How Can the Bank of Japan Contribute to Japan's Economic Recovery?

by

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1. Introduction

During the past two decades, the Bank of Japan has become one of the most widely studied central banks in the world, and scholars have focused on both its policy outcomes and its institutional design. Though recently focused on the role of monetary policy in Japan's economic stagnation, this attention was initially motivated by a very positive set of policy outcomes. The Bank of Japan supported rapid reindustrialization during the High Growth Period from 1950 to 1970, which achieved 10 percent per annum growth in real GDP with only moderate inflation and no financial distress (Cargill, Hutchison, and Ito, 1997). Following this, as Figure 1 shows, the inflation rate did rise significantly in the early 1970s, to such a degree that the period is referred to by many Japanese as the period of "wild inflation," but the Bank of Japan was able to reduce the inflation rate and

lower inflationary expectations with a determined and credible reduction in monetary growth (Pigott, 1980).

By 1975, the Bank of Japan has achieved price stability and continued to maintain price stability throughout the 1980s, in stark contrast to the policy outcomes of most central banks, as Table 1 illustrates. More important, the commitment to price stability mad it possible for Japan to avoid the inflation, disinflation, and recession sequence that characterized most developed countries in response to the second set of oil price shocks in 1979-80. By the late 1980s, Hutchison and Judd (1989), together with many other observers, concluded that the Bank of Japan's policy outcomes made it one of the most credible central banks in the world. More importantly, the Bank of Japan attracted attention because it achieved price stability while being one of the world's most dependent central banks (Cargill, 1989). The policy outcomes of the Bank of Japan contradicted the widely held view that formally independent central banks generated better price stability outcomes than dependent central banks (Alesina and Summers, 1993).

Yet even prior to the burst of the bubble economy in 1990, there were nonetheless several instances of negative outcomes caused by Bank of Japan policy. The inflation of the early 1970s was the result of a joint objective of the Bank of Japan and the Ministry of Finance to limit yen appreciation in the wake of the collapse of the fixed exchange rate regime. The Bank of Japan did become concerned about the effect of monetary expansion on the price level, and wanted to shift towards tighter policy, but efforts to raise the discount rate were resisted by the Ministry of Finance. The Ministry finally relented by the end of 1973 and as a result, the Bank of Japan achieved a degree of

political independence that rendered formal estimates of Bank of Japan dependence misleading (Cukierman, Webb, and Neyapti, 1992).

In the late 1980s, the Bank of Japan, again focusing on limiting yen appreciation, permitted monetary expansion in the late 1980s that in hindsight contributed to the asset bubble. Ueda (2000) alleges that this focus on limiting yen appreciation was caused by the Bank's lack of independence, and that a more formally independent Bank of Japan would not have permitted the rapid increase in high powered money. As Figure 2 shows, there was a rapid rise in the monetary base through 1990, along with significant growth of money (as measured by M2+CD). Ueda's view is not widely accepted, however, and is inconsistent with the concerns and issues of Bank of Japan policy in the latter part of the 1980s. In May 1989, the Bank of Japan raised the nominal discount rate (as shown in Figure 3) and subsequently burst the asset bubble. The Bank of Japan continued a tight policy for several years, finally shifting toward an easy monetary policy in 1993. In February 1999, the Bank of Japan adopted an unprecedented "zero rate policy" which it only departed from briefly in the latter part of 2000, and then in March 2001 it adopted "quantitative easing" by focusing on reserve targets rather than the call rate. The Bank of Japan subsequently increased the quantitative easing targets, and by late 2002 increased the growth rate of high powered money to a range between 20 to 30 percent per annum.

The Bank of Japan's policy from the 1990s through the first years of the new century has been widely criticized both outside and inside of Japan, despite arguments from the Bank of Japan that it has done everything possible, and that monetary policy cannot be made more expansionary without risking future inflation, fiscal irresponsibility, and the financial strength of the Bank of Japan. Yet the fact remains that the price level

has continually declined in Japan since 1995, and this price deflation is illustrated in Figure 1 for the GDP Deflator, the Wholesale Price Index, and the Consumer Price Index. There is evidence as of early 2004 that the deflation process has abated somewhat and the economy may be rebounding. However, it is still difficult to account for the Bank of Japan's policy outcomes in the 1990s, though an important part of the explanation revolves around the revision of the 1942 Bank of Japan Law in June 1997 that rendered the Bank significantly more independent effective as of April 1, 1998.

In the context of the Bank of Japan's "high period" of policy outcomes and the more recent "low period," this paper addresses the question of how the Bank of Japan can contribute to Japan's recovery after almost fifteen years of economic, financial, and political stress. Section 2 outlines the causes of Japan's distress, to properly place the role of the Bank of Japan in context. We will argue that the Bank of Japan cannot be held responsible for Japan's economic and financial distress, but the failure to prevent the price level from declining has limited Japan's potential for recovery. The Bank of Japan needs to establish positive expectations of price inflation, for until the Bank of Japan reverses the deflationary process, Japan's economy will not recover and efforts to reform the economy will be more difficult. Section 3 details how deflation adversely impacts the economy in general, and in particular why it is such a problem in Japan. Japan is the most prominent example of price deflation since the 1930s, and virtually the only sustained example in a developed economy since then. Section 4 outlines some of the issues related to implementation of this policy, and in section 5 the Bank of Japan's resistance to more expansionary monetary policy is considered, with several explanations offered to account for it. Section 6 concludes the paper.

2. The Bank of Japan's Role in Japan's Economic and Financial Distress

The general outline of Japan's economic and financial distress is now well understood. The following elements are based on the outline presented in Cargill and Parker (2004b), which itself is a summary of views expressed in many places (e.g., Cargill, Hutchison, and Ito, 1997 and 2000; Hoshi and Patrick, 2000; and Lincoln, 2001).

First, in the late 1970s and 1980s, Japan commenced a financial liberalization process that -- despite the rhetoric of liberalization -- either left in place or increased the emphasis on key characteristics of the old Japanese financial regime. In particular, the financial system was dominated by mutual support systems between politicians, financial institutions, and regulatory authorities that were designed to limit bankruptcy.

Second, regulatory and market innovations in this context subsidized risk taking, both by financial institutions and their business clients. That is, the failure to adopt a balanced approach to liberalization weakened the financial system by permitting enhanced opportunities to assume and manage risk in the context of a deposit guarantee system that subsidizes risk taking.

Third, this unbalanced liberalization process was enhanced by accommodative monetary policy in the second half of the 1980s, as the Bank of Japan focused on external considerations (i.e., limiting yen appreciation) in the context of high rates of real economic growth and low rates of inflation (Glick and Hutchison, 1994, and Ueda, 2000). The growth of both the monetary base and the money supply accelerated after 1986, but did not immediately impact the price level because of rapid real growth and increased productivity.

Fourth, the unbalanced liberalization process and the accommodative monetary policy combined to provide a foundation for asset inflation in the late 1980s. Increased monetary growth led to increased bank lending, which in turn increased the demand for land, real estate, and equities. The resulting high prices for land, real estate, and equities fed back into the banking system to support additional lending through the role of land as a common collateral for loans and the role of "hidden reserves" in determining bank capital. This contributed significantly to the run up in equity and land prices that characterizes Japan's economy in the second half of the 1980s as the "bubble economy."

Fifth, the adoption of the BIS capital-asset requirements in 1988 contributed to the problem by strengthening the relationship between bank lending and equity prices. Counting 45 percent of latent capital as part of tier II capital requirements ensured that increases in equity prices increased bank capital, which in turn, increased bank lending and supported increasing equity and land prices.

Sixth, regulatory authorities were unable to monitor this process adequately and failed to understand that the old-regime approach to regulation based on "administrative guidance" was inadequate in a rapidly change financial environment. While some commentators by the early 1990s were expressing concern over Japan's approach to liberalization, Japanese regulatory authorities believed they could manage the process and that the type of financial disruptions that had characterized the liberalization process in the United States (e.g., in the Savings & Loan debacle) and the Scandinavian countries were unlikely in Japan. In particular, Japan argued that moral hazard was not an issue and that administrative guidance could manage the process despite western-style transparency.

Seventh, the Bank of Japan initiated the decline in asset prices by raising the discount rate in May 1989, and continued with tight monetary policy through 1994. The decline in asset prices weakened bank balance sheets, reduced investment and consumption spending, and generated a nonperforming loan and borrower problem. In hindsight, the Bank of Japan continued too long with tight monetary policy and did not shift aggressively enough to monetary easing after 1993, when its policy changed.

Eighth, regulatory authorities were unwilling to close insolvent financial institutions, permit bankruptcy in the corporate sector, and instead adopted a policy of denial and avoidance by supporting accounting gimmicks, "white knight" mergers and other "convoy system" approaches in which the stronger supported the weaker. However, these policies of forbearance and forgiveness failed. Financial distress increased in the form of insolvent institutions and nonperforming loans. The unwillingness of regulatory authorities to allow bankruptcy to remove inefficient capital from the market, especially in the financial sector, and the willingness to forgive and forbearance as the preferred policy response, seriously interfered with financial intermediation and credit allocation. The banking system continued to support weak borrowers and those who could not obtain credit from the banking system shifted to several government banks that are part of the Fiscal Investment and Loan Program (FILP). Postal deposits grew relative to total deposits in response to increased concern about the stability of the banking system, and thus provided increased funding for government banks through the FILP (Cargill and Yoshino, 2003).

Ninth, a number of fiscal stimulus packages were enacted that did little to improve the situation. Much of the spending was traditional "pork barrel" spending and

much in the form of loan guarantees. As a result, Japanese Government Bonds (JGBs) grew throughout the decade, and as of 2004 now stand at almost 200 percent of GDP. Combined with the nonperforming loan problem embedded in the private banking system and the nonperforming loan problem embedded in the FILP, Japan has accumulated an unprecedented amount of debt.

Finally, the Bank of Japan not only imposed tight monetary policy for too long a period of time in the early 1990s, but it also did not provide sufficiently stimulative policy to prevent a gradual but definite downward movement in the price level. When they acted, policymakers focused on decreasing nominal interest rates but failed to recognize that the decline in prices had increased the real rate of interest, which we show in Figure 4. This exposed the Bank of Japan to a liquidity trap, increased the real burden of servicing debt, enhanced the nonperforming loan and borrower problem, and adversely impacted aggregate demand.

What does this suggest about the role of Bank of Japan policy? Keeping in mind that hindsight is always easier than foresight, the Bank of Japan's policy error in the second half of the 1980s would not have been so severe had it had not occurred in the context of an incomplete and unbalanced liberalization process (Cargill, 2001). The resistance to a more expansionary policy after 1993, however, is not so easy to dismiss. While serious structural problems existed whose solution would impose adverse effects on the real economy, Bank of Japan policy has now made the structural reforms even more difficult.

Furthermore, the Bank of Japan's willingness to allow deflation between 1994 through 2004 is difficult to explain. Decades of theoretical, empirical, and historical

research has demonstrated that central bank policy does have significant influence over the price level, and that continued declines in the price level most likely suggest an insufficiently stimulative monetary policy. This view does not suggest that a more aggressive monetary policy would have been sufficient to return Japan to sustained and stable economic growth in the absence of the structural changes that have been slow to evolve in Japan, but rather that such a policy would have been, and remains, a *necessary* condition for recovery.

The answer to the question of how Bank of Japan policy can contribute to Japan's recovery is thus straightforward. The Bank of Japan needs to adopt a credible monetary policy that creates a low and steady rate of inflation, and the resulting expectations of inflation must be permanent. This is the only way in which expectations of declining prices can be reversed; every time the Bank of Japan signals that the current monetary easing is only temporary, it undermines its own policy.

3. Why is Deflation a Problem in Japan?

Cargill and Parker (2003) discuss several adverse effects of anticipated price deflation that render any given rate of deflation more serious than an equivalent rate of inflation, and argue that deflation generates a "discontinuity" in the conduct of monetary policy often referred to (somewhat inaccurately) as the liquidity trap. We follow this argument to enumerate the adverse effects of deflation and then explain how these effects generate a discontinuity in the conduct of monetary policy.

As Fisher (1933) argued after the deflation of the Great Depression, unexpected deflation increases the burden of servicing outstanding debt and increases bankruptcy.

This adverse effect of anticipated deflation is mitigated to some degree by adjustable rate debt instruments; however, at any point there exists a large volume of fixed-interest debt and adjustable rate instruments such as mortgages are limited in how far the nominal rate can be adjusted downward. This is especially the case in Japan, with large amounts of outstanding debt fixed in nominal value. High bankruptcy rates in turn reduce aggregate demand by reducing investment spending and the willingness of banks to lend, hence reducing the size of the money multiplier. Banks are induced to shift portfolios toward safe assets such as government bonds rather than lend to borrowers who may have difficulty service debt, and Japanese banks have done just that.

The real rate of interest remains constant in the context of anticipated inflation; however, enough anticipated deflation will increase the real interest rate because the nominal interest rate has an effective lower bound at or near zero. Raising real interest rates affects aggregate demand by reducing investment spending and may also offer an incentive for consumers to save and postpone their spending. In Japan, as Figure 4 shows, the current real interest rate is not historically unprecedented, but nor is it low enough to effectively stimulate the economy.

It is well known that anticipated inflation increases the return on holding commodities and thus induces a shift in portfolios from money to commodities. Cagan (1956) demonstrated this principle in his study of hyperinflation. The reverse is possible in the case of deflation, and the Cagan-type effects might be generated with a deflation rate considerably less in absolute terms than the type of inflation rates studied by Cagan. Deflation increases the value of money balances while reducing the return on holding commodities, thereby encouraging the substitution of money for commodities.

These effects of deflation have been empirically identified by Cargill and Parker (2004a and 2004b) by visual inspection of real interest rates, velocity, and money multipliers and by econometric estimates of consumption and money demand functions. In the 1990s, real interest rates rose, velocity declined, money multipliers declined, money demand has been positively influenced by deflation, and consumption has been negatively influenced by deflation. In Figure 2, we showed the deposit expansion multiplier for the Japanese money stock (M2+CD), which decreased by more that 40 percent between 1992 and 2002, effectively canceling out the stimulative effect of a rapidly rising monetary base.

These elements combine to generate a discontinuity in the conduct of monetary policy. First, deflation increases the demand for money and reduces the deposit expansion money multiplier, contributing to further deflation and making it more difficult for monetary policy to reverse the process. Second, the standard interest rate-expenditure channel becomes less reliable because of the inability to reduce nominal interest rates, placing more emphasis on nontraditional approaches to monetary expansion such as large scale open market operations in government bonds or other assets. Third, increasing real interest rates reduce aggregate demand through reduced consumption and investment spending putting more pressure on the downward trend in prices. Yet unlike the traditional liquidity trap characterization, which following Krugman (1999) has been used to discuss Japanese monetary policy, this discontinuity is based on the view that monetary policy has not become impotent. However, the longer the deflation process is permitted to persist the more difficulty monetary policy has in reversing the process.

Monetary policy has not become impotent in Japan, but the Bank of Japan has failed to establish a basis for positive price expectations.

4. How Does a Central Bank Create Low and Steady Inflationary Expectations?

Friedman's well-known statement that inflation everywhere and at all times is a monetary phenomenon pertains to deflation as well. While there are cases when deflation can be attributed to supply shifts, such as in China during the late 1990s (Cargill and Parker, 2004a), deflation over a long period of time is still a monetary phenomenon. The empirical evidence that monetary policy in Japan has been restrictive for the entire decade of the 1990s is impressive (e.g., Hetzel, 2003 and McCallum, 2003). Bank of Japan policy has even been criticized by representatives of other central banks (e.g., Bernanke, 2003; Beebe, 2001; and Blix, 2001) and by many observers both inside (e.g., Ito, 1999) and outside of Japan (e.g., Posen, 1998).

Thus, the solution to deflation is straightforward. Bank of Japan policy needs to continue the policies that have recently increased the growth of high powered money to the 20 to 30 percent range, and they need to signal that the inflation rates it creates will be low, steady, and permanent. These policies were introduced in late 2002 and given the lags in the effect of monetary policy, the positive impact on the economy and price level is only now beginning to manifest itself. The Bank of Japan needs to continue this policy, and perhaps even consider an even more rapid expansion.

Continued quantitative easing may require large scale purchases of JGBs, purchases of nongovernmental assets, or other means of providing funds to the public. The reserve-banking-credit-spending channel has been weakened as a result of the

nonperforming loan problem, insolvent institutions, the unwillingness to impose large scale bankruptcy on the real sector, and the banking system's concern with capital adequacy. The Bank of Japan as a result may need to bypass the banking channel and provide funds more directly to the public.

These types of nontraditional monetary policy, however, require close cooperation between the Bank of Japan and the Ministry of Finance for three reasons: first, large-scale purchases of JGBs will require a commitment from the Ministry that any accounting loss to the Bank of Japan from future interest rate increases will be covered by the government; second, the distribution of funds created by the Bank of Japan will require government spending and/or reduced taxes; and, third, the Ministry must accompany this degree of cooperation with assurances that meaningful structural reform will be accomplished and that the close cooperation is consistent with the institutional design of the Bank of Japan.

Unfortunately, the basis for this degree of cooperation does not yet appear to be present. There have been bitter conflicts between the Bank of Japan and the Ministry, which reached a low level during the discussions over revising the 1942 Bank of Japan Law when the Ministry leaked to the press information about salaries of Bank of Japan officials and the number of golf club memberships held by the Bank of Japan. Cooperation between the Bank of Japan and the Ministry of Finance is needed for the Bank to continue and expand on its current policies.

The Bank of Japan itself needs to be more transparent about the goal of establishing positive inflation expectations. The Bank of Japan has in recent announcements indicates it will continue to pursue an expansionary policy until deflation

is reversed. However, this falls short of a positive policy statement that the goal is to achieve a low and positive inflation rate. The Bank of Japan has rejected as simplistic calls for inflation targeting or any type framework committing monetary policy to a specific inflation goal. While there are legitimate issues over inflation targeting as a solution, nonetheless the Bank's arguments against any type of targeting suggest to the public either an unwillingness or an inability to achieve an inflation target. The Bank of Japan continues to suggest that deflation is to some degree a nonmonetary phenomenon, due either to Chinese imports or structural problems, and thus again suggests to the public an inability to achieve such a policy goal.

This perceived lack of ability and/or willingness to achieve an inflation target has a greater impact on the public's expectations of price movements because of the recent institutional redesign of the Bank of Japan toward greater independence. This change in structure was given widespread public attention with the expectation that it would improve monetary policy. The reverse has been the case, however. Monetary policy outcomes have deteriorated to a low point not equaled during any period in the postwar period when the Bank of Japan operated under a dependent relationship with the Ministry of Finance.

5. Interpretation of Bank of Japan Policy

Why has the Bank of Japan been so reluctant to pursue a monetary easing and establish long-term inflation targets to end the deflation? Though it is not currently possible to know for sure, there are several possible interpretations of the Bank of Japan's

willingness to permit the gradual decline in the price level since 1994 and resist outside recommendations for more aggressive action.

First, there may be differences between the Bank of Japan and the Ministry of Finance in how each views resolution of the financial distress. The Bank of Japan has been a more enthusiastic supporter of financial liberalization and market discipline, whereas the Ministry of Finance has resisted aggressive resolution of the banking and nonperforming loan problem. The Ministry has been more willing to adopt a policy of forgiveness and forbearance than the Bank of Japan. The Bank of Japan may be concerned that in the absence of a firm commitment to resolve the financial distress, more aggressive monetary expansion through the banking system will be used to support further postponement of the structural changes that are required.

Second, the Bank of Japan has expressed concern that large scale purchases of JGBs will contribute to reducing fiscal discipline in the context of record government deficits and a ratio of JGBs to GDP approaching 200 percent. The Bank of Japan has expressed concern that it will be placed in the same position as in the 1930s when large government deficits were monetized generating high rates of inflation.

Third, the Bank of Japan has expressed concern about its capital position arguing that large scale purchases of JGBs will expose the Bank to major interest rate risk when inflation and higher interest rates return. In widely cited speeches, both former Governor Masaru Hayami (Pilling, 2003) and Governor Toshihiko Fukui (2003) expressed concern about Bank of Japan capital and its relationship to central bank credibility.

Fourth, the transition from a dependent to a more independent central bank combined with the Bank of Japan scandals that forced the resignation of its Governor and

Deputy Governor in 1998 may have diverted the Bank of Japan's attention at a critical point. This factor, however, is of limited use since it cannot account for Bank of Japan policy before 1998 and it is unlikely to have had a long lasting effect.

Fifth, however, the Bank of Japan's formal independence may have also contributed to a more conservative approach to policy than required by the circumstances. Cargill, Hutchison, and Ito (2000) suggested the Bank was caught in an "independence trap." Institutional independence may have made the Bank of Japan less willing to enter into a dialog with outsiders, especially the Ministry of Finance. It is possible the Bank's resistance to inflation targeting was partly conditioned on the fact that the recommendation for inflation targeting came from the Ministry of Finance. To paraphrase Samuelson (see Cargill, 2001, p. 227), the Bank of Japan has become a "prisoner of it's own independence."

In all probability, each of the above factors play a role in understanding the Bank of Japan's reluctance to engage in more aggressive policy; however, the independence issue might very well be the most important. A case can still be made that formal independence is better than dependence since an independence central bank has the legal authority to resist overt political pressure to inflate the economy, but at the same time, formal independence has adverse public choice elements that can be offset with an inflation targeting framework.

6. Concluding Comment

How did the Bank of Japan contribute to Japan's economic and financial distress during the decade or more, and how can it now contribute to Japan's economic recovery? In this

paper, we review some of the history and evidence regarding the Bank of Japan's role, and while we do not consider the Bank of Japan to be the primary instigator of Japan's economic decline, we do argue that its monetary policy has remained far too conservative and this has made recovery much more difficult. The Bank of Japan has consistently underestimated the negative effects of price deflation, and has downplayed both its own role in helping to create the deflationary environment and its ability to reverse course. We consider several possibilities for why the Bank of Japan has failed to pursue a more appropriate monetary policy, including a lack of cooperation from the Ministry of Finance, and we note that its recent formal independence may have perversely been a contributing factor.

But most important, we argue that the Bank of Japan must now finally create an economic environment in which Japan can finally begin growing again, by creating public expectations that the era of deflation is over. It must finally pursue an aggressive and permanent monetary policy through whatever means it has at its disposal, whether traditional or innovative, to make prices rise at slow, steady, and permanent pace. To be credible, it must signal through action that it is willing to do this however it affects the value of the Yen, its own balance sheet, or its own independence. It must avoid any public statements or other actions that signal hesitation or a willingness to reverse course once the first sign of inflation returns. The Bank of Japan must make the Japanese public believe that it will no longer ever again permit price deflation.

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Figure 1: Japanese Growth and Inflation Rates

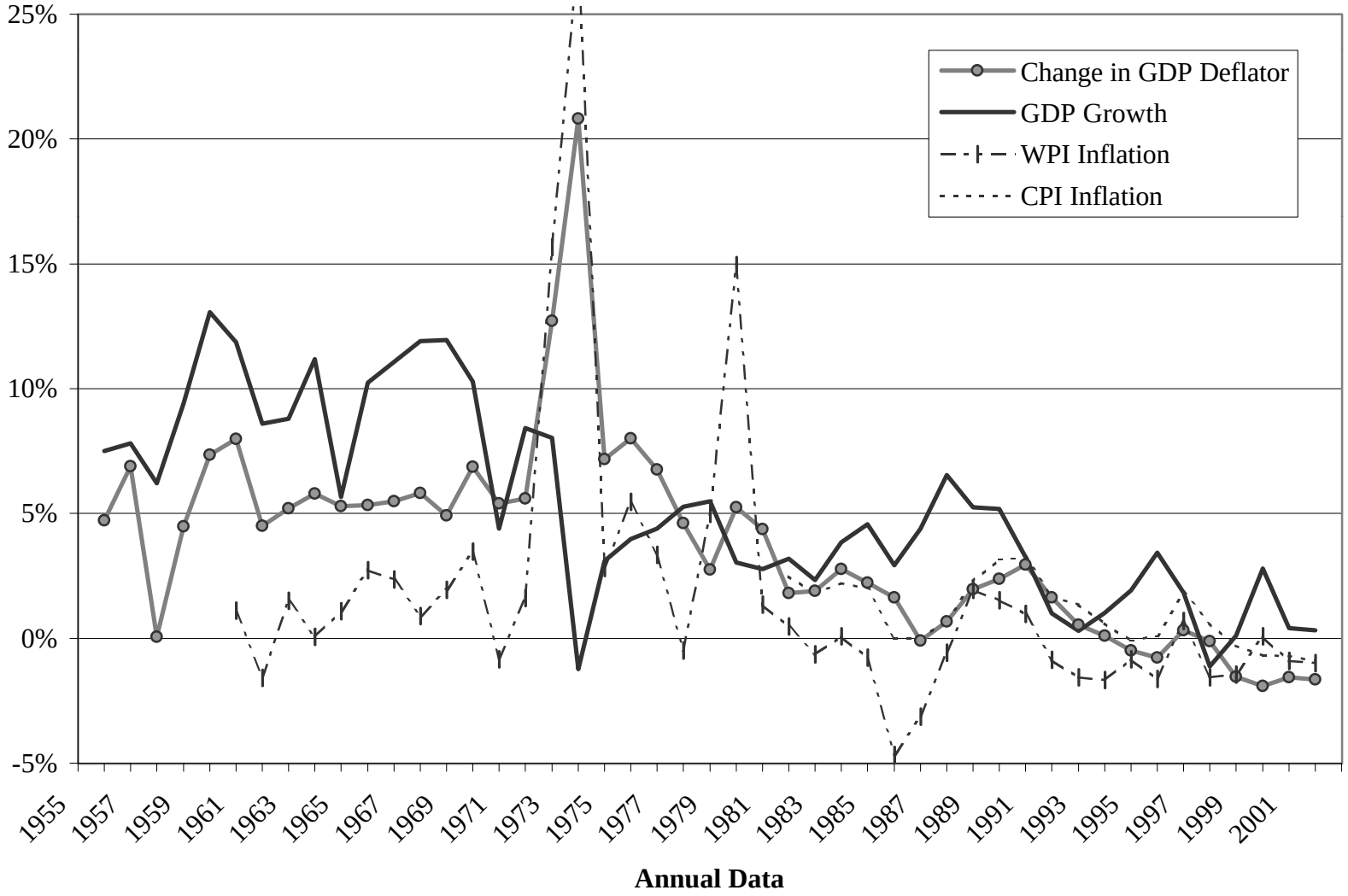

Figure 2: Japanese Monetary Aggregates (Relative to GDP)

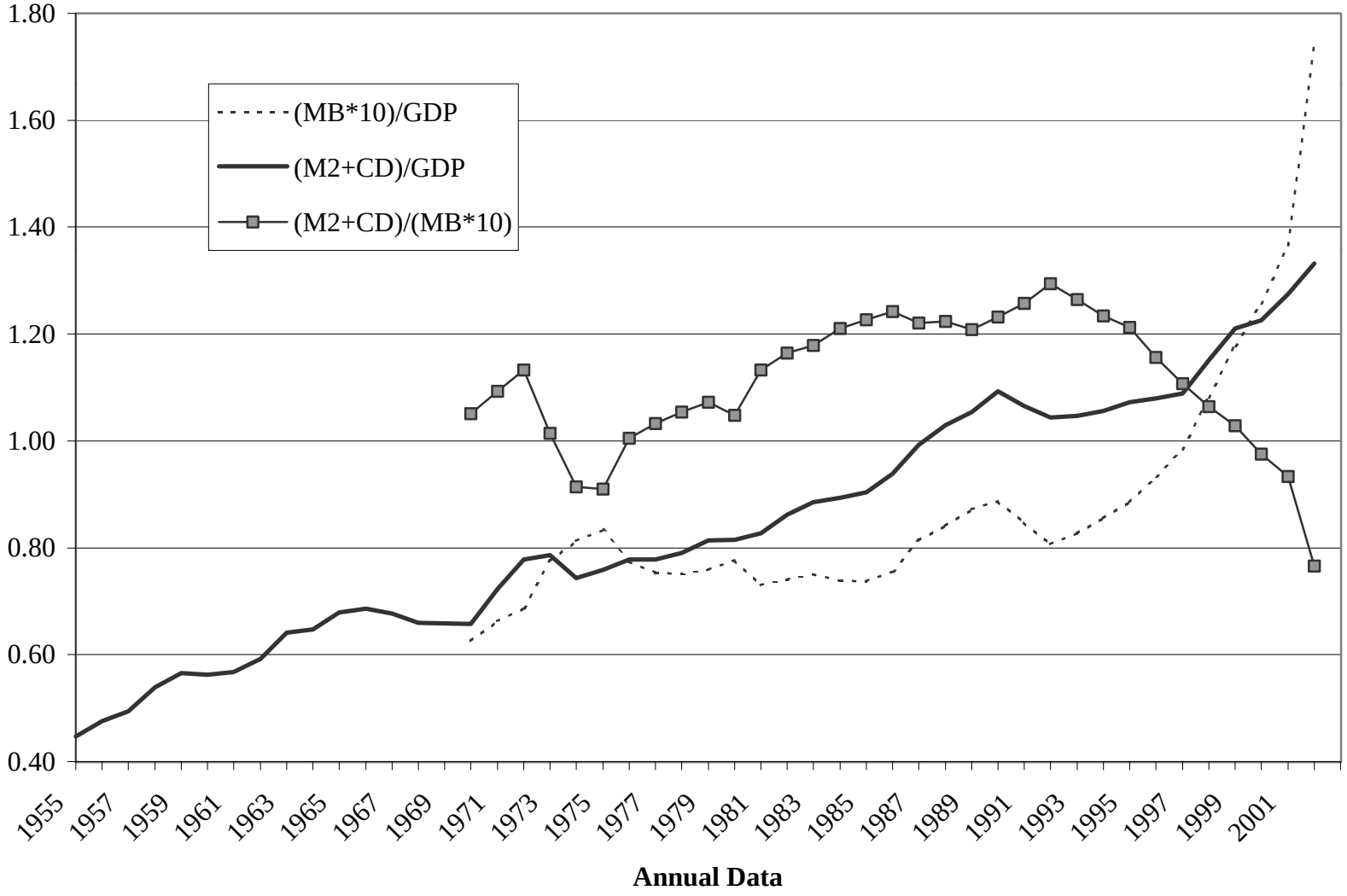

Figure 3: Japanese Nominal Interest Rates

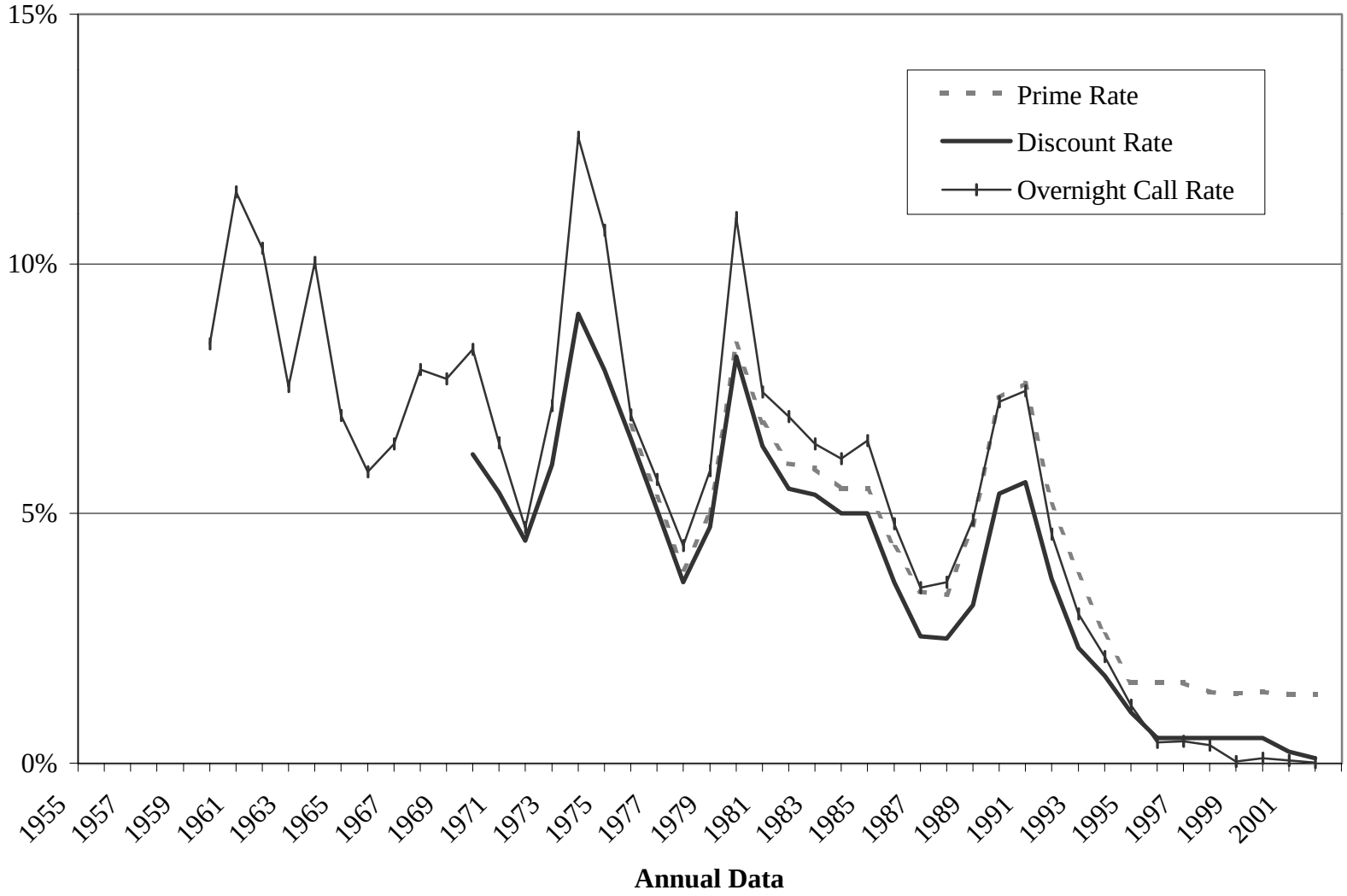

Figure 4: Japanese Real Interest Rates