, how would the limit be fixed?

It is assumed, of course, that the Government notes would not be irredeemable fiat money, but that they would be payable on demand in gold. Then the Government, at all times, would have to maintain an adequate reserve of gold, and be prepared to pay in gold all notes as presented. How would the Government obtain the supply of gold as needed?

Does any one believe that it would be wise to inject such questions into party politics? In view of the financial heresies that sometimes have pre-

IN THE UNITED STATES

vailed and still are extant, and in view of our political methods, any plan of issuing additional Government notes in the United States, even under the most careful original safeguards, would produce endless uncertainty and political agitation, and inevitably would tend to financial disaster.

The European System of Commercial Credits

It has been asserted that, in large part, the stability and the safety of financial conditions in Europe are due to the European system of commercial credits, and that satisfactory financial conditions cannot be secured in the United States except by the adoption of a similar system.

In Europe, when a merchant buys goods on credit from another merchant, or from a manufacturer, in many cases the seller of the goods draws for the price either upon the purchaser, if the latter has an established credit, or upon bankers with whom the purchaser previously has arranged that they shall lend him their credit up to a certain amount by accepting bills drawn for the price of goods bought in the course of his business. In such case the purchaser undertakes to furnish the bankers with funds for the payment of their acceptances when due, and sometimes the goods and their proceeds are pledged as security. Foreign

THE BANKING AND CURRENCY PROBLEM

bills commonly are drawn upon bankers, with the documents for the goods attached. Such a bill of exchange, bearing the name of an undoubtedly good acceptor in addition to the name of the drawer, can be sold readily to a bank at the current rate of discount, and the drawer of the bill is enabled thus to obtain funds if desired prior to the maturity of the bill.

In the United States the practice generally is different. When a merchant buys goods on credit the seller does not draw upon the purchaser or upon bankers for his account, nor does the purchaser give his note for the price of the goods. Usually the seller contents himself with an account receivable payable after thirty days or more. The seller receives no commercial paper, and if he should need funds before maturity of the book account he must borrow from the banks upon his paper, with or without accommodation indorsement. If, in order to obtain the benefit of trade discounts for prompt payment, the purchaser should desire to pay cash, he would commonly borrow the necessary funds upon his own note.

The European system undoubtedly has advantages over the American system. The seller of goods is safer, because he receives commercial paper bearing the name of an acceptor of high credit, and this paper can be discounted without

IN THE UNITED STATES

difficulty. For the same reason the several banks which discount such paper also are safer. Furthermore, though the European system of commercial credits involves the creation of bank credit in the same amount as the American system, it is better for the general credit situation. This is so because commercial paper created under the European system is a more salable asset in the hands of the banks than the single name or accommodation paper created under the American system. The several banks can carry smaller reserves in Europe than in the United States because, in case of need, such commercial paper can be rediscounted readily either at their central bank at home or in the large commercial centres of Europe.

There are several reasons, however, why this European system of commercial credits is not available as a means of preventing the financial disturbances which often occur in the United States. One reason is that this system is not in accordance with our business methods and habits, and it is not practicable, by legislation, to revolutionize the business methods and habits of the people. Another reason is that it is doubtful whether the introduction of this European system would have a far-reaching effect, inasmuch as the legitimate commercial credits granted by the banks in the United States are not the principal source of danger to the

THE BANKING AND CURRENCY PROBLEM

general credit situation. A third reason is that the principal advantage of the European system can be obtained only after establishing more stable financial conditions and more stable interest rates, so that the holders of commercial paper may be sure of a ready market for such paper at a reasonable rate of discount.

The European system of commercial credits is the result, and is not the cause, of stable financial conditions. In the United States the first step should be to secure reasonable stability of credit conditions and of interest rates by providing the necessary central regulation. After securing such necessary stability, it is probable that the more desirable credit methods used in foreign countries would be adopted in the United States, and New York, like London and Berlin, would become a market for international commercial credits.

Guarantee of Bank Deposits

It has been proposed to tax all the National banks ratably, according to their deposits, to provide a guarantee fund for the prompt payment of the depositors of every broken bank; and it has been asserted that the adoption of this plan would give to bank depositors such confidence that there would be no more runs upon banks and no more financial

IN THE UNITED STATES

panics. Although during the last presidential campaign this plan was made an issue, and was rejected by popular vote, its merits should be considered without regard to party politics or party feeling.

Many have been induced to look with favor upon this plan to guarantee bank deposits because they have been assured that it would protect innocent people who have deposited their savings in the banks, and that in order to bring about a result so beneficent all banks could well afford to pay a small tax upon deposits. It should be borne in mind, however, that only a small percentage of the so-called deposits of the National banks are savings deposits or represent any deposit of money. The larger part of these so-called deposits represent merely exchanges of credits for business purposes between the banks and their so-called depositors. Such transactions are perfectly honest and proper, but it is absurd to assume that these exchanges of credit between business men and the banks are so highly meritorious that the Federal Government should exercise paternal care for their protection by establishing a system of compulsory insurance at the expense of the banks, and by requiring the sound and conservative banks to pay the losses of those people who choose to deal with unsound and reckless banks.

The aggregate losses suffered by the depositors of

THE BANKING AND CURRENCY PROBLEM

failed National banks by reason of the *ultimate* insufficiency of their assets to pay off depositors in full have been very small—less than one-twentieth of one per cent. They have been infinitesimal compared with the losses of the people through bad debts, fraud, speculation, gambling, indulgence in drink, and other causes largely preventable and equally deserving of the paternal attention of the Government. If, however, it should be deemed of paramount importance to establish a system of compulsory insurance for the protection of savings depositors, the proper course would be to confine this system strictly to savings deposits, and to pay for the insurance out of the interest which otherwise would be paid by the banks to the depositors. The first step in that direction would be to authorize the National banks to establish separate savings departments, to be managed under the supervision of the Comptroller of the Currency according to the most approved methods of managing savings-banks.

The whole plan for the guarantee of bank deposits is the result of a confusion of ideas and of a misconception as to banking processes. Though by a guarantee, or insurance fund, it might be possible to protect the depositors of failed banks against the small ultimate losses that may appear upon final winding up of the banks, it would be

IN THE UNITED STATES

absolutely impossible to assure such a sufficiency of cash reserves that the depositors of every suspending bank would receive payment promptly on demand.

If the plan be to insure prompt payment of the depositors of a bank immediately upon its failure, and not merely to make good any ultimate losses of depositors upon the final winding up, the amount of cash necessary would be simply enormous. The money contributed by the banks to the insurance fund either would be locked up by the Government, or it would be invested in securities, or it would be redeposited in the banks. If the money were locked up by the Government the effect would be in exactly that amount to reduce the bank reserves, with the consequent larger reduction of the power of the banks to make loans and grant credits. In other words, the reserves of the banks and their power to grant credits would each be reduced. If the money were invested in securities and thus returned to circulation, the securities could be reconverted into cash only by sale, and in that event the purchase money would be drawn from the banks, thereby again diminishing their reserves and their credit power; a result most likely to happen at the very time when the banks could least afford to diminish their reserves or to contract their credits. Finally, if the money contributed to the

THE BANKING AND CURRENCY PROBLEM

guarantee fund were to be redeposited in the banks, the only change in the situation would be that the banks would have exactly the same reserves as before, but subject to calls upon their reserves in order to pay off the depositors of any banks that may fail. At best, therefore, the plan would operate as a compulsory pooling of part of the reserves of the banks—the reserves of the prudent and sound banks to that extent being made subject to calls for the payment of depositors in banks that are unsound or badly managed.

What, then, would be the effect of the plan? In good times and with prosperous business the weaker and speculative banks would be encouraged to expand their credits and to increase their loans, but in times of stringency and threatened trouble the strong and conservative banks would be forced to contract credits and to refuse accommodation to their customers because of the necessity of maintaining and building up their reserves to meet demands for cash to pay off depositors of failing banks. (In times of money stringency and threatened trouble the strong banks would be forced to be doubly conservative because they would have to be prepared to meet unknown demands, the amount of which they could not foresee, and against which the utmost caution and foresight would not protect them. The tendency of the plan, there-

IN THE UNITED STATES

fore, would be to cause expansion of bank credits when conservatism is desirable, and to cause contraction of bank credits when credit is most needed to prevent panic and disaster. 7

No guarantee fund, nor any system of insuring bank depositors, can possibly furnish a substitute for cash reserves. At best the plan would be but an illustration of a man trying to lift himself over a fence by his own boot-straps. The plan would not increase the bank reserves by one dollar, and would not in the least strengthen the general banking situation. It would weaken the strong banks far more than it would strengthen the weak banks. It would tie all the banks together, the good and the bad, so that in the event of great stress and trouble all would be likely to fall together in one general ruin.

The assumption that the proposed guarantee of bank deposits would give to depositors such confidence that there would be no more runs upon banks, and therefore no more bank panics, also is unfounded. Runs upon banks by small depositors who wish to draw out cash for hoarding are not the principal causes of bank suspensions. If people cease to make new deposits in a bank, or if the larger depositors deliver their checks to other banks for collection, it may be forced to suspend, though there be no visible run of depositors. But

THE BANKING AND CURRENCY PROBLEM

what reason is there to assume that the adoption of this plan would inspire confidence and prevent runs upon banks? As already indicated, the adoption of the plan would not in the least increase the ability of the banks collectively to pay depositors on demand, or strengthen the general situation, and it would result in tying all the banks together, so that in times of stress and trouble all would have to suspend. The utmost possible of accomplishment would be to insure that, upon final winding up, the depositors of the unsound banks would be paid in full at the expense of the sound banks. Would the belief of depositors that in case of the failure of their bank they will get their money in a year or more, and that in the mean time general financial disaster may overwhelm the country, be likely to prevent them from trying to get their money as soon as possible?

But even if it were true that the adoption of this plan would make equally safe all deposits in National banks, thereby inspiring confidence in all National bank deposits, the plan would prove a direct encouragement to "wildcat" banking, and ultimately would prove disastrous. It would enable speculators or inexperienced persons to form a bank with small capital, and on the strength of this guarantee to obtain large deposits by offering to allow rates of interest higher than could be

IN THE UNITED STATES

afforded by a conservatively managed bank; and then they could use these deposits in promoting speculative or unsound ventures. They would risk the loss of only the small capital which they contributed and their individual liability for an equal amount. Should their speculations succeed they would reap large profits, but if their speculations should fail and the money obtained from depositors be wasted, the loss would fall upon the sound banks.

State Banks and Trust Companies

The report of the Comptroller shows that in June, 1907, there existed in the United States 19,746 banks and trust companies, classified as follows:

	Number.	Capital.	Individual Deposits.
National banks	6,429	\$883,700,000	\$4,322,900,000
State banks	9,967	471,663,037	3,068,649,860
Trust companies	794	276,146,081	2,061,623,035
Savings-banks	1,415	34,224,322	3,495,410,087
Private banks	1,141	25,144,822	151,072,225
Total	19,746	\$1,690,878,262	\$13,099,655,207

In addition, there were numerous non-reporting companies and firms doing a banking business, some of them receiving large deposits and engaging in banking operations on a large scale.

It has been urged that the failure of one or of a

THE BANKING AND CURRENCY PROBLEM

few of the large State banks or trust companies may precipitate a general panic involving all the banks and trust companies in the country, and that, therefore, no sound system of banking and currency can be established in the United States unless the various State banks and trust companies, as well as the National banks, are subjected, by Act of Congress, to some system of uniform inspection and regulation.

In the opinion of the writer, this view is not well founded. The serious financial troubles in the United States have not been due to dishonesty or bad judgment in the management of individual banks or trust companies. They have been due to the absence of intelligent central regulation of the general credit situation, and to the absence of a central power to provide for unexpected demands for currency and for unexpected strains upon the general banking situation. Without this central regulation and control no system of uniform inspection and regulation of the several banks and trust companies would render the banking situation safe. Undoubtedly the existence of diverse State banks, trust companies, and private banking firms emphasizes the necessity that some central authority shall be established with power to regulate and to protect the general banking situation; but foreign experience shows that where such a central

IN THE UNITED STATES

power exists, the individual banks, in great measure, can be left to take care of themselves, and that close regulation of the individual banks is not necessary to insure the safety of the general credit situation. In England there are many joint stock banks which, though doing an enormous volume of business, are subject to very little regulation and many private banking firms that are subject to no regulation at all. Yet it has been found practicable, through the Bank of England, to keep the general financial situation sound and safe, and to meet extraordinary conditions, like those caused by the failure of the great international house of Baring Brothers & Co. Similar conditions prevail in France and Germany.

By the establishment of a central agency empowered to regulate the issue and redemption of currency by the National banks, the general expansion of credits could be regulated and the safety of the general banking situation could be insured without subjecting the State banks and trust companies to National regulation. Under such circumstances the regulation of the individual affairs of the several State banks and trust companies and private banking firms would not be a matter of National concern. It is believed that the plan herewith submitted would furnish a means of regulating and protecting banking conditions through-

THE BANKING AND CURRENCY PROBLEM

out the country as effective as that existing in Germany, and a method much more effective than the English system.

Grave constitutional and practical difficulties would embarrass any attempt to regulate the entire banking business of the United States by Act of Congress. The Constitution does not confer upon Congress power to regulate the banking business, nor does it confer upon Congress power to regulate corporations. Therefore, any National legislation for the regulation of the banking business, or for the regulation of banking corporations organized under State laws, could be sustained only so far as such regulation should constitute a proper exercise of some other power expressly vested in Congress by the Constitution. The Act of Congress imposing a tax of 10 per cent. on State bank-notes was sustained by the Supreme Court, partly as an exercise of the taxing power of the Federal Government and partly as an incident to the power of Congress to coin money and to issue bills of credit. Possibly the Supreme Court might sustain legislation prohibiting all banks, except those regulated by Act of Congress, from engaging in transactions directly connected with interstate commerce, and possibly the Supreme Court might even sustain legislation affecting the right to use bank checks and drafts in interstate commerce, on the ground that such

IN THE UNITED STATES

legislation would be an exercise of the power of Congress to regulate interstate commerce; but there appears to be no basis for sustaining the constitutionality of an Act of Congress regulating the business of receiving deposits and of making loans or discounting paper.

The proposal indirectly to regulate the banking business through the taxing power should not be countenanced, for it would evade the spirit of the Constitution, even though the courts should feel obliged to uphold such legislation because of their unwillingness to scrutinize the reasonableness of a tax or the motive of Congress in imposing it.

Though it may be desirable to subject all the State banks and trust companies to uniform National regulation, it is to be borne in mind that there are also many other subjects which it would be desirable to regulate by uniform National legislation, but under our system of Constitutional government such legislation is impossible. Any attempt to prohibit the banking business under State laws or to subject the State banks and trust companies to National regulation would involve serious constitutional and practical difficulties, and in most of the States probably would meet with popular disapproval.

THE BANKING AND CURRENCY PROBLEM

How Central Regulation can be Secured

If the views herein expressed are correct, no safe and sound system of banking and currency is possible without some central agency having power to control the expansion of bank credits in the aggregate in relation to bank reserves in the aggregate, and power also to protect the general credit situation in case of an unexpected strain upon the banks by the withdrawal of large sums from their cash reserves.

In England the necessary central control and protection are obtained through the Bank of England by raising or lowering its discount rate. By raising its discount rate the bank, to some extent, can raise the current interest rate in the London market, and thereby can limit the expansion of credits and cause gold to flow to England, thus increasing the bank reserves. The Bank of England cannot control or protect the credit situation by means of note issues. Except as to about ninety million dollars of notes issued against Government securities, the Bank of England cannot issue notes without receiving and holding in its issue department an equal amount of gold, so that the issue and redemption of Bank of England notes does not affect the volume of currency in the country or the reserves of the bank against de-

IN THE UNITED STATES

posit liabilities incurred in its discount department.

The great prestige and power of the Bank of England are based largely upon long-established traditions and business habits. In the United States no additional legislation would be required to establish such a bank, except to constitute it the sole depository of Government moneys. The fact that no such bank has been created in the United States is some indication that such a bank would not be in harmony with our institutions and that it could not be established.

But, even though it were practicable to create here a central bank with the prestige and power of the Bank of England, the English system would not prove adequate in a country as large as the United States, or in a country in which the demand for bank credits and the demand for currency as a circulating medium fluctuate as widely and as rapidly as in the United States. Unless the portion of the country's banking power concentrated in the central bank were larger than in England, any attempt to regulate bank credits and reserves by changing the discount rate of the central bank would prove ineffective and certainly would be too slow. Even in England the English system, probably, would not have proved workable if England were not largely a creditor nation and London a

THE BANKING AND CURRENCY PROBLEM

clearing-house for commercial credits throughout the entire world. A change in the discount rate of the Bank of England has an immediate and marked effect upon the entire volume of international drafts drawn upon the English banks. Even in England this system has not always proven adequate, as is shown by the fact that on several occasions it became necessary to suspend the Bank Act and to authorize the Bank of England to issue its notes without adding a corresponding amount of gold to the reserve in its issue department, and on several occasions the Bank of England found it necessary to obtain assistance by borrowing gold from the Bank of France.

The most effective and the most rapid means of regulating and protecting the general credit situation is by increasing or diminishing the volume of outstanding bank-note currency not covered by a reserve of gold or other lawful money. This method is that used successfully both in France and in Germany. The Bank of France and the Imperial Bank of Germany to some extent regulate credit conditions by acting as central banks of discount; but their most effective action is by increasing or diminishing the uncovered amount of their outstanding notes. When additional currency is needed as a circulating medium they supply this currency by issuing notes. When contraction of

IN THE UNITED STATES

the currency, or a check upon the further expansion of bank credits, is desirable, they accomplish the result by diminishing the volume of their outstanding notes and by raising the discount rate.

Plan for Central Regulation in the United States

The problem, then, is to establish some central agency having power to control the volume of uncovered bank-note currency in the United States without creating a central bank vested with a monopoly of the power to issue bank-notes and able to dominate all the banks in the country.

In substance, the plan now submitted is to authorize the National banks to issue notes upon their joint credit and to control the uncovered amount of these notes by the joint action of the Secretary of the Treasury and of a managing board, or committee, elected by the banks.

To carry out this plan, an Act of Congress should be passed authorizing the National banks to form an association, subject to terms and conditions prescribed in the Act, for the sole purpose of issuing notes upon their joint credit. The association should have no capital and should not have power to receive deposits. It should be simply a joint agency of the associated banks, like a large clearing-house association. The association should become

THE BANKING AND CURRENCY PROBLEM

operative when banks having a fixed aggregate capital stock of not less than two hundred and fifty million dollars shall have become members, but all National banks should be entitled at any time to join the association.

The banks constituting the association should elect a managing board, or committee, consisting of fifteen to twenty-one experienced bankers or business men familiar with general conditions and with financial operations, and this managing board should control the affairs of the association. However, as the entire community is interested in the character of the currency and in the stability of financial conditions and of interest rates, no action of the managing board affecting the volume of outstanding notes, or the percentage of the redemption fund for the payment of the notes, should be effective until approved by the Government through the Secretary of the Treasury. The Comptroller of the Currency should be, *ex officio*, a member of the managing board of the association.

The elected managers of the association should hold office for three years, and should be classified so that one-third shall be elected annually. Each bank should have one vote for each \$25,000 of its capital stock for each manager to be elected and should have power to cumulate its votes. To fix the votes of the several banks according to their

IN THE UNITED STATES

capital stock would be fair and would prevent any particular class of banks from controlling the association, as is shown by the following figures taken from the report of the Comptroller for 1907:

Capital.	Number of Banks.	Aggregate Capital.
Less than \$50,000.....	2,063	\$54,322,000
\$50,000 and not over \$250,000.....	3,304	232,250,920
Over \$100,000 but not over \$250,000....	741	135,379,585
Over \$250,000 but not over \$1,000,000...	472	250,026,920
Over \$1,000,000 but not over \$5,000,000..	64	139,080,700
Over \$5,000,000.....	6	84,000,000
Aggregate of all kinds.....	6,650	\$895,060,125

Branches and Agencies

The principal office of the association should be in Washington, and the association should be required to establish a branch or agency for the issue and redemption of notes in each city in which there is a United States sub-treasury. The association should be permitted to establish branches and agencies wherever the board of managers may deem advisable, either for the issue and redemption of notes or only for the redemption of notes. It should be the duty of the association, within two years after it has commenced operations, to establish a branch or agency for the redemption of notes in every city of the United States having a population of one hundred thousand persons.

THE BANKING AND CURRENCY PROBLEM

Meetings of the Board of Managers, etc.

The managers of the association should hold their meetings at the principal office in Washington, or at other places approved by the Comptroller of the Currency. Regular meetings of the board should be held monthly, and there should be an executive committee of three residing in Washington and holding daily meetings. The executive committee, upon receiving the approval in writing, or by telegraph, of a majority of all the members of the board, should have power to act for the whole board upon any proposal to increase or to diminish either the authorized volume of notes or the percentage of the redemption fund.

The board of managers should have power to appoint such committees, officers, and agents as they may deem advisable for the management of the association and its several branches and agencies.

Limit of Note Issues under Plan

Each bank, being a member of the association, should have a right to take out and to issue notes up to an amount which, including its present bond-secured notes, shall not exceed its capital stock. With the approval of the Secretary of the Treasury, the managing board should have the power from time to time to increase, ratably as to all banks, the

IN THE UNITED STATES

authorized amount of their note issues, and thereafter to reduce any such increase that may have been authorized; but this power to increase the authorized amount of the note issues should be limited to some fixed percentage of the capital stock of the banks. No bank should be authorized to take out notes unless its capital stock be wholly paid up and unimpaired, nor if it be in default in depositing and keeping up its note-redemption fund or in the payment of any sum due to the association. The notes should be prepared by the association, under the supervision of the Comptroller of the Currency, and every act of the association should be subject to the supervision of the Comptroller.

Redemption Funds under the Plan

Each bank having taken out notes should be required to keep on deposit with the association, as a redemption fund for their payment, a sum of lawful money equal to 20 per cent. of such notes, or such greater per cent. thereof as from time to time may be prescribed by the board of managers and the Secretary of the Treasury. The note redemption funds of the several banks should be administered by the board of managers, under the supervision of the Comptroller of the Currency.

THE BANKING AND CURRENCY PROBLEM

Upon taking out notes, each bank would be required to deposit in its note-redemption fund the prescribed sum of lawful money. Whenever, because of the payment of notes of a bank out of its redemption fund, or because of an increase of the prescribed percentage of the redemption funds, the redemption fund of any bank shall fall below the percentage then prescribed by the board of managers and the Secretary of the Treasury, the bank, upon call of the board of managers, should be required to deposit such sum as may be necessary to make up the deficiency. However, in order to avoid needless multiplicity of calls upon the banks, the board of managers should not be obliged to call upon a bank to make up a deficiency amounting to less than 3 per cent. of the outstanding notes of the bank.

The great function of the board of managers, in conjunction with the Secretary of the Treasury, would be, from time to time, to fix the authorized limit of the note issues of the several banks (if any increase beyond their capital stocks be authorized) and to fix the amount of lawful money to be deposited with the association for the redemption of the notes.

This power of the board of managers, in conjunction with the Secretary of the Treasury, to increase or to diminish the percentage of the note-redemption funds, would enable them to regulate the

IN THE UNITED STATES

uncovered volume of the notes outstanding and to give stability to financial conditions generally. It is here to be borne in mind that it is not the nominal amount of outstanding bank-notes that counts, but only the portion of the notes that is not covered by a redemption fund or reserve of legal-tender money. The issue of \$1,200,000,000 of bank-notes against a reserve of 50 per cent. (or \$600,000,000) has no greater effect in expanding the currency and the credit power of the banks than the issue of \$631,578,947 of bank-notes with a redemption fund or reserve of 5 per cent. In each case the net increase of the currency would be \$600,000,000, that being the amount of notes not covered by the redemption fund or reserve of lawful money.

However, there are advantages in using a large note issue with a large percentage of reserve rather than a small note issue with a small percentage of reserve, partly because the use of bank-notes is more convenient than the use of gold and saves loss by abrasion, and partly because the use of notes covered by a large reserve renders it comparatively easy to expand the currency in case of a sudden demand by reason of a panic or other cause. Thus, with a reserve of \$600,000,000 against outstanding notes amounting to \$1,200,000,000, it would be practicable, in case of need, to empower the banks to issue \$600,000,000 of

THE BANKING AND CURRENCY PROBLEM

additional notes against this reserve by reducing from 50 to $33\frac{1}{3}$ per cent. the required percentage of the reserve, whereas no such increase could be brought about with safety if there existed only a reserve of \$31,578,947 against \$631,578,947 of notes already outstanding.

Separate Reserves for the Notes

Under the present system in the United States the only special reserve for the outstanding National-bank notes is the 5-per-cent. redemption fund deposited with the Government, and this 5-per-cent. redemption fund is counted also as part of the minimum reserves of the banks against deposit liabilities. In fact, each bank's general reserve against deposit liabilities, together with any money in its 5-per-cent. note-redemption fund, constitutes the bank's reserves for the payment of its notes as well as its deposit liabilities, but the 5-per-cent. redemption fund deposited with the Government is not available as a reserve for the deposit liabilities until the notes shall have been paid.

For several reasons this system is bad. A reserve of 5 per cent. would be utterly inadequate for an elastic issue of bank-notes—that is to say, an issue that can be contracted as well as expanded and that can be regulated according to the

IN THE UNITED STATES

requirements of the general financial situation. Under the present system the 5-per-cent. redemption fund has proved adequate only because the volume of the outstanding bank-notes is not elastic and does not fluctuate rapidly, but constitutes what has been described as a "sodden mass" added to the currency of the country. If, however, the general reserves of the banks, together with the redemption funds, be considered as reserves for the outstanding notes and the deposit liabilities combined, the present system in the United States is bad, because it establishes no relation between the reserves of the banks and their outstanding note issues. Under such a system no intelligent regulation is practicable.

As has been observed, the amount of the reserve that should be held by each individual bank, without considering the general credit situation, depends upon the nature of the deposit liabilities and assets of the particular bank, and upon its entire business. A ratio of reserve to deposit liabilities that would be adequate for one bank might be wholly inadequate for another. It would be utterly impracticable by any central authority intelligently to fix and regulate the reserve which should be kept by each of the seven thousand individual banks. The percentage of the reserve of each individual bank in relation to its

THE BANKING AND CURRENCY PROBLEM

deposit liabilities can be regulated intelligently only by the managers of the bank. To regulate the general credit situation from time to time, by increasing or by diminishing the minimum reserve requirements of all the banks in relation to their deposit liabilities, would involve the application to all the banks of a uniform rule upon a subject which ought not to be governed by a uniform rule. Furthermore, it would be quite impossible to enforce an order from a central authority directing seven thousand banks to increase the percentage of their reserves by reducing their loans, their discounts, and their deposit liabilities.

The better plan would be to keep separate the reserves for outstanding bank-notes and the reserves for deposit liabilities, and, without attempting to change and to regulate the reserves for deposit liabilities, to regulate the currency and the general financial situation by increasing or by diminishing the volume of outstanding bank-notes and the percentage of reserve for the notes. The percentage of reserve for bank-notes ordinarily should be larger than the percentage of reserve for deposit liabilities, especially if the bank-note issue is elastic and serves its true purpose by contracting and expanding according to financial conditions. There is no reason why all the banks should not

IN THE UNITED STATES

be required to keep a uniform percentage of reserve for their outstanding notes.

Of course, in the case of a central bank there is no reason for separating its reserve for notes from its reserve for deposit liabilities, because the management of the central bank is in a position to determine how much money should be held as a reserve for the outstanding notes and how much as a reserve for the deposit liabilities. Accordingly, the Bank of France and the Imperial Bank of Germany do not separate the reserve for notes from the reserve for deposit liabilities. The Bank of France, with a large note issue and small deposit liabilities, keeps on hand a reserve of about 80 per cent. of its combined notes and deposit liabilities. The Imperial Bank keeps a reserve of about 40 per cent. of its combined notes and deposit liabilities, but it is required to keep in its reserve an amount of coin equal to at least $33\frac{1}{3}$ per cent. of its note issues. The Bank of England, on the other hand, keeps its note-issue department entirely distinct from its general banking department, and keeps a separate reserve for its deposit liabilities.

Operation of the Plan Illustrated

The operation of the plan may be illustrated as follows: Let us assume that the association of

THE BANKING AND CURRENCY PROBLEM

banks has been formed and that all arrangements have been made to commence the issue of notes, the initial percentage of the note-redemption fund having been fixed at 40 per cent. A demand arises for the use of additional currency as a circulating medium to move the crops, or for other cause, and depositors commence to draw lawful money from the bank reserves, thereby compelling the banks to reduce their loans and discounts and to raise interest rates. By taking out and issuing notes the banks can prevent the depletion of their reserves and the necessity of largely contracting their loans and discounts, because for every \$4,000 of gold or other lawful money which they deposit in the note-redemption fund they can issue \$10,000 in notes.

If the banks should put in circulation notes to the aggregate amount of \$300,000,000 against a deposit in the redemption funds of 40 per cent. (or \$120,000,000) of gold or other lawful money, the currency in circulation among the people would be increased \$300,000,000 while the general bank reserves would be reduced only \$120,000,000 by transferring that amount to the note-redemption funds. If the notes had not been issued the banks would have been obliged to pay \$300,000,000 out of their lawful money reserves, but by issuing the notes they have been enabled to avoid paying out more than \$120,000,000. Thus they have saved

IN THE UNITED STATES

\$180,000,00 of reserve money and have prevented a reduction of their credit power to the extent of about \$1,000,000,000, on the basis of the average relation between the deposit liabilities and the reserves of the National banks, or about \$2,000,000,000 on the basis of the average of all the banks and trust companies of the country.

Assume then, that, in consequence of a diminution of business activity, \$200,000,000 of the \$300,000,000 of additional currency thus put in circulation no longer is needed. Thereupon surplus currency, amounting to \$200,000,000, would be deposited in the banks; but, the notes being at a parity with gold and other lawful money, people would not pick out the notes and deposit the whole \$200,000,000 in notes, but would deposit notes and lawful money indiscriminately. If half of the \$200,000,000 of surplus currency so deposited were to consist of bank-notes and the other half of lawful money, and if thereupon the banks should present the \$100,000,000 of notes for redemption in lawful money, then from time to time, as the notes come in for redemption, the board of managers of the association would call upon the banks having outstanding notes to contribute to their redemption funds \$60,000,000 additional gold or other lawful money, the other \$40,000,000 required to redeem the \$100,000,000 of notes having been deposited for

THE BANKING AND CURRENCY PROBLEM

that purpose in the redemption funds at the time of issuing the notes. Upon redemption of the \$100,000,000 of notes there would remain still outstanding \$200,000,000 of notes, and there would be in the redemption fund 40 per cent. of that amount, or \$80,000,000 of lawful money. The general reserves of the banks would have been increased \$100,000,000 by the deposit of that much lawful money.

Increasing bank reserves accompanied by a very low rate of interest and a fall in the cost of foreign exchange, and possibly by exports of gold, would indicate to the board of managers and to the Secretary of the Treasury the need of a further reduction of the increase of the currency caused by the notes remaining in circulation. In that event the board of managers, in conjunction with the Secretary of the Treasury, gradually would increase the percentage of the note-redemption fund from 40 per cent. to, say, 60 per cent. This would require the banks having outstanding notes to take from their general reserves and to deposit in their note-redemption funds \$40,000,000. of additional lawful money, being 20 per cent. of the \$200,000,000 of notes remaining outstanding. The effect would be the same as though the banks had redeemed and cancelled \$40,000,000 of the notes by paying them in lawful money out of their reserves.

IN THE UNITED STATES

The note-redemption fund then would be \$120,000,000 against \$200,000,000 of outstanding notes and the net increase of the currency would be \$80,000,000. If, thereupon, a substantial fall in the percentage of the general reserves of the banks and a rise of interest rates and of the cost of foreign exchange should indicate an increase in the demand for currency as a circulating medium, or in the demand for bank credits, and if there should be no signs of financial disturbances indicating the need of a restrictive policy, the managing board and the Secretary of the Treasury gradually would reduce the required percentage of the note-redemption funds from 60 per cent. to, say, 40 per cent. The banks then could withdraw in whole or in part the \$40,000,000 of surplus in the note redemption funds, thereby again adding that amount to their general reserves, or they could issue additional notes against this surplus. The \$40,000,000 of surplus in the note-redemption funds after such reduction of the required percentage, would be the basis (at 40 per cent.) for the issue of \$100,000,000 of additional notes, or, if withdrawn by the banks and added to their general reserves, would be the basis for about two hundred and fifty million dollars of additional bank credits, according to the average of the National banks alone, or about five hundred million dollars, according to

THE BANKING AND CURRENCY PROBLEM

the average of all the banks and trust companies.

Of course, except in case of a panic, the managing board would not reduce the percentage of the redemption funds to the lowest possible point. In normal times they would always keep the percentage of the redemption funds sufficiently high to furnish a basis for the issue of a substantial amount of additional notes to meet the necessities of a panic or of any other extraordinary contingency. The safest situation would be when there is a considerable note issue with a very high percentage of reserve, as in France. Though the Bank of France has a considerable volume of notes outstanding, usually it holds a reserve equal to about 80 per cent. of its combined liabilities for deposits and outstanding notes.

Uniform or Separate Note Issues of the Banks

The proposed plan can be worked out either by providing for separate note issues of the several banks, each bank being required to keep up its separate note-redemption fund, or by providing for one uniform issue of notes to be executed by the association, with a joint redemption fund to be kept up by *pro rata* contributions of the several banks.

Under the plan for separate note issues, the notes,

IN THE UNITED STATES

having been prepared and registered by the association, would be delivered to the banks, which then would execute and issue them, as in case of the present bond-secured notes. Under this plan each bank would be required to furnish to the association and to keep up, at the prescribed percentage, its separate redemption fund for its own notes. Upon presentation of the notes of any bank for redemption they would be paid out of the redemption of that particular bank.

Under the plan for a uniform issue of notes with a joint redemption fund, the notes would be all alike, and would be executed by the officers of the association and be delivered to the banks upon their application. Under this plan all the banks would be required to provide *pro rata* for the redemption of all notes that are presented for payment and would be credited *pro rata* with all redemptions. The association would keep with each bank a note account and a redemption-fund account. Upon taking out notes a bank would be charged therewith in its note account, and it would be credited in its redemption-fund account with its contribution to the fund, such contribution being determined by the percentage at which the fund then stands. At the close of each business day the several banks would be credited in their note accounts, in respect of all notes redeemed on that

THE BANKING AND CURRENCY PROBLEM

day, *pro rata* according to the several amounts for which they stand indebted on that day in their several note accounts; and they would be charged in their several redemption-fund accounts with *pro rata* shares of the money paid out of the joint fund in redemption of these notes. Upon any call for additional contributions to the joint redemption fund the *pro rata* contributions of the several banks would be fixed in similar manner.

Under either plan a bank could discharge its obligation in respect of all or any of the notes for which it is responsible, either by depositing lawful money for the redemption of the notes or by surrendering notes for cancellation. Under the plan for separate note issues, a bank surrendering all or any of its own notes for cancellation could withdraw its note-redemption fund or a ratable part thereof. Under the plan for a uniform issue of notes, a bank surrendering any outstanding notes could withdraw a proportionate share out of the joint redemption fund. After having surrendered for cancellation the whole amount of notes for which it stands indebted to the association, a bank, like any other noteholder, could present notes for payment and redemption.

Under either plan, from time to time a bank could take out additional notes, as the amount of

IN THE UNITED STATES

notes for which it is indebted to the association is reduced by redemptions or by the surrender of notes, but the amount of notes for which, at any one time, a bank may be indebted would be limited as provided in the statute.

The only material difference between the two plans is that, in case of separate note issues with separate redemption funds, each bank would have to provide for the redemption of its own notes whenever they come in for redemption, while under the plan for a uniform note issue with a joint redemption fund every redemption of notes would be treated as a redemption of only a *pro rata* part of the notes for which each bank is chargeable. The ultimate responsibility of the several banks would be the same under both plans.

The plan for a uniform note issue with a joint redemption fund probably would be simpler, less expensive, and easier to administer than the plan for separate note issues and separate redemption funds; but it would require careful consideration by experienced bankers whether the plan for a uniform note issue and a joint redemption fund would prove fair to all the banks. On the one hand, it may be said that it would be largely a matter of accident whether the notes issued by a particular bank remain in circulation a long time or a short time, and, therefore, that it would be fair

THE BANKING AND CURRENCY PROBLEM

to all the banks to apply all redemptions of notes *pro rata* according to the amount of notes put in circulation by each bank. On the other hand, it would be necessary to guard against the possibility of a bank increasing its general reserves of lawful money by presenting notes for payment out of the joint redemption fund while the bank remains indebted to the association for outstanding notes. For example, if a bank could take out notes, and, directly or indirectly, could cause these notes to be presented, in its behalf, for payment out of the joint fund, it might thus increase its general reserves by drawing lawful money from the joint redemption fund to which all the banks would have to contribute ratably. However, the advantage would be only temporary, inasmuch as the bank taking out notes and causing them to be redeemed would receive credit only for the redemption of its *pro rata* share of these notes. It would still remain liable for the balance, less only the part thereof represented by its contributions of lawful money to the joint redemption fund, and it would have to make future contributions to the joint redemption fund until it shall have extinguished the whole of this liability either by contributions of lawful money or by surrendering notes for cancellation.

IN THE UNITED STATES

Security of the Notes

It is a matter of primary importance that an issue of bank-notes shall be absolutely good and be kept at a parity with lawful money; in other words, that the notes will be redeemed certainly in gold or other lawful money whenever presented for payment. While bank depositors generally can look out for their own interests and may voluntarily take the risks of unwise management of the institutions with which they deal, bank-notes would fail to serve their purpose as a circulating medium if it were necessary in each instance to scrutinize the solvency of the banks issuing them. Bank-notes that fluctuate in value or that may prove worthless, as in the days of our "wildcat banks," would cause loss to innocent people throughout the country, and would be fatal to business prosperity generally. Therefore, clearly, it is the duty of the Government to prevent the issue of bank-notes for use as currency unless the payment of such notes on demand be assured beyond a doubt.

One of the most dangerous fallacies in banking is the idea that a deposit of ample security in the form of bonds or anything else is sufficient to make an issue of bank-notes sound and safe. It is all important that bank-notes shall be convertible on demand into lawful money. An issue of bank-notes

THE BANKING AND CURRENCY PROBLEM

is unsound and unsafe and will fail to serve its purpose, unless the holders of the notes, at all times, can count with certainty upon obtaining gold or other lawful money for the notes on demand. It is quite as important that the banks should keep reserves of lawful money for the payment of their notes as for the payment of their deposit liabilities; and if an issue of bank-notes is really an elastic one, so that it will contract promptly with the cessation of the need for notes, prudence requires that the reserves of lawful money kept for the notes shall be larger than the reserves for deposit liabilities. It is to be observed, also, that the position of all the banks collectively would not be strengthened by providing collateral security for bank-note issues even though the security were to consist of Government bonds for which there is a ready market. A purchaser of the bonds would have to draw from some bank the money to pay the purchase price. The money realized by selling the bonds of the bank in default would be obtained by reducing the reserve of some other bank.

Under the plan now proposed the security for the payment of the notes on demand in lawful money would be as follows:

(a) A redemption fund, consisting of gold or other lawful money, amounting to a substantial percentage of the notes;

IN THE UNITED STATES

(b) The individual obligation of each bank to redeem the amount of notes issued by it and to keep up its redemption fund for that purpose;

(c) A safety fund to be created, as hereinafter explained, by a tax to be paid by each bank on the amount of notes it has outstanding in excess of the lawful money in its note-redemption fund;

(d) A deposit of United States bonds by those banks choosing to deposit bonds as security for such excess, in order to obtain the benefit of the lower tax upon notes so secured; and

(e) The ultimate ratable liability of all the issuing banks.

The notes issued under this plan would be safer than any bank-notes in the world, except possibly the notes of the Bank of England. If, to increase popular confidence in the notes, it should be deemed advisable that they be guaranteed by the United States, there is no reason why the United States should not practically guarantee their payment and make them receivable in payment of taxes and excises and other dues to the United States, as in case of the present bond-secured notes. The issue of the notes would be supervised and controlled by the Government. A guarantee of their payment would subject the United States to less risk than the present bond-secured notes, because under the proposed plan the notes would be backed by adequate

THE BANKING AND CURRENCY PROBLEM

redemption funds of lawful money, which all the banks would be bound to keep up at all times by importations of gold if necessary. Under the present system the Government is bound to pay the notes of the banks on demand in gold or other lawful money. If the Government should not have in the Treasury the required amount of gold or other lawful money, and if the banks should fail promptly to reimburse the Government for the payment of their notes, the Government would have to sell bonds or borrow the required amount of gold. The United States bonds deposited as collateral for the bond-secured notes would cease to afford adequate security if the artificial value of these bonds should be impaired by the issue of additional Government bonds, as might happen in case of a war. The present artificial value of these bonds is caused only by their limited supply and by the demand of the banks for such bonds as a basis for the issue of bond-secured notes.

Collateral Security

Collateral security would not be needed to protect the associated banks against loss by reason of defaults of individual banks in keeping up their note-redemption funds, because the experience of forty years proves that the losses through failures of

IN THE UNITED STATES

individual banks would be infinitesimally small and that the safety fund would be many times more than sufficient to cover any losses.

Collateral security, no matter how good, is in no sense a substitute for gold or lawful money as a reserve for the payment of bank-notes which, on demand, must be paid in cash. Collateral would be security only for the ultimate payment of the notes and, for the reasons already stated, is unnecessary for that purpose.

It would not be practicable to furnish security in the form of commercial paper, because a central agency could not pass intelligently upon the character of such paper, or satisfactorily administer collaterals consisting of commercial paper maturing from day to day. It would not be practicable, through a central agency, to collect the maturing paper and, in case of non-payment, to notify indorsers and enforce payment or arrange for extensions, etc. It would be inadvisable to make municipal bonds or bonds of private corporations receivable as collateral, partly because of the complications which would ensue if any board were vested with a discretionary power to pass upon such securities, and partly, also, because an artificial value would be given to such securities by making them receivable as collateral for bank-notes. The right to issue the present bond-secured notes against United

THE BANKING AND CURRENCY PROBLEM

States bonds has given to these bonds an artificial value, probably at least 20 per cent. in excess of their real value as investments, and consequently the holders of United States bonds, including the banks, consider now that this artificial value is a vested right that should be protected by law. If municipal bonds or other bonds were made receivable as collateral security for bank-note issues, these bonds, likewise, soon would acquire an artificial value, and it would be claimed that, in justice, this artificial value should not be impaired by any subsequent change of the currency laws.

However, though it is undesirable and unwise to require collateral security for an issue of bank-notes, some of the objections that have been raised against collateral security for bank-notes appear to be unfounded. Thus it often has been contended that the present issue of bond-secured National-bank notes is inelastic because United States bonds must be deposited as security for such notes. This appears to be a mistake. The true reason why the issue of these bond-secured notes is inelastic is that each one of the seven thousand banks at all times issues and keeps outstanding all the notes it can, guided only by the desire to make a profit for itself and regardless of the credit situation of the whole country. An issue of notes simply upon

IN THE UNITED STATES

the credit of the banks, without collateral security, would be equally inelastic unless regulated and controlled through some central authority by increasing or diminishing the required reserve for the notes.

Again, it has been contended that if the banks deposit bonds as collateral security for their notes, they must use part of their capital in paying the purchase price of the bonds, and that this would diminish the amount of capital or credit of the banks available for the accommodation of the commercial business of the country. This appears also to be a mistake. When a bank invests in bonds to be used as collateral for notes of the bank the money paid for the bonds is not locked up or taken out of circulation, but remains in the country, and remains available as circulating currency and as bank reserves. The only lawful money that may be locked up under the present laws is the 5 per cent. of the notes to be deposited in lawful money with the Government, and even that money is not necessarily locked up, as the law requires it to be turned into the Treasury as a miscellaneous receipt. On the other other hand, there is an actual increase of the circulating currency by the amount of the notes. To the extent that these notes are used as a circulating medium, they save the use of that much lawful money, which goes into the

THE BANKING AND CURRENCY PROBLEM

bank reserves and becomes available as a basis for granting additional bank credits.

Protection of United States Bond Values

There has developed a sentiment that any currency legislation that may be passed should contain such provisions as will preserve the artificial value heretofore given to United States bonds by making them available as security for the issue of National-bank notes. In order to protect this artificial value of United States bonds it should be provided that any bank issuing notes under the plan now proposed shall have the privilege of depositing United States bonds as collateral security for the uncovered part of the notes, and that in consideration of furnishing such security (which would protect the safety fund and the other banks from ultimate loss) the banks making such deposit of United States bonds shall pay only the present taxes upon their circulation so secured, and shall be relieved from the higher taxes to be imposed upon notes issued without such collateral security.

Taxation of Notes under the Plan

In fixing the rate of the tax to be imposed upon the proposed circulation, the following considerations should be borne in mind:

IN THE UNITED STATES

(a) Bank credits and bank-notes are merely part of the machinery for transacting business, and this machinery should not be made unnecessarily expensive to the people by taxation or by other artificial means. Ultimately a high tax upon bank credits or currency would fall upon borrowers and would operate as a check upon business generally.

(b) A tax upon bank-notes or bank credits is not required to obtain revenue for the Government.

(c) Taxation is neither a scientific nor an effective method of regulating bank credits or of keeping the banks sound and the currency safe. The right way to prevent an issue of bank-notes from causing an unsafe expansion of bank credits is by requiring the banks to increase the reserve for the redemption of the notes, thereby diminishing the amount of notes outstanding in excess of this reserve. If it be desirable to reduce the profits derived by the banks from their note issues, the proper way to accomplish this is to compel the banks to reduce the uncovered amount of the notes by increasing the redemption fund or reserve for their payment. Though taxation of bank-notes may restrict the issue of bank-notes, it cannot add to their security or strengthen the situation of the banks.

THE BANKING AND CURRENCY PROBLEM

(d) A small tax upon bank-notes for the purpose of providing a safety fund for the payment of the notes of defaulting banks is proper, and, as shown by present experience in Canada and by former experience in New York, such a safety fund would accomplish its purpose.

(e) A tax upon bank-notes should be based upon the portion of the notes not covered by gold or other lawful money in the note-redemption fund. It should not be based upon the nominal amount of the notes outstanding, for a considerable issue of notes with a large percentage of gold or other lawful money in the redemption fund is better and safer than a small issue of notes with a smaller percentage of reserve. It is only the uncovered part of a note issue that represents an increase of the currency based upon the credit of the banks.

Having regard to these considerations, it is proposed that each bank be required to pay quarterly a tax computed at the following rates on the average amount of notes it has outstanding in excess of the average amount of gold or other lawful money in its note-redemption fund—*viz.*:

(1) At the rate of one-half per cent. per annum on so much of such excess as is secured by a deposit of United States 2-per-cent. bonds.

(2) At the rate of 1 per cent. per annum on so much of such excess as is secured by United States

IN THE UNITED STATES

bonds bearing interest at a rate greater than 2 per cent.

(3) At the rate of 3 per cent. per annum on any remainder of such excess.

These taxes, or part of them, should be set apart for use as a safety fund to be applied in making good any losses through default of banks in keeping up their note-redemption funds.

Existing Bond-Secured Notes

The uncovered amount of bank-notes now outstanding in the United States is larger in proportion to the total currency of the country, and in proportion to population, than is the uncovered amount of bank-notes outstanding in England, France, or Germany. Experience has shown that the volume of bank-notes outstanding in the United States is too large, except when an extraordinary amount of currency is needed for circulation, or when there is a bank panic. In order to place financial conditions in the United States upon a sound basis, it is necessary that any increase of the present inelastic volume of bank-notes be stopped. No plan can be sound that provides merely for the issue of more bank-notes on top of the present bond-secured notes. No plan can be sound unless it shall provide for elasticity in the uncovered volume

THE BANKING AND CURRENCY PROBLEM

of bank-notes, so that an excessive amount of the notes shall not remain outstanding in normal times.

After some years, owing to the growth of the country in population and in wealth, the present volume of bank-notes probably would cease to be excessive even in normal times, but it is very desirable that at least a portion of the bond-secured notes be replaced, as soon as possible, by an issue of notes that can be contracted in normal times by some central authority. It is proposed to bring about this result as follows:

(a) No United States bonds hereafter issued shall be receivable as security for bond-secured notes under existing laws.

(b) No bank being a member of the proposed association shall be permitted to issue bond-secured notes under the existing laws to an amount exceeding 50 per cent. of its capital stock. If any such bank at the time of becoming a member of the association shall have outstanding notes issued under existing laws to an amount exceeding 50 per cent. of its capital stock, such bank shall not be allowed to issue notes under existing laws upon redemption of any of such outstanding notes until the amount of these notes issued pursuant to existing laws shall be reduced below 50 per cent. of the capital stock of the bank.

(c) After the satisfactory operation of the plan

IN THE UNITED STATES

shall have been established, further restrictions should be imposed upon the issue of bond-secured notes under the existing laws, so as to force the gradual substitution of notes issued under the proposed plan for the present bond-secured notes.

The banks would be protected against loss resulting from a forced reduction of their issues of bond-secured notes, because they would acquire the right to issue notes under the new plan and could use their United States bonds as collateral for the uncovered part of these notes, thereby saving the higher taxes which would be payable by those banks that do not deposit United States bonds.

THE END

