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Inflation Hedges Compared

The performances of different assets that have been widely used as "inflation hedges" over the past 2 decades have varied markedly. Of those discussed below, only gold increased in real value during that period. However, common stocks, which in real terms retained their value over the past 20 years, currently may hold the strongest promise for future long-term increases in real value.

Chart 1 shows the prices over the past 2 decades (in current and constant dollars) of four assets — gold, Swiss francs, farmland, and common stocks — that have been widely viewed as hedges against losses in the purchasing power of the dollar. Over the period shown, all have maintained their real value better than the dollar (see Chart 2). However, both the current and constant-dollar prices of each asset have experienced marked fluctuations, and it may be useful to comment briefly on the current prices of each in relation to historical measures of their relative value.

As shown in Chart 1, in both current and constant dollars gold prices drifted erratically downward after skyrocketing during the 1970's. In real terms, gold prices have retreated to their mid-1970's levels. However, gold still is worth much more in real terms than it was in 1971, when the government abandoned all efforts to hold its price at $35 per ounce. For purposes of this discussion, an important point is that the purchasing power of gold today remains historically high. Gold is the premier hedge against a flight from currency, and if the dollar's depreciation accelerates nominal gold prices could quickly go "off the charts." But it would seem unlikely that constant-dollar gold prices will increase from recent levels (which are relatively high in a historic context) to the extent that they did between 1970 and 1980.

The most sustainable gains in the real price of gold were those achieved when the Government's artificial price barriers were removed and market pricing began. Presumably, that price adjustment had been largely achieved by late 1974, when gold prices temporarily peaked. The increases in the gold price between 1977 and 1980 mainly reflected anticipation of much higher prices due to accelerated price inflation and, possibly, a flight from currency, both of which failed to occur. Further downward adjustments in gold's purchasing power are possible if confidence in paper currencies is sustained.

Unlike gold, Swiss francs (and Deutsche marks, not shown) both are worth substantially less in real terms than they were 20 years ago, although they have retained value better than the U.S. dollar and most other fiat currencies.

Throughout the 1970's and much of the 1980's, it was widely believed that real estate prices could only go up and that real estate therefore was a foolproof investment. The recent real estate "bust" has belied such notions. Chart 1 shows the total value of U.S. farm real estate (which may be a more useful measure of real estate values *per se* than are the data for residential and commercial properties, which include increases in value due to the addition of buildings and other fixed assets). The data in Chart 1 suggest that in real terms real estate values peaked in 1979. The subsequent slide in the real value of farm

Chart 1
VALUATIONS OF SELECTED "INFLATION HEDGES"
Of the four "inflation hedges" shown in the chart, only gold is clearly worth more in terms of purchasing power than it was 20 years ago. In real terms, Swiss francs and farm real estate are worth substantially less today than in 1970, while U.S. common stocks retained their real value over the period shown.

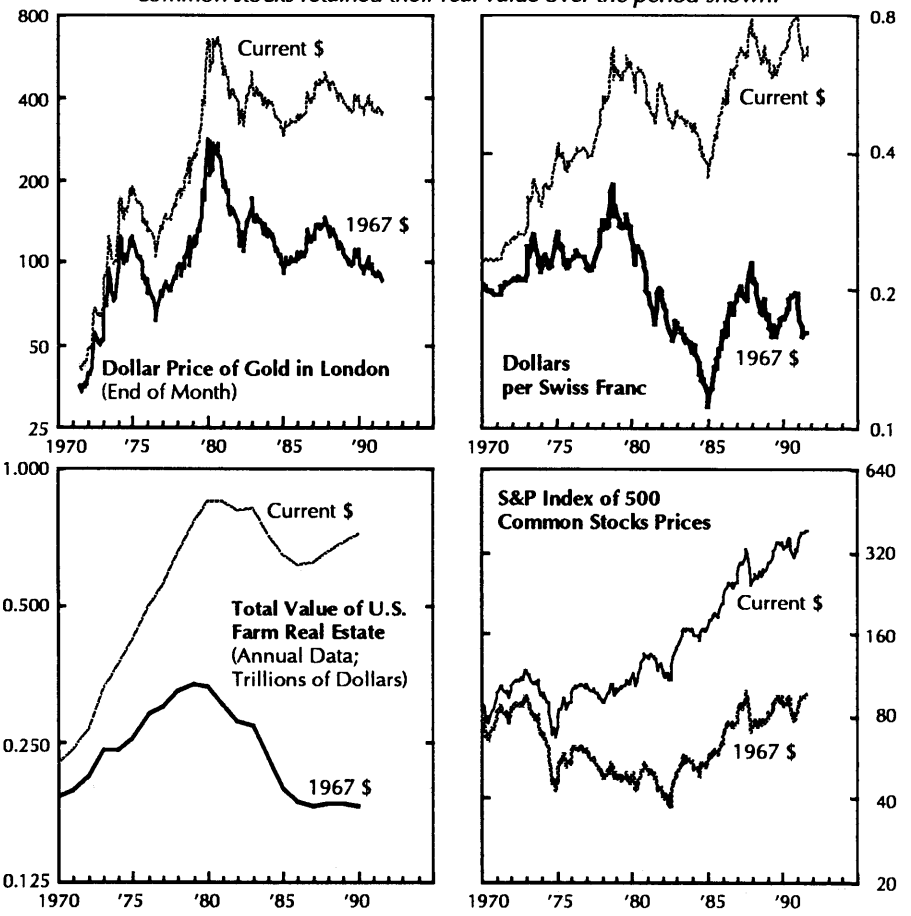
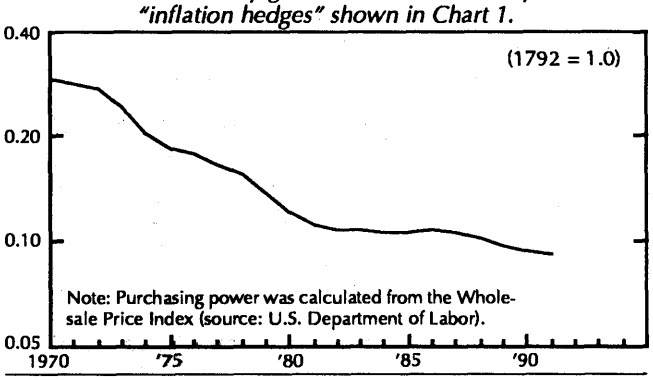


Chart 2
PURCHASING POWER OF THE U.S. DOLLAR
Since 1970, losses to the purchasing power of the U.S. dollar have been markedly greater than to that of any of the "inflation hedges" shown in Chart 1.



land moderated only in the late 1980's and at levels *below* those prevailing in 1970, which has led some analysts to conclude that real estate once again is a "good buy."

The remaining panel in Chart 1 shows the prices of U.S. common stocks as measured by the S&P index of 500 common stocks. Although the real value of common stocks was more than halved between 1972 and 1982, subsequent gains have more than offset that loss and, in real terms, stocks are worth slightly more than they were in 1970.

In terms of asset value alone, then, of the "hedging" assets considered here, only gold is clearly worth more in real terms than it was 20 years ago. But gold does not produce income. Of course, some gold-related investments yield income — shares of gold mining companies pay dividends. However, the mines themselves are "wasting assets" (*i.e.*, when all the gold has been extracted, a mine is relatively worthless and could actually be a liability).

The other assets shown in Chart 1 produced income over the period in dividends on common stocks, interest on Swiss francs, and rent on farmland in excess of property taxes most of the time. If the income paid on these assets were included, their total "return on investment" would be markedly higher than the increases shown in the chart. But, because it is a fiat currency too, the principal losses on the Swiss franc must be assumed to be permanent. Farmland, like gold, is a real asset, but it is inconvenient to hold and linked to the fortunes of a single industry. Common stocks are easily held in liquid and diversified form and would appear to be as useful or better an "inflation hedge" as any of the other assets commonly believed to be such.

Determining whether stocks are a "good value" in relation to their market price at any given time, on the other hand, is more complicated than, say, comparing the relative value of gold over time. An ounce of gold is an ounce of gold, whether in 1900, 1950, or 1991, and what it is worth in relation to other things is easily established by what it will buy.

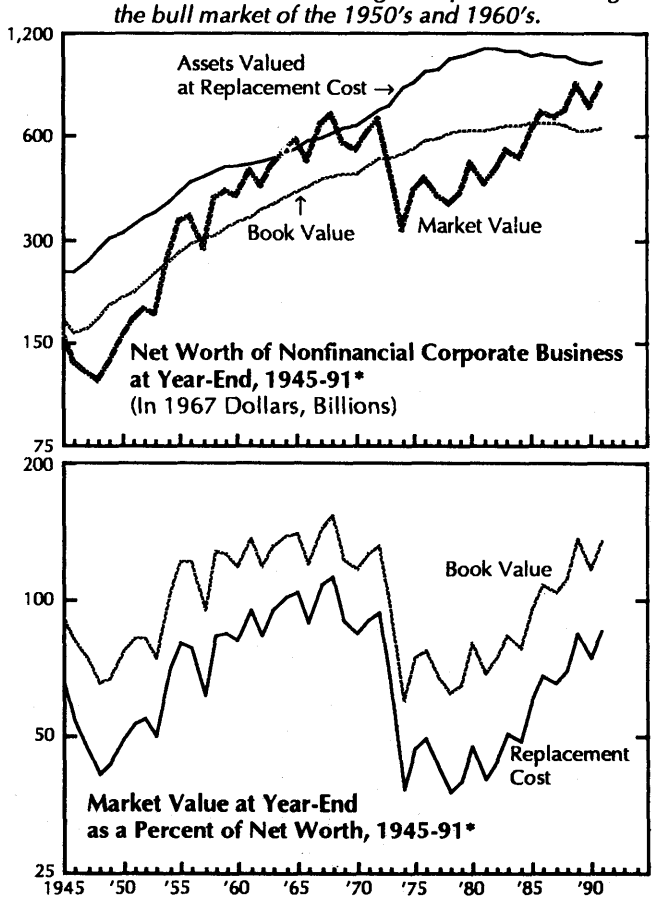
The assets underlying common stocks, however, are constantly changing and even in real terms their value is limited only by the performance of the issuing corporation. Theoretically, based on productivity and sales increases, an individual stock might increase in real worth indefinitely. However, its value to the market at any given time depends on a myriad of factors that are not readily understood or easily forecast, even (or especially) by Wall Street analysts. That is why the prices of individual stocks or even of entire stock indexes sometimes fluctuate so wildly.

A share of common stock is ultimately a claim on the assets held by the corporation that issued it. Such claims are subject to prior claims, mainly any indebtedness of the company. The first panel of Chart 3 shows the total of such "net worth" of nonfinancial corporate businesses (NFCBs), measured in two ways. One, using the historical cost of assets less prior claims, is the "book value" of the equity in NFCBs. The other uses the "replacement cost" of the assets to determine the value of the equity. The market value of such equities is also shown. The charts are based on Federal Reserve data for 1945 to 1990 and AIER estimates for 1991 and are adjusted for price inflation.

All three measures of net worth increased markedly from World War II through the mid-1970's, presumably reflecting the reinvestment of retained earnings and net new issues of equity. In 1973-74, however, the market value of NFCBs stocks plummeted, while corporate net worth in terms of book value and with assets valued at replacement cost continued to increase. In 1972, just before the change in trend, the market value of stocks was above book value and nearly equal to the market value of assets less liabilities. Two years later, the market value of NFCB stocks was less than 50 percent of net worth based on replacement cost. This sharp decrease is evident in the second panel of Chart 3.

In the late 1970's and the 1980's the market value of nonfinancial corporations' stocks recovered and their net worth grew slowly and eventually decreased. This decrease reflected the fact that, as a result of "leveraged buyouts" and other retirement of corporate equity, corporate indebtedness increased faster than the value of corporate assets. By 1986, stock values were about equal to net worth computed using the book value of assets, but were less than the net worth based on the replacement cost of assets. In the late 1980's the market value of

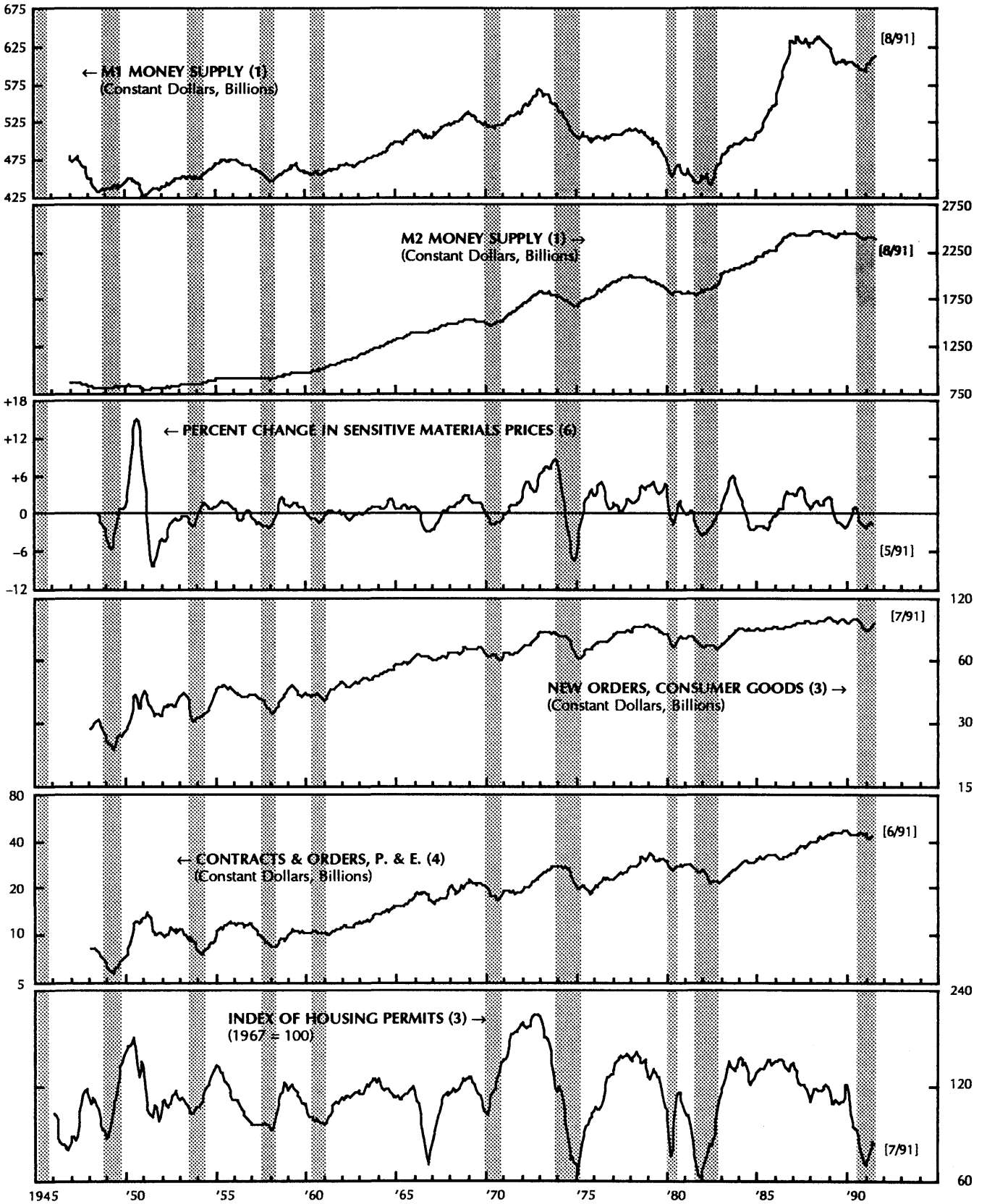
Chart 3
SELECTED MEASURES OF THE NET WORTH OF NONFINANCIAL CORPORATE BUSINESS
In relation to book value and replacement value, the market value of NFCBs now is in the range that prevailed during the bull market of the 1950's and 1960's.



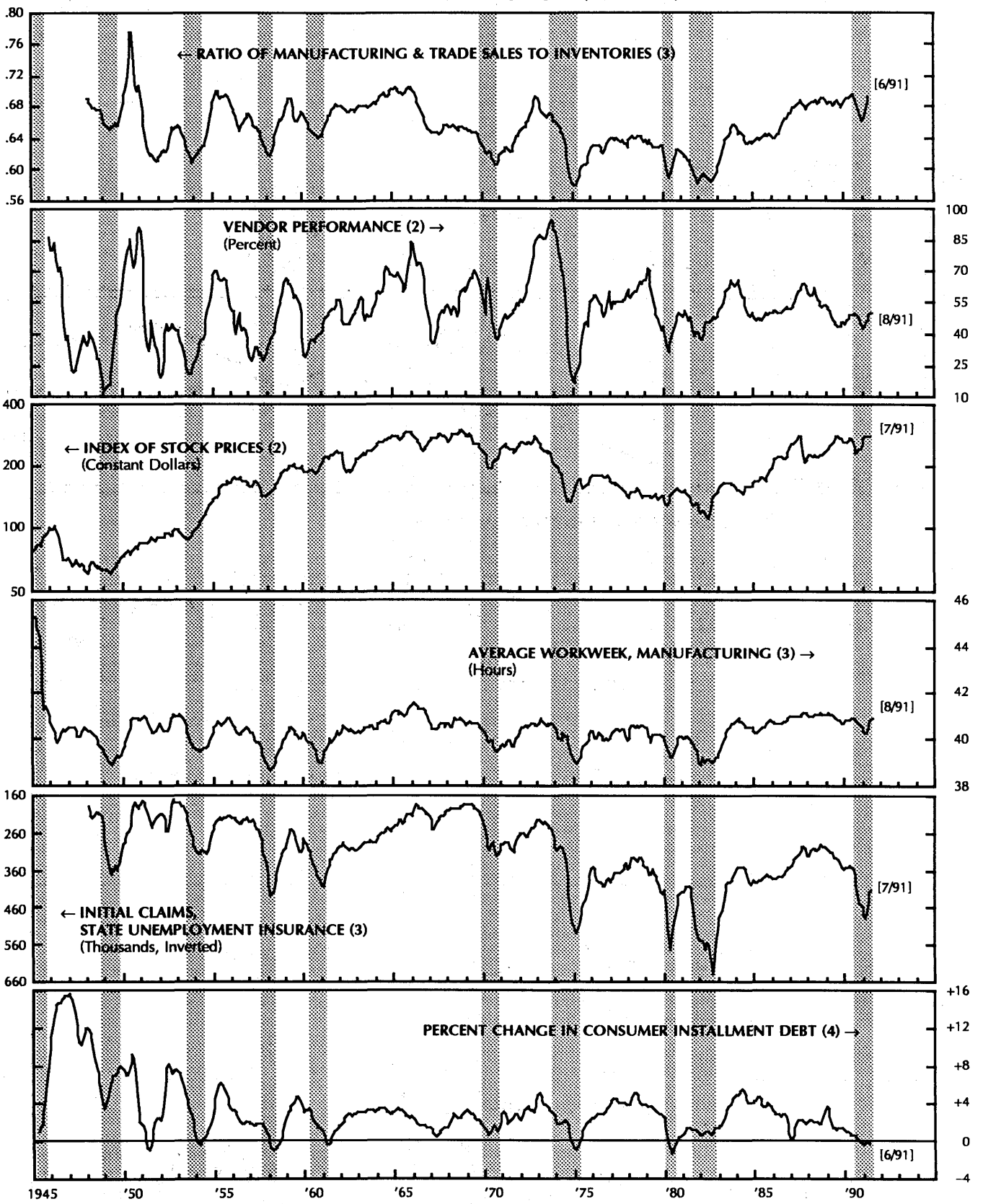
* Estimates for 1991 based on third quarter data.
Source: Federal Reserve Board *Balance Sheets for the U.S. Economy.*

PRIMARY LEADING INDICATORS

During expansions, the primary leaders typically indicate cyclical turns 3 to 6 months in advance. Eight of the leading indicators currently are appraised as expanding and only one is appraised as contracting, indicating that the economy is likely to continue to expand in the coming months.



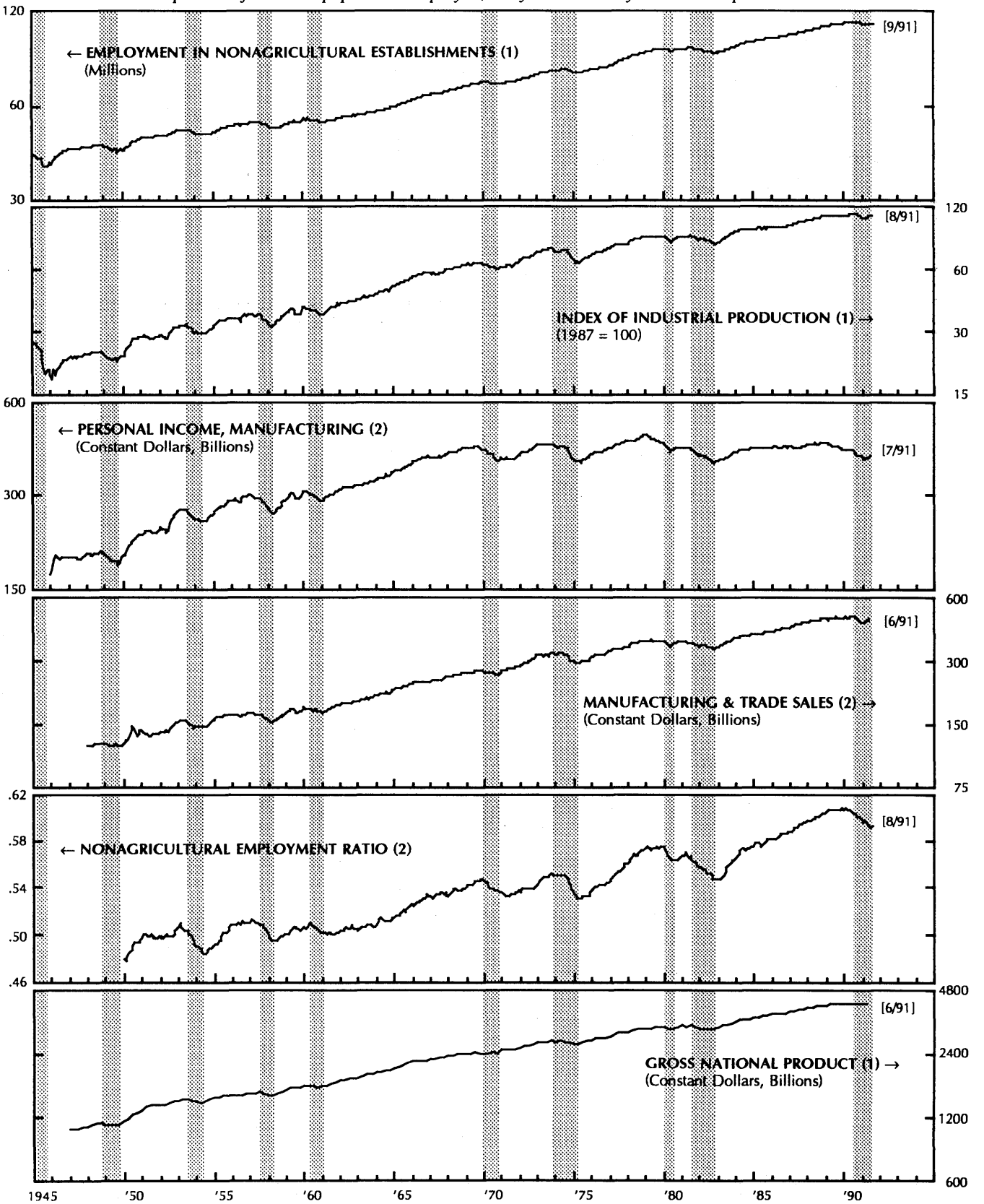
PRIMARY LEADING INDICATORS (Continued)



Note: The number in parentheses next to the name of a series is an estimate of the minimum number of months over which cyclical movements of a series are greater than irregular fluctuations. That number is the span of each series' moving average, or MCD (months for cyclical dominance), used to smooth out irregular fluctuations. The data plotted in the charts are those MCDs and not the base data. The number in brackets is the latest month for which the moving average is plotted.

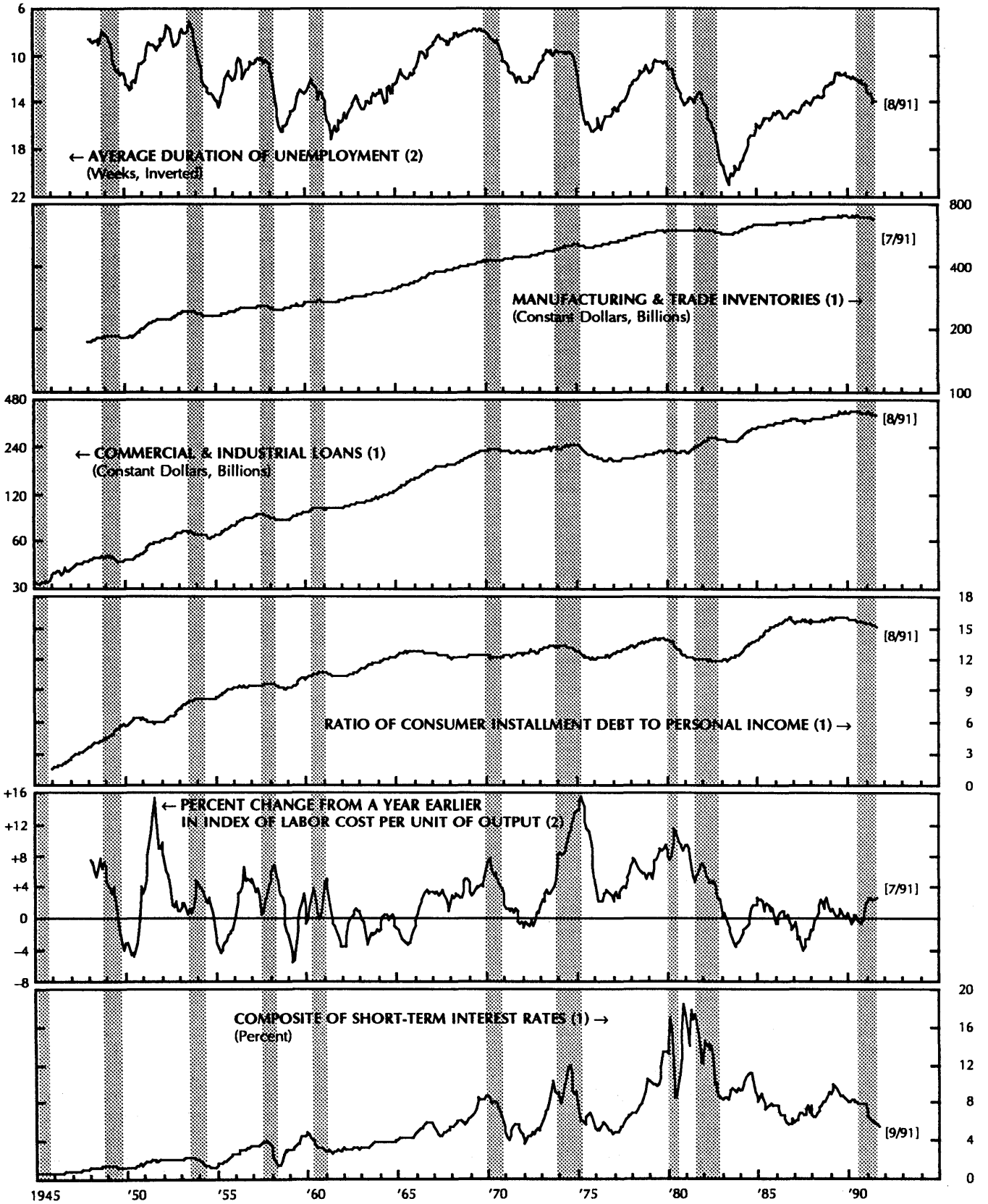
PRIMARY ROUGHLY COINCIDENT INDICATORS

The turning points in these series mark the peaks and troughs of the business cycle. Most of the coincident series have increased since April, and their further increases in August and September suggest that the fledgling recovery continued in the third quarter. However, the ***nonagricultural employment ratio****, the percent of the adult population employed, has yet to show any sustained improvement.*



PRIMARY LAGGING INDICATORS

The lagging series behaved atypically during this business cycle, in that most of them peaked before, rather than after, the recession started. Currently, most of them are contracting, as they usually do in the early months of an expansion.



stocks in relation to net worth returned to the levels reached in the 1960's, and remained there in 1991. The estimates for 1991 show increases in all three measures of corporate worth, following decreases in 1990.

As the percentages in panel 2 indicate, the relationship between the market value of stocks and the inherent value of the corporations that issue them has varied widely over the years. With the exception of the 1973-74 decrease, however, downturns in the value of stocks in relation to corporate net worth have been followed by larger increases.

Plainly, common stocks are not now the "bargain" that they were in 1974. But neither are they prohibitively priced. Currently, in relation to book value and replacement value, the market value of NFCB's is in roughly the range that prevailed during the long bull market of the 1950's and 1960's. And as the data in Chart 1 may suggest, even stocks purchased at the worst possible moment for the investor over the long run recovered their value.

BUSINESS-CYCLE CONDITIONS:
Leave the Credit Markets Alone

An unusual number of monthly decreases among the leading series at this stage of the recovery and an atypical contraction of M2 in August have raised concerns that the recovery is faltering and provoked a new round of financial market interventions by the Federal Reserve as well as the Bush Administration last month. Although the percent of AIER leaders expanding appears "stalled," the underlying cyclical trends of the leaders continue to indicate expansion. The coincident series of production, employment and income continue to strengthen abetted by the absence of bottlenecks among the laggers.

Among the primary leading indicators of business conditions, the constant-dollar *index of 500 common stock prices* hit a new high in August, and the series was upgraded to clearly from probably expanding last month. (This and all other dollar-denominated series are reported in constant dollars.) The underlying trends for the two monetary aggregates diverged further in August. The *M1 money supply*, which is composed of noninterest bearing currency, demand deposits and checkable deposits, increased $2.9 billion, or a seasonally adjusted annual rate of 5.9 percent, and the series is clearly expanding. On the other hand, the broader *M2 money supply*, which includes interest-sensitive deposits in money market mutual funds and accounts, as well as savings and small time deposits, dropped $6.5 billion. The series contracted for the third consecutive month and its cyclical status was downgraded to indeterminate from probably expanding.

Financial conditions today differ markedly from those in past business cycles. The term structure of interest rates now reflects a "sharply upward sloping" yield curve (*i.e.*, a widening gap between short- and long-term interest rates). With short-term interest rates currently at a 15-year low, individuals capable of saving are shunning the low rates offered on bank deposits, which reinforced the contraction of M2, and are flocking toward higher yielding alternatives, most of which are not included in any measure of money. Another ramification of the widening gap between rates is that debtors are "paying down" consumer installment debts or refinancing home mortgages, both of which carry high interest charges. In this respect, the contraction of M2 represents a movement of funds toward higher yielding financial instruments or debt rescheduling to escape high rates. These trends may well render further monetary easing ineffective.

The financial health of consumers is, of course, a major key to a successful recovery. Presently, consumers appear hesitant to finance spending by borrowing at high interest rates. Thus, total outstanding debt fell $1.3 billion in August, and the 3-month *change in consumer installment debt* hit a new low. The cyclical status of the series was downgraded to clearly contracting from indeterminate last month. As another indication that consumers are curtailing spending, personal consumption in August decreased $5.9 billion, or a seasonally adjusted annual rate of 2.9 percent, while disposable income gained $5.1 billion, or 2.1 percent. As previously reported, the surge in consumption since January appeared unsustainable to the extent that it outpaced gains in the disposable income of consumers. That income gains now are outpacing consumption would seem to favor improvements in the latter. Presumably, if the recent income gains are sustained, consumer caution may moderate.

The outlook for the housing industry improved in August. Conventional mortgage rates used to finance new single-family homes fell to 9.11 percent, according to the Federal Housing Finance Board. As a result, many homeowners now are refinancing existing mortgages. Further, the demand for new homes surged 6.7 percent, which reduced the unsold inventory of new homes to a 6.6 months' supply, according to the National Association of Realtors. Moreover, spending on residential construction increased $5.7 billion, or 3.5 percent. Although its base data decreased slightly, the 3-month average of the *index of housing permits* series remains appraised as probably expanding.

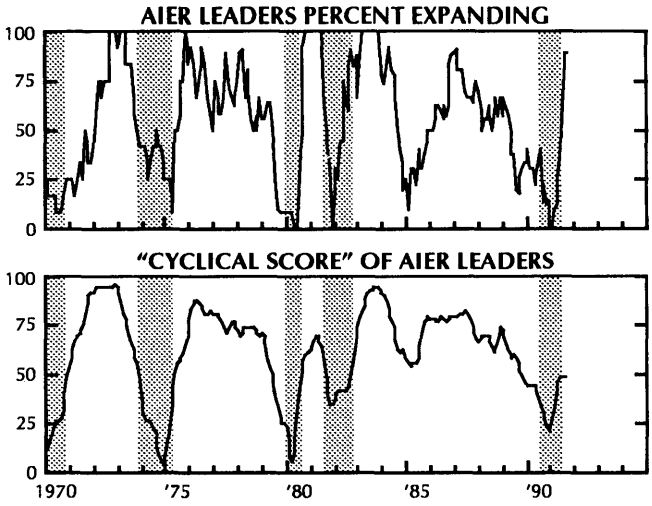
The manufacturing series continued to expand albeit at a slower pace. The *ratio of manufacturing and trade sales to inventories* increased in July and the series is probably expanding. *Vendor performance* gained in September and remains clearly expanding. Despite the monthly decreases in their base data, the cyclical status of *new orders for consumer goods and materials* was upgraded to probably expanding from indeterminate and that of *contracts and orders for new plant and equip-*

THE STATISTICAL INDICATORS

	Direction of Change in Base Data				Cyclical Status		
Primary Leading	Jun.	Jul.	Aug.	Sept.	8/91	9/91	10/91
M1 money supply†	+	–	+		+	+	+
M2 money supply†	–	–	–		+?	+?	?
Chg. in sensitive mat. prices	–	nc'	–		?	?	?
New orders, cons. goods†	–	+	–		?	?	+?
Contracts & orders, p. & e.†	+	+	–		–	–?	?
Housing permits	+	+	–		+?	+?	+?
Mfg. & trade sales/inv.†	+	+			?	+?	+?
Vendor performance	+	+	–	+	+	+	+
Stock prices†	–	+	+		+?	+?	+
Average workweek, mfg.	+	–	+	–	?	+?	+
Initial claims, unempl. ins.*	+	+	–		?	+?	+?
Chg. in cons. instal. debt	–	–	–		?	?	–
Percent expanding cyclically					**83**	**89**	**89**
Primary Roughly Coincident							
Nonagr. employment	–	–	+	+	+?	+	+
Industrial production	+	+	+		+?	+	+
Personal income, mfg.†	+	+	+		+?	+	+
Mfg. & trade sales†	+	+			+?	+?	+
Nonagr. employment ratio	–	+	–	+	–	–	–?
Gross National Product†q	–				+?	–	–
Percent expanding cyclically					**83**	**67**	**67**
Primary Lagging							
Avg. duration of unempl.*	–	+	–	nc	–	–?	–?
Mfg. & trade inventories†	–	–			–	–	–
Com'l. & industrial loans†	–	+	–		–?	–?	–
Cons. instal. debt/pers. inc.	–	–	–		–	–	–
Chg. in labor cost/output	+	–	+		+	+	+
Short-term interest rates	+	–	–	–	–?	–	–
Percent expanding cyclically					**17**	**17**	**17**

† In constant dollars. * Inverted. q Quarterly. nc No change. 'Revised.

Under "Direction of Change," plus and minus signs indicate, respectively, increases or decreases in monthly or quarterly data from the previous month or quarter, blank spaces indicate data not yet available. Under "Cyclical Status," plus and minus signs indicate expansions or contractions of each series as currently appraised; question marks indicate doubtful status when shown with another sign or indeterminate status when standing alone.



ment was upgraded to indeterminate from probably contracting. On the other hand, the cyclical status of the 3-month *rate of change in sensitive materials prices* remains indeterminate.

The cyclical trends of the labor series continued to expand despite the modest reported decreases in their base data last month. The cyclical status of the *average workweek in manufacturing* was upgraded to clearly from probably expanding last month. Moreover, the cyclical status of (inverted) *initial claims for unemployment insurance* remains appraised as probably expanding.

As a result of four upward and two downward revisions in the cyclical statuses of the leaders this month, the percentage expanding of leaders for which a trend is apparent "stalled" at 89 (8 out of 9), the same as last month, after increasing for 6 consecutive months. Similarly, AIER's experimental cyclical score also remains unchanged at 49 after revisions to last month's data. However, both scores continue to indicate economic expansion.

Among the roughly coincident series, the labor market strengthened. The Labor Department's September survey of households indicates that the *nonagricultural employment ratio* increased more sharply than it has in nearly one and a half years. The series was upgraded to probably from clearly contracting last month. Also, the survey of establishments suggests that *nonagricultural employment* increased 24,000 — the second monthly gain for that series. Although initial estimates of payroll employment generally undergo upward revisions, such revisions are even more likely during recoveries, as new businesses often are slow to report payroll information to the Federal agencies. The cyclical status of the series remains appraised as clearly expanding.

Further, *manufacturing and trade sales* increased $3.4 billion, or a 9.0 percent annual rate, in July, and the cyclical status of the series was upgraded to clearly from probably expanding last month. According to the Commerce Department's final estimate, annualized *Gross National Product* fell $5.2 billion, or a seasonally adjusted annual rate of –0.5 percent, during the second quarter of 1991, and the series is appraised as clearly contracting. Although two series were upgraded and none downgraded, the percent expanding of coinciders for which a trend is apparent is unchanged at 67 (4 out of 6) from last month. Overall, the coincident series indicate continued expansion.

Among the primary lagging indicators, *commercial and industrial loans* hit a new low in August, and the cyclical status for that series was downgraded to clearly from probably contracting last month. Similarly, the *composite of short- term interest rates* hit a 15-year low in September. The series has plummeted from its 18.5 percent historic peak in December 1980 to a new low for this business cycle at 5.5 percent last month, and its behavior during this business cycle has been most atypical for a "lagging" indicator (*i.e.*, it peaked a year and a half before the recession). The series remains appraised as clearly contracting. Overall, the percent expanding of laggers remains unchanged at 17 (1 out of 6) for the third consecutive month.

Growing concern that the recovery may be sputtering out provoked a battery of financial market interventions by the Federal Reserve and the Bush Administration during September. The Fed boosted credit in the banking system through the purchase of Treasury securities in mid-September, which in turn forced downward the Federal funds rate on overnight interbank loans from 5.5 to 5.25 percent, and Fed officials cut the discount rate on direct lending to commercial banks from 5.5 to 5 percent. In turn, various key interest rates dropped, among them the prime lending rate on loans for banks' most valued corporate customers, which fell from 8.5 to 8 percent. However, decreasing interest rates *per se* apparently have failed to encourage new lending to and borrowing by consumers and small business — and the "credit crunch" reportedly persists.

What has confounded Fed "easy credit" policy is the inescapable fact that many banks have yet to surmount the problems associated with their inflated real estate loan portfolios. After years of government-assisted "binge" lending, which has left many of them in shaky financial condition if not insolvent, banks apparently now are reluctant to follow the Fed down the same path again.

Increasingly impatient with the Fed's inability to arrest the "credit contraction," the Bush Administration earlier this month announced its own array of measures designed to "ease the credit crunch." These measures would attempt to encourage bank lending, in effect, by weakening capital standards, by allowing banks to roll over loans on stalled construction projects, and by encouraging sales of preferred stock to speculative investors to recapitalize shaky institutions.*

As we have noted many times in previous issues of these *Reports*, economic contractions — while they have many unfavorable public and private aspects — are necessary phases of the business cycle during which needed adjustments are made to changing market conditions. From an economic perspective, their most useful function is to "wring the excesses" out of the economy. At times, a portion of such excesses, as in the case of the speculative real estate bubble that propelled the financial markets during the 1970's and 1980's, may remain even after a recovery has begun. Indeed, where distortions have been very great, it could take years even for relatively unimpeded markets to clear.

Countermarket government policy designed to promote "growth" no matter what the costs — as in the case of the Bush Administration's and the Fed's recent credit policies — directs resources away from their best uses and invariably retards the processes that are necessary for long-term economic health. In this respect, the most encouraging feature of the recovery so far is that the credit markets seem to be ignoring both the President and the Fed.

* Bacon, Kenneth and Fred Bleakley, "Bush Moves to Relieve 'Credit Crunch'" in *The Wall Street Journal*, October 9, 1991, pp. A2, A5.

PRICE OF GOLD

	1990	*1991*	
	Oct. 18	*Oct. 10*	*Oct. 17*
Final fixing in London	$367.85	$359.50	$357.65

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