



The Role of Expectations in Monetary Policy: Evolution of Theories and the Bank of Japan's Experience

Speech at the University of Oxford

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Chart 1

Monetary Policy Discussions by Economists in the UK in the First Half of the 20th Century (1)

John Maynard Keynes (1883-1946)



by Walter Stoneman, bromide print, July 1940 © National Portrait Gallery, London (CC BY-NC-ND 3.0)

Liquidity trap

"...after the rate of interest has fallen to a certain level, liquidity-preference may become virtually absolute in the sense that almost everyone prefers cash to holding a debt which yields so low a rate of interest. In this event the monetary authority would have lost effective control over the rate of interest.

But whilst this limiting case might become practically important in future, I know of no example of it hitherto. Indeed, owing to the unwillingness of most monetary authorities to deal boldly in debts of long term, there has not been much opportunity for a test."

-- The General Theory of Employment, Interest, and Money (1936)

Monetary Policy Discussions by Economists in the UK in the First Half of the 20th Century (2)

Ralph George Hawtrey (1879-1975)



by Walter Bird, bromide print, 1958 © National Portrait Gallery, London (CC BY-NC-ND 3.0)

Forward-looking monetary policy

"The explanation is that it is not the past rise in prices but the future rise that has to be counteracted.

The problem is a psychological one. As soon as the rate is high enough to offset the traders' hopes of future profits it becomes deterrent. And a very relevant factor in the psychological problem is the traders' expectations as to the intentions of the authority which fixes rates."

-- Monetary Reconstruction (1923)

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Chart 3

Monetary Policy Discussions by Economists in the UK in the First Half of the 20th Century (3)

Ralph George Hawtrey (1879-1975)



by Walter Bird, bromide print, 1958 © National Portrait Gallery, London (CC BY-NC-ND 3.0)

Effects of interest rate policy

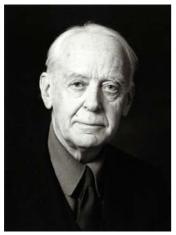
"The pressure applied to traders by a moderate rise in the shortterm rate of interest, say, 1 percent, is undeniably very slight. Yet apparently the Bank of England always counted on a rise of 1 percent or even of 0.5 percent having a noticeable effect."

"In the first place, when the use of Bank rate to restrict credit became an established practice, traders, being aware of the intentions of the Bank, were inclined to anticipate them. When Bank rate went up from 3 to 4 percent, a trader would reason that this was intended to have a restrictive effect on markets, and that, if the effect was not brought about, the rate would simply go higher and higher till it was. Those who took that view would restrict their purchases and demand would fall off, and so the 4 percent rate might be found potent enough, even though, if unsupported by traders' anticipations, a 6 or 7 percent rate might have been necessary."

-- A Century of Bank Rate (1938)

Monetary Policy Discussions by Economists in the UK in the First Half of the 20th Century (4)

John Richard Hicks (1904-1989)



Source: All Souls College, University of Oxford

Announcement effect of monetary policy

"I want to use the announcement effect of an act of policy to mean the change which takes place in people's minds, the change in the prospect which they think to be before them, before there is any change which expresses itself in transactions of any kind. It is the same as what Hawtrey calls 'psychological effect'; but that is a bad term, for it suggests something irrational, and this is entirely rational.

Expectations of the future (entirely rational expectations) are based upon the data that are available in the present. An act of policy is a significant addition to the data that are available; it should result, and should almost immediately result, in a shift in expectations. This is what I mean by an announcement effect.

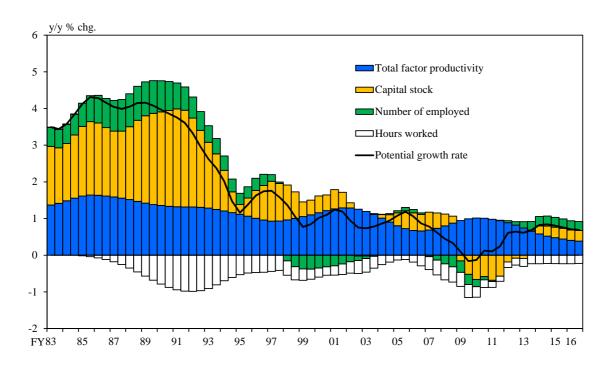
What I learn from Hawtrey's analysis is that the 'classical' Bank Rate system was strong, or could be strong, in its announcement effects."

-- Economic Perspectives (1977)

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Chart 5

Japan's Potential Growth Rate

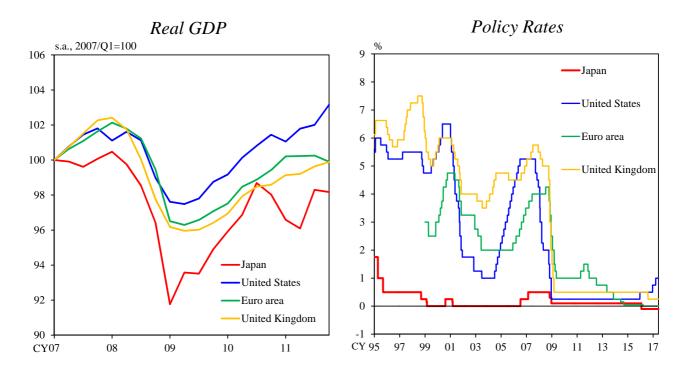


Note: The potential growth rate is estimated by the Research and Statistics Department, Bank of Japan.

Sources: Cabinet Office; Bank of Japan; Ministry of Internal Affairs and Communications; Ministry of Health, Labour and Welfare;

Ministry of Economy, Trade and Industry; Research Institute of Economy, Trade and Industry.

Real GDP and Monetary Policy Responses after the Global Financial Crisis

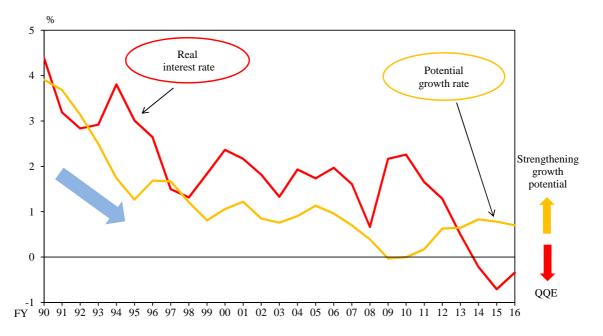


Note: For Japan, for the period when no target interest rate was adopted, figures for the policy rate are the interest rate applied on excess reserves. Sources: Cabinet Office; Haver; Bank of Japan; Federal Reserve; European Central Bank; Bank of England.

Chart 7

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Real Interest Rate and Natural Rate of Interest (Potential Growth Rate)

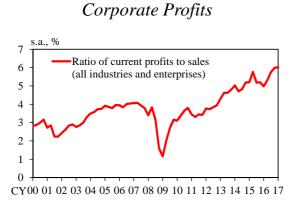


Notes: 1. The real interest rate is calculated by subtracting the year-on-year rate of increase in the CPI (excluding fresh food and energy) from the yield on 10-year JGBs.

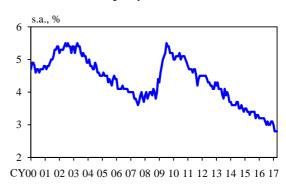
2. The potential growth rate is estimated by the Research and Statistics Department, Bank of Japan.

Sources: Ministry of Internal Affairs and Communications; Bloomberg; Cabinet Office; Bank of Japan; Ministry of Health, Labour and Welfare; Ministry of Economy, Trade and Industry; Research Institute of Economy, Trade and Industry.

Effects of "Quantitative and Qualitative Monetary Easing"



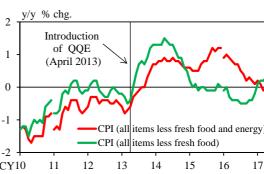
Unemployment Rate



Hourly Cash Earnings



Consumer Prices



Sources: Ministry of Finance; Ministry of Internal Affairs and Communications; Ministry of Health, Labour and Welfare.

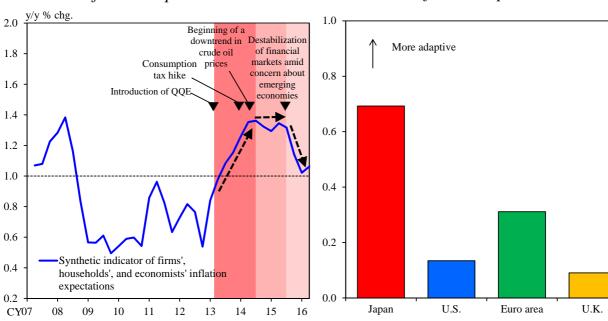
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Chart 9

Inflation Expectations

Synthetic Indicator of Inflation Expectations

Contribution of Adaptive Component to Inflation Expectations



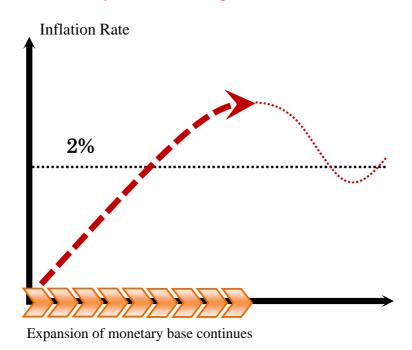
Note: The chart shows the contribution of observed inflation to inflation expectations 1 year ahead.

Sources: Bank of Japan "Comprehensive Assessment: Developments in Economic Activity and Prices as well as Policy Effects since the Introduction of Quantitative and Qualitative Monetary Easing (QQE)" (September 2016).

Consensus Economics Inc., "Consensus Forecasts", etc.

Inflation-Overshooting Commitment

• The Bank continues <u>expanding the monetary base</u> until the year-on-year rate of increase in <u>the observed CPI</u> (all items less fresh food) <u>exceeds the price stability target of 2 percent and stays above the target in a stable manner</u>.



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