shift as the deposit measure increases roughly three percent annually.

Chart 5 shows currency/deposit ratios for demand deposits and total transaction deposits. Like the turnover rates in chart 4, a striking feature of chart 5 is that total transactions deposits appear to be behaving more like pre-deregulation demand deposits than do demand deposits themselves. The ratio of currency to demand deposits shows a protracted rise, which begins at about the same time as the introduction of NOW accounts, but which goes far beyond the period usually identified with initial flows from demand deposits to OCDS.

Putting this evidence together, an interesting possibility emerges. As households switched transactions accounts from regular demand deposits to the new interest-bearing types, the demand deposits component was transformed. Both the turnover rates and currency/deposit ratios suggest that demand deposit behavior has changed dramatically since deregulation.

Within this scenario, we would expect to see the velocity of MIA rising faster during the early 1980s than did M1 velocity before deregulation. But, as noted earlier, the rate of M1A velocity growth from 1982 through 1984 was roughly comparable to that of pre-deregulation M1. This corresponds with the period in which the velocity of M1 was experiencing sharp declines. It seems possible that the relative stability of M1A velocity in the early 1980s merely reflected a coincidence of offsetting forces on the rate of velocity growth. While the changing composition of demand deposits would have tended to raise the average growth rate of M1A velocity through higher turnover rates, this tendency was offset by the velocity-depressing effects of disinflation. Thus, it is not the composition of transactions deposits that matters most, but the relationship of those deposits to nominal GNP.

Conclusion

In 1981, the nationwide introduction of NOW accounts caused a large shift of funds from demand deposits to OCDS, distorting the measured growth rates of both M1 and M1A. Since then, no other regulatory changes have had such disruptive effects. Nevertheless, the velocity of M1 has departed from its previous growth trend to such an extent that the FOMC chose not to set an explicit target for M1 in 1987.

The apparent stability of M1A’s velocity from 1982 through 1984 led some observers to suggest that this narrower measure of transactions monetary aggregates could be substituted for M1 as a target. However, data on demand deposit ownership shares, turnover rates, and currency/deposit ratios suggest that the observed stability of M1A’s velocity in the early 1980s may represent a coincidence of offsetting forces.

In the long run, the behavior of MIA velocity could be expected to rejoin M1 as its previous trend. The same factors that have affected M1’s behavior have also affected MIA, diminishing its usefulness as a potential policy target. The recent decline in MIA velocity provides preliminary evidence that its velocity may not, in fact, follow a growth pattern as predictable as M1’s previous velocity trend.

For many years, monetary policy has been implemented largely through the pursuit of monetary aggregate targets. The Federal Open Market Committee (FOMC), the policymaking arm of the Federal Reserve System, sets target ranges for the growth of various monetary aggregates, which are intended to be consistent with the broader objectives of policy.

While the Federal Reserve has maintained the need for multiple monetary targets, business and research economists have considered the M1 aggregate to be the most important of these various monetary targets. The Federal Reserve did not set a target range for M1 in 1987, however, citing “uncertainties about its underlying relationship to the behavior of the economy and its sensitivity to a variety of economic and financial circumstances.”

The uncertainty about M1’s behavior is often described in terms of a break down in the growth trend of its velocity—the ratio of nominal GNP to M1 (see chart 1). M1 velocity rose at roughly 3 percent annual rate for most of the post World War II era, fluctuating slightly in response to changes in nominal interest rates. Since 1982, however, the velocity of M1 has shown much greater volatility and has, on average, declined at a 3.2 percent annual rate.

In light of M1’s weakened status, economists inside and outside the Federal Reserve System have searched for an alternative policy target. One proposed solution is for the Federal Reserve to target an aggregate that would exclude interest-bearing checking accounts from the present definition of M1 (see table 1). The Federal Reserve reported statistics for this monetary measure from 1980 until 1983, referring to it as M1A.

From 1982 through 1984, the velocity of MIA seemed to follow a growth trend similar to that which had previously characterized M1 velocity, providing support for the idea of an MIA target. During 1985 and 1986, however, M1 and M1A each grew much faster than expected given the rates of inflation and economic growth, resulting in anticipated velocity declines for both measures. Despite this departure, support for greater reliance on M1A in the conduct of monetary policy has persisted. In this Economic Commentary, we examine the behavior of M1 and M1A in the 1980s and discuss some issues relevant to the possibility of replacing M1 with M1A.

Most analysts who question the use of M1 as a policy target have focused on the contamination of M1 by savings-related balances in interest-bearing checking accounts. However, we suspect that the characteristics of demand deposits have also been altered by deregulation; specifically, that demand deposits are now dominated by commercial accounts. All else being equal, this change would have reduced the growth rate of M1A velocity above that of pre-deregulation M1. The similarity of M1A velocity growth in the 1980s to pre-1980 M1 velocity growth may, therefore, reflect a coincidence of offsetting influences. Thus,

Table 1 The Composition of M1 and M1A

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<tr>
<th>Sources</th>
<th>Currency and</th>
<th>Traveler’s Checks</th>
<th>Demand Deposits</th>
<th>Other Checkable Deposits</th>
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<th>M1A</th>
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<td>Board of Governors of the Federal Reserve System</td>
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<td>730.5</td>
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</tbody>
</table>

*Billions of dollars, seasonally adjusted.

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The source of the declines in M1A velocity in 1985 and 1986 is likely to be the same as for the earlier breakdown in M1’s velocity: a fundamental realignment of the relationship between transactions deposits and nominal GNP in the new disinflationary environment.

M1 vs. M1A
M1 was previously considered the most important of the monetary targets for a number of reasons. Between 1985 and 1986, M1A, was preferable on theoretical grounds, as the Federal Reserve’s primary focus had been on transactions deposits as the best measure of the monetary targets for a number of reasons. Between 1985 and 1986, M1A was previously considered the most important of the monetary targets for a number of reasons.

Deposit Rate Deregulation
The proposal to replace M1 with M1A may be appropriate if the deregulation of deposit-rate ceilings under the breakdown in M1 velocity: one of the important, and easily distinguishable, effects of deregulation has involved the flow of funds into newly authorized types of accounts. In fact, this type of distortion was brought about by the FOMC’s 1982 decision to de-emphasize the M1 target temporarily.

Inflation
M1A may not resolve the problem with the monetary targeting process, however, if the drop in M1A velocity can be traced to recent disinflation, which has led to a prolonged and substantial drop in interest rates. The new interest-bearing transactions accounts would be expected to show a more pronounced response to the changes in nominal interest rates, but the opportunity costs of all financial assets—including demand deposits—should be affected.

The Changing Composition of M1A
The M1A velocity declines of 1985 and 1986 would suggest that the hypothesis that the “pure” M1A aggregate might adequately fill the role that M1 once had as a policy target. Rather, an explanation that includes the effects of disinflation on the opportunity costs of financial assets seems more likely.

5. For a detailed analysis of the flows among these non-M1 instruments, see the paper by R. D. Simpson and John R. Williams, “Recent Revisions in the Demand Deposits, vol. 67, no. 7 (July 1981), pp. 539-544. An alternative view can be found in John A. Trotman, “Recent Financial Innovations: Have They Distorted the Meaning of M1?” Review, Federal Reserve Bank of St. Louis, vol. 64, no. 4 (April 1982), pp. 23-33.
6. The adjusted turnover rates shown in the lower panel of chart 4 are derived in Appendix C of The Changing Composition of M1A.

Similar evidence on the effects of M1A’s compositional changes can be seen in ratios of currency to deposits. The currency/deposit ratio is important because it reflects the relative usefulness of the currency balances. The lower panel of chart 4 shows turnover measures that reflect only transactions associated with final sales, including intermediate and financial transactions. The lower panel of chart 4 shows turnover measures that reflect only final sales associated with business transactions, and the currency/deposit ratio remains higher than with M1. After the adjustment has been made to turnover rates, neither the demand deposits measure nor the total transactions deposits measure appears very similar to the demand deposits component of M1 before 1980.
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M1 vs. M1A

M1A was previously considered the most
important of the monetary targets for a
number of reasons. Because M1A, as op-
compares to M1, was preferable on theoreti-
cal grounds, as the Federal Reserve's
strategy to construct a comprehensive mea-
sure of assets that were held pri-
marily for transactions. To others, M1A
seemed to be the most controllable of the
targeted aggregates. Finally, many econom-
ists preferred M1A because it seemed to be
most predictable relative to economic ac-
tivity.

Since the deregulation of deposit rates in the early 1980s, it is increas-
ingly difficult to argue that M1A repre-
sents a theoretically pure measure of trans-
actions balances. It appears likely that at least a portion of the funds in new
interest-bearing transactions accounts
accounts represent higher-quality funds.
Furthermore, many money market funds and
accounts allow limited check-drafting privi-
ileges, making checking deposits that were some transactions-related funds in are in these non-M1 instruments.

Proponents of M1A as a policy target
have not generally claimed that M1A
provides a comprehensive measure of trans-
actions money, but that it is prefer-
able to M1 because it excludes accounts contaminated by savings bal-
ances. Furthermore, because M1A is a sub-
set of the relatively controllable M1, it
might also be more controllable than either
the broader aggregates or pro-
posed weighted-average aggregates.

The most important rationale for an M1A target, though, is that its rela-
tionship to economic activity seems to
have changed less than that of M1. How-
ever, recent declines in M1A veloc-
ity indicate that M1A is not as immune to
velocity instability as the 1982 to
1984 experience suggested. If we are to
consider M1A as a policy guidepost, it
is important that we understand what has
happened to the growth patterns of trans-
actions deposits-interest-bearing and non-interest-bearing-in this era of
deregulation and disinflation.

Deposit Rate Deregulation

The proposal to replace M1 with M1A
may be appropriate if the deregulation of deposit-rate ceilings underlies the
breakdown in M1 velocity. One of the
important, and easily distinguishable,
effects of deregulation has involved the
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of accounts. In this case, the type of
distortion was behind the FOMC's 1982
decision to de-emphasize the M1 target
 temporarily.4

The element of deposit deregulation
most relevant to M1 was the introduc-
tion of negotiable orders of withdrawal (NOW) accounts, which allowed
limited check-drafting and conveniently
side the range of uncertainty normally
associated with velocity forecasts.

The nationwide authorization of
NOW accounts at the end of 1980, how-
ever, triggered large transfers of funds
into the new accounts. Although evi-
cence suggests that a complex pattern of
flows between various account types took
place, chart 2 illustrates that the net effect was a large transfer of funds from
demand deposits to ODs.5 This
phenomenon is reflected in the velocity
measures shown in chart 1, primarily as a
sharp upward shift in the level of M1A
velocity.

The introduction of Super-NOW
accounts in 1983 and the elimination of
rate ceilings and minimum balance
requirements in 1986 did not seem to
cause the same type of initial net deposit
deposits for the nationwide intro-
duction of NOW accounts. One impor-
tant reason may be that the ceil-
ings had become nonbinding before the
introductions whereas NOW accounts
were already below the maximum, so the
elimination of that constraint did not
cause an increased rate of velocity that
would have attracted new funds.

Regardless of their initial effects, the
moves to deregulate payments have
people manage their savings and trans-
actions balances. OCD growth has
been slower-and much slower than demand deposit growth, past or
present, given rates of economic growth
and the rate of inflation.

Because the major difference in the
two types of transactions accounts is
whether the funds were laundered in OCDs, it is often concluded that OCDs are
unlike demand deposits because they
don't measure the characteristics of savings
accounts. To the extent this is true, an
M1A aggregate might, in fact, repre-
sent more closely the true role of trans-
actions money than M1.
Conclusion
In 1981, the nationwide introduction of NOW accounts caused a large shift of funds from demand deposits to OCDS, distorting the measured growth rates of both M1 and MIA. Since then, no other regulatory changes have had such distinctive effects. Nevertheless, the velocity of M1 has departed from its previous growth trend to such an extent that the FOMC chose not to set an explicit target for M1 in 1987.

The apparent stability of M1’s velocity from 1982 through 1984 led some observers to suggest that this narrower measure of transactions money could be substituted for M1 as a target. However, data on demand deposit ownership shows, turnover rates, and currency/demand deposit ratios suggest that the observed stability of M1’s velocity in the early 1980s may represent a coincidence of offsetting forces.

In the long run, the behavior of M1A velocity could be expected to follow a growth trend similar to that which had preceded M1 prior to the 1980s. The same factors that have affected M1’s behavior have also affected M1A, diminishing its usefulness as a potential policy target. The recent decline in M1A velocity provides preliminary evidence that its velocity may not, in fact, follow a growth pattern as predictable as M1’s previous velocity trend.

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Most analysts who question the use of M1 as a policy target have focused on the contamination of M1 by savings-related balances in interest-bearing checking accounts. However, we suggest that the characteristics of demand deposits have also been altered by deregulation, specifically, that demand deposits are now dominated by commercial accounts. All else being equal, this change could tend to raise the growth rate of M1 Velocity above that of pre-deregulation M1.

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1. MIA - M.A.?


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COMMENTARY

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