Can We Control the Boom?

A CONFERENCE AT THE
UNIVERSITY OF MINNESOTA
MAY 11, 1937

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THE DAY AND HOUR SERIES OF THE UNIVERSITY OF MINNESOTA
NUMBER 20 OCTOBER, 1937

THE UNIVERSITY OF MINNESOTA PRESS

PRESIDENT COFFMAN:

This discussion will be continued by Dr. Fritz Machlup, professor of economics at the University of Buffalo, a graduate of the University of Vienna, and a writer of eminence on problems of economics, particularly of monetary theory and business cycle theory.

DR. FRITZ MACHLUP:

MR. CHAIRMAN, LADIES, AND GENTLEMEN: Can we control the boom? This is really a complex of many questions. In an attempt to see the implications of our problem more clearly I found it necessary to ask first these three questions:

1. Do we know what a boom is and can we clearly identify a given situation as a boom?

2. If we know what a boom is and if we know how to identify it, do we know how it might be controlled?

3. If we know what a boom is and if we know how to identify it, and if we know how it might be controlled, are we able to apply our knowledge and carry out the measures which we consider adequate?

Now, to the first question, What is a boom? When I mention in conversation "stopping the boom," I am usually interrupted by a violent protest and an assurance that the present situation is no boom, but just a slight recovery. When I am curious about the difference between recovery and boom, I am usually answered: "Well, don't you know, the boom is the period which leads to the collapse!"

If this is thought to be a definition, we are in another predicament, and the answer to the question whether we can control the boom becomes "no" by force of logic. Of course, if you call "boom" the period leading to a collapse, then you *can't* control a boom, because if you can control it so that no collapse follows, then it is no boom.

The predicament would be, again by force of logic, that we could never identify a boom before it was too late, because we could identify it only by the collapse. Now that won't do. Nobody will like an economist who answers, when asked whether we are experiencing a boom, "Wait a year or two. Should you see a breakdown, then it was an unhealthy boom; should everything be all right, then it was a healthy recovery."

We had better give up a definition that allows us to recognize the situation only afterward, when it has passed. I suggest that we define a boom as a spectacular rise in business activity, either in some parts or in several or all parts of the economic system. It is a matter of judgment to find a rise normal or spectacular; but after all, may not even economists have some power of judgment?

The rise in business activity is measured in money values. It may be due to increased prices or to increased volume, usually both. Many people take the rise in volume as an absolutely healthy development and are uneasy only about a sharp rise in prices. A smaller group of economists — I am among them — extend the skepticism to the boom in business volume because they doubt that a very quick growth can be free from disproportionalities and maladjustments.

Looking back to the period preceding the collapse of 1929, we find a really spectacular price rise only in the stock markets and real estate markets, while the industrial boom was almost exclusively one of increased volume. This very fact made most of the observers believe everything was sound and firm in the industrial situation.

Here are a few figures from the 1929 boom:

Industrial output rose from 1924 to 1929 by 25 per cent, or alone from 1927 to 1929 by 12 per cent.

Construction contracts awarded rose from 1924 to 1928 by 42 per cent.

Loans and investments by banks rose from 1924 to 1929 by 33 per cent.

Bank debits outside of New York (that is, outside of stock market transactions) rose from 1926 to 1929 by 78 per cent.

It was thus a time of great technical improvement and thus of lower production cost, so that the monetary expansion did not express itself in the form of increased commodity prices. Otherwise, and usually, such monetary expansion shows itself both in higher volume and higher prices.

All financial and industrial crises and depressions observed in the past two centuries were preceded by rapidly rising business activity, and so it was natural to take the rapidity or extent of the increase, the boom, as the cause of the breakdown. A number of theories were advanced to explain the sequence. Some of these theories may be

called optimistic because they hold that certain avoidable defects in our financial institutions and certain avoidable mistakes in their operations are to be blamed for the collapse from the heights to which business had been carried in the boom. That is to say, they believe in a control which does not aim at avoiding the boom or at checking the boom, but in a control which avoids a fall from the high level attained. The pessimistic theories do not find that avoidable defects and mistakes, but developments inherent in too rapid or too marked a growth, are the cause of the collapse. The control recommended by them would have the function of avoiding the boom, of slowing down the financial and industrial expansion.

Why in the world should anything be wrong with a process which brings unemployed labor back to unutilized machines? Why should a breakdown threaten when the economic system begins to work as it is held desirable, that is to say, with the employment of the resources available for production? Theories which assert that there might be anything wrong in this process are indeed trying to explain something which seems to offend common sense. Unfortunately, I shall have to try it. And I have to invite you to follow me through a bit of quite abstract reasoning.

Let us start out with a situation of large unemployment. Why are workers, willing to work at the going wage, not hired by producers? Obviously, because the latter do not expect that they could sell the product of additional workers at prices which would permit paying the wages of the hired workers. Two ways, in the main, are open to change this situation. One is a reduction in labor cost (or production cost in general) so that the formerly insufficient revenues from selling more output become now sufficient to pay for its cost. The other is an increase in the demand for the product, so that a higher revenue is expected if an increased output is sold, and this higher revenue can then take care of the wages of the workers who are taken on. An increase in the demand for one product which is not a decrease in a demand for another product can only come from an increase in the money and credit available to, and used by, buyers. In other words, credit expansion increases the demand for products and for means of production. *More money* is available to buy more labor at given wage rates — whereas in the first way to which we referred, a given money fund would buy more labor at *lower wage rates*. Both ways involve, as a rule, reduced real-wage rates, the first through reduced money-wage rates, the second through higher prices, which make a given wage buy fewer goods. The reduction of real-wage rates is as a rule a necessary concomitant of any increase in employment; I said real-

wage *rates,* however. The total real income of the laboring class will usually rise, if real-wage rates are reduced. Indeed, the wage income of the individual worker may rise also if, consequent upon a fall in wage rates, part-time jobs become full-time jobs. And the wage income of families may rise if, consequent upon a fall in wage rates, unemployed members of a family find employment. And the wage income of the whole labor class may rise, not only in real terms, because of lower commodity prices, but also in terms of money, if the rise in employment is relatively greater than the reduction of the money-wage rates.

I mentioned two ways in which re-employment may be brought about, although I know how unpopular one of them, the wage-cut method, is. I mentioned it because I believe that it is the one that contains fewer germs of maladjustment. If a certain amount of money can buy more labor, if therefore production cost falls, and finally a certain amount of money can buy more goods — production and employment are increased with less danger of a setback. But I repeat that this method is unpopular and that a great many resistances are present to make it almost impracticable.

The second method achieves higher employment through *monetary expansion.* Its working can be described by this very simplified picture. There is first an initial act of borrowing — be it by private industrialists who cannot postpone any longer certain outlays which they have postponed for several years, or be it by the government which does not wish to wait until private investment picks up and undertakes public works. These investments, which constitute demand for producers' goods, bring new purchasing power into the hands of consumers, who have now an increased demand for consumers' goods. The spending of these moneys will invite some more private investment to be undertaken. Public investment and increased private investment, both financed by newly created bank credit, form again demand for producers' goods. Spent for the production of the producers' goods, the new money becomes income of the employed factors of production, i. e., laborers and owners of equipment. The increased income will again constitute demand for more consumers' goods. And this may continue as a cumulative process.

The three principles involved in this process are: (1) increase in monetary circulation (which in the United States is seen chiefly in demand deposits and their turnover); (2) so-called secondary spending of the new money by the factors employed through the investment, which was financed through the credit creation; (3) the accelerated demand for investment goods derived from the increased demand for consumers' goods.

I have to explain this principle of acceleration of demand. Imagine that a thousand locomotives are needed to handle a certain amount of traffic. Fifty locomotives a year are brought to replace outworn ones. Should the traffic increase by 10 per cent, a hundred more locomotives would be needed, so that a hundred and fifty locomotives instead of fifty have to be ordered. Thus a 10 per cent increase in demand for transportation has caused a 200 per cent increase in demand for locomotives. The increased demand for locomotives will in turn cause an increased investment demand of the locomotive producers, and so on and so forth. But bear in mind that the demand for locomotives will stay at the higher level only as long as the demand for transportation goes on rising by 10 per cent a year. Should the demand for transportation once rise by only 5 per cent rather than 10 per cent, the locomotive demand would fall from one hundred and fifty to one hundred, i.e., by 33⅓ per cent.

This situation in itself would not cause a general setback, because people who do not use more income for traveling may use it for other things, provided they have a rising demand for something. But can we expect total monetary demand to rise indefinitely? No, this cannot be, for several reasons.

Bear in mind the driving forces of the described uplift of the system. There was investment financed with borrowed money. There was increased consumers' demand when the new money was paid to the factors employed by the new investments. There was incentive for more investment when the increased consumers' demand was felt by the producers. Thus investment of borrowed money pushed up consumers' demand, and consumers' demand, in turn, pushed up investment of more borrowed money. But this is not a *perpetuum mobile.* The process which is in its beginning cumulative begins after a certain period to work with dwindling forces. The slowing down of new investment of borrowed funds makes consumers' demand rise at a decreasing rate, which in turn brings investment to a still slower pace, and this involves a setback in the production of producers' goods, causing a downturn.

This was only one among several possible explanations of the sequence of events. Other explanations stress other elements, and necessarily so, because the events leading to the downturn are not always the same. Of great importance is the probability that the continuation of the investment spell is made impossible through a lack of liquid capital. Rising interest rates and rising costs of factors of production make further investment unprofitable, and stop full operation in the investment industries.

Optimists are inclined to dispose of both dangers. Lack of liquid capital? Rising interest rates? Let the Reserve banks manage that inconvenient situation. The Reserve banks are able to prevent stiff money and to furnish the banks with enough reserves for further expansion. Dwindling investments by private industry? Let the government take care of this. There are enough fine public works to be undertaken. Public investment can fill the gap left by private investment.

Such optimism is, to my mind, inflationism. The program amounts to no less than this: Supply all the ever increasing demands for capital by means of the creation of new bank money; and do it so liberally that the interest rates are kept from rising; or, should private investment demand fall off, finance public works by means of new bank money: in other words, go on and on inflating the circulation. I agree that the setback can be postponed by these methods, but I hold that a final collapse cannot be escaped. To maintain the rate of investment at the boom level would call for a continuous increase of the means of circulation. The consequences of inflation, however, would eventually force that fall in investments which had been prevented from taking place at an earlier moment. The diminution of the rate of investment does not seem to be avoidable and the setback in investment, then, would make it evident that the expansion of industry during the upswing was disproportionate. The distribution of the monetary demand for the outputs of the different industries during the period of credit expansion is different from the distribution of demand after the credit expansion slows down or stops. That is to say that a large part of the economic system seems to be doomed to experience another paralysis.

So far we have not mentioned one type of control: speed control. If the monetary expansion was carried on at a very slow and cautious pace, could then the disproportionalities in the industrial structure not be avoided? I am doubtful about that. It seems to me that monetary expansion, as soon as it exceeds contraction through hoarding in its various forms, hence, as soon as it begins to have positive effects on industrial production, begins also to misdirect industrial expansion. The three principles mentioned before may act whether this expansion is fast or slow. And yet, there are a number of aggravating elements if the expansion is rapid, which can be avoided if the expansion is slow. The dangers of outright mistakes in estimating future demands are much greater in the overoptimistic mood concomitant with booming business. Thus a more modest prosperity, which perhaps may last

longer than a buoyant boom, is likely to be followed by a milder setback than the boom.

This seems, then, to be the real meaning of a control of the boom: to slow down expansion to a most modest pace, with the result, not of avoiding a setback, but of making it less violent, less detrimental. And in this sense, but only in this sense, I venture to answer the second of my three leading questions with "yes!" Yes, we know how the boom might be controlled. Now we may proceed to our last question, which asks whether we are able to carry out the measures which we consider adequate.

The control consists in avoiding a rapid expansion in credit and circulation. How rapidly have we been advancing since 1933? The loans and investments of our member banks rose from the second quarter of 1933 to the end of 1936 by more than 30 per cent, and the check deposits rose by approximately 70 per cent. Total bank debits outside of New York City (with its financial transactions) rose from December, 1932, to December, 1936, by more than 81 per cent; in the last two years alone by 48 per cent.

To prevent money creation and money use from continuing at their dangerous pace would be the first demand in a boom-control program. What were the forces making for the past increase and possibly making for a continuing increase in circulation? Let me point to these four forces: (1) government borrowing, (2) gold inflow, (3) borrowing by trade and industry, (4) greater use of liquid balances.

Our Administration started to check two of these forces. The effect of further gold inflow on member bank reserves was eliminated through the new sterilization policy of the Treasury. And borrowing by trade and industry was checked, in its modest beginnings, through the rise in reserve requirements of member banks, making it a bit harder for them to expand loans. However, this alone cannot have a lasting effect. Higher reserve requirements constitute a barrier to expansion if the reserves are kept from increasing. And, should the turnover of bank deposits begin to rise, then the only available offset would be an open market policy of the Federal Reserve banks which would endeavor to reduce bank resources through selling securities from the Federal Reserve portfolio. Credit control in the discussed sense works therefore only if the Federal Reserve banks do not buy any government bonds, because this would increase excess reserves of member banks, and if the Federal Reserve banks are prepared to start a sale of government bonds at any moment that it should become necessary.

What are the Federal Reserve banks doing instead? They are not preparing for a sale, but showing readiness to purchase government

bonds in order to support the market for these bonds, the market for new bonds which the government issues in order to finance its budget deficit. As long as the government has a budget deficit and as long as the Federal Reserve banks have to support the price of bonds by purchases, no control can be effective. Thus, even if we know how we might do something toward controlling the boom, we are not able to apply our knowledge at the time being.