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Fiscal Restraint, Total Demand and Monetary Policy

TOTAL demand for goods and services has continued to rise sharply, placing excessive claims on our nation's resources. Total spending increased 9 per cent in the year ending in the second quarter, and pulled up prices by 4 per cent. From mid-1965 to mid-1967, spending rose at a 7.5 per cent average annual rate and prices advanced at a 2.6 per cent rate. Excessive total demand in recent years has been fostered by a combination of very stimulative fiscal and monetary actions.

On June 28, the "Revenue and Expenditure Control Act of 1968" was signed into law. This legislation was designed to alter the influence of the Federal budget so as to restrain private and Government spending and thereby dampen inflationary pressures. Included in the Act are provisions which increase tax rates on individual and corporate income, extend excise tax rates on automobiles and telephone service at existing rates and moderate the growth of Government expenditures. Implementation of the Act is expected to reduce sharply the Federal budget deficit.

The fiscal program as proposed is intended to moderate the budget stimulus as a factor contributing to the current inflationary situation. This note assesses the economic impact of the Act of 1968 by focusing on the following considerations:

1. Recent trends in the growth of total demand, real product and prices.
2. The outlook for growth of total demand, real product and prices in light of the new fiscal program.
3. The outlook for the U.S. balance of payments.
4. The outlook for financial markets and the implications for monetary action.

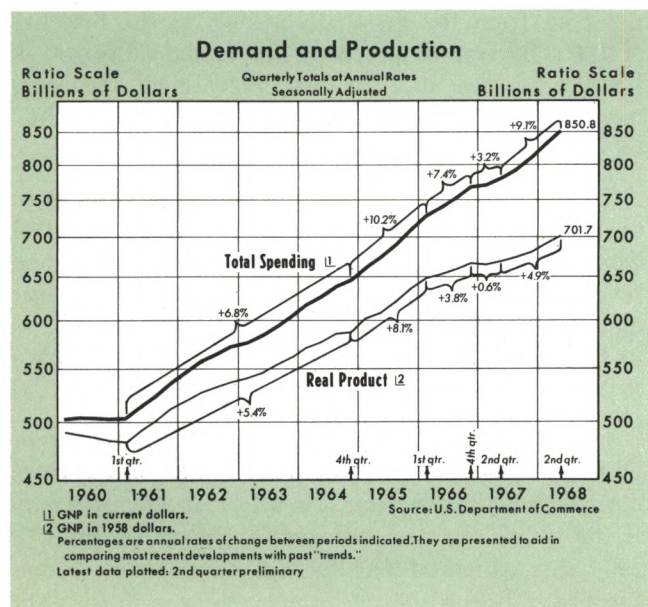
Recent Trends in Total Demand, Output and Prices

Total spending for goods and services rose 9 per cent from the second quarter of 1967 to the second quarter of 1968, accelerating from the 7.5 per cent annual rate for the previous two years. From 1957 to 1965, total spending had increased at a 6 per cent annual rate.

Total output of the economy expanded 5 per cent in the year ending second quarter, an unsustainable rate of growth. Expansion of real product is constrained by the growth of productive potential, which is estimated to be increasing about 4 per cent per year.

As a consequence of the rapid increase in the demand for goods and services relative to supply, the rate of price increase has accelerated. The general level of prices advanced 4 per cent in the last year, compared with a 3 per cent average rate over the previous two years and a 1.6 per cent rate from 1957 to 1965.

The intensified inflationary pressures have been encouraged by highly expansionary monetary and fiscal actions. The high-employment budget moved from a \$7 billion annual rate of surplus in the first half of



1965 to a \$14 billion deficit in the first half of 1968. By comparison, this budget averaged a \$9 billion surplus from 1957 to 1965. The nation's money stock rose at a 5 per cent annual rate from early 1965 to mid-1968, compared with an annual rate of 2.2 per cent from 1957 to 1965.

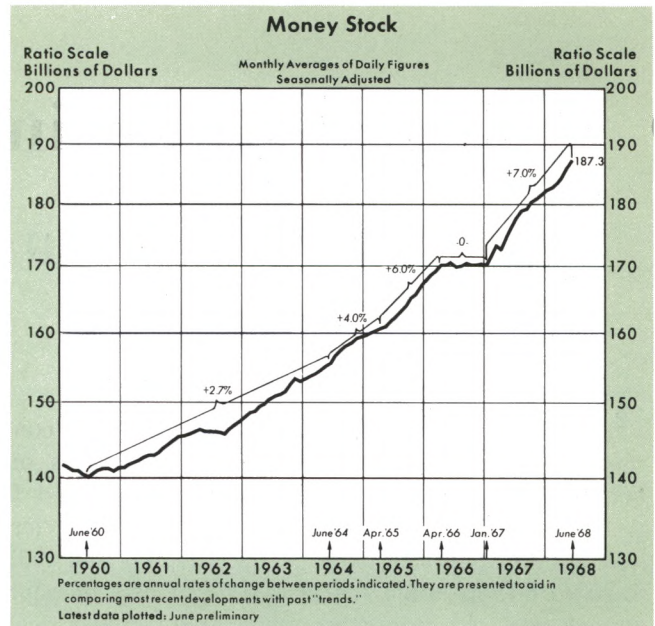
The Fiscal Program

The primary purpose of the Act of 1968 is to reduce inflationary pressures by moderating the growth of total demand. Taking into account the fiscal program and recent estimates of expenditures, the high-employment budget is expected to move to a \$12 billion rate of surplus in the first half of 1969 from a rate of deficit of \$14 billion a year earlier.¹

The major features of the fiscal package are a reduction in spending for some items from the level proposed in the Government's budget for the year ending June 30, 1968, and a 10 per cent surcharge on corporate and individual income taxes. The surcharge on corporate income tax liability is retroactive to January 1. For individuals the surcharge is retroactive to April 1, which will mean a 7.5 per cent increase in taxes on personal income earned in 1968.

The expenditure cuts included in the program apply to the level of spending in the Government's official budget which was proposed for the fiscal year beginning July 1. In the January budget message, the President proposed spending and net lending of

¹Budget figures referred to here are in terms of the high-employment budget, which differs from the Government's official budget. The high-employment budget excludes Government lending activities and conforms more closely to accrual accounting than does the Government's official budget.

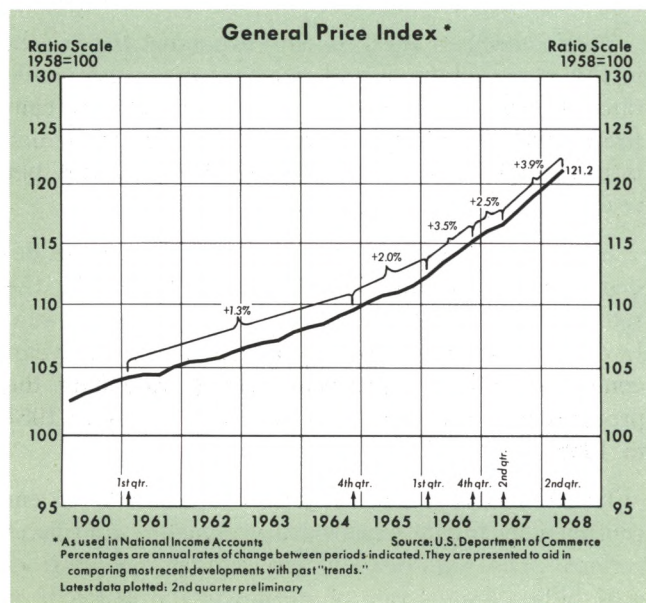


\$186.1 billion in fiscal 1969. The fiscal program calls for limiting the level to \$180.1 billion, an increase of \$1.2 billion from fiscal 1968. Spending in excess of this amount is allowable, however, if needed for special support of Vietnam operations, interest on the national debt, or veterans' and social security benefits. Expenditure estimates for Vietnam in fiscal 1969 have already been revised upward by \$2.6 billion from the level proposed in the budget. Interest on the national debt is now expected to be almost \$1 billion higher than previously estimated.

Taking into account revised expenditure estimates and assuming other expenditures are controlled according to the program, Federal spending on a high-employment budget basis is now expected to rise 2.4 per cent from the first half of 1968 to the first half of 1969. By comparison, high-employment budget expenditures rose at a 15 per cent annual rate from mid-1965 to 1968, and at a 6 per cent rate from 1957 to 1965.

The tax provisions of the program, plus an increase in social security taxes effective January 1, 1969, would provide an estimated \$13 billion in additional revenue in the year ending June 30, 1969. This estimate includes \$7 billion from individual income taxes, \$3 billion from the corporate surcharge, and \$3 billion in increased social security taxes.

The shift from deficit to surplus in the budget reflects, in addition to the effects of changed tax rates, normal growth of revenues in an expanding economy. If the tax surcharge is allowed to expire on June 30, 1969, it is estimated that the high-employment budget surplus will drop sharply to near balance in the third



quarter of 1969. The reliability of these projections depends on how far the programs which are exempt from the spending restrictions deviate from the levels proposed in the January budget, and the extent to which other programs are effectively limited by expenditure controls.

Fiscal Restraint and the Outlook for Total Demand and Prices

The Revenue and Expenditure Control Act is designed to reduce the stimulative influence which fiscal actions have exercised on the economy since 1965. The amount of resources which has been required for Vietnam operations has been greatly underestimated since 1965 and, as a result, expenditures for defense have risen faster than budgeted amounts. The sharp expansion of defense spending was undertaken as the Government was accelerating expenditures for domestic programs. Total outlays far outpaced revenue, resulting in substantial budget deficits. Federal Reserve action to reduce the impact of heavy Government borrowing on financial markets resulted in rapid monetary expansion. The combination of these fiscal and monetary developments stimulated total demand, and the resulting pressure on a fully-employed economy has been a major factor contributing to price inflation and high interest rates.

Estimating the impact of the new fiscal program is an inexact, but very important matter, and an assessment of this impact is facilitated by examining key segments of total demand in some detail.

Personal Consumption. The thrust of the tax portion of the fiscal program is aimed at individuals, who will have to pay almost \$7 billion in extra taxes

in the year ending June 30, 1969. The surcharge is expected to reduce the growth of consumer spending by moderating gains in take-home pay. The manner in which consumers respond to higher taxes will determine, in large measure, the impact of this part of the fiscal program.

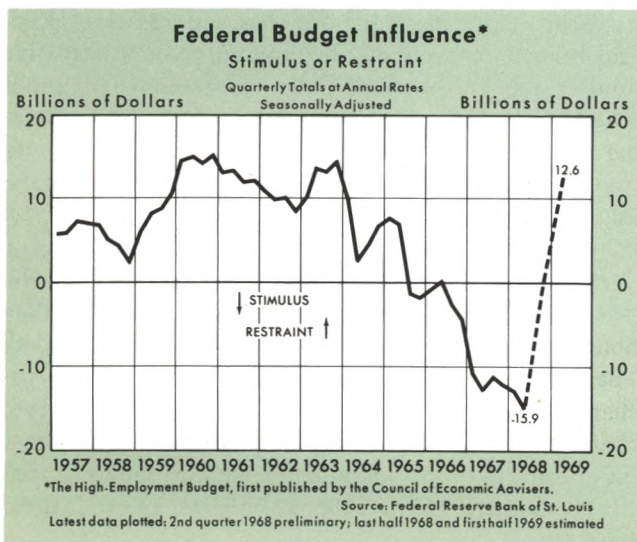
The extent to which individuals choose to pay their increased tax liabilities from past saving, or by reducing current saving, will tend to moderate the restrictive effects of the fiscal program. From late 1966 to mid-1968, individuals allocated a larger share of their income to savings. Personal saving averaged 7 per cent of disposable personal income over the period, compared with an average rate of 6 per cent from 1957 to 1966. A reduction in the saving rate of one percentage point over the next year would free almost \$6 billion for spending, negating a large portion of the restrictive effect of increased taxes.

Individuals base current spending plans to some degree on past experience. The flow of income to which persons have become accustomed is a very important determinant of current and future consumption. The fact that individuals have been accumulating a large amount of savings relative to income suggests that the restraining effect of the added tax may be attenuated. In addition, the ostensibly temporary nature of the surcharge provides consumers with an added incentive to regard the reduced flow of income as a short-run factor, and to use their wealth position to maintain spending.

Business Investment. Expenditures for plant and equipment are based mainly on long range projections, and therefore depend on sales expectations over an extended period. If businesses observe only moderate easing of growth in consumer spending, they will have continued incentive to carry through with investment plans.

The cost and availability of funds are also important in determining the strength of investment spending. Easing of upward pressure on market interest rates might influence businesses to borrow funds for investment projects. Such a development would counter the restrictive effect of the tax hike via reduced cash flow to businesses. Furthermore, the fiscal package introduces the prospect of a tax advantage for investment programs undertaken during the period when increased tax rates are in effect, making the investment tax credit more attractive.

Government Demand. Rapid expansion of Government demand has been a major factor contributing to the sharp increase in total demand experienced since mid-1965. The provisions limiting Federal expendi-



tures in fiscal 1969 imply a reduction in the growth of Government demand for goods and services. However, the ability of the Government to restrain expansion of its demand for resources in the present fiscal year remains to be proved.

Summary of Outlook for Total Demand. Aggregate demand probably will continue to be strong for some time, reflecting stimulative fiscal and monetary actions in the recent past. There is some doubt whether fiscal actions will restrain economic activity greatly in the immediate future. Many factors suggest that both consumer and business spending may not respond to the program of fiscal restraint to a degree sufficient to reduce the pressure on prices significantly.

In addition to the pull of current total demand, cost factors, reflecting past excessive demands, are also exerting upward pressure on prices. The inflationary situation which has prevailed in the economy since 1965 has induced labor to seek wage settlements which will compensate for purchasing power lost to past price increases. The prolonged period of inflation has probably also caused some pressure for compensation for expected future inflation. The fiscal package can do little immediately to dampen this pressure. The tax hike itself might stimulate demands for even larger settlements.

Fiscal Restraint and the Balance of Payments

The impact of the fiscal program on total demand and prices has important implications for the U.S. balance of payments. The United States economy has experienced a sharp decline in its foreign trade surplus, reflecting the adverse effects of a rapid growth of imports. Acceleration of domestic income has increased the demand for foreign goods. If the trade balance is to be restored to the strong surplus position of previous years, the relative price position of American products must be improved.

Since the rate of price increase cannot be expected to moderate to a significant degree soon, little improvement in the balance of payments can be expected as the result of increased exports. Continued rapid expansion of aggregate demand would also tend to maintain imports at a high level relative to exports. With little likelihood of rapid and significant improvement on current account, capital flows become the prime vehicle for improvement. In the first half of 1968, high interest rates attracted a large amount of foreign capital into the United States. Interest rate declines in the second half of 1968 would reduce the inflow of such capital.

Monetary Policy and Financial Markets

The fiscal program, if strictly followed, is expected to reduce Government borrowing needs in fiscal 1969 by about \$20 billion from the level of fiscal 1968. This suggests that a great deal of the upward pressure on interest rates will be removed over the course of the fiscal year.

The response of monetary developments to such possible easing of credit conditions deserves attention. Federal borrowing needs remain relatively large in the second half of calendar 1968. The pressure of this demand on financial markets, in addition to expected corporate borrowing to meet first-half tax liabilities, suggests little immediate moderation in the demand for lendable funds. Monetary expansion to provide downward pressure on interest rates could stimulate spending and reinforce upward pressure on prices. Monetary expansion at or above recent rapid rates would then work to negate the restrictive influence of the fiscal program.

The response of corporations and individuals to the tax hike will depend in part on conditions in financial markets. Other things unchanged, high interest rates tend to reduce the amount of funds demanded by business for investment, and tend to increase the attractiveness of saving relative to spending for individuals. Falling interest rates tend to have opposite effects. Within a framework of fiscal actions aimed at reducing the growth of demand for goods and services, and consequently dampening inflationary pressure, monetary expansion to ease pressure on interest rates might encourage both consumer and business spending and discourage private saving.

Conclusion

Fiscal authorities have adopted a program of Federal budget restraint in an effort to combat excessive total demand. It is hoped that this action will moderate inflationary pressures while only slightly affecting output and employment. However, an inflationary psychology has become entrenched in the economy, as evidenced by large wage settlements and the rising costs of credit. If the Administration and the Congress have finally assigned high priority to the task of reducing inflationary pressures, monetary actions to complement the fiscal program are needed. The possibility that the restraining effects of the surcharge may be attenuated, and also that expenditure controls may not be fully implemented, reinforces the desirability of avoiding monetary actions that might counter the restrictive effects of the fiscal program.

The Monetary Base - Explanation and Analytical Use

THE MONETARY BASE recently has achieved prominence as a measure of monetary influence on the economy. Other aggregates often used are the money stock defined as currency plus demand deposits held by the nonbank public, money plus time deposits at commercial banks, member bank reserves, bank credit, liquid assets, and total credit. Other frequently used measures of monetary actions include market interest rates and so-called marginal reserve measures such as member bank excess reserves, borrowings from Reserve banks, and free reserves.

Those who find the monetary base to be a measure of monetary influence give two reasons for doing so. First, there is a significant body of monetary theory which incorporates the monetary base as an important link between Federal Reserve monetary actions and their ultimate impact on income, output, and prices. Second, among all the variables cited above as measures of monetary actions, the monetary authorities have the most complete control over the monetary base, and the base reflects the actions of these authorities more directly than the other measures do.

This article first explains the monetary base concept and presents the method of its computation, and then discusses its role in monetary analysis, briefly developing some of the arguments for using the base as a measure of monetary actions.

Monetary Base Concepts

Three concepts are used in this article to compute the monetary base. These are the "source base," "reserve adjustments," and the sum of these two, called the "monetary base."

The Source Base

The "source base" is derived from a consolidated monetary balance sheet of the Federal Reserve System and the United States Treasury.¹ Table I presents this consolidated balance sheet. According to column one of this table, the source base is the sum of Federal Reserve credit (Federal Reserve holdings of U.S. Government securities, member bank borrowing from

¹The term "source base" used in this article is the same magnitude which Friedman-Schwartz-Cagan call "high-powered money," and which Brunner-Meltzer call the "monetary base."

Table I
CALCULATION OF THE SOURCE BASE — JUNE 1968
Monthly Averages of Daily Figures¹
(Millions of Dollars)

Sources of Base		Uses of Base	
Federal Reserve Credit:		Member Bank Deposits	
Holdings of Securities	+51,396 ²	at Federal Reserve	+21,350
Discounts & Advances	+ 705	Currency held by Banks	+ 5,566
Float	+ 1,712	Currency held by	
Gold Stock	+10,369	the Public	+41,900
Treasury Currency Outstanding	+ 6,744		
Treasury Deposits at Federal Reserve	- 960		
Treasury Cash Holdings	- 973		
Other Deposits and Other			
Federal Reserve Accounts	- 177		
Source Base	68,816		68,816

¹Data are not adjusted for seasonal variation.
²Includes acceptances of \$90 million not shown separately.
Source: Board of Governors of the Federal Reserve System, Federal Reserve Bulletin. The sources and uses of the base are a rearrangement of data contained in the first table appearing in the Financial and Business Statistics section of the Bulletin — "Member Bank Reserves, Federal Reserve Bank Credit, and Related Items."

Reserve banks, and Federal Reserve float), the nation's gold stock, and U. S. Treasury currency outstanding *less* Treasury deposits at Reserve banks, Treasury cash balances, and other deposits and accounts at Reserve banks.

For ease of computation, the source base is frequently measured by summing the monetary liabilities of the Federal Reserve and the Treasury. These liabilities, consisting of member bank deposits (reserves) at Reserve banks and currency held by banks and the nonbank public, are referred to as *uses of the base* and are listed in column two of Table I. These uses of the base are equal to the source.

For monetary analysis it is important to distinguish between the source base as a magnitude supplied by monetary authorities (Table I, Column 1) and the demand for the base by other sectors of the economy (Table I, Column 2). This distinction is discussed more fully later.

Reserve Adjustments

Because of changes in laws and regulations and in the distribution of deposits among banks subject to different regulations, adjustments must be made in the source base in order to maintain comparability over time. "Reserve adjustments" allow for the effects of changes in reserve requirements on member bank deposits, and for changes in the proportion of deposits subject to different reserve requirements (reserve city member banks versus country member banks versus nonmember banks, demand deposits versus time deposits, and recently the over and under \$5 million reserve requirement differentials on both demand and time deposits). These reserve adjustments are expressed as dollar amounts which are positive when average reserve requirements fall and negative when they rise.²

The following method is used to calculate the reserve adjustment for an individual month. The procedure is the same for both demand and time deposits, but for purposes of explanation the example used is for demand deposits. First, the weighted average reserve requirement on demand deposits for the month (using for weights the distribution of these deposits by class of member bank) is computed. Then, the difference in average reserve requirements from the previous month is multiplied by net demand deposits for the previous month. The procedure is carried out for every month since January 1929.

²These reserve adjustments are referred to by Brunner-Meltzer as "liberated reserves." The reserve adjustment procedure used here was developed by Brunner-Meltzer.

Finally, the reserve adjustment for a particular month is the algebraic sum of the monthly reserve adjustment figures for both demand and time deposits from January 1929 to the month under consideration. In addition to the above computations, the data on reserve adjustments since December 1959 include a small positive adjustment to reflect the gradual allowance of member bank vault cash as a part of their reserves.

The Monetary Base

The monetary base is defined in this article as the source base plus reserve adjustments.³ In deriving a seasonally-adjusted time series for the monetary base, the source base was first seasonally adjusted and then the month's reserve adjustment amount was added to this magnitude. There are no discernable seasonal movements in the latter. The first chart presents a weekly time series since January 1967, and the second chart presents the time series for the monetary base since January 1947.

Analytical Use of the Monetary Base

This section discusses factors influencing the supply of the monetary base and the demand for the base. It concludes with a brief discussion of the adjustment process by which the amount of the base demanded is brought into equilibrium with the amount supplied by monetary authorities. This adjustment process establishes the monetary base as a strategic economic variable for monetary management and for interpreting actions of such management.

Supply of the Monetary Base

The "source base" (Table I, Column 1) is by far the main part of the supply of the monetary base. The source base plus reserve adjustments give the total supply. Federal Reserve credit, the main component of the monetary base, is under the direct control of the Federal Reserve System. The gold stock depends on such factors as movements in the nation's balance of payments. Treasury currency outstanding and Treasury cash balances and deposits at Reserve banks are under the direct control of the Treasury Department. In recent years, other deposits and accounts at Reserve banks have been only minor factors affecting the supply of the monetary base.

The supply of the monetary base is substantially under the complete control of the Federal Reserve

³This definition of the monetary base is the same magnitude which Brunner-Meltzer define as the "extended base."

Monetary Base*



*Uses of the monetary base are member bank reserves and currency held by the public and non member banks. Adjustments are made for reserve requirement changes and shifts in deposits among classes of banks. Data are computed by this bank. Latest data plotted: Week ending July 24, 1968 preliminary

System.⁴ Recent studies have found that movements in Federal Reserve credit dominate movements in other sources of the source base, and therefore determine most of the movements of the monetary base.⁵ Evidence has also been presented that Federal Reserve open market operations are able to offset, to a high degree, seasonal and irregular move-

ments in other components of the source base.⁶ Consequently, the Federal Reserve, if it so chooses, is able to achieve desired levels of the monetary base for purposes of economic stabilization.

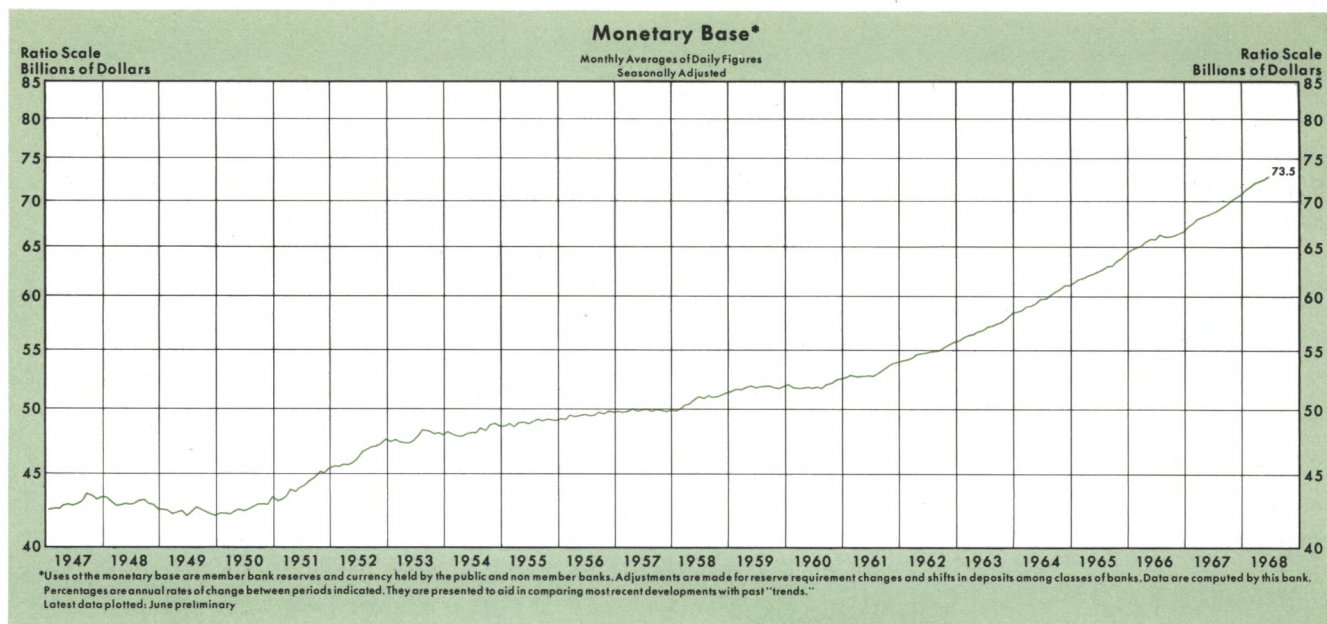
Demand for the Monetary Base

Demand for the monetary base consists of the demand of commercial banks for excess reserves and required reserves and the demand of the nonbank public for currency (Table I, Column 2). Banks' demand for required reserves is a derived demand

⁴Although member bank borrowing from Reserve banks and changes in the gold stock and float are not under the direct control of monetary authorities, it is generally believed that open market operations may be used to offset short-term changes in these and other accounts in order to achieve a desired level of the monetary base.

⁵For a discussion of these studies, see Karl Brunner, "The Role of Money and Monetary Policy," this *Review*, July 1968.

⁶Leonall C. Andersen, "Federal Reserve Defensive Operations and Short-Run Control of the Money Stock," *Journal of Political Economy*, April 1968.



reflecting the demands for private demand deposits, Government demand deposits, net interbank deposits, and time deposits.⁷ Demand for the monetary base consequently reflects economic decisions made by commercial banks, the nonbank public, and the Government. Therefore, all of the factors influencing the decisions of each of these sectors influence the demand for the monetary base. Some of the factors influencing each of these sectors are discussed below:

Bank Demand – Commercial bank direct demand for the monetary base consists of demand for excess reserves and net interbank deposits. Bank indirect demand for required reserves, for reasons mentioned above, is considered as nonbank demand for the base. A bank's demand for excess reserves generally is believed to be related positively to its size (total deposits) and the cost of borrowing short-term funds (Federal Reserve discount rate, Federal funds rate, and rates paid on large certificates of deposit), and negatively related to yields on its short-term assets (loan rates and Treasury bill rates). Also, the demand for excess reserves is often viewed as being positively related to the pace of economic activity, which generates different amounts of loan demand at given loan rates. Net interbank deposits vary directly with economic activity and inversely with

short-term interest rates, but are probably little affected by these variables.

Public demand – The nonbank public's demand for the monetary base reflects its direct demand for currency. Also, because of reserve requirements on bank deposits, the nonbank public's demand for demand deposits and time deposits constitutes an indirect demand for the monetary base. Demand for currency and demand deposits by consumers, businesses, financial institutions, and state and local governments is usually held to be positively related to economic activity, wealth, and prices of real assets, and negatively related to short-term interest rates and rates paid on time deposits and other forms of savings accounts. Demand for time deposits at commercial banks is postulated to be influenced in the same general manner (but in different degrees) by the factors influencing the demand for currency and demand deposits, except that rates paid on time deposits have a positive effect.

Government demand – Demand by the Government for demand deposits at commercial banks, another indirect demand, is based on decisions of the Government to hold varying amounts of these deposits. These decisions are influenced little by economic factors.

Total demand – Total demand for the monetary base is the summation of sector demands; it is therefore influenced by the factors determining individual sector demands. Consequently, total demand for the base (given wealth, interest rates paid on time deposits and other forms of savings accounts, and the Federal Reserve discount rate) is positively related

⁷Calculations of the monetary base, as presented in this article, include reserve adjustments; these factors are viewed as influencing the supply of the base. For example, a rise in reserve requirements decreases the monetary base. Therefore, it is appropriate to *exclude* changes in reserve requirements and the effects of shifts in deposits as factors influencing demand for the monetary base. In effect, on the demand side reserve requirements are held at their January 1929 level. The use of this date to start the reserve adjustments is arbitrary and carries no special significance.

to economic activity and prices of real assets, and negatively related to a wide variety of short-term market interest rates.

The Adjustment Process

Most recent developments in monetary theory, which pertain to the determination of economic activity, stress the role of assets, both financial and real, and the market adjustment of asset holdings through the relative price mechanism.⁸ The monetary base, according to some economists, is an asset which monetary authorities supply to the economy. Since the supply of this asset can be controlled by the Federal Reserve System, banks and the nonbank public must adjust their holdings of real and other financial assets so as to bring the amount demanded of the monetary base equal to the amount supplied. In the process of adjustment, economic activity, prices of real assets, and interest rates are changed.

There is a "weak" and a "strong" view regarding the role of the monetary base. The weak view embodies the process just outlined and goes no further. The strong view also adopts this adjustment process, but then extends the analysis with additional hypotheses and empirical tests. It holds that the monetary base is the main determinant of the money stock, which, in turn, is a good indicator of the thrust of monetary forces. Furthermore, according to the strong view the monetary base is the proper measure of Federal Reserve monetary actions. Whichever view one adopts, changes in the monetary base are held as ultimately leading to changes in the growth of total demand for goods and services.

There are differences between the two views regarding the strength and predictability of the influence of monetary forces on economic activity. The weak view holds that other factors, such as fiscal actions, or shifts in the demand for goods and services, also influence to a considerable degree changes in economic activity. As a result, the influence of monetary forces is not very predictable. The strong view recognizes these other influences on economic activity, but maintains that monetary forces are the dominant influence and that their influence is highly predictable.

According to the strong view, if the monetary base were to expand at a trend rate of 6 per cent, total demand would adjust to vary around a trend rate consistent with, but not necessarily the same as, the rate of expansion in the base. If the rate of

growth in the monetary base were reduced by monetary authorities, total demand would slow and vary around a lower trend rate. Sources of variations around an established trend in economic activity result from changes in fiscal actions and other independent forces.

Summary

The monetary base can be controlled by the Federal Reserve System and is directly influenced by its actions, even though other economic variables are used as guides by monetary managers. Moreover, reliable data for the source base, the main component of the monetary base, are readily available from the balance sheets of the Federal Reserve System and the Treasury. Monetary managers, therefore, have up-to-date information on the major factors affecting movements in the monetary base. Such knowledge makes it possible for them to offset, by open market operations, movements in these other factors in order to achieve a change in the monetary base appropriate for economic stabilization.

Interpretations of movements in the monetary base are not obscured by short-run movements in Government demand deposits or movements between demand and time deposits. Such movements frequently lead to disagreements among monetary analysts regarding the proper interpretation of changes in the money stock, money plus time deposits, and bank credit. Movements in market interest rates and marginal reserve measures are also subject to these same problems of interpretation.

Whether one takes the weak or the strong view, the Federal Reserve System, by varying the supply of the monetary base, causes commercial banks and the nonbank public to adjust their spending on real and financial assets so as to bring the amount demanded of the base into equilibrium with the amount supplied. In the course of these adjustments, the pace of economic activity is affected.

Three points should be noted: the monetary base is under the direct control of the Federal Reserve System, it may be changed by monetary managers in a predictable manner, and such changes have an important influence on output, employment, and prices. These considerations lead to the conclusion that the monetary base is an important magnitude for those interested in monetary management.

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This article is available as reprint series No. 31.

⁸For a discussion of these developments and the two points of view discussed in this section, see Brunner, *ibid.*

DATA ON THE MONETARY BASE are available without charge on a regular basis from this bank. Monthly data appear in our "Monetary Trends" release. Weekly data appear in our "U.S. Financial Data" release. Back data are also available — monthly data from January 1947 to June 1968, and weekly data from January 1967 to June 1968. These releases and data may be received by writing: Research Department, Federal Reserve Bank of St. Louis, P.O. Box 442, St. Louis, Missouri 63166.