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Goldman Sachs Weekly January 1997 - April 1998 [binder] [4]

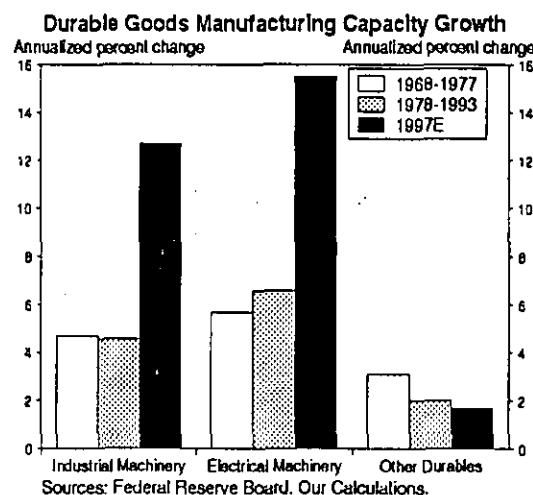
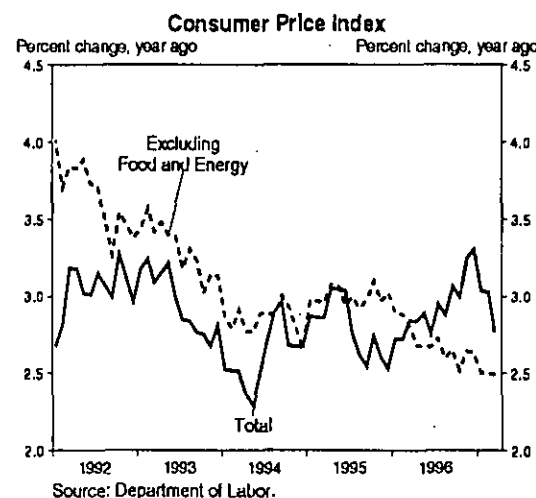
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U.S. Economics Analyst

Concentrated Capacity Growth Heightens Risk of Strains

- The March CPI report was substantially more benign than expected, with overall prices advancing only 0.1%, and core prices rising only 0.2%, despite a sharp jump in airline fares caused by reimposition of the 10% airline ticket tax. The CPI report reassured investors that Fed officials were indeed acting preemptively and that the magnitude of tightening needed to temper the pace of expansion might prove to be limited.
- Despite the good inflation news, another tightening step at the May 20 FOMC meeting still appears likely. Sentiment for a tighter monetary policy could be seen in comments by Fed Vice-Chairman Alice Rivlin who characterized the economy as showing "very strong momentum."
- The industrial production data backed up Governor Rivlin's assertion. Industrial output rose sharply in March and prior months were also revised up. Real GDP growth for the first quarter now appears likely to have risen by 4.2% (annualized) despite significant drag from the trade sector.
- Although overall manufacturing capacity growth is quite high, a closer examination by industry indicates that the expansion is highly concentrated in technology-oriented industries such as electrical machinery and industrial machinery and equipment. Outside these areas, capacity growth has been much more subdued.
- This suggests that capacity constraints could become evident more rapidly than expected, especially if industrial production growth remains on its current torrid trajectory.



Trade Recommendations

- Close long June '97/June '98 Euro calendar spread and short June T-bond futures positions.
- Get short June '97 Eurodollars at or above 94.08, with a target of 93.85 and a stop on a close above 94.20.

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**Issue No: 97/16
April 18, 1997**

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I. Weekly Wrapup

Economic and Market Overview

Both bond and stock prices moved higher as a benign consumer price report made investors more confident that Fed officials were unlikely to tighten monetary policy aggressively over the next year. Consumer prices in March rose by only 0.1% overall, and by 0.2% excluding food and energy. The increases were very moderate considering that the reimposition of the 10% airline ticket tax resulted in a 4.5% rise in airline fares last month. The report underscores the fact that despite a rapidly growing economy and rising wages, inflation pressures remain subdued.

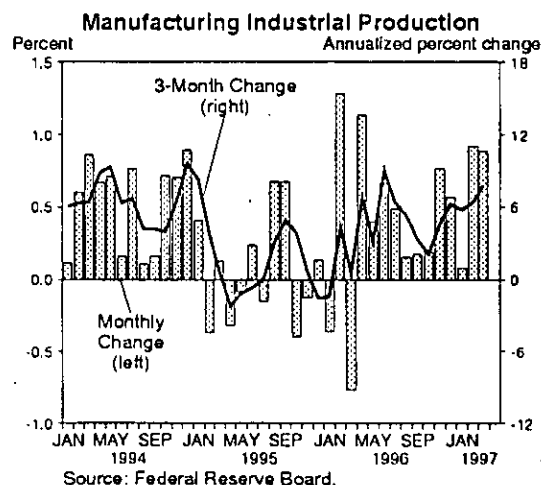
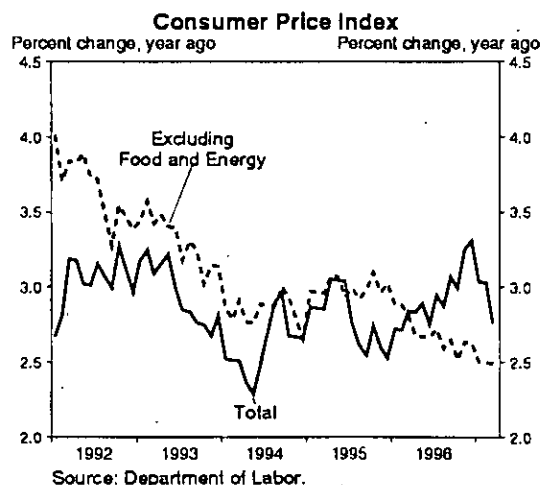
On the growth side, the evidence indicates that the economy continues to grow quickly. In particular, industrial production was very firm, rising by 0.9% in March. In addition, modest upward revisions to January and February were sufficient to push the capacity utilization rate up to 84.1%, its highest point since early 1995.

However, this positive element in the growth outlook was largely offset by less improvement in the trade balance for February than expected. The February trade deficit fell to \$10.4 billion (mistakenly announced originally as \$11.6 billion due to an error in calculating petroleum imports) from \$12.7 billion in January, as exports rose sharply (+4.0%). The large trade deficits so far this year imply that the trade sector will exert about the same amount of drag on real GDP growth in the first quarter as it was a boosting impulse in the fourth quarter of 1996, when it added 2.3 percentage points to the annualized growth pace.

Other information that revealed weakness was much less meaningful. Although housing starts fell by 6.4% in March, reversing much of the weather-induced 10.7% rise in February, the decline was concentrated in the two regions—the Midwest and the South—that showed strength in the prior month, and building permits fell only slightly (-1.5%). Similarly, the decline in the Philadelphia Fed survey index in April to 5.7% from 21.1% in March more underscores the volatility of this series than indicates a sharp change in trend. There is no reason to expect manufacturing output growth to slow sharply yet, given that demand continues to grow much faster than inventories, pulling the business inventory-to-sales ratio down to a record low level.

Federal Reserve Policy

Although Fed officials are unlikely to seriously consider tightening beyond a 6% federal funds rate target as long as the inflation news remains benign, a hike at the May 20 FOMC meeting still appears likely. That is because the motivation for the March tightening was the persistent strength in demand, not inflationary pressures, and the news on the demand front has remained quite firm. In this regard, it is noteworthy that Fed Board Vice-Chairman Alice Rivlin, a Clinton appointee, this week in a speech characterized U.S. wage pressures as "broad-based" and noted that the picture is one of "very strong momentum." The strength in demand, the rebound in production, and the low level of inventories relative to sales all suggest that the FOMC would vote for a second rate hike if its next meeting were imminent.





Although sentiment in this regard will undoubtedly wax and wane over the next few weeks in response to incoming information, it is important to recognize that Fed officials are unlikely to be easily convinced that a 25-basis-point tightening will be sufficient to pull the economy back to a trend growth pace. Since 1972, the first rate hike has never been the last when the monetary authorities began to tighten in a low inflation environment.

Fiscal and Political Developments

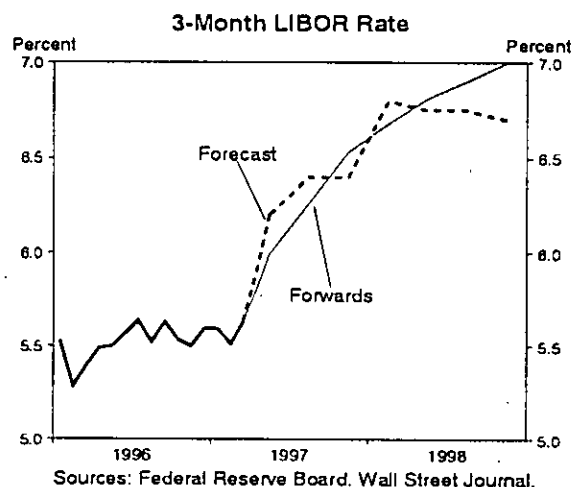
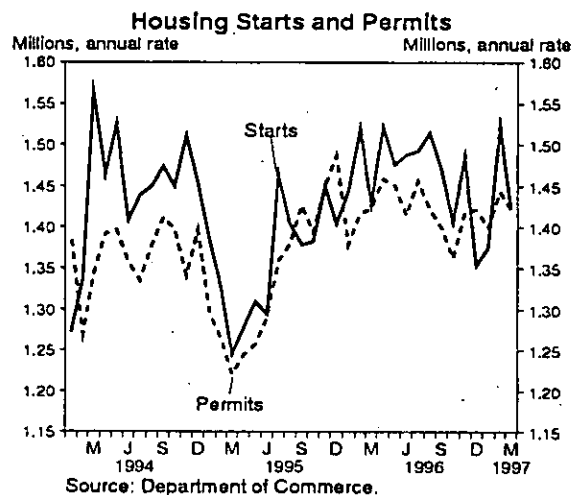
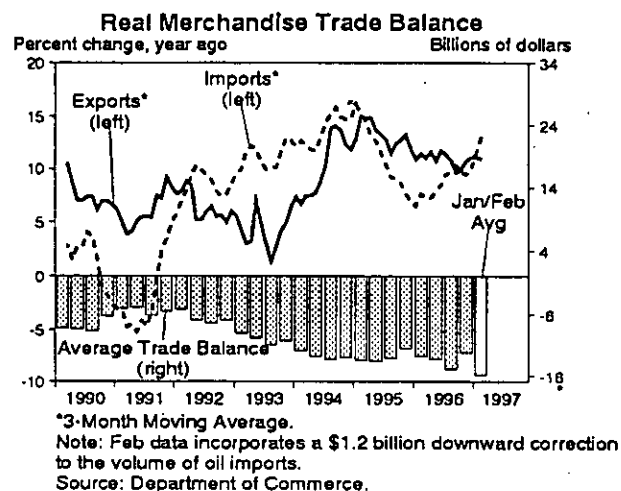
Although budget negotiations continue, the prospects for a breakthrough over the near term remain low for two reasons. First, the Clinton administration has few incentives to put its best offer on the table because of uncertainty that agreement by the Republican leadership would necessarily imply passage by the House. Second, substantive differences remain on the magnitude of discretionary spending cuts and tax cuts, which will not be easily bridged, especially now that the House Republicans have made it clear to Speaker Gingrich that retreat on tax cuts is unacceptable.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

We would close out our long June '97/June '98 Eurodollar calendar spread and our short June T-bond positions for several reasons. First, we believe that the March CPI report will reassure investors, at least temporarily, that any tightening moves of the Fed are likely to be limited in scope. Second, investors are likely to have money to put to work after sitting on the sidelines following the March 25 federal funds rate hike. Third, the demand data have been so torrid that a pause or a slackening in the growth rate is likely. This could cause investors to grow more optimistic that the rise in interest rates that has already occurred might be sufficient to pull the economy back to a trend growth pace.

At the same time, we believe that Fed officials will tighten monetary policy at the May 20 FOMC meeting. The evidence already available makes it clear that the economy is growing too quickly for comfort. For this reason, we would look to take advantage of any upward bounce in the market by getting short the June '97 Eurodollar contract at 94.08 or above, with a target of 93.85 and a stop on a close above 94.20.



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II. Concentrated Capacity Growth Heightens Risk of Strains

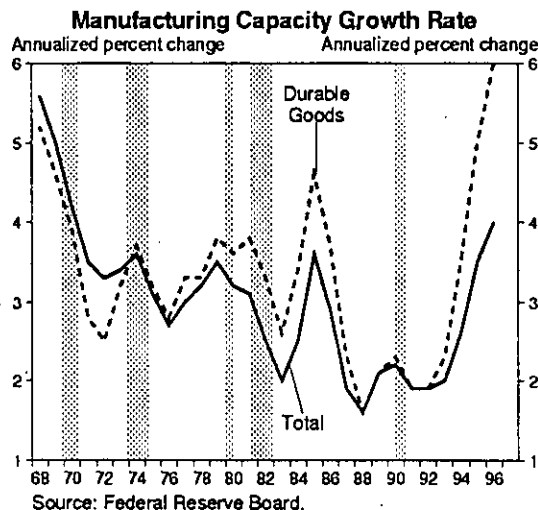
Growth in total U.S. manufacturing capacity has accelerated materially in recent years, to rates not seen since the early 1970s, as the result of heavy business capital expenditures during this decade. This development has led many analysts to conclude that the factory sector will not experience the types of strains on productive resources in this expansion that have frequently arisen late in other economic cycles, often helping to foster a significant rise in goods price inflation.

Upon closer examination, however, it becomes evident that the pickup in factory capacity growth has been highly concentrated within two industry groups that collectively account for just 21% of total manufacturing production. The remaining major sectors are adding capacity at the same or even a slower pace than in the recent past, and are falling far short of the potential output gains achieved a quarter-century ago.

The industrial output and utilization figures from March released this week confirm the strengthening of factory business activity since last summer, which has been led by an upswing in new orders, as distributive firms respond to buoyant consumer demand and exceptionally lean inventories. If goods output growth proceeds on the current trend through yearend, then utilization rates across a wide range of factory sectors will approach or exceed 85%. Similar conditions in the past have typically engendered delivery slowdowns and goods price strength, and that knowledge should help sustain pressure on the Federal Reserve for additional monetary tightening over coming months.

Factory Capacity Growth Narrowly Concentrated

The Federal Reserve estimates that total U.S. industrial capacity will rise 3.7% between December 1996 and December 1997, with a 4.1% jump anticipated in the manufacturing component. These would mark the fastest capacity expansion rates since 1970, extending a pattern of steady, substantial acceleration since the early 1990s. This jump in goods output potential helped to hold total industry capacity utilization within a relatively narrow, moderate range between mid-1995 and late 1996, despite solid increases in domestic demand and



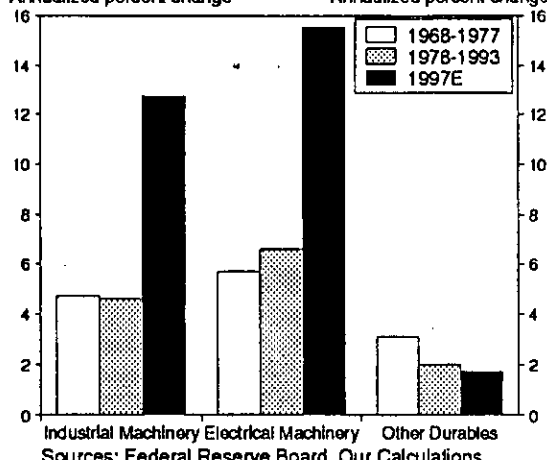
production over that period. Based on this relatively benign utilization rate behavior, as well as official projections of continued strong capacity growth, many analysts have arrived at a conclusion that goods production needs are likely to remain well within potential capacity limits, and that, consequently, there is little danger that inflationary bottlenecks could develop at U.S. factories anytime soon.

These attitudes may prove misguided, however, because in fact a very large proportion of the recent and projected capacity growth is occurring among a fairly narrow group of industries. Firms that produce industrial machinery, such as computers and office equipment, are expected to witness a 12.7% capacity rise this year, while electrical equipment producers, including semiconductor makers, are due for a 15.5% increase following an estimated 16.8% surge in 1996. Both rates are sharply higher than earlier norms. Clearly, these two areas are experiencing the lagged effects of extraordinarily heavy investments in facilities for the production of high-technology items, which have been made in the expectation that demand for such goods will stay robust for an indefinite period.

The situation is very different elsewhere within the domestic goods-making complex. For nondurable goods producers, which comprised nearly 46% of total factory production in 1996, capacity growth this year is estimated at just 1.5%, down slightly from the prior few years and sharply below the 4.0% annual

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Durable Goods Manufacturing Capacity Growth
Annualized percent change



pace of 1968-1977. Excluding the industrial and electrical machinery groups, U.S. makers of durable items—another one-third of manufacturing output—are expected to have capacity gains of only 1.7% this year, not very different than in the prior ten years, but much less than the 1968-1977 average (3.1%).

Factory Utilization Soon Could Reach Broadly Lofty Levels

Historically low stock levels at all distribution stages, in conjunction with sturdy consumer and business spending on goods, have caused U.S. producers to intensify their expansion efforts since last summer. Relative to the growth rate experienced over the twelve months ending last September, production has picked up markedly during the past six months for manufacturers of nondurables (from 0.6% to 4.2% annualized), industrial equipment (from 10.0% to 13.3%), electrical machinery (from 7.5% to 14.4%) and all other durable-goods makers (from 1.9% to 6.6%).

With the vast bulk of U.S. manufacturing experiencing only modest potential output growth, the rapid, demand-led rise in production over the past half-year has pushed up utilization rates substantially

Manufacturing Production Growth
(annual rates)

	% of Total Output	Sep '95 - Sep '96	Sep '96 - Mar '97	Change
Total	100.0%	2.8%	6.9%	+4.1%
Durable	54.2	4.6	9.4	+4.8
Industrial Machinery & Equipment	11.0	10.0	13.3	+3.3
Electrical Machinery	9.9	7.5	14.4	+6.9
Other	33.2	1.9	6.6	+4.7
Nondurable	45.8	0.6	4.2	+3.6

Source: Federal Reserve Board. Our Calculations.

across nearly all factory groups. During the nine months since last June, total manufacturing usage has climbed 1.0% to 83.3%. In the nondurable sector, however, the increase has been 1.4%, to 83.4%, and for durable goods producers excluding industrial and electrical machinery the utilization rate is up nearly 2%, to 81.8%.

If production growth at the latest six-month annual rate were to be sustained through the end of 1997, we estimate that total manufacturing utilization would hit 85.0% of capacity, a level that has been matched or exceeded in only 37 months over the past quarter-century. Moreover, it appears that this high capacity usage would prevail across a broad range of factory sectors, with substantially narrower discrepancies between industry classes than have existed in the past few years. This reflects the balanced character of current strong trends in final demand for goods, as well as the slow growth of capacity outside the high-technology sectors.

Strong Upward Pressure on Factory Utilization Rates

	% of Total Capacity	June 96	March 97	Dec 1997E*
Total Manufacturing	100.0%	82.3%	83.3%	85.0%
Durable	54.6	82.6	83.1	84.9
Industrial Machinery & Equipment	10.2	90.1	90.1	90.4
Electrical Machinery	10.0	83.9	80.7	80.1
Other	34.3	79.9	81.8	84.7
Nondurable	45.4	82.0	83.4	85.1

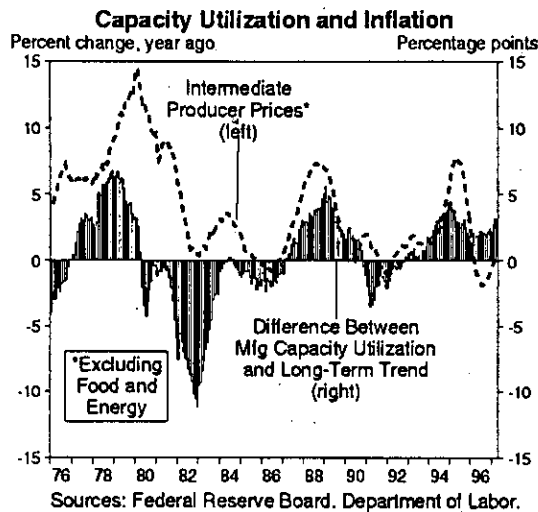
* Projection based on continuation of production growth pace in latest six months.

Source: Federal Reserve Board. Our Calculations.

High and Steeply Rising Utilization Rates Can Foster Upward Goods Price Pressures

The primary danger to financial asset values that might derive from such high and rapidly rising factory utilization rates is that an intensifying squeeze on capacity could lead firms to boost prices for finished and unfinished products more quickly. In the modern era, when factory utilization has deviated materially from its long-term trend, either up or down, the inflation rate for intermediate producer goods other than food and energy has tended to move in the same direction soon thereafter. Prices for such unfinished items, in turn, can be a leading indicator for quotes on finished producer and consumer goods.

To be sure, this historical behavior of prices in response to high and steeply rising utilization may not be repeated in the present circumstances. In particular, it is possible that continued strength in the dollar exchange rate could dispel or greatly mitigate pressures on domestic goods prices, by progressively

have already gained upward momentum. Thus, the enhanced prospects for a further material rise in the utilization rate are an important reason to anticipate appreciable further monetary tightening by the Fed, both in the short term and over the next year.

John Youngdahl

increasing incentives for U.S. businesses and households to shift purchases toward foreign suppliers.

Implications for the Economic Outlook

The skewed character of current capacity additions and the prospects for further significant absorption of resource slack in most manufacturing areas hold at least three important implications for the U.S. economic and investment outlook:

1. **Business capital outlays should stay on a firm path this year.** Although overall capacity is expanding rapidly, many industries have been slow to enhance their productive capabilities, and are now likely to experience a rapid rise in utilization rates. This provides a motivation for companies to maintain or increase fixed investment expenditures.
2. **Goods prices could accelerate more than commonly believed.** Were factory utilization to approach or exceed 85% in a broad group of industries by early next year, it would be higher relative to trend than at any time since the late 1980s. This could give rise to bottlenecks and a slowdown in vendor deliveries, which might permit more upside flexibility on pricing of U.S. products.
3. **Federal Reserve officials will remain under pressure to tighten credit.** It would be very risky for central bankers to ignore the past correlation between taut factory resource supplies and pricing strength, particularly when unemployment is unusually low and labor costs



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'97 Mar	'97 Feb	'97 Jan	'96 Dec			
Nonfarm Payrolls (ch. Thousands)	175	293	259	231	233	225	May 2
Unemployment Rate (%)	5.2	5.3	5.4	5.3	5.3	5.3	
Index of Hours Worked (% ch)	-0.1	2.6	-1.6	0.8	3.7	3.7	
Average Hourly Earnings (% ch)	0.4	0.4	0.1	0.4	4.1	4.0	
Producer price finished goods index (% ch)	-0.1	-0.4	-0.3	0.5	0.6	1.5	May 14
Excluding food and energy	0.4	-0.1	0.0	0.1	0.4	0.8	
Consumer price index (% ch)	0.1	0.3	0.1	0.3	3.1	3.0	May 15
Excluding food and energy (% ch)	0.2	0.2	0.1	0.2	2.5	2.5	
Retail sales (% ch)	0.2	1.5	1.7	0.5	9.4	5.7	May 13
Excluding motor vehicles (% ch)	0.5	0.9	1.6	0.3	8.7	6.0	
Industrial Production (% ch)	0.9	0.6	0.1	0.4	6.3	5.6	May 15
Manufacturing	0.9	0.9	0.1	0.6	7.0	6.6	
Capacity utilization (%)	84.1	83.6	83.4	83.5	83.5	83.4	May 15
Manufacturing	83.3	82.8	82.3	82.5	82.5	82.4	
Housing Starts (annual rate, thousands)	1425	1522	1375	1353	1428	1461	May 16
Single-family	1117	1218	1125	1024	1120	1152	
Trade balance (billions, monthly)	--	-10.4*	-12.7*	-10.5*	-10.2*	-10.1*	May 21
Merchandise	--	-16.9*	-18.9*	-16.9*	-16.5*	-16.3*	
Factory Orders (% ch)	--	0.8	2.5	-1.5	10.1	7.7	May 6
Durable Goods	--	1.5	4.1	-1.7	15.0	9.3	Apr 29
Personal Income (% ch)	--	0.9	0.4	0.7	6.6	6.3	May 1
Wages and Salaries	--	1.3	0.0	1.0	7.8	7.2	
Purchasing Managers' Index (%)	55.0	53.1	52.0	53.8	52.8	52.0	May 1
Consumer Sentiment U Mich (Feb 66=100)	100.0	99.7	97.4	96.9	98.3	95.7	May 2
Conference Board (1985=100)	118.5	118.9	118.7	114.2	114.5	113.4	Apr 29

* Data for February 1997 incorporate a \$1.2 billion downward correction to oil imports and may not be comparable to data for the past year.

Note: Percentage changes are month to month for last four months, annualized for 6- and 12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- The Federal budget deficit for March should narrow sharply compared to a year earlier due to the strength of the economy, a decline in the dollar value of tax refunds that were processed in March compared to a year earlier, and calendar differences that caused some payments to be pulled forward into February this year (April 21).
- Existing home sales likely declined sharply in March, reversing the upward surge in February. Given the lags between sales contracts being initiated and closed, however, it is too soon for these sales to soften due to the Fed's late-March rate hike (April 25).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		
			GS	Consensus	Last Report
Mon Apr 21	2:00	Federal Budget Balance (Mar)	-\$29.0 Bil	-\$30.0 Bil	-\$42.1 Bil
Fri Apr 25	10:00	Existing Home Sales (Mar)	-4.0%	-2.8%	+9.0%

- Import and Export Prices (Tue, Apr 22 - 10:00)
- Treasury 2-Year Note Auction (Tue, Apr 22)
- Treasury 5-Year Note Auction (Wed, Apr 23)
- Treasury 1-Year Bill Auction (Thu, Apr 24)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	6.2%	6.4%	6.8%
Forward	6.1	6.4	6.7
2 Yr T-Note	6.6	6.7	7.1
Forward	6.6	6.7	6.9
10 Yr T-Note	7.0	7.1	7.2
Forward	6.9	7.0	7.0

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.8%	4.2%	3.4%	2.4%	3.5%
Ind. Prod., Mfg.	4.3	6.6	4.4	2.7	4.7
CPI	3.3	2.4A	3.2	2.9	3.1
After-Tax Profits*	8.2	4.4	3.6	14.4	1.8
Unemployment	5.3	5.3A	5.1	5.4	5.0

* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

Monetary Policy Still Not Tight

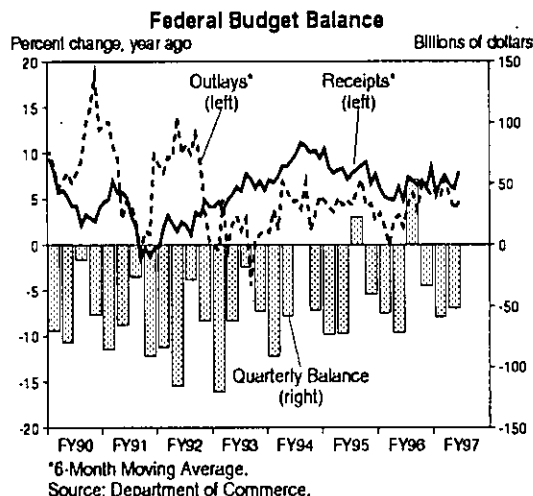
■ A near-term breakthrough in the federal budget negotiations appears unlikely, despite rumors and press articles to this effect. Rep. Gephardt is steering the administration to the left, and House Republicans are pushing congressional leaders to the right. Favorable budget trends also reduce pressure for a deal.

■ Governor Meyer's speech on monetary policy reinforces our view that Fed officials are likely to tighten monetary policy at the May 20 FOMC meeting. The speech laid out the rationale for preemptive action in remarkably clear terms. It is doubtful that the FOMC believes that the 25 basis points of tightening implemented to date will be sufficient.

■ Although the real federal funds rate is currently well above its long-term average, this does not mean that monetary policy is tight. After all, the economy's growth pace indicates that monetary policy has not been constraining.

■ In fact, there are several reasons why the equilibrium real federal funds rate associated with monetary policy neutrality is likely to be substantially higher now than in the past. In particular, financial market deregulation and the strength of the equity market both argue for higher real interest rates.

■ The historical record also reveals that the current level of real rates should not be a significant constraint on the freedom of Fed officials to tighten monetary policy further. For example, the peak real federal funds rate since 1960 has averaged 5.19%, more than 150 basis points above the current level.



Real Federal Funds Rate

Trough to Peak Dates	Trough Rate	Subsequent Peak	Increase (b.p.'s)
1961:Q1 - 1963:Q4	0.28%	2.62%	234
1968:Q1 - 1969:Q4	0.59	3.98	339
1971:Q1 - 1973:Q3	-1.48	4.31	579
1975:Q4 - 1980:Q1	-4.78	6.07	1085
1980:Q3 - 1981:Q3	0.71	8.23	752
1982:Q4 - 1984:Q3	3.98	7.58	360
1987:Q1 - 1989:Q2	3.34	5.29	195
1993:Q1 - 1995:Q2	0.32	3.44	312
Average:		5.19	482

Source: Federal Reserve Board.

Trade Recommendations

- Get short June '97 Eurodollars at or above 94.08, with a target of 93.85 and a stop on a close above 94.20.
- Get short June T-bond futures at prices above 109.08, with a target of 105.00 and a stop on a close above 111.16.

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**Issue No: 97/17
April 25, 1997**

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I. Weekly Wrapup

Economic and Market Overview

With a dearth of fresh economic news to digest, the U.S. bond and stock markets traded up early in the week on rumors that a budget deal was imminent, then faded on the lack of confirming evidence and hawkish talk from Fed officials. In the case of the equity market, a general pattern of better-than-expected first-quarter earnings reports allowed the indexes to hold onto much of their gains, although the sharpest increases were confined to blue-chip securities.

The tidbits of economic data that have been released in recent days imply that this quarter's growth, while perhaps a bit slower than last quarter's, is still well above its 2%-2½% long-run potential. For example, year-to-year gains in the Mitsubishi Bank/Wertheim Schroder weekly chain-store sales index averaged 4.6% during the first three weeks of April. This figure, while noticeably below the 6.7% gain posted for March (due in part to the early timing of Easter), still implies substantial gains in real terms.

Meanwhile, the upward drift in initial claims for unemployment insurance that had emerged in early April was arrested in the latest week. At 323,000, the four-week average is still quite low relative to all but the last two months. Thus, the pace of net hiring is probably still high enough to imply a trend decline in the unemployment rate.

Although sales of existing homes fell 2.8% in March, they were still at an elevated 4.1-million-unit annual rate, reflecting high levels of affordability. Moreover,

the National Association of Realtors attributed part of the March decline to adverse weather conditions.

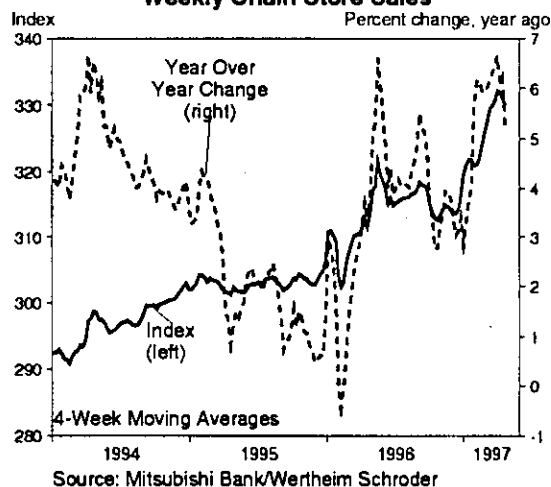
All in all, it seems clear that the economy headed into the second quarter at a pace only modestly below the 4%-4½% range that now brackets most estimates for first-quarter growth. Our estimate for current-quarter growth therefore remains at 3.4%, pending release of the preliminary first-quarter data on April 30.

Federal Reserve Policy

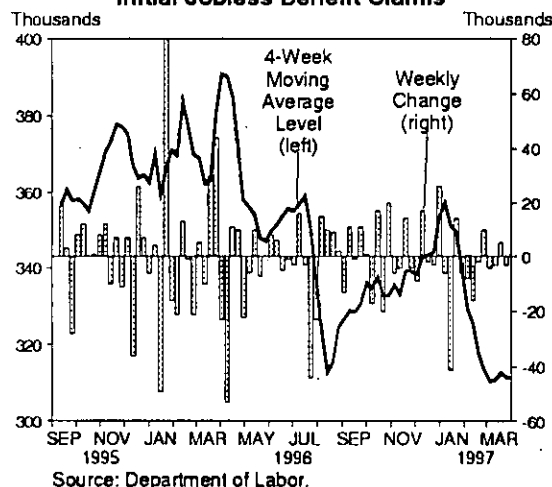
Fed policy makers also see the current growth rate as unsustainable, judging from recent comments by Vice Chair Alice Rivlin and Governor Laurence Meyer. Gov. Meyer's comments were especially noteworthy because they came in a remarkably explicit speech outlining the rationale for the March 25 rate hike. He emphasized: (1) his unabashed belief in "the Phillips Curve and the NAIRU concept;" (2) his view that the March tightening was justified by a change in the economic outlook; and (3) his judgment that rising wage inflation poses a risk of rising price inflation. While Gov. Meyer stressed that he was speaking for himself, it is quite unlikely that a speech this detailed would have been delivered without prior review by Chairman Alan Greenspan and other Board members.

Ms. Rivlin's comments, while much less formal, were important because she is widely viewed as the least hawkish member of the FOMC. Although she attributed part of the first-quarter surge in growth to unusually warm weather and stressed the importance of incoming data to the May 20 FOMC meeting, Ms. Rivlin also noted that the economy was "not clearly

Weekly Chain Store Sales



Initial Jobless Benefit Claims



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slowing down yet," implying that, in her view, the probabilities tilt toward another rate hike at that time.

Fiscal and Political Developments

We would discount rumors of a near-term breakthrough in the federal budget negotiations. Despite rumors and press articles to the effect that the prospects have improved, our understanding is that the talks made little headway toward common ground. Instead, Representative Richard Gephardt (D-MO) appears to be steering the Clinton Administration to the left, while House Republicans continue to pull that party to the right. Most likely, the continued jockeying simply reflects a desire on the part of both sides to put up a good-faith effort and to avoid blame if the negotiations do break down. In this situation, both sides have an incentive to imply that significant progress is possible if only the other side will give a little.

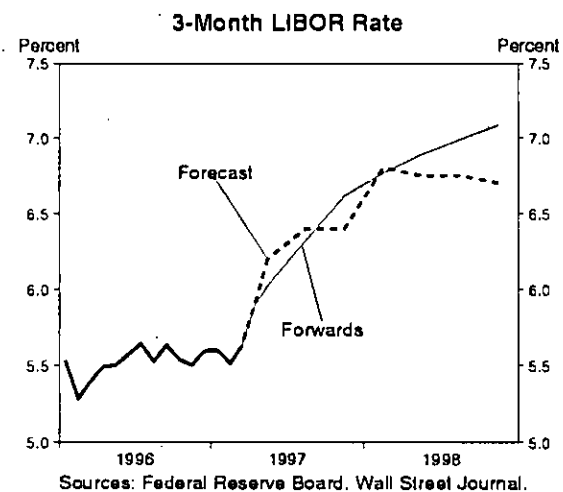
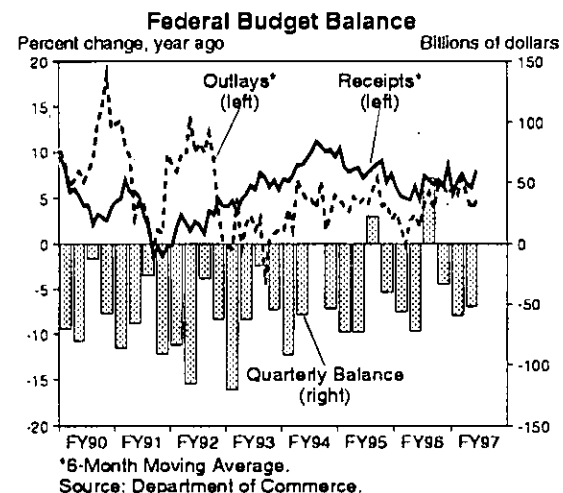
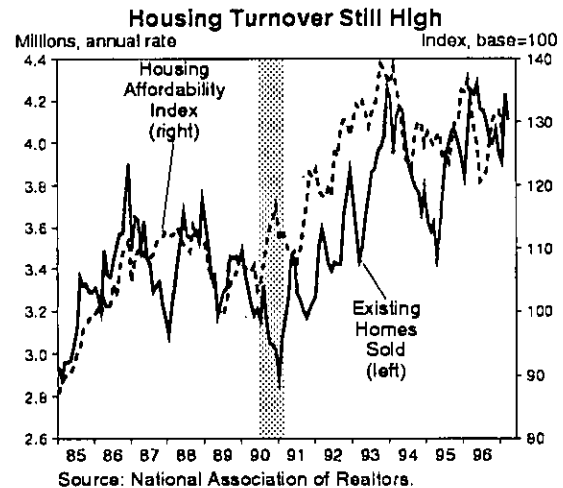
Unexpectedly favorable budget trends provide yet another reason for skepticism that policy makers will see the urgency of cutting the deficit. Halfway through fiscal 1997, the deficit stands at \$113.3 billion, \$14.4 billion below last year's October-to-March shortfall, suggesting that our recently reduced \$110 billion estimate for fiscal 1997 may still be too high.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Given the density of the economic data over the next week, now is a good time to lay low. We also are reluctant to put shorts on at current levels because market sentiment is already quite bearish and some slowing in the pace of economic activity appears inevitable in the second quarter.

However, should the market bounce upwards sufficiently we would reinstitute short positions at both the short- and long-end of the market. Given the pace of economic activity, the forthcoming data would need to be unusually weak to force a deferral of 25 basis points of tightening at the May 20 FOMC meeting. We continue to look to get short the June '97 Eurodollar contract at 94.08 or above, with a target of 93.85 and a stop on a close above 94.20 and would get short the June T-bond futures contract at prices at or above 109.08, with a target of 105.00 and a stop on a close above 111.16.





II. Monetary Policy Still Not Tight

Some analysts argue that Federal Reserve officials are unlikely to tighten monetary policy much further because the real federal funds rate already is well above its long-term average. We disagree with this conclusion for three reasons. First, the fact that the current real federal funds rate is above its long-term average tells us little about what setting is needed now to constrain the economic growth pace. There is no stable equilibrium real federal funds rate that can be easily used as a ruler to measure accurately the stringency of monetary policy.

Second, it is likely that the real rate associated with neutrality today is higher than the long-term average. Structural changes in the economy and a strong stock market both appear to have pushed the equilibrium real rate higher.

Third, even if the long-term average real federal funds rate were the right benchmark, there would still be plenty of room for tightening. The historical record shows that the real federal funds rate peak has averaged more than 5%, well above the current reading. Thus, the level of today's real federal funds rate provides little support for the view that future interest rate hikes must necessarily be very limited in magnitude.

The Shifting Real Federal Funds Rate

The notion that there is some immutable real equilibrium federal funds rate is based, in part, on the popularity of Taylor's Rule.¹ Taylor's Rule starts with the assumption that there is an equilibrium real federal funds rate of 2%. Taylor's Rule then proposes that the nominal federal funds rate should be set equal to this equilibrium real federal funds rate plus the expected inflation rate plus one-half of the difference between the actual and desired inflation rate plus one-half of the difference between potential output and actual output.

Although Taylor's Rule has worked reasonably well in describing the actual path of the nominal federal funds rate over time, its assumption of a stable 2% equilibrium real federal funds rate is unfortunate. That is because it has created the impression of stability in the equilibrium real federal funds rate that is not supportable either empirically or theoretically.

Empirically, the lack of stability can be illustrated by examining the relationship of the real federal funds rate to the tightness of the labor market. If the equilibrium rate were stable, then the relationship between the real federal funds rate and the degree of labor market tightness would also be generally stable over time, with the real federal funds rate rising as the labor market tightens.² In fact, no such tight relationship exists. As shown in the top chart on page 5, which examines the relationship since 1968 between the real federal funds rate and the tightness of labor markets (proxied by the gap between our estimates of the non-accelerating rate of unemployment [NAIRU] and the actual unemployment rate), the relationship appears to be very imprecise.

However, when one examines this relationship over shorter time periods, such as 1968-1979 and 1990-1996, a much closer relationship reemerges, with the real federal funds rate increasing as the labor market becomes tighter (i.e., when the unemployment rate falls below the NAIRU). This indicates that there is a close relationship between the real federal funds rate and the tightness of the labor market, mainly because Fed officials make monetary policy more stringent as the labor market becomes tight and ease when the unemployment rate climbs.

The relationship between the real federal funds rate and the tightness of labor markets is not visible over longer time periods for two reasons. First, the real federal funds rate associated with a given degree of labor market tightness shifts over time. Second, during the 1980s, the relationship broke down as Fed officials aggressively squeezed inflation out of the economy.

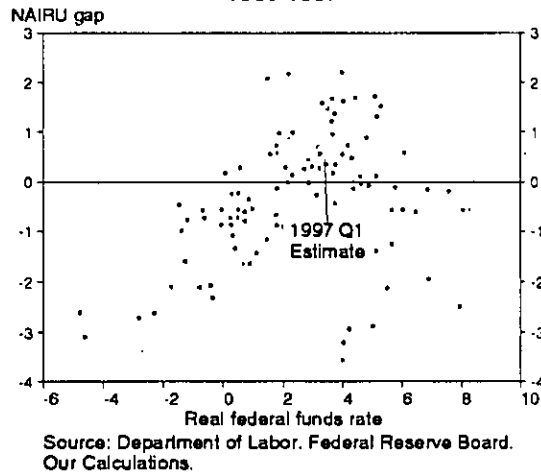
The shift in the real federal funds rate over time can be seen by comparing the scatter plots for 1968-1979 versus 1990-1996. During the 1990-1996 period, the real federal funds rate is higher at comparable degrees of labor market tightness. This suggests that the real equilibrium federal funds rate has shifted upward

¹ For a fuller discussion of Taylor's Rule see the *International Economics Analyst*, April 1997, p.5.

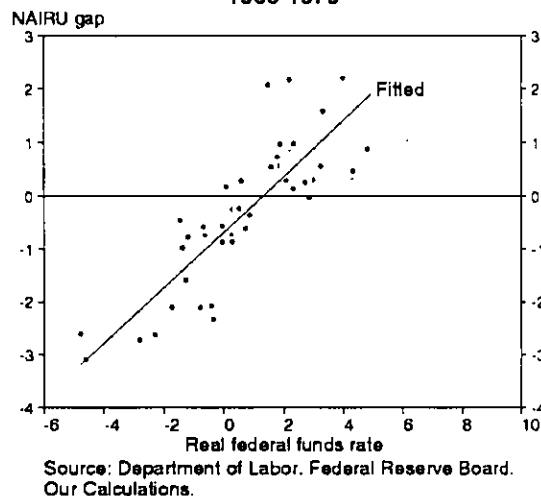
² As is the case with Taylor's Rule, this conclusion assumes no sharp shifts in the reaction function used by the monetary authorities to conduct monetary policy. However, if the equilibrium real federal funds rate were stable, then there would be little reason for the Fed to shift.



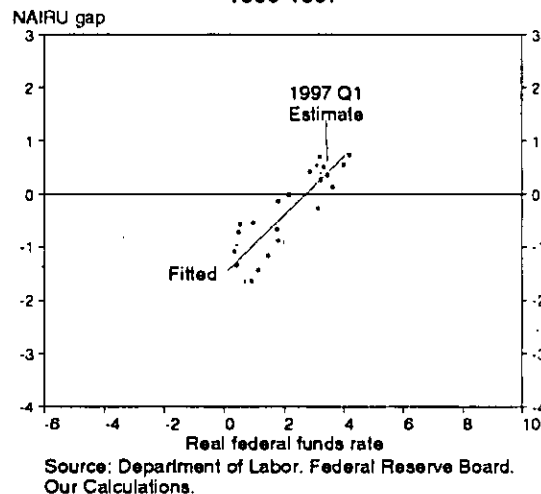
**Real Federal Funds Rate vs. NAIRU Gap
1968-1997**



1968-1979



1990-1997



over time and calls into question the validity of the assumption that the equilibrium real federal funds rate is stable over time. It also suggests that the current real federal funds rate of about 3½% (calculated using the GDP deflator) may not represent a tight monetary policy setting.

Why the Real Federal Funds Rate Has Climbed

A number of structural changes have occurred in the economy that suggest that the equilibrium real federal funds rate should be higher today than it has been in the past. First, interest rate ceilings on deposits (implemented by Regulation Q) no longer exist. Coupled with the development of mortgage securitization, this means that the housing industry always has good access to funds even when monetary policy is tight. In contrast, prior to 1980, the flow of credit to the housing industry was sharply constrained whenever the monetary authorities raised short-term interest rates above Regulation Q ceilings. This meant that small increases in rates had a significant constraining effect on economic activity, which held down the average level of real interest rates and led to somewhat lower peaks in nominal and real interest rates.

Second, global capital markets have become deregulated and integrated. This means that capital can flow freely throughout the world. This has tended to result in higher U.S. interest rates over the past 20 years compared to the 1960s. Capital outflows from the United States were artificially restricted prior to the collapse of the fixed exchange system in the early 1970s.

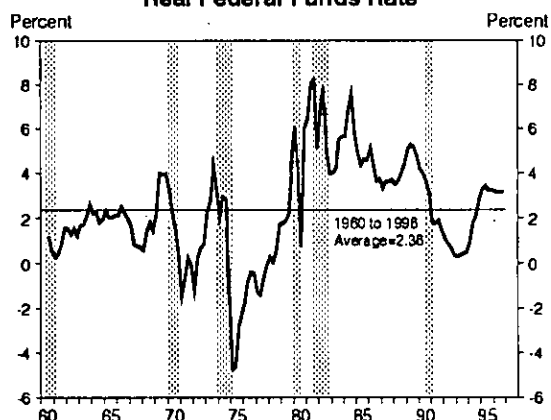
Third, stock market valuation is higher today than it generally has been during the past. This has reduced the equity cost of capital. All else equal, this should also result in a higher equilibrium real federal funds rate.³ The rise in interest rates offsets the decline in the cost of equity capital, keeping the cost of capital from declining.

The proof of the pudding is the fact that the U.S. economy has been growing at an above-trend rate since early 1996 at a real federal funds rate that is above the average of the 1960-1996 period. This fact alone suggests to us that the current equilibrium real interest rate has shifted higher and that monetary policy is not as stringent as the long-term average real federal funds rate implies.

³ See the *U.S. Economics Analyst*, October 18, 1996.



Real Federal Funds Rate



Note: Federal funds rate less year-ago percent change in the GDP chain weight deflator.

Source: Federal Reserve Board. Department of Commerce.

still plenty of scope for additional rate hikes. While it is true that 1997 is not 1994 because the monetary authorities are beginning to tighten monetary policy from a much higher starting point in terms of the real federal funds rate, one also should not be complacent and assume that this higher starting point constrains Fed officials to only tightening monetary policy once or twice. If the underlying pace of economic activity is above 3%, as appears likely, then it is likely to take more than a further 25- to 50-basis-point rise in the real federal funds rate to pull the economy back down to a trend growth pace.

The major constraint on the magnitude and aggressiveness of Fed tightening will continue to be benign inflation news. If the inflation news remains favorable, Fed officials are unlikely to push the federal funds rate up beyond a 6% nominal federal funds rate target, regardless of the growth pace. In contrast, if the wage pressures that are already visible leak into prices sooner than we anticipate, then the additional hikes in the nominal and real federal funds rate that we now envision in 1998 could be pulled forward into 1997.

Bill Dudley

Real Federal Funds Rate

Trough to Peak Dates	Trough Rate	Subsequent Peak	Increase (b.p.'s)
1961:Q1 - 1963:Q4	0.28%	2.62%	234
1968:Q1 - 1969:Q4	0.59	3.98	339
1971:Q1 - 1973:Q3	-1.48	4.31	579
1975:Q4 - 1980:Q1	-4.78	6.07	1085
1980:Q3 - 1981:Q3	0.71	8.23	752
1982:Q4 - 1984:Q3	3.98	7.58	360
1987:Q1 - 1989:Q2	3.34	5.29	195
1993:Q1 - 1995:Q2	0.32	3.44	312
Average:		5.19	482

Source: Federal Reserve Board.

Not High Compared to Past Peaks

An examination of the behavior of the real federal funds rate during past business cycles also suggests that there is plenty of room for additional rate hikes. As shown in the table above, the average increase in the real federal funds rate has been nearly 500 basis points. In addition, the average peak real federal funds rate of 5.19% shown in the table is also well above the current real federal funds rate.

Without any updrift in inflation, the additional 100 basis points of tightening that we foresee over the next 12 to 18 months would still result in a real federal funds rate below its average peak. And, if inflation drifts gently upwards, as we expect, the increase in the real federal rate would be even more subdued than the 100-basis-point rise in the nominal federal funds rate that we anticipate.

Thus, even if one concluded that the long-term average real federal funds rate were the right standard to use to assess the stance of monetary policy, there is



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'97 Mar	'97 Feb	'97 Jan	'96 Dec			
Nonfarm Payrolls (ch. Thousands)	175	293	259	231	233	225	May 2
Unemployment Rate (%)	5.2	5.3	5.4	5.3	5.3	5.3	
Index of Hours Worked (% ch)	-0.1	2.6	-1.6	0.8	3.7	3.7	
Average Hourly Earnings (% ch)	0.4	0.4	0.1	0.4	4.1	4.0	
Producer price finished goods index (% ch)	-0.1	-0.4	-0.3	0.5	0.6	1.5	May 14
Excluding food and energy	0.4	-0.1	0.0	0.1	0.4	0.8	
Consumer price index (% ch)	0.1	0.3	0.1	0.3	3.1	3.0	May 15
Excluding food and energy (% ch)	0.2	0.2	0.1	0.2	2.5	2.5	
Retail sales (% ch)	0.2	1.5	1.7	0.5	9.4	5.7	May 13
Excluding motor vehicles (% ch)	0.5	0.9	1.6	0.3	8.7	6.0	
Industrial Production (% ch)	0.9	0.6	0.1	0.4	6.3	5.6	May 15
Manufacturing	0.9	0.9	0.1	0.6	7.0	6.6	
Capacity utilization (%)	84.1	83.6	83.4	83.5	83.5	83.4	May 15
Manufacturing	83.3	82.8	82.3	82.5	82.5	82.4	
Housing Starts (annual rate, thousands)	1425	1522	1375	1353	1428	1461	May 16
Single-family	1117	1218	1125	1024	1120	1152	
Trade balance (billions, monthly)	--	-10.4	-12.3	-10.5	-10.1	-10.0	May 21
Merchandise	--	-16.9	-18.6	-16.9	-16.4	-16.2	
Factory Orders (% ch)	--	0.8	2.5	-1.5	10.1	7.7	May 6
Durable Goods	--	1.5	4.1	-1.7	15.0	9.3	Apr 29
Personal Income (% ch)	--	0.9	0.4	0.7	6.6	6.3	May 1
Wages and Salaries	--	1.3	0.0	1.0	7.8	7.2	
Purchasing Managers' Index (%)	55.0	53.1	52.0	53.8	52.8	52.0	May 1
Consumer Sentiment U Mich (Feb 66=100)	100.0	99.7	97.4	96.9	98.3	95.7	May 2
Conference Board (1985=100)	118.5	118.9	118.7	114.2	114.5	113.4	Apr 29

Note: Percentage changes are month to month for last four months, annualized for 6- and 12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- The employment cost index is likely to show further gradual acceleration, with the biggest uncertainty the contribution of benefits to overall compensation costs (April 29).
- Real GDP growth for Q1 will mask a sharp pickup in domestic demand growth. The headline figure will be held down by a reversal of the sharp improvement in trade seen in the previous quarter (April 30).
- April jobs report should be a bit softer than last few months, with a drop in aggregate hours worked (May 2).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Mon Apr 28	10:00	New Home Sales (Mar)	-2.5%	-2.6%	-0.7%
Tue Apr 29	8:30	Durable Goods Orders (Mar)	0.0%	+0.4%	+1.5%
	8:30	Employment Cost Index (Q1 '97)	+0.9%	+0.9%	+0.8%
	10:00	Consumer Confidence (Apr)	119.0	118.0	118.5
Wed Apr 30	8:30	Real GDP (Q1 '97—Advance)	+4.2%	+4.0%	+3.8%
	8:30	Chain-Weight Price Index (Q1 '97—Adv)	+2.3%	+2.1%	+1.5%
	10:00	Chicago Purchasing Managers Index (Apr)	57.0%	n.a.	57.5%
Thu May 1	8:30	Personal Income (Mar)	+0.5%	+0.4%	+0.9%
	8:30	Personal Consumption (Mar)	+0.6%	+0.5%	+0.3%
	10:00	Purchasing Managers Index (Apr)	55.0%	54.0%	55.0%
	10:00	Construction Spending (Mar)	-1.3%	-0.5%	+2.3%
		Domestic Motor Vehicle Sales (Apr)	13.3M	13.2M	13.7M
Fri May 2	8:30	Civilian Unemployment Rate (Apr)	5.2%	5.2%	5.2%
	8:30	Nonfarm Payroll Employment (Apr)	+200,000	+209,000	+175,000
	10:00	Leading Indicators (Mar)	+0.1%	+0.2%	+0.5%

- Treasury Announces Market Borrowing Estimates (Mon, Apr 28 - 3:00)
- Greenspan speaks to Int'l Inst. of Finance (Tues, Apr. 29 - 12:30)
- APICS Survey (Wed, Apr 30 - 10:00)
- Treasury Announces May Refunding (Wed, Apr 30 - 2:30)
- Kansas City Fed Survey (Thu, May 1 - 11:00)
- U.K. Parliamentary Elections (Thu, May 1)
- Consumer Sentiment—Final (Fri, May 2 - 10:00)

Interest Rates: Forecast vs. Forward Yields:

	<u>3 mo</u>	<u>6 mo</u>	<u>12 mo</u>
LIBOR 3 mo	6.2%	6.4%	6.8%
Forward	6.1	6.4	6.8
2 Yr T-Note	6.6	6.7	7.1
Forward	6.7	6.8	7.0
10 Yr T-Note	7.0	7.1	7.2
Forward	7.0	7.0	7.1

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	<u>Q4</u>	<u>Q1E</u>	<u>Q2E</u>		
Real GDP	3.8%	4.2%	3.4%	2.4%	3.5%
Ind. Prod., Mfg.	4.3	6.6A	4.4	2.7	4.7
CPI	3.3	2.4A	3.2	2.9	3.1
After-Tax Profits*	8.2	4.4	3.6	14.4	1.8
Unemployment	5.3	5.3A	5.1	5.4	5.0

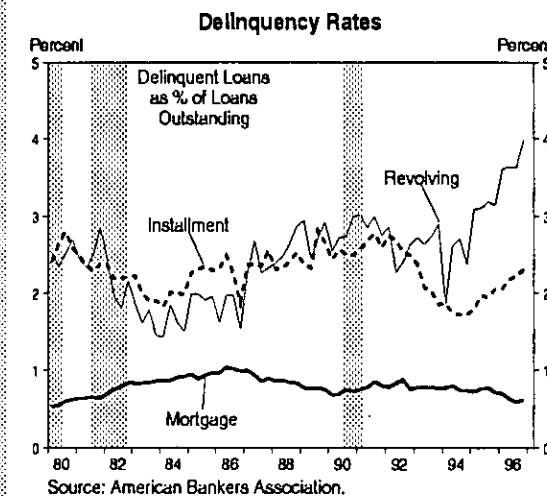
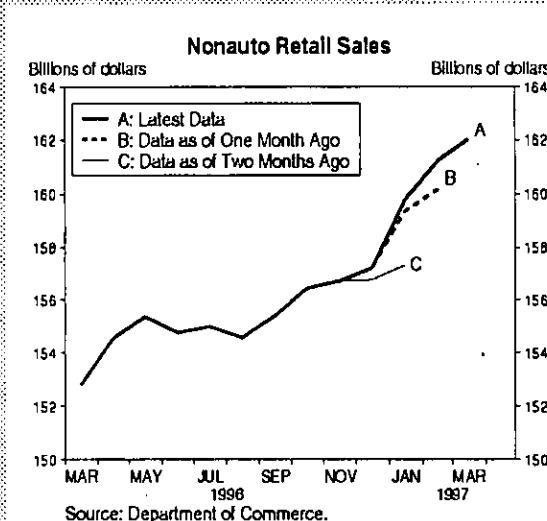
* Excluding inventory profits; adjusted for depreciation distortions.



U.S. Economics Analyst

Debt Be Not Proud: Consumers Are Still Spending

- Retail sales revisions were revised sharply upwards for January and February. This indicates that consumer spending was unusually robust in the first quarter. And, with inventories lean, this increases the risk that the economy may soon begin to overheat.
- So far, at least, the inflation outlook remains generally benign. Although prices for finished producer goods, excluding food and energy, rose by 0.4% in March, this worrisome development was offset by a slight decline in overall prices, and little price pressure was evident at the intermediate goods level.
- The strength in retail sales underscores our view that borrowers in the household sector are generally in good financial shape, despite the rise in consumer loan delinquencies. Revolving debt is a small piece of total consumer liabilities, and the increase in late payments appears due mainly to a shift in the mix of borrowers toward younger customers. Although the delinquency rates are higher on an absolute basis for this group, they have not been rising over time.
- Lenders of consumer credit also appear healthy. Specialty finance companies, in particular, have been able to offset higher average delinquency rates through a combination of rising net interest margins, higher fees, and lower expense ratios.
- Thus, the most likely explanation for the recent deceleration in revolving debt growth involves reduced needs for credit, due to rapid income gains. This means that even further decelerations in debt growth should not lead to spending weakness.



Trade Recommendations

- Stay long June '97/June '98 Euro calendar spread, maintaining a target of 100 basis points, and moving stop to a close below 80 basis points, from 75 basis points previously.
- Stay short June T-bond future with a target of 105.00, moving stop to a close above 108.00, from 108.16 previously.

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Issue No: 97/15
April 11, 1997

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I. Weekly Wrapup

Economic and Market Overview

After trading in a narrow range during most of the week, bond and stock prices came under renewed downward pressure on Friday. A strong retail sales report, which underscored the strength of consumer spending, was the culprit behind the selloffs.

Although the retail sales figures for March were not very robust, rising by 0.2% overall and by 0.5% excluding autos, this impression was more than offset by large upward revisions to the January and February retail sales figures. For example, non-auto retail sales for January were revised upwards by 0.2% (to +1.6%) and for February by 0.4% (to +0.9%). The retail spending data imply that real personal consumption expenditures rose at nearly a 6% annual rate in the first quarter. As yet, there are few signs that this momentum has slowed. Noteworthy is the fact that the 4-week moving average of the Mortgage Bankers Association index for new purchase applications has climbed sharply since February.

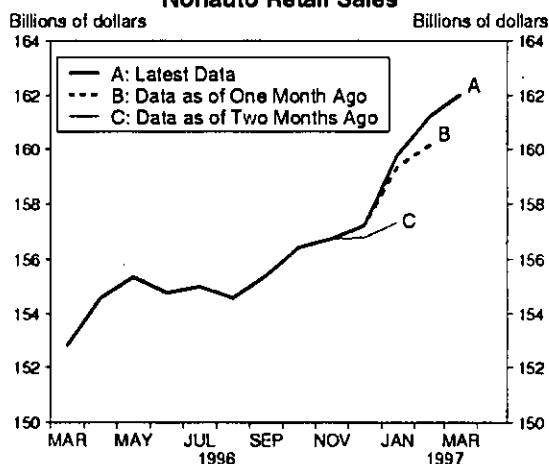
Updated wholesale trade data reinforce earlier indications that business stockpiles are exceptionally lean. Inventories were flat among wholesalers in February, but were revised down 0.2% in the prior month. Sales at those firms, meanwhile, surged 2.9% in the first two months of 1997, pushing the inventory-to-sales ratio down to a 12½ year low. Little wonder, then, that both national and regional measures of orders to U.S. factories are climbing rapidly. For example, the Richmond Federal Reserve Bank's monthly poll in March showed a 26% rise in the new orders component.

On the inflation front, the news was mixed. Although core producer prices for finished goods rose quite sharply in March (+0.4%), there was no evidence of growing pressure in the pipeline as intermediate goods, excluding food and energy, were unchanged. Moreover, the uptick in March was due, in part, to big increases in two components, tobacco and aircraft. Finally, a sharp drop in energy prices was sufficient to cause the overall index for finished goods to fall by 0.1% in March.

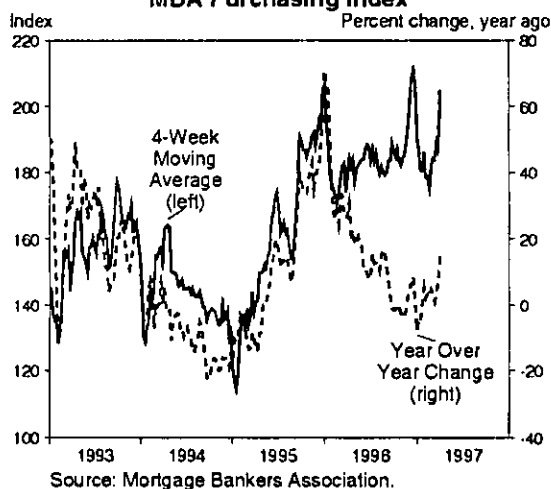
Federal Reserve Policy

Now that the unofficial "blackout" period for official commentaries surrounding the FOMC meeting has ended, senior central bankers once again are providing commentary on issues that have a direct bearing on monetary policy. Judging from their early comments, it does not seem that the concerns which prompted the interest rate hike last month are abating. In an interview with a news service, Governor Susan Phillips, a centrist among policy makers, stressed the high levels of resource utilization as creating potential for firmer price pressures in the future. She also expressed the view that the recent interest rate rise won't do much to slow the economy toward its trend pace, stating, "it's still a fairly low structure of interest rates by historical comparisons." Separately, Richmond district bank president Alfred Broadus, a noted policy hawk, said he foresees a pickup in price inflation this year and believes that the risks for economic growth are "heavily weighted" to the upside versus consensus forecasts.

Nonauto Retail Sales



MBA Purchasing Index



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Fiscal and Political Developments

Although the Clinton Administration has been more flexible on the budget, it remains doubtful that a bipartisan deal on a deficit-eliminating fiscal package will be reached in the next few weeks. President Clinton agreed to modify his proposals for the Medicare program that would further reduce spending by \$18 billion over five years, and White House aides also reportedly have shown some willingness to consider additional restraint on discretionary domestic spending. In response, senior Republican lawmakers have indicated more optimism about reaching a broad budget settlement that would obviate the need for Congress to draft its own plan, with the risk of rejection by the President in the end.

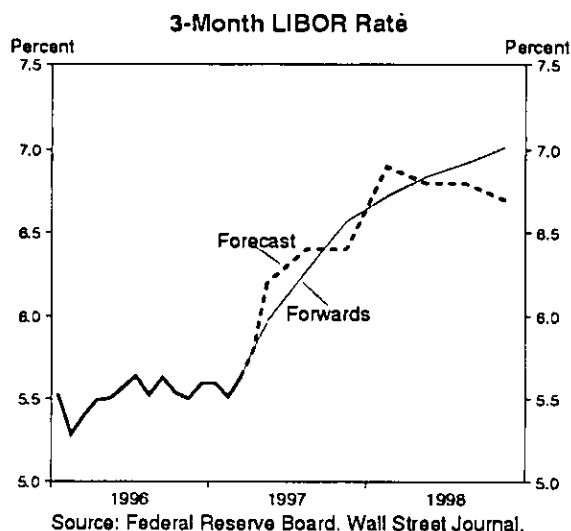
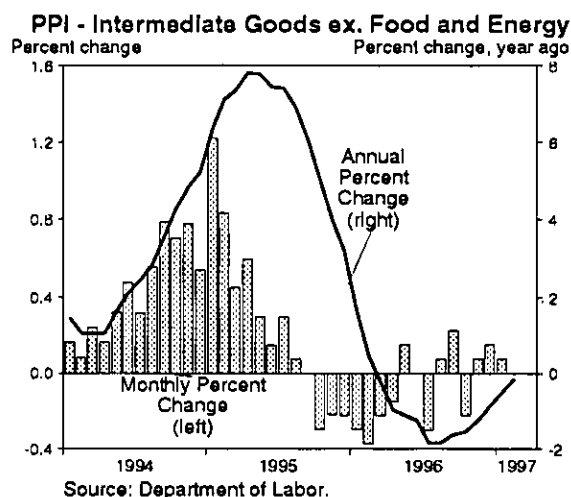
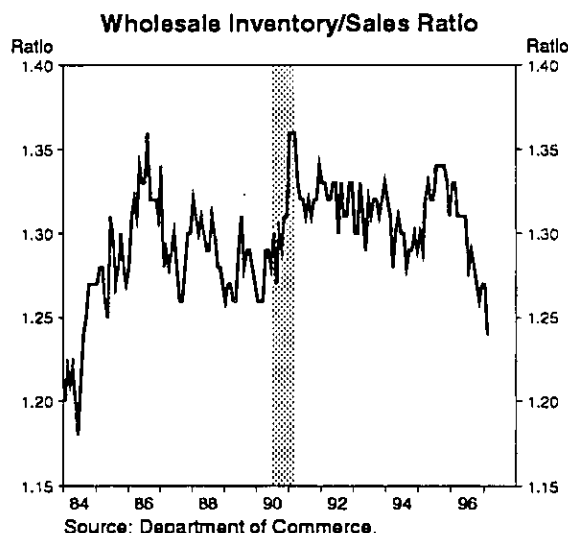
Differences between the two sides remain large, however, especially on the magnitude and structure of tax cuts and the volume of savings achievable in discretionary federal programs. Offsetting the pressures for an agreement are divisions within the GOP congressional caucus which make a deal very hard to achieve. Many Republican lawmakers are deeply skeptical that any budget settlement with the Clinton Administration can advance their political agenda, which centers around permanently shrinking federal government activities in both taxation and spending. The painful experience of 1990, when an initial budget agreement was rejected by the House, will likely deter the parties from announcing a deal that does not have broad support in Congress.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

We would keep our bearish positions in place. Final demand remains very strong. With inventories lean, there is an increased risk that the economy will continue to surge ahead. In such an environment, Fed officials may be forced to tighten monetary policy significantly more than expected to prevent the economy from overheating. As expectations about the Fed grow more pessimistic, this is also likely to put further upward pressure on bond yields.

On the short end, we would remain long the June '97/June '98 calendar, keeping our target of 100 basis points, but moving our stop to a close below 80 basis points, from 75 basis points previously. On the long end, we would remain short the June T-bond futures contract, maintaining our target of 105.00, but moving the stop to a close above 108.00, from 108.16 previously.





II. Debt Be Not Proud: Consumers Are Still Spending

Consumer debt has long been touted as the Achilles heel of the current business expansion. More recently, rising delinquencies in the credit card arena have been cited as evidence that borrowers are overburdened or that lenders are overextended. Similarly, credit card delinquencies have been pointed to as the driving force behind decelerating revolving debt growth and a slowdown in card solicitations.

Our analysis, however, suggests that neither debtors nor creditors are in dire straits. In terms of borrowers' health, the debt burden is often overstated, as payment problems seem fairly concentrated in credit card debt, a small piece of total household liabilities. Moreover, evidence suggests that higher delinquency averages reflect, in part, a mix shift toward younger customers where delinquency rates are higher in absolute terms but have not risen markedly over time. This means that the slowdown in debt growth probably does not stem from an increasingly burdened consumer reducing credit demands. Nor does a major scaling back of credit supply appear to be driving the debt deceleration. While rising delinquencies may be deterring some banks from stepping up their consumer lending, others have been growing market share by learning to offset higher delinquency rates through a combination of higher fees and interest charges. Total unused credit lines, therefore, continue to grow.

How, then, to explain the drop in revolving debt growth and credit card solicitations and to gauge the associated potential for a spending drag? Most likely, debt decelerations relate to reduced needs for credit due to exceptionally strong income growth. In this context, current debt dynamics do not pose a serious threat to the spending outlook.

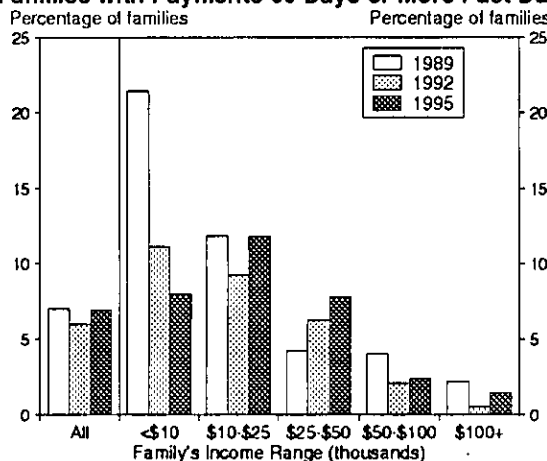
Households Do Not Appear Overburdened

In the past, we have argued that growth in total liabilities of the household sector since 1994 is not particularly worrisome, since it has been swamped by changes on the asset side of the balance sheet. Yet, what if we narrow our focus to credit card debt and to those families experiencing payment problems? Clearly in the revolving debt arena, which primarily includes credit card debt, delinquencies have been rising, reaching 4.0% in the final quarter of 1996, after having peaked at 3.0% during the 1990-1991 recession. Evidence from the recently released 1995

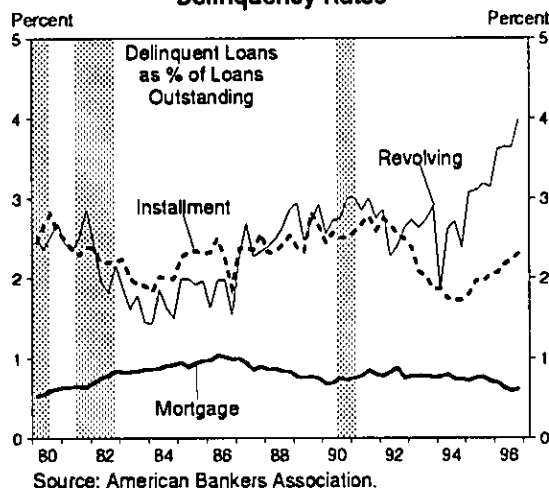
Survey of Consumer Finances suggests that middle income families, earning between \$10,000 and \$50,000 per year, are having some difficulty servicing their total debt, as shown in the accompanying chart. Yet, this picture likely overstates the problem, since it calculates the percentage of families with *any* payment 60 days or more past due. By counting all types of delinquencies equally, this measure implicitly overweights the rise in late revolving debt payments, which are generally small in dollar terms.

Moreover, other parts of the survey's results suggest that the increase in overdue payments is partly due to a mix shift toward groups where the absolute delinquency rate is higher but where consumers are not becoming increasingly burdened. For example, the percentage of families where debt service is 40% of income or greater fell between 1992 and 1995. While this may relate to strong income growth, it also probably stems from debt becoming more widespread—e.g., the growth in liabilities was driven by more families taking on debt. Slicing the delinquency data by age group provides even more support for the idea that a mix shift occurred: Both credit card and overall debt medians grew most rapidly for households headed by persons less than 35 or between 35 and 44. These age groups had higher-than-average absolute delinquency rates of 8.2% and 7.0%, respectively, in 1992; thus a mix shift toward these groups raised the average delinquency rate. More importantly, however, overdue payment rates for these younger consumers have not risen

Families with Payments 60 Days or More Past Due



Source: Federal Reserve Board.

Goldman
Sachs**Delinquency Rates**

significantly during the credit card explosion.¹ Therefore, for a given consumer, the strains of debt have not become increasingly onerous, and credit demands should not necessarily be waning.

Finally, as shown in the chart above, if we step back to look at the total household sector, payment problems seem somewhat confined to revolving accounts, comprising only 10% of overall debt. Delinquencies on installment debt—which includes loans on autos and mobile homes, closed end personal loans, second mortgages and home equity loans—remain at reasonable levels, while primary mortgage delinquencies have actually declined during this business expansion. One reason that late payments have not become a generalized problem is that total debt service burdens are not particularly high: Declines in mortgage servicing have, to some degree, offset the rise in revolving payments, keeping debt service as a percentage of disposable income at 17.0%, below its peak at the end of the previous expansion of 17.6%.

Lenders Also Appear Healthy

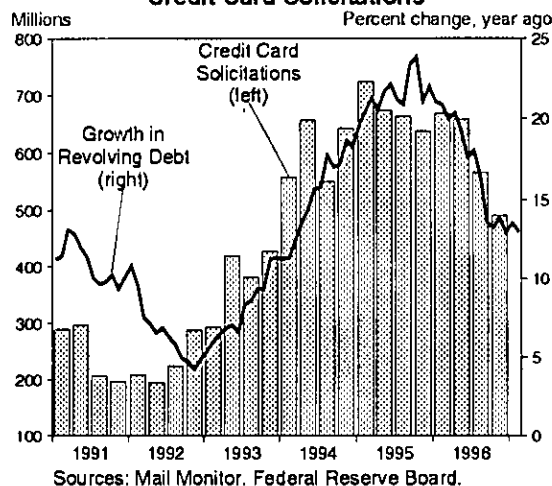
The fact remains, however, that growth in revolving debt has decelerated from a peak of 23.8% year-over-year in late 1995 to 12.9% currently. Meanwhile, solicitations for new credit cards slowed during 1996, as seen in the accompanying chart. The coupling of these developments has been cited as evidence that

¹ Delinquencies in the 45-54 age group did rise sharply, from 5.4% in 1992 to 7.8% in 1995, but this move was offset by a steep decline in delinquencies for the 55-64 age group, from 4.6% to 2.5%. It thus remains unclear whether middle aged families as a group saw an increase in payment difficulties.

lenders cannot absorb a higher average delinquency rate and are now pulling back from the credit card business.

Yet, a look at consumer finance companies provides evidence that many lenders have been able to offset higher delinquencies with a combination of higher fee income, lower expense ratios, and higher net interest margins. As shown in the table on page 6, specialty finance companies endured an increase in loan loss provisions as a percentage of average earning assets of just over 200 basis points between the first quarter of 1995 and the final quarter of 1996. Over that same period, however, net interest margins as a percentage of earning assets rose 77 basis points, as lenders offered fewer “teaser rates.” Moreover, non-interest income as a percentage of earning assets grew 81 basis points, as the drag from annual fee reductions was replaced by increases in other fees categories such as late fees. Finally, non-interest expense ratios fell slightly as firms became more efficient in marketing and in processing transactions.

For commercial banks, on the other hand, it is difficult to know whether these types of offsets have occurred—consumer credit is a small portion (between 5% and 10% of earnings) of overall business, and margin data on these loans are not generally available. Federal Reserve data for large commercial banks does show a higher-than-average charge-off rate on credit card loans of 5.0% by the third quarter of 1996. Commercial banks, therefore, may be responsible for the slowing of solicitations. In the meantime, however, specialty finance companies are increasing their market share in the revolving credit business, with the ten largest companies now commanding 50% share of the

Credit Card Solicitations



Income Components: Specialty Finance Companies (percentage of average earning assets)

	Net Interest Margin	Loan Loss Provision	Non- Interest Income	Non- Interest Expense	Return On Assets
1993	8.05%	2.53%	3.49%	5.91%	1.76%
1994	7.36	2.36	3.46	5.82	1.78
1995	7.40	2.68	3.05	5.34	1.65
1996	7.94	3.68	3.39	5.23	1.66
1995 Q1	7.27%	2.24%	2.81%	5.53%	1.57%
Q2	7.35	2.40	3.09	5.41	1.87
Q3	7.45	2.75	3.13	4.89	1.75
Q4	7.51	3.24	3.16	5.18	1.56
1996 Q1	7.84	3.23	3.17	5.14	1.80
Q2	7.85	3.39	3.36	5.21	1.71
Q3	8.01	3.69	3.31	5.23	1.66
Q4	8.04	4.32	3.62	5.29	1.58

Source: Company reports.

market, up from 31% in 1986. Altogether, credit lines continue to grow: Between 1992 and 1995, the median limit on credit cards surged from \$5,400 per family to \$9,000, outstripping the growth in median credit used.

Spending Can Continue to Be Robust

If borrowers are healthy and lenders are willing, why have revolving debt and card solicitations slowed? The most likely explanation involves reduced needs for credit, due to rapid growth in income. Over the past twelve months, while real consumption has grown at a sturdy 2.8% rate, real disposable income growth has been a blistering 3.7%. In the past, such an environment of strong income growth has been consistent with decelerating debt growth: Since 1970, the correlation between changes in debt growth (i.e., the change in the *flow* of debt) and disposable income growth has been -0.21.² This suggests that debt and income are, in some sense, substitutes for one another. Similarly, the slowdown in card solicitations may be explained by reduced demands for new credit lines—the acceptance rate for new cards has nearly halved since 1992 and is now running at only 1.4%. Thus, the marketing expense associated with a solicitation may outweigh the benefits of a 1.4% acceptance rate.

If slower debt gains relate to strong income growth, spending should not be expected to slow. Moreover,

it is unclear whether recent changes in debt growth relate directly to spending decisions, since growth in credit balances may reflect shifts in the mix of liabilities, accumulation of financial assets, or financing of real asset purchases, only the latter of which shows up as consumer spending. Consumers might also use more credit while shifting their mix of assets, such as moving cash balances into the stock market. In 1996 specifically, credit growth was likely tied to factors other than spending, since income gains were enough to generate both consumption growth and a rise in the saving rate.

Even if we assume that debt decelerations will have a negative impact on spending, the effect is unlikely to be large in dollar terms. While total revolving debt balances are close to \$500 billion, allowing almost 20% of purchases to be made on credit, the *growth* in spending is affected by the *change* in accumulation or decumulation of debt balances. This is generally a small number. In 1996, for instance, when revolving debt began decelerating, balances expanded by \$53 billion, versus \$75 billion in 1995, for a net drag of \$22 billion. Despite this, overall spending was still quite strong, given the powerful effect of income growth. Meanwhile, last year's deceleration has already brought year-over-year debt growth closer to normal levels: Revolving debt is now growing at 2.5 times the pace of disposable income gains, versus an average for this ratio during the second half of expansions of 2.0. A decline in today's ratio to 2.0 would imply debt growth of about 10.0%, for a net drag in 1997 of \$6.7 billion. If, by contrast, consumer debt growth decelerates to 6%—or 1.2 times disposable income growth, which is the low point of this ratio during mature stages of expansions—the drag would be \$25 billion in 1997. Neither of these figures is large, relative to total consumption of \$5.5 trillion.

Thus, we believe the environment remains supportive for consumer spending. While consumer balance sheets should continue to be monitored for signs that debt has become intolerably high, we do not see evidence that this is currently the case. Recent consumer credit figures in fact suggest that growth rates may have stabilized. Moreover, should credit continue to slow, any negative effect on spending will likely be masked by the positive impetus from income gains.

Jill Jacobs

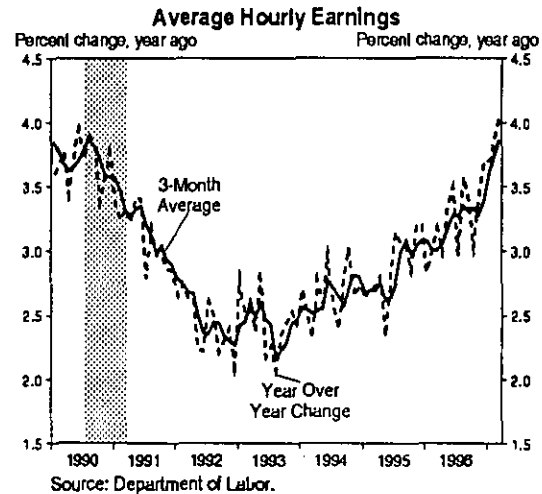
² While this coefficient does not imply a particularly tight correlation, it is striking that it is negative, since stronger income growth might be expected to prompt a greater supply of consumer credit to borrowers who are better able to pay.

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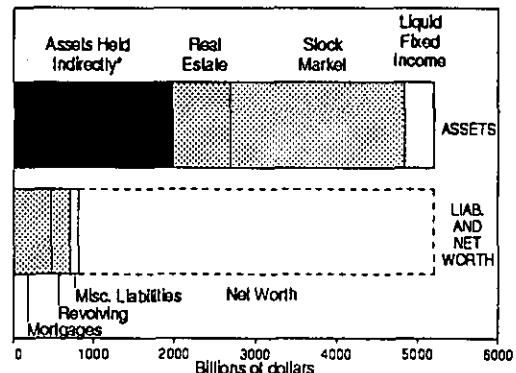
U.S. Economics Analyst

The Wealth Effect: The Jury Is Still Out

- The latest indicators show more signs of pickup than slowdown in U.S. economic growth and a further acceleration in wage trends. Real consumer spending surged at a 5%-6% annual rate last quarter, while activity accelerated in both the construction and manufacturing sectors.
- The employment data for March confirm this underlying strength. In particular, hours worked rose at a 3.5% annual rate in the first quarter, supporting other indications that our 3.5% estimate for first-quarter real GDP growth is probably too low. In this context, and with unemployment falling, the moderation in payroll gains in March was probably due mainly to seasonal distortions.
- The incoming data reinforce our view that further Fed tightening steps are very likely, beginning with a rate hike at the next FOMC meeting on May 20.
- It is tempting to see the surge in spending as the lagged response to two years of strong gains in household net worth. However, the personal saving rate also rose last quarter, underscoring the solid growth trend in real income that has formed the backbone of our economic outlook.
- In fact our review of the historical record on the wealth effect finds plenty of supporting evidence stretching back over three decades, but no clear explanation for its absence in the past two years. Against this backdrop, market participants should not be too quick to assume that the latest stock market setback will curb spending growth, when none of the much larger gains since late 1994 have yet been spent.



Change in Consumer Balance Sheet: 94Q4 - 96Q4



Trade Recommendations

- Stay long June '97/June '98 Euro calendar spread, maintaining target of 100 basis points, moving stop to a close below 75 basis points, from 60 basis points earlier.
- Stay short June T-bond future with a target of 105.00, moving stop to a close above 108.16 from 110.00 earlier.

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**Issue No: 97/14
April 4, 1997**

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I. Weekly Wrapup

Economic and Market Overview

The U.S. bond market spent most of the week in a narrow range, as 30-year Treasury yields above 7% attracted enough investors to replace those driven off by economic news suggesting that the Fed tightening was not yet over. In contrast, the equity market had a difficult week as worries about earnings growth and higher interest rates pushed investors to the sidelines.

On the economic front, most of the news continued to indicate that activity is rising briskly. For example, the March purchasing managers' index rose to 55.0 from 53.1, boosted by a large increase in the orders component, and construction spending for February surged 2.3%. Moreover, there were few signs that the economy's strength is waning. Not only did the index of leading economic indicators rise sharply in February (+0.5%), but factory orders also rose by 0.8% and unfilled orders rose by 0.9% in February. Meanwhile, initial jobless benefit claims remain quite low, while the number of benefit recipients and the unemployment rate are both falling. This suggests that the moderation in payroll gains in March (+175,000) had more to do with fluctuations in the weather and shifts in seasonal adjustment factors than any change in the underlying trend.

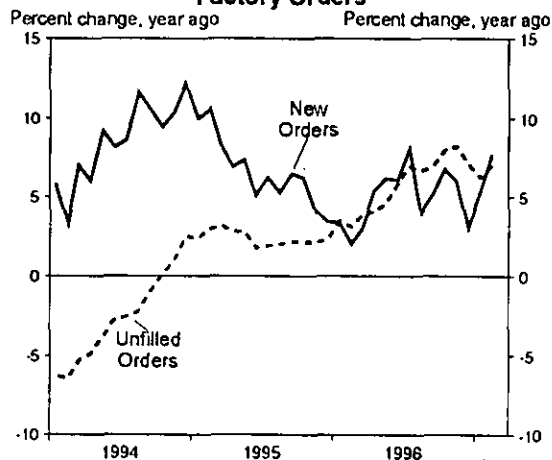
Beneath the surface, details of the employment report underscored the economy's strong momentum. In particular, the index of hours worked rose 3.5% at an annual rate last quarter, despite a 0.1% slip in March. In the factory sector, the workweek rose 0.2 hour to 42.1 hours, 0.1 hour short of all-time high reached in January 1995.

On the inflation front, the news was mixed. On one hand, the vendor performance component of the purchasing managers' report indicated a slowdown in supplier deliveries by rising to 53.6 in March from 51.3 in February. On the other hand, the prices paid component of the NAPM report dipped to 50.9 last month from 55.1 in February. Meanwhile, average hourly earnings rose 0.4% in March; on top of a small upward revision, this pushed the year-on-year trend up to 4% for the first time in this expansion.

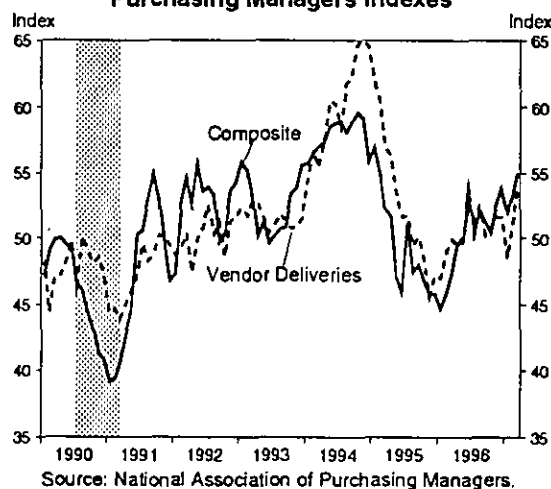
Federal Reserve Policy

Over the past week, two wire service reports got the attention of market participants trying to assess the prospects for a Fed tightening at the May 20 FOMC meeting. One story reported that Fed officials had in no way precommitted themselves to tighten at that meeting. The other reported that several senior Fed officials were concerned about the strength of the economic news and believed that more interest rate increases would be needed to pull the economy's growth trajectory back down to trend. Although seemingly contradictory, both stories are probably accurate. According to those who have attended FOMC meetings, Fed officials typically adjust monetary policy in discrete steps without prejudging whether additional moves will be taken at subsequent meetings. This has especially become the pattern now that the FOMC minutes disclose more of the nuance of the discussions that take place at meetings and the meetings are taped and transcribed for release after five years. At the same time, the activity data has been so strong that Fed officials almost certainly would tighten if the May 20 meeting were at hand.

Factory Orders



Purchasing Managers Indexes



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They recognize that 25 basis points of tightening will not change the economy's trajectory in a meaningful way and that more tightening appears necessary to pull the economy back to a trend growth pace.

The decline in equity prices has not been sufficient to deter Fed officials from tightening further for two reasons. First, the magnitude of the market decline has been quite small (less than 10% for the S&P 500 index) relative to the previous rise (up more than 75% to its February peak from the beginning of 1995). Second, Fed officials cannot count on the decline having a noticeable restraining effect on economic activity given that the earlier rise did not appear to stimulate spending (see center section for an in-depth examination of the so-called "wealth effect").

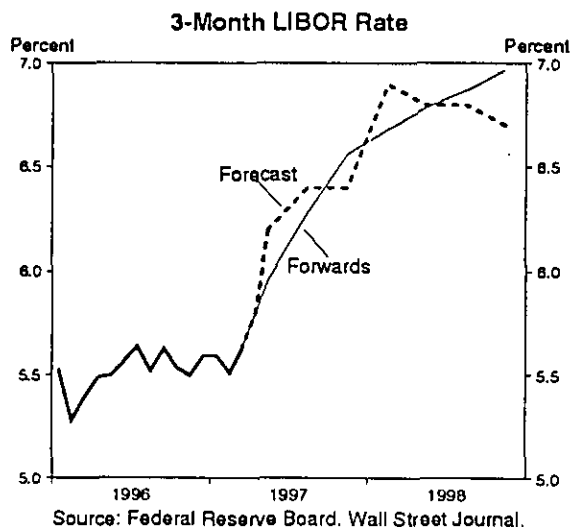
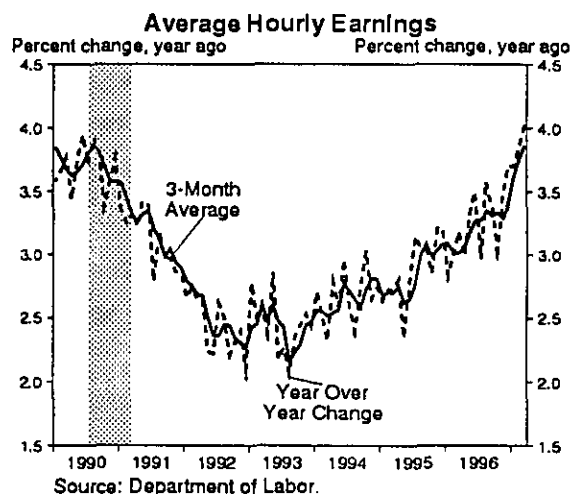
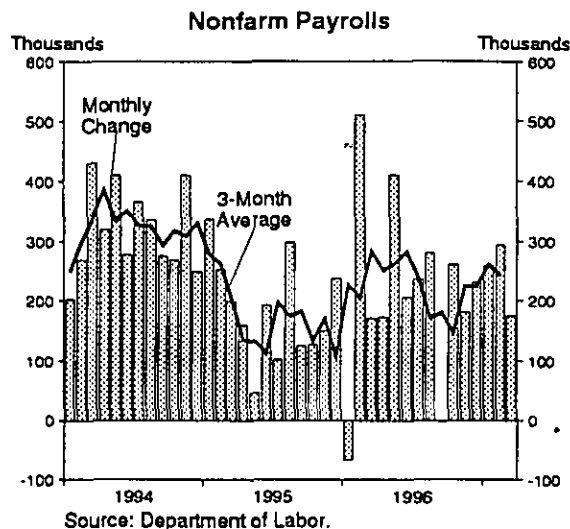
Fiscal and Political Developments

In the quest for a balanced budget, the Republican leadership plans to pass two pieces of legislation this year: 1) A bill that balances the budget by the year 2002, accomplished mainly by cutting spending, and 2) Legislation that would cut taxes by about \$120 billion (gross amount) over the next five years with the tax cuts financed from the interest rate savings projected to be generated by a balanced budget and an extension of the airline ticket tax. Before embarking on this course, the Republican leadership is likely to negotiate for a few more weeks to help to inoculate themselves against blame when the negotiations remain deadlocked. Because the prospect for a breakthrough in these talks is very low, Republicans are likely to set out on their own course by May.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Incoming data underscore the strength of the U.S. economy and reinforce our opinion that more Fed tightening is likely than generally expected. For this reason, we would retain our two bearish trading positions. We would remain long the June '97/June '98 Eurodollar futures calendar spread, maintaining a target of 100 basis points and moving our stop to a close below 75 basis points, from 60 basis points previously. On the long end, we would retain our short position in the June T-bond futures contract, maintaining our target of 105.00 and moving our stop down to a close above 108.16, from 110.00 previously.



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II. The Wealth Effect: The Jury Is Still Out

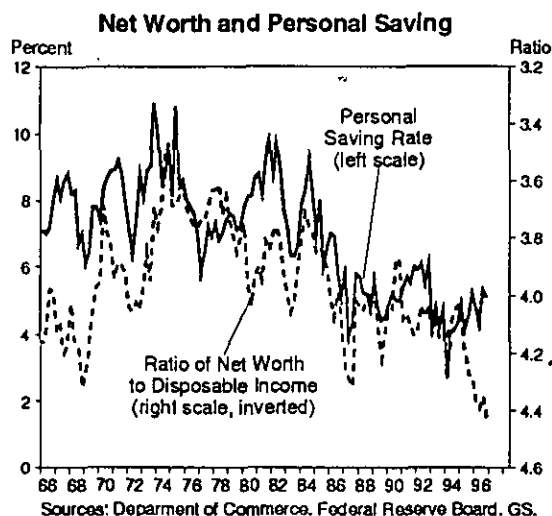
After rising at a sturdy 3.4% annual rate in the fourth quarter of 1996, real consumer spending was on track to increase at a blistering 5%-6% rate last quarter. Could this be the beginning of the wealth effect that we and other economists have discussed from time to time and that Fed Chairman Alan Greenspan alluded to in preparing Congress and the financial markets for last month's monetary tightening? Or, will the nearly 10% slide in stock prices seen in recent weeks spark a wealth effect in reverse, causing consumers to turn tail in coming months?

The verdict is not yet in on whether changes in wealth will drive consumer spending—in either direction. The setback in stock prices is certainly too recent, and probably too small in the context of the extraordinary gains of the preceding two years, to hurt spending too much; in fact, many stockholders are still marginally ahead so far in 1997. By the same token, there has been no discernible spill-over into spending from that two-year run-up in wealth; in other words, income growth has been strong enough over the past two years to finance solid gains in spending—including the latest surge—and a modest rise in saving to boot.

It is this income trend, and its solid underpinnings, on which we have been basing our forecast of consumer-driven, above-trend growth. The uncertainties about a wealth effect that is now more than two years late are simply too great, and now too evenly balanced, to incorporate into a forecast, despite plenty of evidence that changes in wealth have systematically affected consumers' spending and saving decisions in the past.

Rationale and Historical Evidence

As we see it, the rationale for the wealth effect is twofold: For many people, the stock market movements that generate the largest swings in household net worth are taken as a barometer of the economy's well-being, and thus cause confidence and spending to rise and fall in their wake. For others, significant gains in net worth bring them closer to their ultimate saving objectives—e.g., children's education or retirement—and therefore reduce the amount they need to set aside out of current income to meet those needs, while setbacks in net worth have the opposite effect. In either case, the validity of the wealth effect boils down to a question of whether large changes in net worth cause saving to move in the opposite direction.



At the simplest level of analysis, this inverse linkage seems fairly well established in the chart above, which plots the personal saving rate against the ratio of household net worth to disposable income. Both have been scaled to disposable income to adjust for trend growth in the economy. With the net worth ratio plotted upside down, the coincident movement of the two lines shows that the expected inverse linkage has held up for most of the past thirty years, though lately it appears to have weakened. However, the chart fails to address a basic question: How do changes in net worth stack up against other factors—such as changes in income growth, unemployment, confidence, interest rates, and demographics—that might also affect households' decisions about how to allocate income between consumption and saving?

This question is best answered by multiple regression analysis. Results from such analysis, based on annual data from 1964 to 1996 and summarized in the table on page 5, confirm the historical role of net worth as a key determinant of the saving rate. In particular:

1. Net worth has been an important driver of the consumption/saving decision for more than three decades—ranking third, behind shifts in income growth and unemployment. Deviations in disposable income growth from its five-year trend have consistently been the most important factor, probably because consumers initially see shifts in income growth as transitory and are



Personal Saving Regression Results

Explanatory Variable	1964-1996	1964-1993	1970-1993
Income Growth Deviation	+0.389*	+0.352*	+0.365*
Unemployment Rate	+0.326*	+0.325*	+0.288*
Net Worth Ratio	-0.015	-0.021*	-0.026*
Adjusted R ²	.445	.472	.567

* Statistically significant at 5% on a one-tailed test.

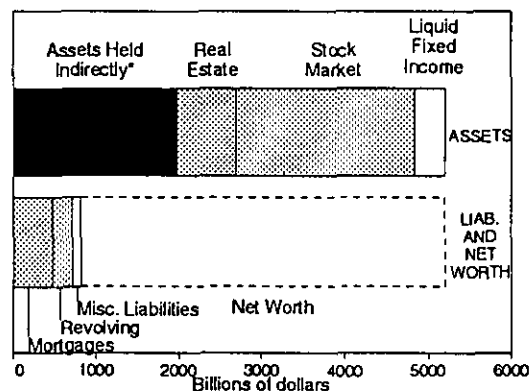
Note: All variables in first differences except for the income growth deviation, which is the percentage change in disposable income less its 5-year moving average.

therefore slow to adjust their spending habits.¹ Predictably, changes in the jobless rate have also caused the saving rate to move in the same direction. On the other hand, shifts in consumer confidence—like net worth—typically push the saving rate in the opposite direction. In fact, confidence ran a close fourth in the analysis, probably reflecting the impact of changes in net worth on sentiment. Finally, changes in interest rates and in the age composition of the population have had little discernible systematic effect.²

2. The linkage between saving and net worth was tightest in the 1970s and 1980s. Over those two decades, changes in net worth single-handedly explained 44% of the variance in annual saving-rate changes. The effect was a bit less reliable, although still statistically significant, when the period was extended back to 1964 and forward through 1993.³ However, concomitant increases in the saving rate and the net worth ratio since 1994 have called this significance into question.
3. The estimated effect, while small per dollar of change in net worth, implies a large reservoir of potential additional spending. Depending on the period for which the equation was estimated, the impact of a change in the net worth ratio on the saving rate ranged between -.015 and -.026, meaning that only 1½%-2½% of an increase in

net worth typically shows up in spending. But net worth surged \$4.4 trillion in 1995 and 1996, with no negative impact on the saving rate so far, and the stock market losses sustained in recent weeks have not reversed all of the gains of January and February. Thus, taking the 2% midpoint of the wealth effect range, consumer spending could easily be \$88 billion higher than it is currently—four times the \$22 billion increase in delinquent installment loan balances that we estimate occurred over the same period.

Change in Consumer Balance Sheet: 94Q4 - 96Q4



*Insurance and pension reserves and equity in noncorporate business.

Source: Federal Reserve Board.

So Where's the Beef?

The hard fact is, however, that the saving rate has risen 0.8 points over the past two years instead of falling twice this much, as our estimates of the wealth effect would predict. Many observers take this as *prima facie* evidence that the wealth effect has broken down, focusing on three objections:

1. *The wealth has been accruing to a small set of people who do not spend, while most of the rest of the population is constrained by debt.*

While this is the most frequent criticism leveled at the wealth effect, it is also the weakest, for three reasons. First, the benefits of the latest stock market surge have actually been quite broadly spread across the wealth spectrum. According to the Federal Reserve's 1995 Survey of Consumer Finances (SCF), the share of families with direct or indirect ownership of equities has risen for almost all wealth brackets, due to the proliferation of 401(k) and other defined-contribution retirement plans. Second, wealthier individuals may have a higher propensity to save, but they are not exactly ascetics. On this score, the SCF reported that only 78% of the families with net worth

¹ The dominant role of shifts in income growth could also just reflect the fact that disposable income is the starting point for calculating personal saving.

² The proportion of households headed by 45- to 64-year-olds has actually had a depressing effect on the saving rate, contrary to popular impressions.

³ Statistical significance means that the probability of no effect, given the imprecision inherent in the estimates shown, is 5% or less.

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over \$250,000 reported that they saved at all in 1995! Third, while it is true that families in the \$10,000-to-\$50,000 income bracket experienced a significant increase in their debt burden between 1992 and 1995, this group includes barely more than half (53.5%) of the nation's families and controls a much smaller portion of income and spending.

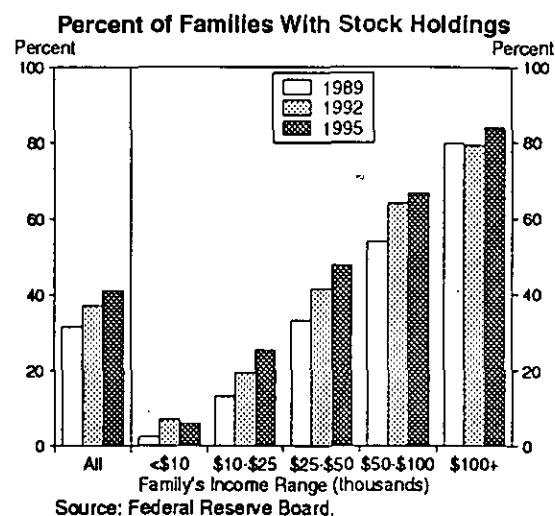
2. What if the recent setback in the stock market turns into a rout?

This objection has obvious appeal, given the market's recent behavior and the fact that stock prices account for about four-fifths of the preceding net worth surge. However, given that the wealth effect has not yet kicked in on the upside, this objection requires that declines in net worth have more effect than increases. We actually uncovered some ostensible support for this proposition in our statistical work, but would not give it much weight for two reasons: First, in order to test the proposition, we split the data according to whether the net worth ratio rose or fell. But this essentially created two very small samples, the results from which should be heavily discounted. Second, the notion that consumers respond asymmetrically to changes in net worth implies that two successive moves in stock prices (or any other source of variation in net worth) of equal size but in opposite directions—say, a 1,000 Dow-point rise followed by a 1,000-point drop—would leave the saving rate higher than before. While such an event might prompt a short-term rise in saving, to the extent it signaled higher volatility, it is unreasonable to expect the saving rate to stay permanently higher—and then to move still higher after each stock price cycle!

Two other points are relevant in this context. First, the stock market losses sustained in recent weeks, while substantial, have not yet erased the gains earlier this year, let alone those racked up in 1995 and 1996. Second, we can find no evidence that changes in the value of the corporate stock held by households are any more important than other components of net worth in determining how households spend or save.

3. The gains are mostly in illiquid assets, mainly retirement accounts.

There is no question that retirement and other illiquid accounts have risen as a percentage of household assets, or that a large portion of the 1995-1996 net worth surge—almost half—was booked in these assets. This does not necessarily negate the wealth effect, however. As with the value of corporate stock holdings, we have been unable to establish that the wealth effect depends on the liquidity of net worth



changes. This makes sense for two reasons: First, the beneficiaries of retirement plans have some idea of how these assets are changing in value, and may still respond to a surge by increasing their spending and financing it some other way. In this regard, it should be noted that these assets can be used as collateral to obtain loans. Second, the wealth effect does not require that the additional spending come from those whose net worth has risen. For example, an increase in stock prices can simultaneously confer an increase in net worth on one group of individuals and boost the confidence and the spending of another.

The Jury Is Still Out

As we weigh the evidence on the wealth effect, the risks seem evenly balanced at the present time. Its failure to materialize for more than two years, after a 30-year run of comparative reliability, suggests that other factors—possibly worker insecurity or the sheer strength of income growth—have intervened to mask or thwart it. Whatever the reason for its absence, financial market participants should not be too quick to assume a negative impact from the recent stock market setback when we have not yet seen the much bigger positive impact that should have come before.

In this situation, the real lesson is to pay close attention to real income growth. It is, and always has been, the premier driver of spending. The current strong income trend is well rooted in hiring and real wage gains. And as long as this is the case, it seems likely that real spending will also post strong gains. This has been, and continues to be, the basis for our forecast of strong economic growth in 1997.

Ed McKelvey



Key U.S. Economic Data

	Latest Monthly Data				6 Mo	12 Mo	Next
	'97 Mar	'97 Feb	'97 Jan	'96 Dec	Trend	Trend	Release
Nonfarm Payrolls (ch. Thousands)	175	293	259	231	233	225	May 2
Unemployment Rate (%)	5.2	5.3	5.4	5.3	5.3	5.3	
Index of Hours Worked (% ch)	-0.1	2.6	-1.6	0.8	3.7	3.7	
Average Hourly Earnings (% ch)	0.4	0.4	0.1	0.4	4.1	4.0	
Producer price finished goods index (% ch)	--	-0.4	-0.3	0.6	1.4	2.2	Apr 11
Excluding food and energy	--	-0.1	0.0	0.1	0.0	0.4	
Consumer price index (% ch)	--	0.3	0.1	0.3	3.1	3.0	Apr 15
Excluding food and energy (% ch)	--	0.2	0.1	0.2	2.5	2.5	
Retail sales (% ch)	--	0.8	1.5	0.5	8.6	5.1	Apr 11
Excluding motor vehicles (% ch)	--	0.5	1.4	0.3	7.4	5.4	
Industrial Production (% ch)	--	0.4	-0.1	0.4	3.9	3.8	Apr 16
Manufacturing	--	0.8	-0.3	0.6	4.5	4.3	
Capacity utilization (%)	--	83.3	83.2	83.5	83.2	83.2	Apr 16
Manufacturing	--	82.5	82.1	82.5	82.3	82.2	
Housing Starts (annual rate, thousands)	--	1528	1362	1353	1434	1461	Apr 16
Single-family	--	1215	1117	1024	1124	1150	
Trade balance (billions, monthly)	--	--	-12.7	-10.5	-10.2	-9.8	Apr 17
Merchandise	--	--	-19.0	-16.9	-16.4	-15.9	
Factory Orders (% ch)	--	0.8	2.5	-1.5	10.1	7.7	May 6
Durable Goods	--	1.5	4.1	-1.7	15.0	9.3	Apr 29
Personal Income (% ch)	--	0.9	0.4	0.7	6.6	6.3	May 1
Wages and Salaries	--	1.3	0.0	1.0	7.8	7.2	
Purchasing Managers' Index (%)	55.0	53.1	52.0	53.8	52.8	52.0	May 1
Consumer Sentiment U Mich (Feb 66=100)	100.0	99.7	97.4	96.9	98.3	95.7	May 2
Conference Board (1985=100)	118.5	118.9	118.7	114.2	114.5	113.4	Apr 29

Note: Percentage changes are month to month for last four months, annualized for 6- and 12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- Retail sales should post another sturdy gain for March, this time reflecting strength in motor vehicle sales. In fact, the 0.3% increase we anticipate for other sales includes setbacks in the gasoline and building-materials sectors and hence masks a moderately stronger estimated increase, signaled by strong month-to-month gains in weekly retail sales indicators. An early Easter probably helped somewhat (April 11).
- Another benign producer price report is likely for March, as sharp increases in food prices offset energy price declines. Only tobacco looks troublesome in the core index (April 11).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Mon Apr 7	3:00	Consumer Credit (Feb)	+\$7.0 Bil	+\$7.0 Bil	+\$8.4 Bil
Fri Apr 11	8:30	Producer Price Index (Mar)	+0.1%	+0.1%	-0.4%
		Excluding Food & Energy	+0.1%	+0.1%	-0.1%
	8:30	Retail Sales (Mar)	+0.8%	+0.5%	+0.3%
		Excluding Autos	+0.3%	+0.5%	+0.2%

- Wholesale Trade (Tue, Apr 8 - 10:00)
- Richmond Fed Survey (Tue, Apr 8 - 10:00)
- Treasury Inflation-Indexed Note Auction (Thu, Apr 10)
- Chain-Store Sales Results (Thu, Apr 10)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	6.2%	6.4%	6.8%
Forward	6.0	6.3	6.7
2 Yr T-Note	6.6	6.7	7.1
Forward	6.6	6.7	6.8
10 Yr T-Note	7.0	7.1	7.2
Forward	6.9	7.0	7.0

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.8%	3.5%	3.4%	2.4%	3.3%
Ind. Prod., Mfg.	4.3	4.0	4.8	2.8	4.7
CPI	3.3	2.7	3.2	2.9	3.1
After-Tax Profits*	8.2	4.6	5.0	14.4	2.7
Unemployment	5.3	5.3	5.1	5.4	5.0

* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

More Interest Rate Rises Ahead

■ The first tightening is not likely to be the last. In the past when Fed officials have tightened during periods of low inflation, the first tightening has swiftly been followed by further tightening steps. Thus, a tightening at the May FOMC meeting is quite likely. We continue to expect a further 100 basis point rise in short-term rates over the next 12 to 18 months.

■ The tightening process may unfold in two distinct steps: A further 50 basis point rise in short-term rates by autumn and then another 50 basis points early next year. A pause in the tightening process seems likely because inflation pressures remain benign, making Fed officials reluctant to tighten aggressively, and because Fed officials will want to allow time to assess the impact of the initial moves.

■ Further increases in bond yields should also be expected. During past episodes of preemptive tightening, the initial rate increase has generally caused bond yields to rise during the following month, as the yield curve shifts upward in a parallel fashion. Only later does the yield curve tend to flatten as the tightening process becomes more advanced.

■ The statement accompanying the Fed's action was couched in surprisingly strong language, stressing that the current growth trend poses an increasing threat of rising inflation. Against this backdrop, the first few data points—weekly retail spending figures, durable goods orders, and jobless claims—underscore the strong momentum in final demand for U.S. output.

Initial Monetary Policy Tightenings (1972-1996)

Date	CPI (% Yr/Yr)	Size (b.p.)	Next Move (In days)	Cumulative Change (b.p.)
Low Inflation (<4%):				
3/3/72	3.3%	25	7	750
7/30/85	3.7	25	44	38
4/23/87	2.0	25	26	138
3/29/88	3.8	19	44	319
2/4/94	2.8	25	46	300
Average:			33.4	309
High Inflation (4% or more):				
11/13/73	7.1%	56	--	56
3/1/74	9.4	13	10	281
6/12/75	10.2	81	91	113
2/27/76	6.7	5	--	5
4/20/76	6.1	13	16	75
1/18/77	5.2	5	93	195
1/6/78	6.7	25	102	500
8/22/80	13.2	125	24	1000
1/30/81	10.5	300	6	500
2/1/82	8.9	275	--	275
5/24/83	4.0	31	30	94
3/20/84	4.7	43	7	200
1/28/85	4.0	25	--	25
Average:			42.1	255

Source: Bureau of Labor Statistics, Federal Reserve Board.
Our calculations.

U.S. Interest Rate Forecasts 1997-1998 (quarter-end)

	1997 Q1	1997 Q2	1997 Q3	1997 Q4	1998 Q1	1998 Q2	1998 Q3	1998 Q4
Federal funds	5.5	5.8	6.0	6.0	6.5	6.5	6.5	6.5
3-Month LIBOR	5.8	6.2	6.4	6.4	6.9	6.8	6.8	6.7
2-Year Treasury	6.4	6.6	6.7	6.7	7.1	7.1	7.0	6.9
10-Year Treasury	6.8	7.0	7.1	7.1	7.2	7.2	7.2	7.1
30-Year Treasury	7.0	7.2	7.3	7.3	7.4	7.4	7.3	7.2

Trade Recommendations

- Close short June '97 Euro position.
- Go long June '97/June '98 Euro calendar spread, with target of 100 bp, stop on a close below 60 bp.
- Go short June T-bond future with a target of 105.00, with a stop on a close above 110.00.

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**Issue No: 97/13
March 27, 1997**

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I. Weekly Wrapup

Economic and Market Overview

U.S. stock and bond markets rallied early in the week as market participants became hopeful that the widely anticipated tightening in monetary policy would be limited to one or two small rate hikes. These hopes were quickly dispelled, however, by the language that accompanied the quarter-point move, which strongly suggested that it would not be an isolated event.

The indicators released in recent days, although scant, underscore the demand momentum cited by the Federal Open Market Committee (FOMC) as its proximate reason for tightening. For example, year-to-year gains in the Bank of Tokyo/Mitsubishi weekly index of chain store sales have averaged 6.5% over the past four weeks; the Johnson Redbook survey shows a similar 6% rise. With prices of goods rising at about a 1½% annual rate, these sales results imply real gains in the 4½%-5% range. Meanwhile, turnover of existing homes jumped 9.0% in February.

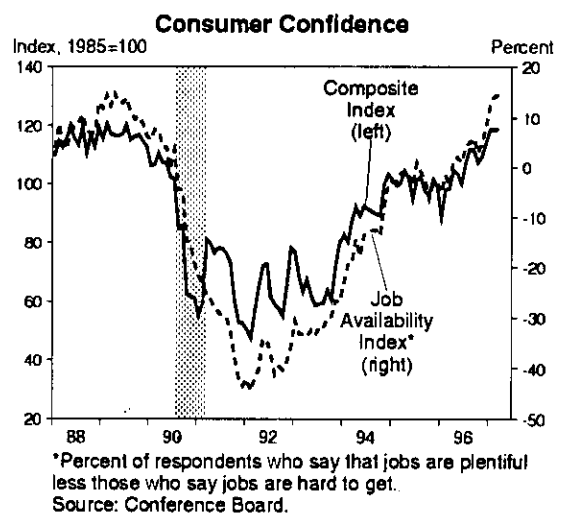
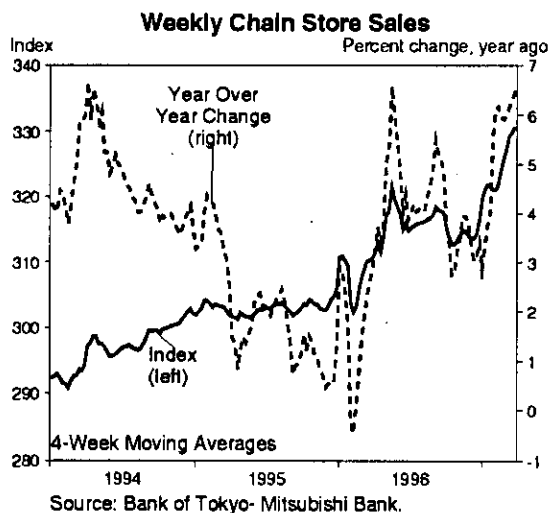
The momentum in spending is not apt to fade on its own, judging from the latest consumer confidence surveys. Both major indexes of confidence remained at extremely high levels in March; in the Conference Board survey, attitudes about job availability, gauged by the difference between the percentages of respondents reporting jobs plentiful and jobs hard to get, reached an 8-year high. This improvement was confirmed by an up-tick in help-wanted advertising in February and by the continued low level of claims for jobless benefits in late March.

Demand for U.S.-made durable goods in February was also strong. Orders rose 1.5% despite declines in bookings for defense equipment and civilian aircraft. Outside these volatile sectors, orders rose 2.1% overall and 6.9% for capital goods. This latter figure, coming on top of a 3.2% increase in January, signals a rebound in spending on business equipment by U.S. firms, an increase in exports of such items, or both.

Federal Reserve Policy

The FOMC's decision to lift its federal funds rate target by 25 basis points, to 5½%, came as no surprise by the time it was announced. However, the announcement itself contained surprisingly strong language. In particular, the FOMC justified its move as a response to "persisting strength in demand," a characterization stronger than was used in 1994, and it noted that this strength was "progressively increasing the risk of inflationary imbalances." The choice of terms like "persisting" and "progressively" does not suggest that the Committee sees one 25-basis-point move as sufficient to prevent an increase in inflation. Moreover, the announcement pointedly indicated that the rate hike was "...a prudent step [to help sustain] the existing low inflation environment..."—a statement clearly designed to protect the FOMC against charges of fighting a phantom enemy.

Altogether, the statement reveals that Fed officials are paying close attention to the pace of growth in assessing the potential risk of an increase in inflation down the road and will not hesitate to raise rates further if the current trend persists. At the margin,





this increases the probability of a rate increase at the May 20 FOMC meeting. A continuation of current benign inflation trends will not suffice to forestall such a move. Instead, Fed officials will have to see a noticeable abatement in growth.

Fiscal and Political Developments

Five months into the fiscal year, it appears likely that the federal deficit will come in below official projections. February's shortfall was \$44 billion, unchanged from one year earlier despite an increase in tax refunds. The latest figures indicate that the sturdy underlying trend in tax revenues is intact, while growth in outlays also remains restrained. April's report is apt to contain more good news in the likely event that taxes on capital gains realizations overwhelm the loss of \$8 billion from the end of the 3-year retroactive payment period for the 1993 tax hike on upper-income taxpayers.

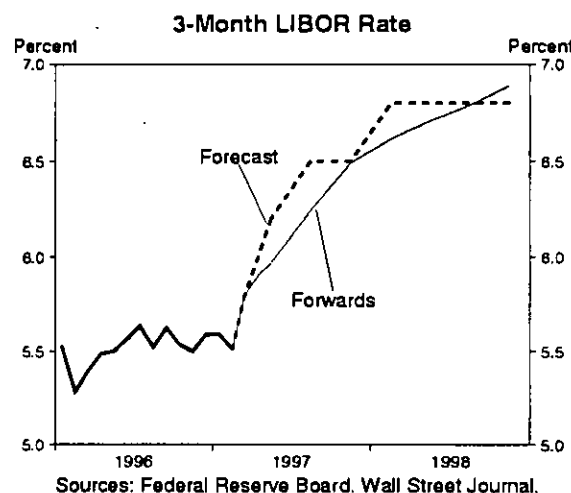
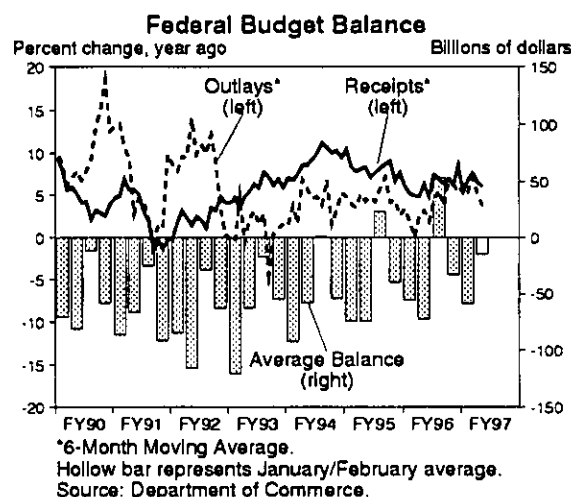
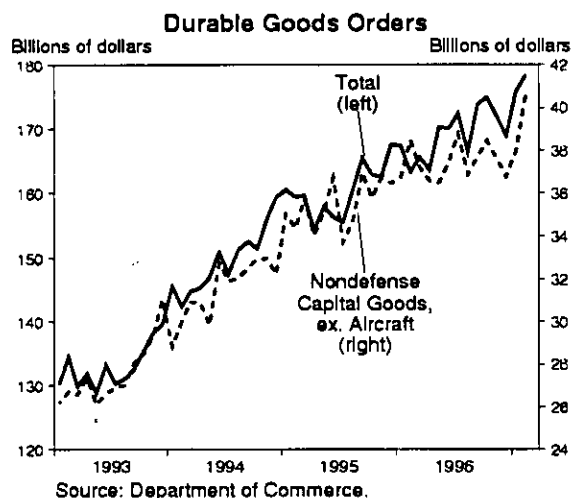
The improved budget situation will provide a test of sorts for politicians' resolve to reach a compromise on a deficit reduction package. While it makes a compromise easier to achieve, it also reduces still further the sense of urgency.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Now that Fed officials have tightened, we would close out our short position in the June 1997 Eurodollar future. To reflect the fact that we expect more tightening than what is priced into the market, we would initiate a calendar spread of long June '97/short June '98 Eurodollar futures (currently trading at 81 basis points). We favor calendar spread trades as a way of expressing bearish views in the short-end because, unlike outright short positions, convergence does not tend to work against them, as is generally the case with outright short positions.

In terms of the long end, we also are bearish given that the typical response of the bond market to Fed tightening moves is for yields to move higher. With the economic data remaining very firm, a similar result is likely this time as well. Bond yields are likely to move higher as investors adjust their expectations upward concerning the likely magnitude of future Fed tightening. We would initiate a short position in the June bond future (currently 107.28), with a target of 105.00, and a stop on a close above 110.00.





II. More Interest Rate Rises Ahead

The FOMC's decision to raise its federal funds rate target by 25 basis points to 5.5% is likely to be the first in a series of tightening steps totaling about 125 basis points over the next 12 to 18 months. The historical record makes it clear that when the monetary authorities begin to tighten preemptively, the first tightening is not the last. In terms of the 30-year Treasury bond, a further rise in yields into a 7%-7 1/2% range appears likely. Again, the historical record shows that bond yields generally rise in the month following an initial tightening move.

Why the First Move Is Not the Last

Over the past twenty-five years, there have been 18 separate episodes in which Fed officials began to tighten monetary policy. In only four cases was the first move an isolated action. In most cases, the next move followed quite quickly, with an average time to the next tightening of 39 days.

When the 18 episodes are divided into two groups based upon the rate of inflation at the time of the initial tightening, it becomes even more apparent that further tightening moves are likely this time around. As shown in the accompanying table, in all five episodes in which the monetary authorities started to tighten when inflation pressures were subdued (less than 4% for the year-over-year change in the CPI), the initial tightening was the first in a series of moves. In other words, isolated tightening moves do not tend to occur when inflation is low and the monetary authorities are tightening preemptively. In contrast, when the Fed does not begin to tighten until inflation is already high, the pattern is much more mixed. About one-third of the time, the first move turns out to be an isolated event.

The reason for this seemingly counter-intuitive result is straightforward. The threshold for tightening when inflation is low is substantially higher than when inflation is already a problem. Thus, when Fed officials become convinced that tightening is needed in a low inflation environment, they usually are right. The strength of the economy proves persistent, triggering additional tightening steps. It takes time for monetary policy to slow the economy so the reasons for tightening are usually still evident for many months. In contrast, when inflation is high, then the threshold for tightening is low. Under such circumstances, Fed officials sometimes initiate tightenings that prove to be unnecessary. In such

Initial Monetary Policy Tightenings (1972-1996)

Date	CPI (% Yr/Yr)	Size (b.p.)	Next Move (In days)	Cumulative Change (b.p.)
Low Inflation (<4%):				
3/3/72	3.3%	25	7	750
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2/27/76	6.7	5	--	5
4/20/76	6.1	13	16	75
1/18/77	5.2	5	93	195
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8/22/80	13.2	125	24	1000
1/30/81	10.5	300	6	500
2/1/82	8.9	275	--	275
5/24/83	4.0	31	30	94
3/20/84	4.7	43	7	200
1/28/85	4.0	25	--	25
Average:			42.1	255

Source: Department of Labor. Federal Reserve Board.
Our calculations.

circumstances, the initial move sometimes turns out to be an isolated event.

More Tightening Than Expected

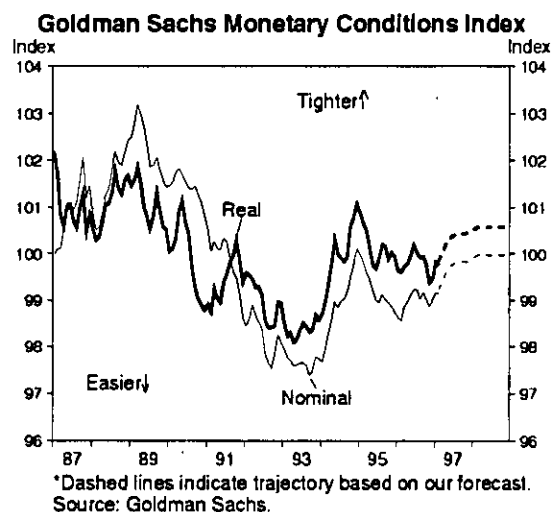
The magnitude of tightening is likely to be substantially greater than expected by market participants. That reflects three factors. First, Fed officials are starting from a point where monetary policy has been neutral-to-stimulative. This can be seen most directly by simply observing that the economy has grown at a 3.2% annual rate over the past four quarters at a federal funds rate setting of 5 1/4%. Second, the growth trajectory appears to be strengthening, not weakening. Even with substantial drag from the trade sector, we anticipate a growth pace of about 3 1/2% (annualized) during the first half of 1997. Third, the U.S. economy is not particularly interest rate sensitive. In our monetary conditions index, a one-point increase in the index is equivalent to a 100 basis point rise in both short- and long-term rates plus a 1% appreciation of the trade-weighted value of the dollar—in other words, a seemingly significant change in monetary conditions. Despite

this, we find that a 1 point increase in the GS-MCI leads to only about a 1 percentage point reduction in the year-over-year growth rate of industrial production after three quarters. This suggests that if Fed officials need to tighten to slow the economy down, then significantly more tightening is likely to be required than is now generally anticipated.

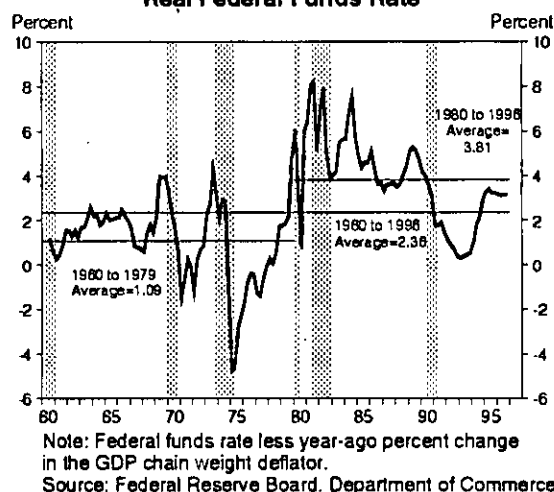
Our forecast of an additional 100 basis point rise in short-term rates and about another 40 basis point rise in long-term rates would result in less than a 1 point further increase in both the real and nominal GS-MCI. This is the minimum amount of tightening that we believe will prove necessary to bring the U.S. economy back to trend growth. Note that even with such tightening, monetary conditions will not be as tight as they were in late 1994 and will be substantially easier than towards the end of the last business cycle in 1989.

The historical record also supports this conclusion that more tightening is likely than the roughly 25-50 basis points embodied in the current yield curve. Looking at the 18 tightening episodes since 1972, the average tightening was 270 basis points. During the five episodes that began when inflation was low, the average tightening was 309 basis points. Thus, our forecast of a cumulative 125 basis point increase in short-term rates is far lower than the norm. This reflects a view that the degree of restraint that is required is relatively modest because inflation is well-controlled and because the pace of growth is not so exceptionally strong that it must be trimmed sharply.

An examination of the real level of interest rates also suggests that there is plenty of room for additional monetary policy tightening. As shown in the chart,



Real Federal Funds Rate



although the real federal funds rate (calculated using the GDP deflator) is currently at about 3 1/2% and, thus, is above the average value over the 1960-1996 period of 2.36%, it is still below the average over the 1980-1996 period of 3.81%. This suggests that the real federal funds rate needs to climb to at least 4% within the next year to have a noticeable braking effect on economic activity.

As shown in the table below, the historical record also suggests there is plenty of room for further increases in the real federal funds rate, despite the fact that it has already risen about 300 basis points during this expansion. The average increase in the real federal funds rate has been nearly 500 basis points across the seven major tightening cycles and the average peak real federal funds rate has been 5.19%.

Moreover, it is important to recognize that the rate of inflation as measured by the GDP deflator is likely to drift up. Thus, the additional 100 basis points of tightening that we expect over the next 12 to 18 months will still leave the real federal funds rate well below the average peak of prior tightening cycles.

Real Interest Rates

Trough to Peak Dates	Trough Rate	Subsequent Peak	Increase (b.p.'s)
1961:Q1 - 1963:Q4	0.28%	2.62%	234
1968:Q1 - 1969:Q4	0.59	3.98	339
1971:Q1 - 1973:Q3	-1.48	4.31	579
1975:Q4 - 1980:Q1	-4.78	6.07	1085
1980:Q3 - 1981:Q3	0.71	8.23	752
1982:Q4 - 1994:Q3	3.98	7.58	360
1987:Q1 - 1989:Q2	3.34	5.29	195
1993:Q1 - 1995:Q2	0.32	3.44	312
Average:		5.19	482

Source: Federal Reserve Board.



Bond Yields Likely to Move Higher

The historical record also indicates that the first Fed tightening tends to be bad news for the bond market. An examination of the last four tightening episodes that began since 1980 when inflation was relatively subdued indicates that bond yields tend to rise in the month after the initial tightening. And, in the one case when they fell (the July 1985 tightening), the magnitude of the decline was very modest. In contrast, the bond market performance when the initial tightening occurred when inflation was already high is more mixed. In two out of six episodes, bond yields declined in the month following the tightening. But in both of these cases, interest rates were already high when the initial tightening occurred.

When the tightening is preemptive, the yield curve tends to shift in a parallel fashion at first. This is because the Fed's action causes investors to revise upward their expectations concerning the strength of the economy, the risks of inflation, and the level of short-term rates that is likely over the next year or two. Only later when the tightening process is more advanced do tightening moves lead to a flattening of the yield curve.

Implications For Our Interest Rate Forecast

In general, the historical record provides significant support for our interest rate forecast. The first tightening is not likely to be the last; more tightening is likely than the 25-50 basis points now embedded in the yield curve; and bond yields are likely to move higher. Nevertheless, we are making two small changes to our rate outlook. First, given the fact that

Initial Fed Tightening Bad For Bonds

Tightening Phase	Initial Rate Hike	Change in Yields (in b.p.) one month after tightening*		
		3-Month Yields	2-Year Yields	30-Year Yields
Low Inflation (4% or less)				
7/85 to 8/85	7/30/85	-14	-5	-22
4/87 to 9/87	4/23/87	-21	49	26
3/88 to 2/89	3/29/88	33	35	34
2/94 to 2/95	2/4/94	30	46	48
High Inflation (>4%)				
8/80 to 12/80	8/22/80	58	77	48
4/81 to 5/81	4/30/81	83	-25	-53
2/82	2/1/82	-149	-84	-102
5/83 to 7/83	5/24/83	54	68	45
3/84 to 8/84	3/20/84	-16	21	29
1/85	1/28/85	84	94	64

* Calculated as yield 1 month after tightening - yield 1 day after tightening.

Source: Federal Reserve Board. Our calculations.

U.S. Interest Rate Forecasts 1997-1998

	1997 (quarter-end)				1998			
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Federal funds	5.5	5.8	6.0	6.0	6.5	6.5	6.5	6.5
3-Month LIBOR	5.8	6.2	6.4	6.4	6.8	6.8	6.8	6.7
2-Year Treasury	6.4	6.6	6.7	6.7	7.1	7.1	7.0	6.9
10-Year Treasury	6.8	7.0	7.1	7.1	7.2	7.2	7.2	7.1
30-Year Treasury	7.0	7.2	7.3	7.3	7.4	7.4	7.3	7.2

inflation has remained benign up to now, we now believe that the monetary policy tightening moves from the Federal Reserve are likely to take place in two discrete phases. In the first phase, Fed officials will push up the federal funds rate to around 6% by early autumn, returning to the peak federal funds rate of this business expansion that was first reached in early 1995. The tightening during this phase will be sufficient to exert a restraining influence on the economy, but will not be so aggressive as to threaten recession. Fed officials will not want to risk ending the expansion when inflation is well-behaved. After the first phase is completed, Fed officials are likely to pause to allow time for the tighter monetary policy to restrain the pace of economic activity.

In the second phase, which probably does not begin until 1998, additional policy tightening is likely as price pressures become more visible and the economy grows too fast to allow any slack to develop in the labor market. Currently, the need for this second stage is uncertain. Other forces could pull growth downward, obviating the need for further Fed action. For example, if the dollar were to strengthen significantly or foreign growth were to disappoint, then the drag from the trade sector might be sufficient to slow the economy enough so that Fed officials could avoid this second stage of tightening altogether. Conversely, the dollar could weaken and growth abroad could intensify, leading to even a greater magnitude of monetary policy tightening in 1998.

Second, we have become more pessimistic about the near-term outlook for the bond market. Now that the monetary authorities have begun tightening, we expect long-term Treasury bond yields to move above 7% very soon. Sustained economic momentum should cause investors to become more fearful about additional monetary policy tightening and these fears exert upward pressure on bond yields. Going forward, long-term Treasury bond yields should generally trade in a 7%-7 1/2% range now that the tightening process has commenced.

Bill Dudley

John Youngdahl



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'97 Mar	'97 Feb	'97 Jan	'96 Dec			
Nonfarm Payrolls (ch. Thousands)	--	339	247	231	210	228	Apr 4
Unemployment Rate (%)	--	5.3	5.4	5.3	5.3	5.3	
Index of Hours Worked (% ch)	--	2.7	-1.6	0.8	5.8	3.9	
Average Hourly Earnings (% ch)	--	0.2	0.2	0.4	3.7	3.8	
Producer price finished goods index (% ch)	--	-0.4	-0.3	0.6	1.4	2.2	Apr 11
Excluding food and energy	--	-0.1	0.0	0.1	0.0	0.4	
Consumer price index (% ch)	--	0.3	0.1	0.3	3.1	3.0	Apr 15
Excluding food and energy (% ch)	--	0.2	0.1	0.2	2.5	2.5	
Retail sales (% ch)	--	0.8	1.5	0.5	8.6	5.1	Apr 11
Excluding motor vehicles (% ch)	--	0.5	1.4	0.3	7.4	5.4	
Industrial Production (% ch)	--	0.4	-0.1	0.4	3.9	3.8	Apr 16
Manufacturing	--	0.8	-0.3	0.6	4.5	4.3	
Capacity utilization (%)	--	83.3	83.2	83.5	83.2	83.2	Apr 16
Manufacturing	--	82.5	82.1	82.5	82.3	82.2	
Housing Starts (annual rate, thousands)	--	1528	1362	1353	1434	1461	Apr 16
Single-family	--	1215	1117	1024	1124	1150	
Trade balance (billions, monthly)	--	--	-12.7	-10.5	-10.2	-9.8	Apr 17
Merchandise	--	--	-19.0	-16.9	-16.4	-15.9	
Factory Orders (% ch)	--	--	2.5	-1.5	3.8	5.2	Apr 2
Durable Goods	--	1.5	4.1	-1.7	15.0	9.3	Apr 29
Personal Income (% ch)	--	--	0.3	0.7	5.9	6.1	Mar 31
Wages and Salaries	--	--	-0.1	1.1	6.7	6.9	
Purchasing Managers' Index (%)	--	53.1	52.0	53.8	52.2	51.3	Apr 1
Consumer Sentiment U Mich (Feb 66=100)	100.0	99.7	97.4	96.9	98.3	95.7	May 2
Conference Board (1985=100)	118.5	118.9	118.7	114.2	114.5	113.4	Apr 29

Note: Percentage changes are month to month for last four months, annualized for 6- and 12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- Personal income in February is likely to have risen sharply, aided by the big jump in the workweek and continued rapid payroll employment growth. Consumption will be held down by mild weather, which cut the use of utilities sharply last month; however, sharp upward revisions are likely for January (March 31).
- The NAPM index for March is likely to continue to rise, reflecting the strength of demand and the buildup in order backlogs. Investors should also scrutinize the vendor performance component (the speed of supplier deliveries) to assess whether rapid growth is causing bottlenecks to develop in the manufacturing sector (April 1).
- The index of leading indicators for February should post its biggest advance in a year, underscoring the fact that there are few signs that the pace of growth is likely to slow anytime soon (April 1).
- Payroll gains in March should be solid despite a sharp drop in construction employment following February's huge rise. The unemployment rate should drop, underscoring the tightness of labor markets. Average hourly earnings should also show greater strength as bigger gains appear to be the norm during the last month of the quarter (April 4).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Mon Mar 31	8:30	Personal Income (Feb)	+0.7%	+0.7%	+0.3%
	8:30	Personal Consumption (Feb)	+0.2%	+0.4%	+0.7%
	10:00	Chicago Purchasing Managers Index (Mar)	57.0%	56.5%	56.2%
Tue Apr 1	10:00	Purchasing Managers Index (Mar)	54.0%	53.5%	53.1%
	10:00	Construction Spending (Feb)	+0.9%	+0.8%	+0.4%
	10:00	Leading Indicators (Feb)	+0.5%	+0.4%	+0.3%
		Domestic Motor Vehicle Sales (Mar)	13.4M	13.5M	13.2M
Wed Apr 2	10:00	Factory Orders (Feb)	+1.0%	-0.1%	+2.5%
Fri Apr 4	8:30	Civilian Unemployment Rate (Mar)	5.2%	5.3%	5.3%
	8:30	Nonfarm Payroll Employment (Mar)	+200,000	+190,000	+339,000

- Treasury Announcement—Inflation-Indexed Security (Wed, Apr 2 - 2:30)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	6.2%	6.4%	6.8%
Forward	6.0	6.3	6.6
2 Yr T-Note	6.6	6.7	7.1
Forward	6.5	6.7	6.8
10 Yr T-Note	7.0	7.1	7.2
Forward	6.8	6.9	7.0

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.9%	3.5%	3.4%	2.4%	3.3%
Ind. Prod., Mfg.	4.3	4.0	4.8	2.8	4.7
CPI	3.3	2.7	3.2	2.9	3.1
After-Tax Profits*	9.3E	4.6	5.0	14.7E	2.7
Unemployment	5.3	5.3	5.1	5.4	5.0

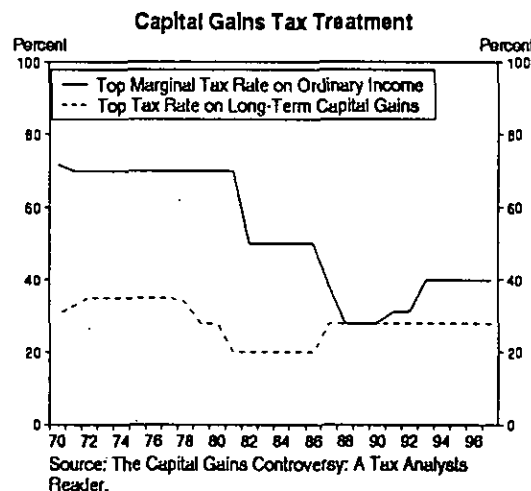
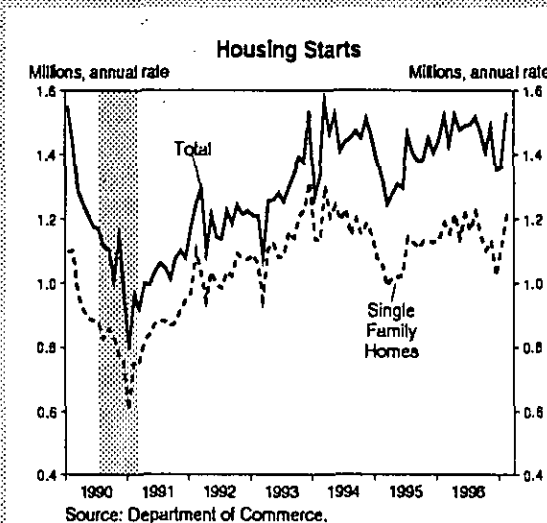
* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

Capital Gains Tax Reduction: Hostage to the Budget

- Chairman Greenspan's testimony before the Joint Economic Committee reinforces our belief that the Federal Open Market Committee will implement a 25-basis-point tightening at the March 25 FOMC meeting. (As a result of our confidence that Fed officials will tighten monetary policy and the passage of time, we have rolled forward our interest rate forecast, which bumps up the 3-month and 6-month rate forecasts, shown on page 8, slightly.)
- If Fed officials do tighten monetary policy, the communique that accompanies the tightening is likely to imply that the Fed perceives the tightening move as preemptive and, hence, that the magnitude of subsequent tightening is likely to be small. It is unlikely, however, that the FOMC statement will imply any limits on the scope for future monetary policy adjustments.
- A 50-basis point tightening appears highly unlikely. Such an action would not fit with Chairman Greenspan's style, nor would it be consistent with an inflation environment that is still quiescent.
- The prospects for broad-based capital gains tax reduction have fallen to no more than 50%. This reflects the difficulties that the Clinton Administration and the Republican-controlled Congress are having in finding common ground in reaching a balanced budget agreement.
- Any agreement on capital gains that does occur is likely to be limited to enactment of a 50% exclusion that would have the effect of cutting the top marginal rate to 19.8% from 28%. Revenue constraints suggest that the cut may not be applied retroactively to the start of 1997.



Trade Recommendations

- Stay short June '97 Eurodollar futures, maintaining target of 93.75 and moving stops to 94.18, down from 94.30.

The next issue of the U.S. Economics Analyst will be published Thursday, March 27.

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**Issue No: 97/12
March 21, 1997**

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Goldman Sachs

I. Weekly Wrapup

Economic and Market Overview

Yields on U.S. debt instruments have continued to drift higher and equity prices have declined as speculation has intensified about a possible prompt Federal Reserve interest rate increase. Financial market developments were not greatly influenced by the most recent economic data reports, which conformed to earlier signs of strong business conditions but also showed a sharply widening trade deficit.

Housing starts rebounded in February, rising 12.2% overall to 1.53 million annual units, a three-year high. Starts in the single-family sector posted a second consecutive steep monthly rise, to match the highest volumes experienced in the past 30 months. While this surge partially reflects a recovery from poor weather, it also illustrates an absence of credit restraint in the economy. Positive conditions for manufacturers were indicated by another rise in the Philadelphia Fed's business outlook index, to +21.1%. The area's factories are experiencing good times and their attitudes about future activity are decidedly upbeat, which bodes favorably for their capital investment outlays. Fast domestic growth, meanwhile, is driving up the trade deficit, which is helping to brake the expansion somewhat. The overall trade gap swelled to \$12.7 billion in January, primarily due to a 2.2% jump in imports.

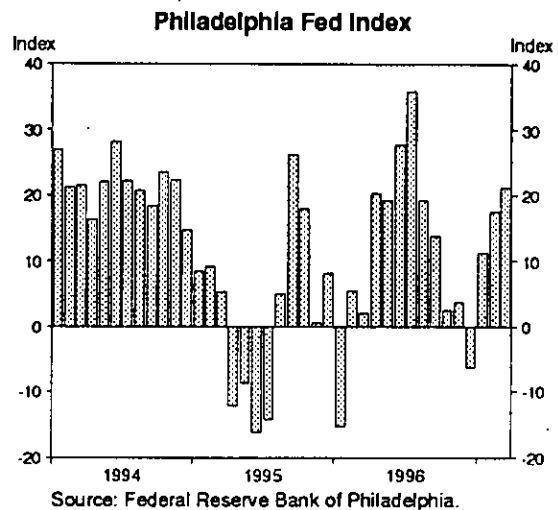
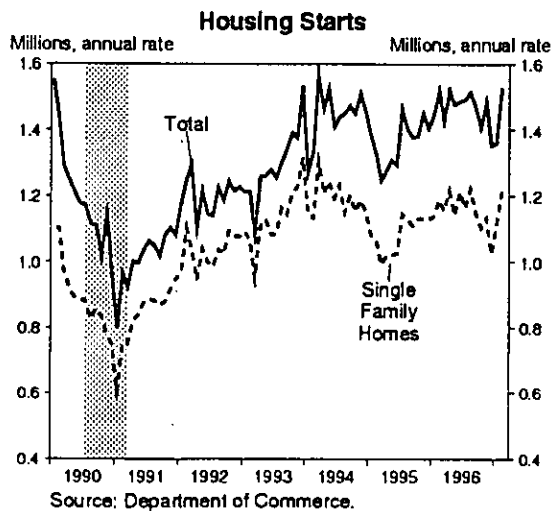
Consumer prices during February climbed 0.3% overall and 0.2% excluding food and energy, keeping the year-to-year changes in the two measures at 3.0% and 2.5%, respectively. After adjusting for changes

made to the CPI methodology by the Bureau of Labor Statistics over the past two years, however, the trend in core retail inflation looks to have been essentially flat rather than modestly down.

Federal Reserve Policy

Fed Chairman Greenspan's remarks before the Joint Economic Committee have reinforced our already-strong belief that the FOMC will decide to tighten monetary policy by 25 basis points at the March 25 meeting. Whereas in his late-February testimony the Chairman said that he could not "rule out a situation in which a preemptive policy tightening may become appropriate," his latest comments stressed the potential for such action to occur next week. Greenspan noted the vigorous pace of early 1997 economic growth, referring specifically to rapid payroll gains, unusually low jobless claims, and buoyant retail sales as signals that demands for labor and goods remain strong. These are the very trends he identified at the Humphrey-Hawkins hearings as posing the greatest risks to a sustained, noninflationary expansion.

In our view, the Fed's decision next week will have important repercussions for the policy outlook over a longer horizon, as it will establish the current framework for monetary strategy. A tightening on the 25th would enhance the probability of another rise relatively soon, because it would establish that Greenspan and Co. are more focused on the rapid pace of demand and output growth (which should persist awhile) than on current mild inflation patterns. In contrast, a decision to keep policy steady would





suggest that policy makers are prepared to show considerable patience with strong economic activity in the absence of a rise in the inflation rate.

Fiscal and Political Developments

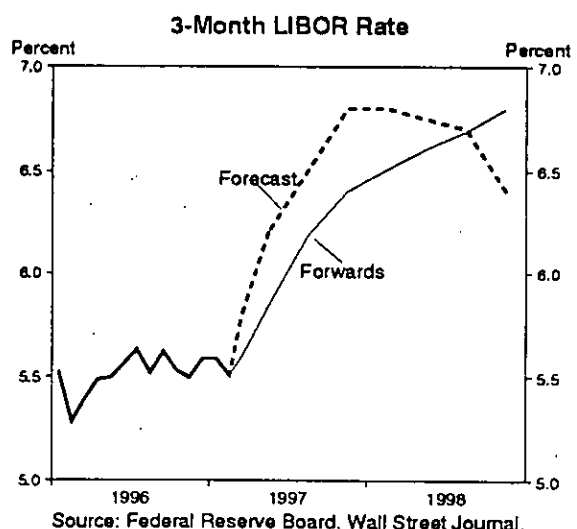
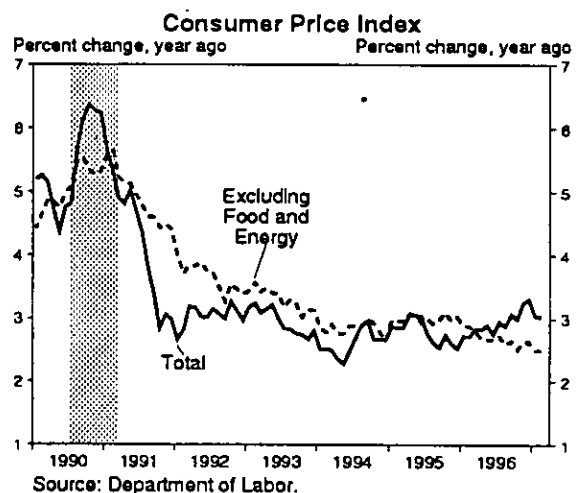
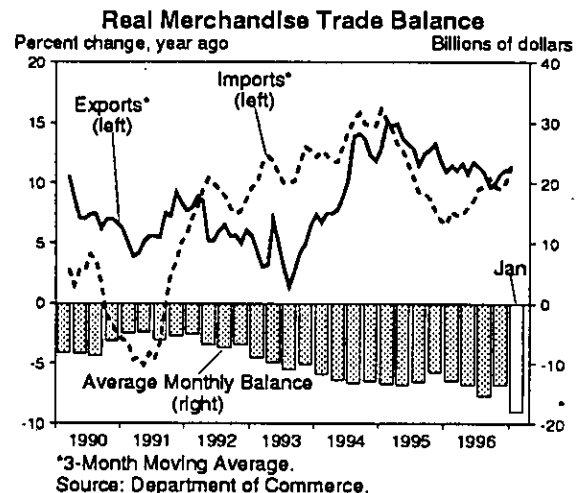
When Congress returns from a two-week Easter recess that begins today, the budget process will enter a crucial period. House and Senate budget leaders at that point are expected to present their blueprints for fiscal balance by 2002, which will be fashioned into a formal congressional budget resolution. These proposals will offer a fresh opportunity for intensified negotiations between lawmakers and the Clinton administration toward multi-year budget reforms. If there is no progress toward a deal by mid-to-late May, however, many lawmakers will be inclined to give up on the effort in favor of a piecemeal approach to the budget, which would offer little potential for genuine fiscal restraint in the near future.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

We continue to recommend an outright short position in June 1997 Eurodollar futures, on two grounds: (1) it is very likely that the Fed will tighten at their meeting next Tuesday; (2) such a step will force market participants to raise the probabilities they assign to at least one additional rate rise before mid-summer, because it will show that the central bank is more sensitive to strong economic growth (which should persist in the near term) than low inflation. A target of 93.75 should be retained, with stops lowered from 94.30 to 94.18, a level which should not be revisited unless the Fed chooses to further delay action. In that unlikely event, we would want to close out all short positions immediately as we would expect the Eurodollar futures market to rally sharply.

Based on this reasoning, we remain neutral on the bond market at current price levels. The bond market already appears to discount about 50 basis points of Fed tightening, and hence, yields may not rise much further until it becomes clear that the central bank faces a bigger-than-expected job in slowing the economy to or below trend growth. In the event that bonds should rally in the wake of a Fed rate increase, we would look to reestablish shorts in anticipation of another price downdraft once the dimensions of the Fed's prospective task become better appreciated.





II. Capital Gains Tax Reduction: Hostage to the Budget

Broad-based capital gains tax reduction has been a long awaited, but unrealized goal of many investors and the Republican leadership in Congress.¹ Prospects this year are tied closely to the budget negotiation process. Without agreement on a balanced budget plan, the likelihood of tax relief on this front is virtually nil this year. If a budget deal is reached, however, then the prospects for a reduction in the effective long-term capital gains tax rate improve dramatically. President Clinton has not ruled out such cuts and capital gains tax reduction is a top priority among many Republicans.

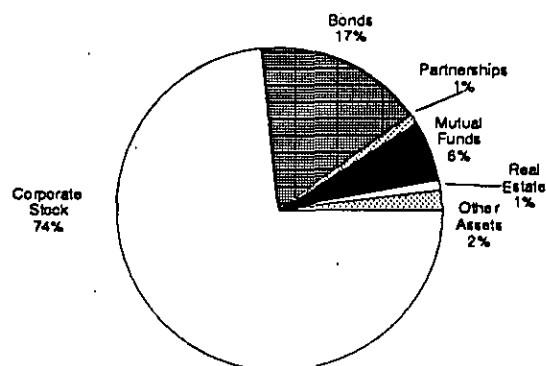
At this point, we would put the probability of a broad-based capital gains tax cut at no more than 50%. This reflects two factors. First, the prospects for a budget deal have faded somewhat in recent weeks. Second, there is a possibility that the reductions in spending that would push the budget towards balance could be separated from the tax cut proposals. In this case, there is a chance that there could be a balanced budget deal without any agreement on a tax cut package. Under such circumstances, capital gains legislation is very unlikely to be enacted on its own. It must be packaged with other tax cut proposals, such as a child tax credit, that help lower income groups so that the tax cut benefits are not skewed toward high-income households.

Q. What would be the likely form of capital gains tax cut legislation?

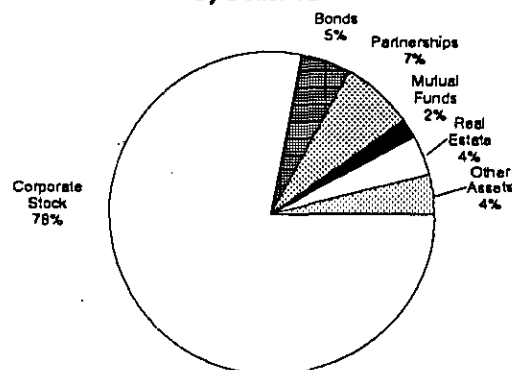
The most likely form of capital gains tax reduction would be a 50% exclusion of long-term capital gains from the taxable income of individual investors. This would effectively reduce the top rate on long-term capital gains to 19.8% (half of the top marginal income tax rate of 39.6%) from the current top long-term capital gains rate of 28%. The exclusion would apply broadly to stocks, other financial instruments, and real estate, but probably would exclude collectibles such as art or stamps.

Republican proposals to cut capital gains taxes also generally include a capital gains tax cut for corporations and indexation of capital gains to inflation (for example, see HR 1033 and S 2). These

Distribution of Long Term Capital Gains, 1994
By Number of Transactions

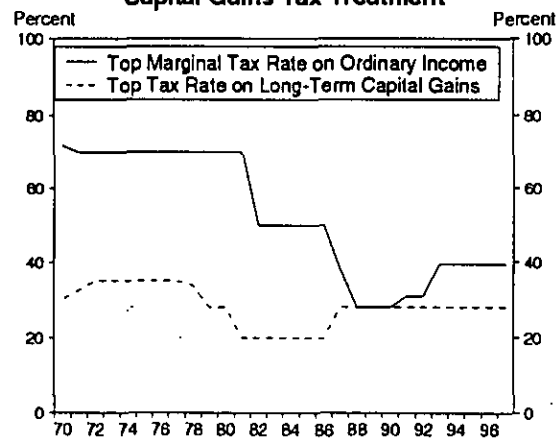


By Dollar Value



Source: Joint Committee on Taxation.

Capital Gains Tax Treatment



Source: The Capital Gains Controversy: A Tax Analysts Reader.

¹ For a more complete discussion of the issues surrounding capital gains tax reduction see *Capital Gains Tax Reduction: Pluses and Minuses*, April 1995.

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elements are very unlikely to be enacted into law. Not only will Democrats object strongly to such provisions, but also revenue constraints suggest narrower capital gains tax relief is likely. Indexation is likely to fail, in part because of the complexity of implementing such a proposal.

Q. What will be the effective date of any capital gains tax reduction?

Current legislative proposals generally anticipate that any capital gains tax cut would apply retroactively to the beginning of 1997. However, this intention is likely to fall victim to revenue constraints. For example, we estimate that postponement of the effective date to October 1, 1997 would save roughly \$10 billion in tax revenue.

Q. Proponents of capital gains tax cuts argue that such cuts would spur saving and investment and economic growth. How valid are these arguments?

We are generally skeptical that capital gains tax reduction would have a major impact on saving and/or investment. Given the ability of investors to defer capital gain realizations and the bump-up in basis at death that allows avoidance of capital gains taxes altogether, the effective rate on capital gains is far lower than the 28% top statutory rate. In fact, assuming no change in the pace of realizations, we estimate that a reduction in the statutory rate to 19.8% from 28% would likely cut the effective rate by about 3 percentage points to around 7%.² This would be too small a change to have much of an impact on saving and investment, especially when one considers that saving rates historically have been very insensitive to changes in rates of return.

Q. Does this mean that there are no benefits from capital gains tax reduction?

No. Clearly, the current marginal capital gains tax rate deters efficient portfolio allocation, especially among investors with smaller-sized portfolios that are not growing rapidly. While this probably does not result in a significant loss in the efficiency of the allocation of capital given the important role of tax-advantaged investors (e.g., pension funds, investors via 401(k) plans, life insurance companies) in helping to set capital asset prices, it does cause investors

Household Corporate Equity Holdings, 1995

Income (\$)	Percent of Families	Median Value for Families with Holdings (\$000)
Less than \$10,000	2.5%	\$2.0
10,000-24,999	9.2	5.7
25,000-49,999	14.3	6.9
50,000-99,999	26.0	5.7
100,000 and more	45.2	30.0
All Families	15.3%	\$8.0

Source: Survey of Consumer Finances, Federal Reserve Board.

Household Mutual Fund Holdings, 1995

Income (\$)	Percent of Families	Median Value for Families with Holdings (\$000)
Less than \$10,000	1.8%	\$25.0
10,000-24,999	4.9	8.0
25,000-49,999	12.4	12.5
50,000-99,999	20.9	15.0
100,000 and more	38.0	48.0
All Families	12.0%	\$19.0

Source: Survey of Consumer Finances, Federal Reserve Board.

Capital Gain Realizations, Tax Year 1994

Adjusted Gross Income (\$)	Total Returns with Gains (millions)	Percent of Returns with Gains in Income Class	Amount (billions)	Share
Less than \$15,000	1.6	3.6%	\$ 6.6	4.7%
15,000-29,999	1.6	5.4	5.9	4.2
30,000-49,999	1.7	8.3	8.2	5.8
50,000-74,999	1.7	12.8	10.8	7.7
75,000-99,999	0.9	19.2	9.0	6.4
100,000-199,999	1.1	32.5	19.7	14.1
200,000 and more	0.6	50.2	79.8	57.0
All Returns	9.2	7.9%	\$139.9	

Source: Statistics of Income (SOI) Bulletin, Spring 1996, Internal Revenue Service.

themselves to hold portfolios that are less than optimal as far as diversification and risk characteristics. Also, the current capital gains tax system would have to be characterized as very inefficient. Academic studies indicate that less than 50% of the unrealized capital gains of taxable investors are ultimately subject to a capital gains tax.

Q. How much would a 50% exclusion cost in terms of foregone government revenue?

No one really knows, because it depends on how responsive the rate of realizations is to reductions in the capital gains tax rate. In terms of budget scoring, a capital gains tax cut probably will be scored as a revenue loser over the 1998-2002 period that is relevant to current efforts to negotiate a balanced budget plan. In December 1995, the Joint Committee on Taxation scored similar capital gains tax cut legislation as losing about \$27 billion over the 1996-2002 period and as losing \$21 billion over the shorter, five year 1996-2000 period.

² The actual reduction in the effective rate would undoubtedly be smaller as the rate of realizations climbed in response to the reduction in the capital gains tax rate.

The Goldman Sachs logo, consisting of the words "Goldman Sachs" in a serif font, with "Goldman" on the top line and "Sachs" on the bottom line, enclosed in a dark rectangular box.

Most likely, the Joint Committee on Taxation will score the new proposal less negatively for two reasons. First, the stock market has appreciated roughly 70% since the beginning of 1995. Thus, there has probably been a significant buildup of unrealized gains. Second, the well-publicized push of Republicans for capital gains tax relief has undoubtedly caused some investors to delay selling appreciated assets. This suggests that there will be a bigger revenue surge in the year following enactment now than what was built into the 1995 Joint Committee on Taxation projections.

Q. What are the implications of enactment for equity prices?

There is likely to be a short-run negative impact on equity prices as investors sell appreciated assets and a longer-run positive impact on equity market valuation. In terms of short-term selling pressure, the 1986 experience is instructive. In mid-1986 the Tax Reform Act of 1986 was enacted. The Act raised the capital gains tax prospectively at the start of 1987 by eliminating the capital gains exclusion. This raised the top marginal capital gains tax rate to 28% at the start of 1987 from 20%. This caused a surge of selling as investors rushed to take advantage of the lower top rate before the increase in 1987. This held down stock prices temporarily. Once 1987 arrived and this selling pressure stopped, the stock market surged ahead.

This time around the selling pressure probably will not be as intense given that the rate will be lowered rather than raised. Thus, there is no window during which investors must act to take advantage of the lower capital gains rate. This should mitigate against a surge in realizations. However, given the long-anticipated nature of the capital gains tax cut combined with the sharp appreciation of stock prices, the pace of realizations will undoubtedly climb. This could restrain stock prices for an undetermined period, perhaps a few months.

Over the long-run, a cut in the capital gains tax rate would tend to push up equity prices by raising the after-tax rate of return. To see this, assume a 2% dividend yield and 8% capital appreciation per year, a decline in the effective capital gains tax rate to 7% from 10%, and a marginal tax rate of 39.6%. With

these assumptions, one can show that the dividend yield would need to decline by about 40 basis points to keep after-tax returns unchanged. A 25% rise in stock prices would be required to reduce the dividend yield by that amount.

A number of factors suggest that the impact would be substantially less than this. First, the demand for equities is also determined by non-taxable investors. Assuming, the impact is roughly proportional to their share of equity holdings, this implies a rise in equity prices of about one-half of 25% or roughly 12%. Second, as equity prices increased and the cost of equity financing declined, this would increase the supply of equities from corporate issuers, exerting downward pressure on equity prices. Third, if the capital gains tax cut did not generate a rise in the savings rate, the increase in equity prices would be accompanied by a rise in interest rates. Otherwise, the cost of capital would fall, which would be inconsistent with an unchanged saving supply. The rise in interest rates would also tend to cap any rise in equity market valuation. Fourth, to the extent that investors currently anticipate a capital gains tax cut, some of its potential impact on valuation may already be reflected in the level of equity prices. On balance, these factors suggest that while a capital gains tax cut would be positive development for the equity market, the degree of uplift would be relatively modest.

Q. What other effects might capital gains tax reduction have on the real economy?

One consequence might be increased consumer spending as investors realized gains and increased their liquidity. In this respect, the experience during the second half of 1986 is illuminating. The surge in capital gains realizations was accompanied by a 2 percentage point drop in the saving rate between the second and fourth quarters of 1986. Apparently, the liquidation of equity holdings helped facilitate greater spending. In this regard, the lack of an apparent wealth effect over the past few years may be due, in part, to the fact that the expectation of capital gains tax legislation has caused the realization rate to fall and this has helped to thwart the wealth effect.

Bill Dudley



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'97 Feb	'97 Jan	'96 Dec	'96 Nov			
Nonfarm Payrolls (ch. Thousands)	339	247	231	181	210	228	Apr 4
Unemployment Rate (%)	5.3	5.4	5.3	5.3	5.3	5.3	
Index of Hours Worked (% ch)	2.7	-1.6	0.8	0.8	5.8	3.9	
Average Hourly Earnings (% ch)	0.2	0.2	0.4	0.8	3.7	3.8	
Producer price finished goods index (% ch)	-0.4	-0.3	0.6	0.1	1.4	2.2	Apr 11
Excluding food and energy	-0.1	0.0	0.1	-0.1	0.0	0.4	
Consumer price index (% ch)	0.3	0.1	0.3	0.3	3.1	3.0	Apr 15
Excluding food and energy (% ch)	0.2	0.1	0.2	0.2	2.5	2.5	
Retail sales (% ch)	0.8	1.5	0.5	-0.1	8.6	5.1	Apr 11
Excluding motor vehicles (% ch)	0.5	1.4	0.3	0.2	7.4	5.4	
Industrial Production (% ch)	0.4	-0.1	0.4	0.8	3.9	3.8	Apr 16
Manufacturing	0.8	-0.3	0.6	0.8	4.5	4.3	
Capacity utilization (%)	83.3	83.2	83.5	83.4	83.2	83.2	Apr 16
Manufacturing	82.5	82.1	82.5	82.4	82.3	82.2	
Housing Starts (annual rate, thousands)	1528	1362	1353	1486	1434	1461	Apr 16
Single-family	1215	1117	1024	1133	1124	1150	
Trade balance (billions, monthly)	--	-12.7	-10.5	-8.0	-10.2	-9.8	Apr 17
Merchandise	--	-19.0	-16.9	-14.4	-16.4	-15.9	
Factory Orders (% ch)	--	2.5	-1.5	-0.5	3.8	5.2	Apr 2
Durable Goods	--	3.6	-1.8	-1.7	2.8	4.5	Mar 26
Personal Income (% ch)	--	0.3	0.7	0.6	5.9	6.1	Mar 31
Wages and Salaries	--	-0.1	1.1	0.8	6.7	6.9	
Purchasing Managers' Index (%)	53.1	52.0	53.8	52.4	52.2	51.3	Apr 1
Consumer Sentiment U Mich (Feb 66=100)	99.7	97.4	96.9	99.2	97.4	95.2	Mar 28
Conference Board (1985=100)	118.4	118.7	114.2	109.5	113.3	108.8	Mar 25

Note: Percentage changes are month to month for last four months, annualized for 6- and 12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- The FOMC meeting will be the major focus of attention, with a 25-basis point tightening of monetary policy expected. A benign inflation environment suggests that a 50-basis point tightening is very unlikely. Also, we expect that the FOMC will leave the discount rate unchanged. A discount rate increase would signal a more aggressive monetary policy posture (March 25).
- The Conference Board's consumer confidence index is likely to move higher, reflecting improved labor market conditions. Investors should pay particular attention to the job availability index as this is a standard favored by Chairman Greenspan for assessing the level of job insecurity (March 25).
- Durable goods orders are likely to rise only slightly as a drop in autos and aircraft orders offsets strength elsewhere (March 26).
- New home sales appear likely to weaken sharply in February, reversing the upward surge in January (March 28).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		
			GS	Consensus	Last Report
Tue Mar 25	10:00	Consumer Confidence (Mar)	119.0	118.0	118.4
	10:00	Existing Home Sales (Feb)	+1.0%	+1.0%	+2.1%
Wed Mar 26	8:30	Durable Goods Orders (Feb)	+0.2%	0.0%	+4.0%
Fri Mar 28	8:30	Real GDP (Q4 '96—Revision)	+3.9%	+4.0%	+3.9%
	8:30	Chain-Weight Price Index (Q4 '96—Rev)	+1.8%	+1.4%	+1.8%
	10:00	New Home Sales (Feb)	-8.0%	-5.7%	+8.6%

- | | |
|--|--|
| ■ FOMC Meeting (Tue, Mar 25) | ■ APICS Survey (Thu, Mar 27 - 8:30) |
| ■ Treasury 2-Year Note Auction (Tue, Mar 25) | ■ Consumer Sentiment—Final (Thu, Mar 27 - 10:00) |
| ■ Treasury 1-Year Bill Auction (Wed, Mar 26) | ■ Help-Wanted Index (Thu, Mar 27 - 10:00) |
| ■ Treasury 5-Year Note Auction (Wed, Mar 26) | ■ February FOMC Minutes (Thu, Mar 27 - 2:00) |

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	6.2%	6.5%	6.8%
Forward	5.9	6.2	6.5
2 Yr T-Note	6.6	6.8	7.0
Forward	6.4	6.5	6.7
10 Yr T-Note	7.0	7.1	7.2
Forward	6.8	6.8	6.9

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.9%	3.5%	3.4%	2.4%	3.3%
Ind. Prod., Mfg.	4.3	4.0	5.1	2.8	4.7
CPI	3.3	2.7	3.2	2.9	3.1
After-Tax Profits*	9.3E	4.4	5.0	14.7E	3.0
Unemployment	5.3	5.3	5.1	5.4	5.1

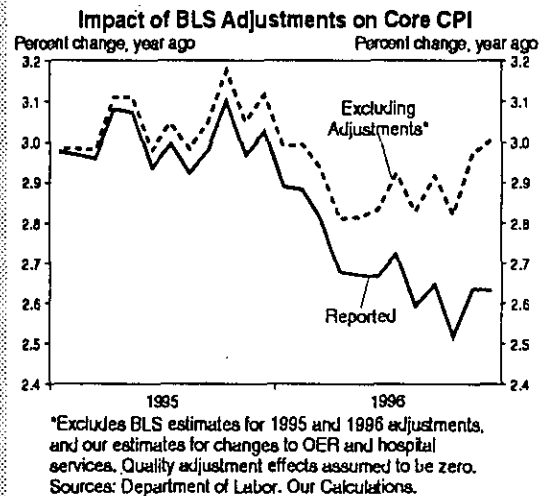
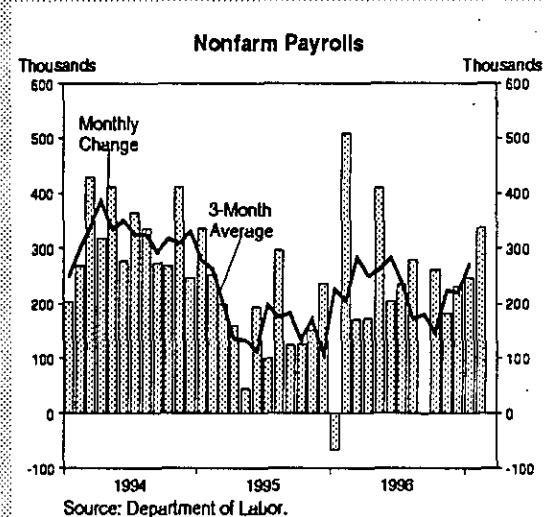
* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

25-Basis-Point Tightening Likely at the March FOMC Meeting

- Strong activity data, combined with a Fed Chairman who believes that monetary policy tightening must be preemptive, suggests that Fed officials will decide to tighten monetary policy by 25 basis points at the March FOMC meeting. Earlier, we had been undecided about whether they would move in March or wait until May. Our forecast of 125 basis points of tightening over the next 12 to 18 months is unchanged.
- The newest activity data point almost uniformly toward firm economic momentum. In February, payrolls rose by 339,000, the index of aggregate hours worked climbed by 2.7%, the four-week average of initial unemployment claims fell to its lowest level since 1989, and the national purchasing managers' index rose to 53.1%.
- In a center-section analysis, *BLS Adjustments Explain Slower Pace in Core CPI*, we examine several changes that have been implemented by the Bureau of Labor Statistics over the past two years, which have shaved the rate of CPI inflation by 0.14 percentage points starting in 1995 and an additional 0.10 points beginning in 1996. Moreover, our analysis of other BLS changes suggests that the dampening effect of revisions on inflation may have been higher, particularly in 1996.
- This means that the apparent deceleration in the core CPI in 1996 is suspect, as it reflects a change in methodology rather than a change in underlying inflation pressures. This is important since monetary policymakers usually focus more on the direction of inflation than on its absolute level.



Trade Recommendations

- Stay long the June '97/June '98 Eurodollar futures calendar spread, maintaining stops on a close below 50 basis points and retaining a target of 90 basis points.
- Stay short December '97 Euro futures, with a stop on a close above 94.00 and a target of 93.50.
- Set shorts in June T-bond futures at 111.08, with a stop on a close above 112.16.

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**Issue No: 97/10
March 7, 1997**

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Goldman
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I. Weekly Wrapup

Economic and Market Overview

Although the equity market recovered following Greenspan's comment that it might not be overvalued, the bond market remained under pressure as the economic news and the Chairman's testimony indicated that monetary policy tightening was increasingly likely.

In particular, production trends remain firm as can be seen in the uptick in the National Association of Purchasing Management index in February to 53.1 from 52.0 in January and the 2.5% rebound in factory orders in January, led by an upward-revised 4% jump in durable goods orders. The jump in orders caused unfilled orders to rise by 0.9% in January, putting the six-month rate of advance at 6.0% (annualized). Factory inventories, meanwhile, remained lean, rising by 0.1%, and the manufacturing inventories-to-sales ratio fell to 1.37, a new record low.

Meanwhile, conditions on the consumer front remain vibrant. Real consumer spending in January rose by 0.6%, putting consumption on about a 4% annualized growth path in the first quarter. Meanwhile, new home sales rose by 8.5% in January, pushing the inventory-to-sales ratio down to an unusually low 4.5 months' supply. In addition, labor market conditions are buoyant. Not only did total payrolls rise sharply in February (+339,000), helped by mild weather that boosted construction payrolls by 109,000, but the workweek rose sharply as well, pushing the index of aggregate hours up by 2.7%.

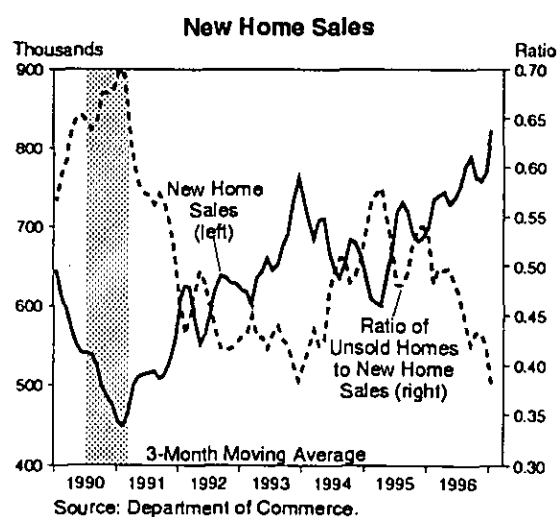
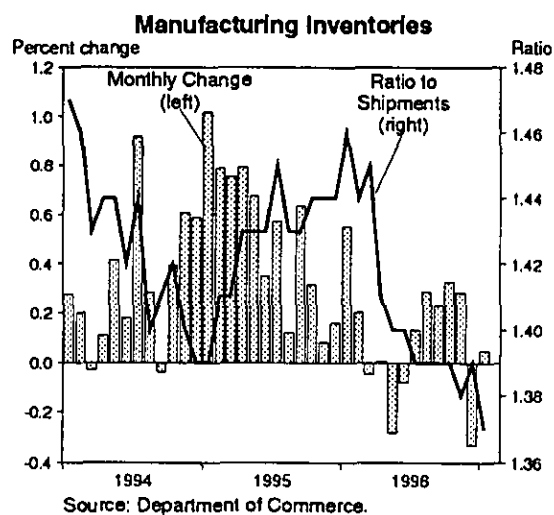
Although the proportion of job quitters fell in February to 10.9% of those that are unemployed from 12.3% in January, we do not think this is meaningful. This series has been trending upward and other indicators suggest that labor markets are continuing to tighten. In particular, the four-week moving average of initial claims has fallen to 310,000, the lowest reading since 1989. On the inflation front, both the prices paid component and the vendor performance component moved up in the January NAPM report, rising to 55.1 from 51.4 and 51.3 from 48.5, respectively. However, average hourly earnings were well-behaved in February, rising only 0.2%, keeping the year-over-year gain at 3.8%.

Federal Reserve Policy

We now expect Fed officials to begin to tighten monetary policy at the March 25 FOMC meeting (75% probability) because the economy continues to grow at an above-trend pace and Chairman Greenspan has not backed away from his earlier remarks that monetary policy needs to be preemptive. Action is likely because Chairman Greenspan has clearly put Congress and the markets on notice. To delay now, Chairman Greenspan would risk his credibility. We expect the first move will be a 25-basis-point hike in the federal funds rate and continue to expect 125 basis points of tightening over the next 12 to 18 months, well above the market consensus.

Fiscal and Political Developments

The Congressional Budget Office evaluation of the Clinton balanced budget plan reaches conclusions very similar to our own. The CBO estimates that the





Clinton budget would result in a \$69 billion deficit in 2002, not a \$17 billion surplus as the Clinton budget projects. In addition, the CBO finds that the budget savings are extremely backloaded into the last two years of the plan. In other words, the Clinton plan would not result in meaningful fiscal restraint until after the millennium.

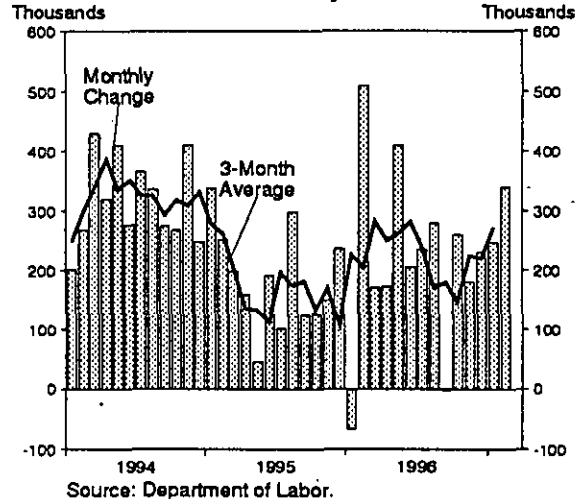
The large gap between the projections of the Clinton budget and those obtained using CBO scoring will make it more difficult to achieve a budget compromise. But one mechanism that could help bridge the gap would be a downward adjustment to the cost-of-living provisions for social security recipients and others to reflect the overstatement of inflation as calculated by the consumer price index. In that regard, the outlook has brightened a bit over the past few weeks as Trent Lott, the Republican majority leader, has suggested establishing a commission to consider this matter. The Clinton administration has not yet formally endorsed this idea, but Franklin Raines, the Director of the Office of Management and Budget, did indicate some willingness to consider the matter. A breakthrough on inflation-indexing would be very significant. Not only would it increase the likelihood of a budget agreement because it would reduce the magnitude of required spending cuts elsewhere, but also it would represent a better budget deal because it would result in further deficit reduction beyond the year 2002, a wedge of deficit reduction that would climb in size over time.

Market Outlook and Comments on Value

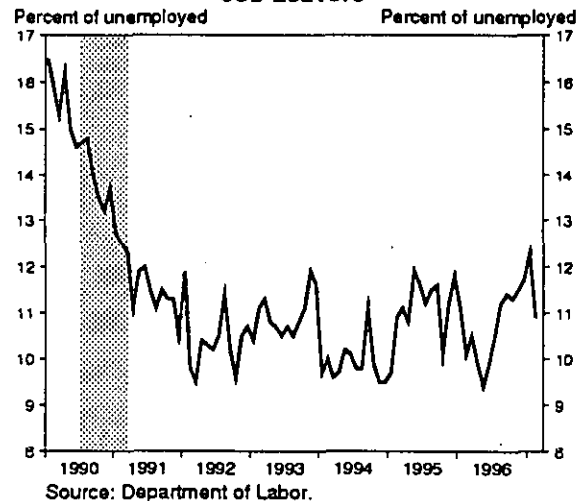
Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

The likelihood that Fed officials will tighten monetary policy at the March FOMC meeting remains substantially higher than what is embodied in Eurodollar futures prices. Moreover, the cumulative magnitude of tightening over the next year is likely to be greater than generally anticipated, regardless of the timing of the first Fed move. For this reason, we would stay with our two bearish positions, remaining long the June '97/June '98 Eurodollar futures calendar spread with a target of 90 basis points and a stop on a close below 50 basis points. We also would remain short December Eurodollar futures, maintaining a target of 93.50 and a stop on a close above 94.00. On the long end, we continue to look for a good opportunity to get short, and would set shorts on the June bond future at 111.08 or higher, with a stop on a close above 112.16.

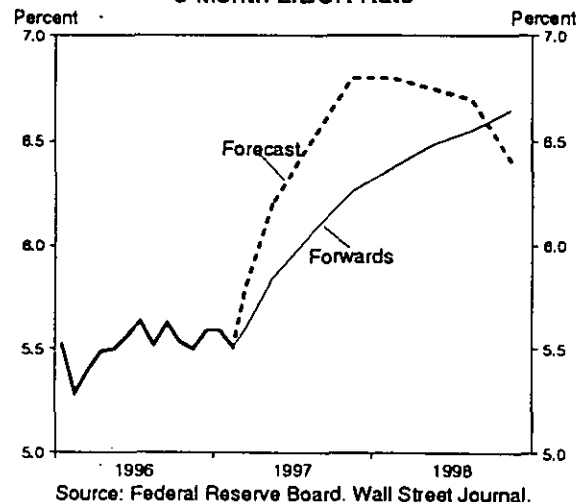
Nonfarm Payrolls



Job Leavers



3-Month LIBOR Rate





II. BLS Adjustments Explain Slower Pace of Core CPI

In its report to the Senate Finance Committee, the Boskin Commission estimated that the consumer price index overstates inflation by approximately 1.1 percentage points per year. This has triggered much discussion about the need for revisions to the calculation of inflation. A recent hint from White House Budget Director Frank Raines, in favor of establishing an expert panel to study such revamping efforts, suggests that political momentum for either new inflation or cost of living measures has increased.

What should not be overlooked, however, is that some revisions have already been made, reflecting gradual attempts by the Bureau of Labor Statistics to address some of the problems pointed out by CPI critics. Such revisions are, in fact, estimated to have subtracted 0.14 percentage points per year starting in 1995, and another 0.10 percentage points per year starting in 1996. These estimates alone explain much of the surprising deceleration of core inflation over the last two years, falling from 2.8% in 1994 to 2.5% (year-over-year) in January 1997, despite evidence that the economy is growing at an above-trend rate. Moreover, our analysis suggests that further changes in methodology—not included in the tally above—may have held down inflation measures even more, particularly in 1996. In sum, we believe year-over-year core CPI inflation would have registered 3.0% at yearend 1996, had no revisions occurred.

It is probably still true that the CPI overstates the absolute rate of inflation. But *gradual* revisions to eliminate a bias are also quite important, since these cause the *pattern* of inflation—accelerations or decelerations relative to previous years—to be disturbed. In thinking about the right setting for monetary policy, it is the pattern, rather than the level, of inflation that matters most.

Recent Adjustments to CPI Bias

Component	Date of Revision	Weight in Total CPI (%)	Contrib. to Total CPI (pct pts)	Weight in Core CPI (%)	Contrib. to Core CPI (pct pts)
Food at Home	Jan-95	9.9	-0.07	0.0	0.00
Owners' Equiv. Rent	Jan-95	19.7	-0.08	25.4	-0.10
Residential Rent	Jan-95	5.8	0.01	7.4	0.01
Prescription Drugs	Jan-95	0.5	0.00	0.6	0.00
Effect on 1995 CPI			-0.14		-0.09
Non-Food, Non-Shelter	Jun-96	55.9	-0.10	72.1	-0.13
Effect on 1996 CPI			-0.06		-0.08

Sources: Department of Labor, Our calculations.

Effects of Revisions in 1995 and 1996

The table below provides a summary of recent revisions, estimated by the BLS to have shaved 0.14 and 0.10 percentage points off the rate of increase in CPI inflation starting in 1995 and 1996 respectively. In January 1995, for example, the method for introducing new food items into the CPI was altered. The new approach helps to eliminate distortions caused when a food item is on sale in the month it enters the CPI base by taking pricing samples for months before the item is incorporated. This change accounted for a 0.07 point reduction in the overall rate of inflation, but had no effect on the core. Also in 1995, the calculations of owners' equivalent and residential rent were changed to incorporate a geometric, rather than arithmetic, average of rent changes. The net reduction in overall and core inflation equaled 0.07 and 0.09 percentage points. Finally, the treatment of prescription drugs was modified in 1995—classifying a drug as generic as soon as it loses its patent—but this was estimated to have no impact in reducing the upward inflation bias.

In 1996, the new pricing techniques for food at home items were extended to all non-shelter categories. BLS estimates that this change reduced the CPI inflation bias by approximately 0.10 points per year (0.13 on the core). For 1996 specifically, the impact was likely smaller, on the order of 0.06 points (0.08 on the core), since these changes were not actually put in place until June. Together with the 1995 changes, this explains 0.20-0.25 percentage points per year in adjustments, a figure used by the Boskin Commission as the probable reduction in the inflation bias over the last two years due to technical changes.

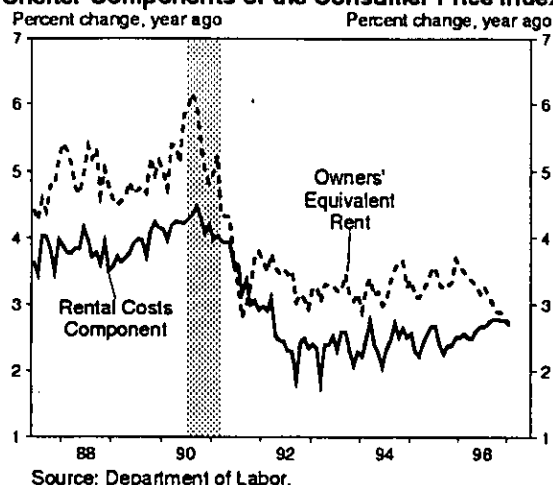
More Than Meets The Eye

We would argue however, that, aside from these modifications, other gradual adjustments to the CPI in recent years have shaved the rate of inflation by more than is commonly perceived. Three observations support our case:

1. Additional changes to the calculation of owners' equivalent rent (OER) were made in 1996. Accounting for 19.7% of the overall CPI and 25.4% of the core, OER captures what homeowners would pay to rent a similar structure. To calculate this, the BLS surveys owners about the structural characteristics and location of their home and then matches each



Shelter Components of the Consumer Price Index



owned unit to a similar rental unit, catalogued from a survey of 35,000 actual renters for use in the residential rent component. In effect, changes in OER are simply a subset of changes in residential rent. Before 1995, however, OER inflation was consistently higher than residential rent inflation by nearly 1.0 percentage point. About 0.4 points of this gap, corrected in 1995, was due to the arithmetic averaging of underlying rental price changes. A second reason, however, was that owned units were being matched with rentals in mostly-owned neighborhoods, where rental prices were rising faster than average. Thus, in January 1996, the BLS enlarged the rental subset used in matching owners to renters. Since that time, the gap between OER and residential rent has been fully eliminated, as shown in the chart above. It appears, then, that 0.5 points was subtracted from OER inflation in 1996, shaving CPI gains by an additional 0.10 points (0.13 on the core).

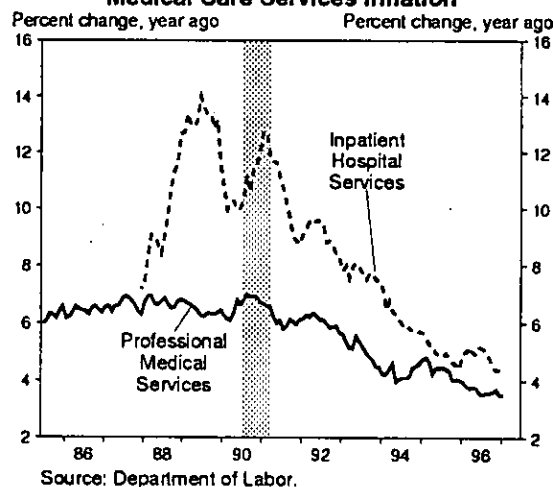
2. Gradual revisions to inpatient hospital services costs have occurred since 1990, but may have had an outsized effect in 1996. As shown in the accompanying chart, inflation in this component, accounting for 3.0% of the CPI, began gradually decelerating in 1990, from 10.7% to a current rate of 4.4%. Doubtless, some of this move reflects a shift in the composition of payors, as the penetration of HMO's has increased relative to fee-for-service plans. Yet, the deceleration in other medical care services costs has been less dramatic. Thus, it strikes us that a change in methodology—also beginning in 1990—has likely had some effect. In that year, the BLS began a gradual move toward the use of

transaction prices, rather than published or "list" prices, which are often discounted at the point of purchase. In 1990 and 1991, hospitals in only three states reported transaction prices. By 1996, about 20% of all hospitals had been included. In June of last year, a final push was initiated, resulting in coverage today of about 60%.

While it would be nearly impossible to quantify the year-to-year effects of these changes, we would point out that the effect has likely been to dampen inflation and that the adjustments were concentrated in 1996. It is also noteworthy that inflation in this component actually turned up in the first half of 1996, but began decelerating mid-summer, coincident with the push to expand hospital coverage. Had hospital services inflation continued on its first-half course, accelerating 0.13 percentage points per month, prices would have been rising at a 6.0% rate by yearend, rather than 4.4%. Adjustments, then, may have shaved as much as 1.60 points off the growth rate of this component, resulting in a 0.06 point reduction in CPI inflation (0.08 on the core).

3. Quality adjustments are routinely incorporated into various CPI components and may be growing in size.¹ In collecting price data on individual items, BLS officials also regularly determine whether the quality of that item has improved since last reading. If so, the value of the enhancement is estimated and is

Medical Care Services Inflation



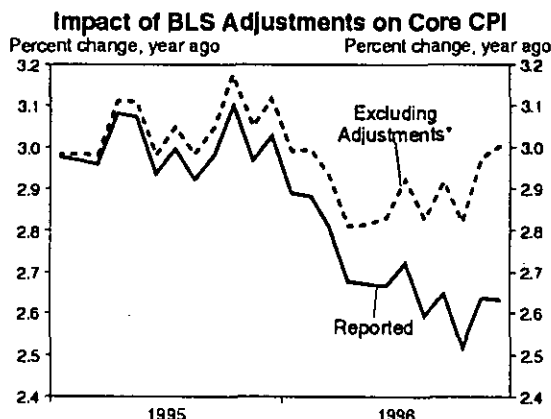
¹ The Boskin Commission's estimate of the quality bias, 0.6 point per year, relates to adjustments needed above and beyond the modifications being discussed here.



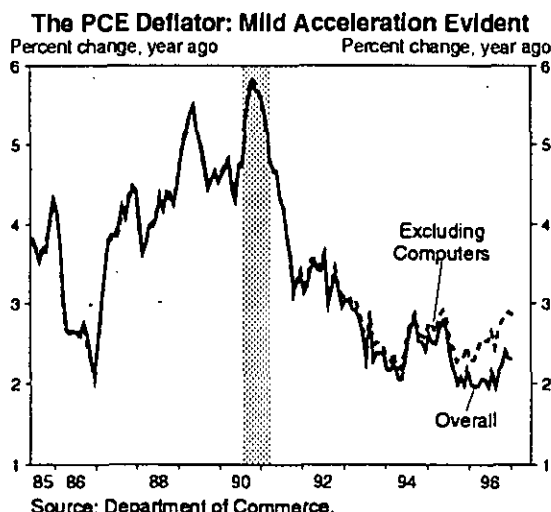
subtracted from the item's new price, so as not to confuse pure inflation effects with a higher price due to higher quality. The BLS estimates that quality adjustments acted to reduce CPI inflation by 2.6 percentage points in 1995 in the components affected.² This is up substantially from 1.2 percentage points in 1984, the last year for which estimates were released. It thus seems likely that this adjustment has been growing by 0.10 percentage points or more in recent years.

Looking Ahead: Inflation Resuscitation?

The revisions discussed above, though not sufficient to eliminate the upward bias in the *level* of inflation, have clearly altered the *pattern* of inflation. By revising one year, without restating historical data, current CPI figures are being grafted onto a historical data set which is not directly comparable. Percentage changes, under this scenario, are not representative of true price behavior, since attaching a price series at a lower level looks like a deceleration in price. The accompanying chart shows our estimate of core CPI gains over the last two years, had no adjustments occurred. As shown, we think core inflation actually moved up in late 1996, to about 3.0% year-over-year. The disruption in pattern is important because Fed officials are often more concerned about changes in the pace of inflation than with the absolute rate of price gains. A few additional points are worth noting about the effect of recent and future revisions:



*Excludes BLS estimates for 1995 and 1996 adjustments, and our estimates for changes to OER and hospital services. Quality adjustment effects assumed to be zero. Sources: Department of Labor, Our Calculations.



1. Once the revision process is complete, inflation could appear to change course, merely by returning to a normal trajectory. Take, for instance, a component accelerating 0.20 percentage points per year, on average, but where growth was dampened by 0.30 points in 1996. This component would appear to decelerate 0.1 points in 1996, but then accelerate 0.2 points in 1997. The net effect would look like a reversal of trend.
2. Further revisions may be in store. The BLS will likely continue making adjustments to CPI components. Particularly in 1998, when a benchmark revision is scheduled (updating the weights of components, but not altering the pattern of inflation, since back data is revised), other types of adjustments may be implemented. Also, if an expert panel is convened to discuss the CPI bias, further adjustments may be called for.
3. Other inflation indicators may prove more useful. The PCE deflator, for example, may provide a clearer picture of inflation since this indicator uses a basket of goods which is up to date (eliminating substitution bias) and since healthcare costs are benchmarked off of PPI transaction based data. As shown above, the PCE deflator accelerated slightly in 1996. This pickup occurred despite the greater weight given to computers, an area where price moves decelerated rapidly in 1995-1996.

Jill Jacobs

² Estimates are based on studies of 171 of the total 207 CPI strata. Calculation methods in excluded categories do not lend themselves to quality adjustments.



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'97 Feb	'97 Jan	'96 Dec	'96 Nov			
Nonfarm Payrolls (ch. Thousands)	339	247	231	181	210	228	Apr 4
Unemployment Rate (%)	5.3	5.4	5.3	5.3	5.3	5.3	
Index of Hours Worked (% ch)	2.7	-1.6	0.8	0.8	5.8	3.9	
Average Hourly Earnings (% ch)	0.2	0.2	0.4	0.8	3.7	3.8	
Producer price finished goods index (% ch)	--	-0.3	0.6	0.2	2.8	2.5	Mar 14
Excluding food and energy	--	0.0	0.1	0.1	0.4	0.6	
Consumer price index (% ch)	--	0.1	0.3	0.3	2.9	3.0	Mar 19
Excluding food and energy (% ch)	--	0.1	0.2	0.2	2.3	2.5	
Retail sales (% ch)	--	0.6	0.3	-0.1	4.3	4.9	Mar 13
Excluding motor vehicles (% ch)	--	0.4	0.0	0.2	3.0	4.6	
Industrial Production (% ch)	--	0.0	0.5	0.8	3.9	4.8	Mar 14
Manufacturing	--	-0.3	0.8	0.8	3.6	5.1	
Capacity utilization (%)	--	83.3	83.5	83.4	83.3	83.2	Mar 14
Manufacturing	--	82.2	82.7	82.4	82.3	82.2	
Housing Starts (annual rate, thousands)	--	1350	1323	1486	1425	1466	Mar 18
Single-family	--	1108	1005	1133	1120	1150	
Trade balance (billions, monthly)	--	--	-10.3	-7.9	-10.0	-9.4	Mar 20
Merchandise	--	--	-16.6	-14.3	-16.1	-15.5	
Factory Orders (% ch)	--	2.5	-1.5	-0.5	3.8	5.2	Apr 2
Durable Goods	--	3.6	-1.8	-1.7	2.8	4.5	Mar 26
Personal Income (% ch)	--	0.3	0.7	0.6	5.9	6.1	Mar 31
Wages and Salaries	--	-0.1	1.1	0.8	6.7	6.9	
Purchasing Managers' Index (%)	53.1	52.0	53.8	52.4	52.2	51.3	Apr 1
Consumer Sentiment U Mich (Feb 66=100)	99.7	97.4	96.9	99.2	97.4	95.2	Mar 28
Conference Board (1985=100)	118.4	118.7	114.2	109.5	113.3	108.8	Mar 25

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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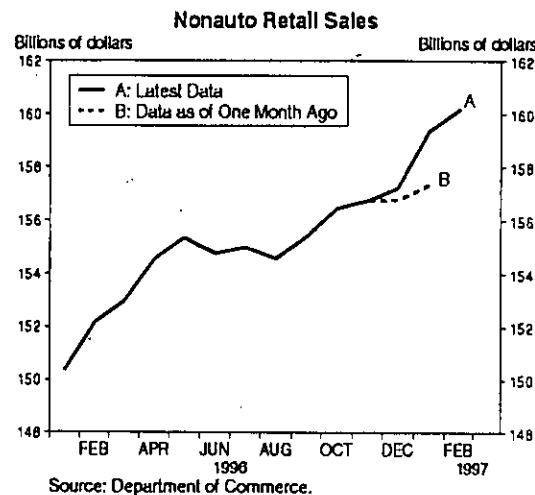
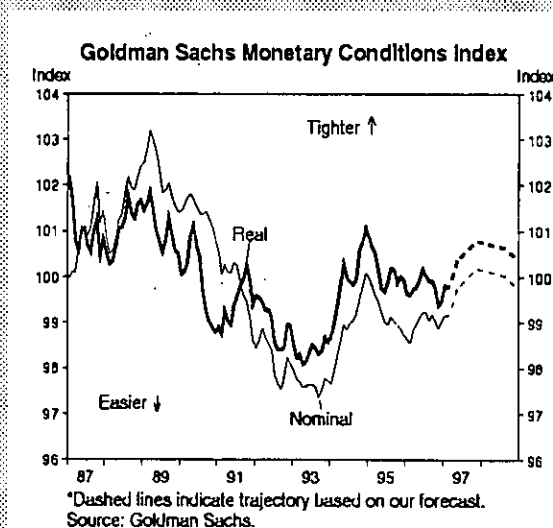
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U.S. Economics Analyst

Five Reasons to Expect Prompt Fed Tightening

- We continue to expect a 25-basis-point tightening of monetary policy at the March 25 FOMC meeting. Chairman Greenspan's assessment that inflation risks are increasingly skewed to the upside coupled with his commitment to a preemptive interest rate strategy suggest that the central bank will finally act on the policy bias they have maintained consistently since last July.
- There are five specific pillars supporting our judgment that rates must rise: (1) Real growth remains solidly above trend; (2) This strength is likely to persist; (3) Monetary policy does not appear tight at present; (4) Wages already are displaying a gradual acceleration; and (5) Higher pay awards are apt to cause a modest pickup in core price inflation.
- Current circumstances differ notably from those present when the Fed chose not to tighten last September. In particular, data on retail purchases in January and February were exceptionally strong, implying that overall real personal consumption growth has accelerated further this quarter, to about 4.5% at an annual rate. Six months ago, by contrast, consumption gains had all but stalled.
- Robust consumer activity reports have led us to revise upward our estimate for annualized first quarter GDP growth, from 2.6% to 3.5%. In addition, strong demand has pushed inventory-to-sales ratios down even further, despite solid production gains. This bodes for a continuation of relatively brisk growth later this year.



Trade Recommendations

- Close out long June '97/June '98 Eurodollar futures calendar spread positions.
- Shift outright short Eurodollar positions from the December 1997 to the June 1997 contract. Set stops at 94.30 with a target of 93.75.

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**Issue No: 97/11
March 14, 1997**

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I. Weekly Wrapup

Economic and Market Overview

Investors in U.S. securities markets remained uneasy this week, faced with uncertainty about the prospects for Fed tightening at the March 25th FOMC meeting. The disquietude made for volatile trading, and ultimately caused downward adjustments in both bond and stock prices. By week's end, bond investors had pegged the chances of a March rate hike at approximately 50%, a probability assessment that we view as still too low.

Data during the week underscored the view that economic momentum is building and that household demand is firmly rooted. February retail sales figures suggest that spending thus far this quarter has been quite a bit stronger than previously thought. Revisions to January retail data reveal growth in that month of 1.5% overall and 1.4% in the nonauto group, versus earlier estimates of 0.6% and 0.4%, respectively. These January gains were then supplemented by a solid pace of sales growth in February, at 0.8% overall and 0.5% excluding motor vehicles. These data have pulled the trend pace of real spending in the first quarter up to about 4.5%, causing us to raise our sights for GDP growth in that period to 3.5% (annual rate), versus 2.6% previously.

With such healthy demand conditions as a backdrop, industrial production rose 0.5% in February, despite a 3.5% decline in utility output that reflects unseasonably warm weather. Manufacturing output posted a 0.8% rise, bringing the factory utilization rate to 82.5%, one of the highest readings of the last fifteen months. Still, solid output gains were unable

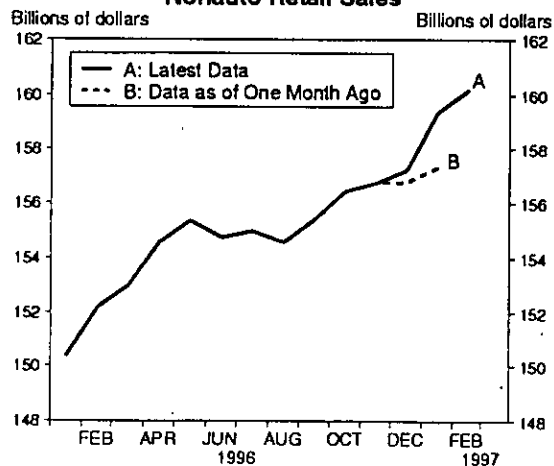
to match the rapid pace of sales, resulting in sharply lower inventory-to-sales ratios. In the retail arena, for example, nonauto goods stocks stand at their lowest level relative to sales since late 1983.

Despite clear strength in both demand and production, domestic goods pricing remains strikingly restrained. In February, large declines in food and energy quotes, alongside only small changes in other areas, caused the producer price index to decline 0.4% overall and 0.1% in the core.

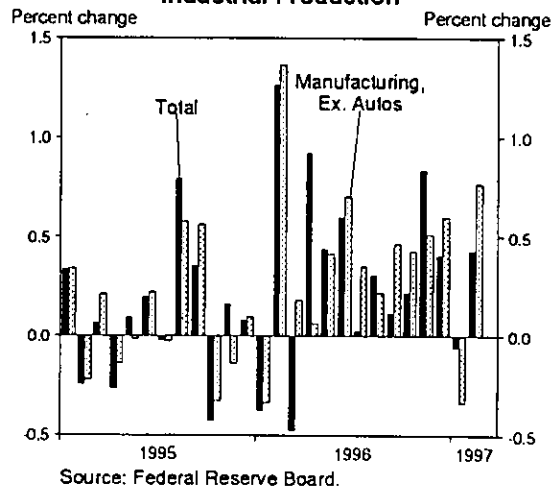
Federal Reserve Policy

In the runup to the March 25th FOMC meeting, commentary by Federal Reserve officials will likely be scrutinized even more closely than usual. A recent remark by Robert McTeer, President of the Federal Reserve Bank of Dallas, suggesting that the Fed is not yet ready to raise interest rates was given much attention. Yet, as discussed on pages 4-6, it is important to remain focused on Chairman Greenspan's statements, as he has been shown to hold enormous sway in molding Fed policy. For instance, while it was clear last fall that a number of regional Fed bank presidents were inclined toward a rate rise, no hike materialized, suggesting that the Chairman remained unconvinced of the need to tighten policy. Now, by contrast, official comments from the Fed chief convey a growing concern about the inflationary risks inherent in several developments, including gains in financial asset markets and continued momentum in economic activity. Moreover, Dr. Greenspan has agreed to testify before the Joint Economic Committee on March 20th, just five days

Nonauto Retail Sales



Industrial Production



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prior to the FOMC meeting. It is worth recalling that this was precisely the forum he used in January 1994 to prepare financial markets for an imminent tightening of policy.

Fiscal and Political Developments

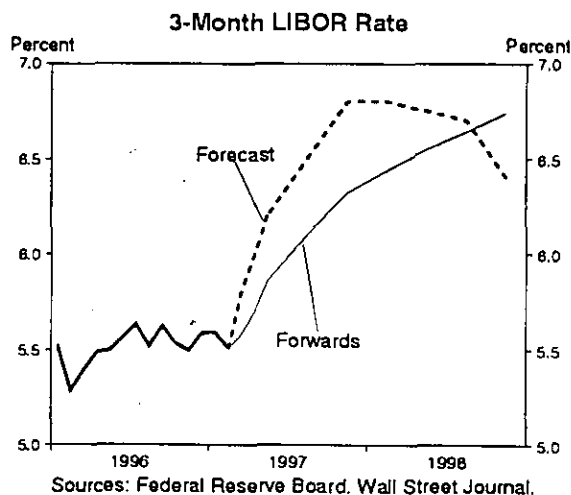
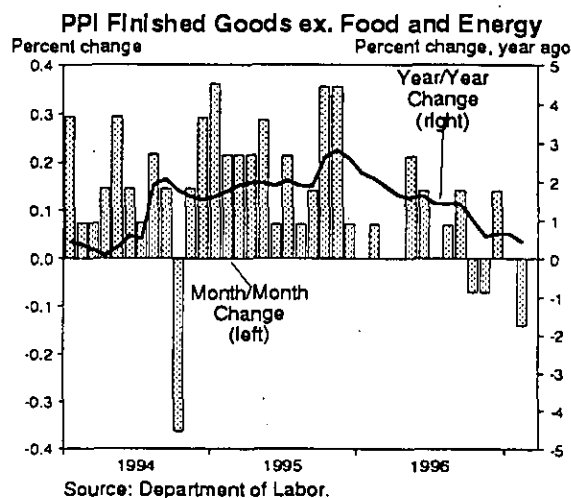
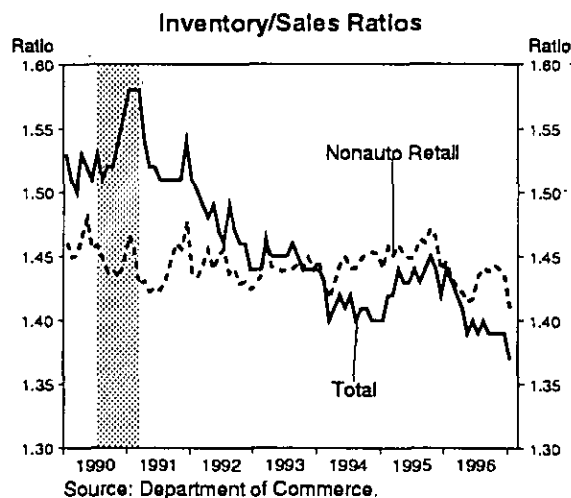
Budget talks between Congress and the White House have hit the rocks in recent days, and may prove difficult to salvage. The atmosphere began to deteriorate last week when the Congressional Budget Office announced that its calculations imply a much larger-than-expected deficit in fiscal 2002 under the Clinton administration's plan. Then, in a second serious blow, the Administration backed away from the idea of a panel to specify future downward adjustments to the Consumer Price Index. This decision makes it much harder to plug the wide gap between White House and CBO budget estimates. It also has angered key lawmakers, who were counting on President Clinton to lend some political cover for their efforts in this highly sensitive area, which touches on both Social Security benefits and income tax brackets. These developments have further deepened the distrust that congressional officials hold for any fiscal dealings with this White House, elevating the risk that the leadership will forego further efforts at a bipartisan accord in favor of writing their own budget in a piecemeal fashion.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

With a rate rise likely to occur at the FOMC meeting just 11 days from now, we recommend closing long positions in the June '97/June '98 Eurodollar futures calendar spread. If the Fed tightens this month, the June 1997 Euros should weaken significantly as market participants begin discounting a high probability of one or more additional rate hikes before the end of summer. In fact, we now would advocate shifting short positions in December 1997 Euro contracts forward into June 1997 Euros, on the basis that the market still assigns a lower probability to a swift tightening than we believe is appropriate.

At this point, we prefer to stay uncommitted in the bond sector, although our preference remains to look for an opportunity to get short. Bond yields have already risen a great deal in recent weeks, but may continue to escalate as investors gain a fuller appreciation for the degree of upward momentum the U.S. economy presently enjoys.



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II. Five Reasons To Expect Prompt Fed Tightening

Federal Reserve officials appear poised to initiate a credit tightening very soon, probably at the March 25 FOMC meeting. In his latest monetary policy report to Congress, Chairman Greenspan was clear in stating that the risks on inflation are tilted to the upside, and that interest rate increases must be undertaken before price pressures become visible, given long lags in their effects on business conditions.

In our view, the time for such a program of monetary restraint has arrived. There are five principal grounds for this conclusion: (1) U.S. economic growth has been maintained at a solid above-trend pace in recent months; (2) Leading indicators of business activity suggest that similarly robust expansion will persist for some time; (3) The behavior of interest-sensitive economic sectors and pricing in financial asset markets imply an unrestrictive monetary posture at present; (4) An upward trend in labor costs is increasingly evident; and (5) Stronger compensation gains are likely to slowly leak into pricing decisions.

Factors which deterred central bankers from hiking rates last summer and fall have gradually fallen away. Whereas final demand—and consumer spending in particular—slumped in the third quarter of 1996, the latest signals on domestic spending have been strong. With the formal bias toward tightening already 8 1/2 months old, it is not clear what would be gained from delaying action another eight weeks.

Five Reasons For The Fed To Tighten Soon

1. Economic Growth Remains Well Above Trend

Upward momentum in business activity has continued this quarter, led by broad gains in final demand. In particular, the pace of consumer spending seems to be intensifying. In the wake of sturdy preliminary consumption figures from January and an exceptionally robust February retail sales report, personal consumption looks likely to climb about 4.5% at an annual rate this quarter, following a 3.4% fourth-period increase. The strength in spending is well supported by trends in jobs and income as well as buoyant consumer confidence. Over the past three months payroll employment has expanded an average of 272,000, versus 193,000 per month in the prior half year. Declining unemployment claims reinforce the impression of a pickup in net hiring, which has bolstered the pace of real income gains. Meanwhile, all major consumer polls

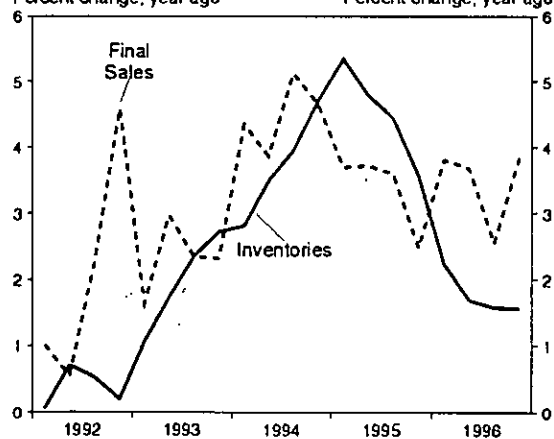
show the most optimistic attitudes about job availability and medium-term finances in years.

Other sectors of the economy also appear to be sturdy. Business fixed investment should remain on a positive course given high profitability and rising utilization rates. Consistent with this outlook, new orders for capital goods other than aircraft jumped 3.9% in January, reversing declines in the prior two months, and real nonresidential private construction outlays in January were already 1.4% (not annualized) above the fourth-quarter average. The housing industry continues to display surprising strength, as new single-family home sales in the past three months were the highest in over a decade.

2. Leading Indicators Imply Continued Strength

There are good reasons to believe that GDP will sustain this momentum for quite some time. In particular, unfilled order backlogs are swelling and inventories are unusually lean. Order backlogs surged 0.9% in January and are 6.2% higher than a year ago, while real nonfarm stocks accumulated at only a \$18.4 billion annual rate last quarter, revised down from the initial estimate of \$31.9 billion. The gap between year-to-year growth in sales and inventories of nonfarm goods is at the widest point in four years. Purchasing managers, moreover, have indicated that these trends intensified in February; their national index of new orders leaped to 57.7%, while inventories dropped to 41.2%, toward the bottom end of the range seen since

Nonfarm Goods Sales Outstripping Production
Percent change, year ago



Source: Department of Commerce.



late 1991. Stock levels are very low for homebuilders as well; the seasonally-adjusted supply of unsold new units dropped 10.8% between July and January, and the supply of new dwellings is about 20% below the normal 6.0-6.5 month range.

Longer-leading indicators such as the performance of equity prices and broad monetary aggregates also point toward a maintenance of solid broad expansion. The Standard and Poor's 500 stock index has risen 22.9% in the past 12 months and soared 71.6% since the beginning of 1995. Annualized growth over the past six months in M2 and M3, meanwhile, has quickened to 5.4% and 8.3%, respectively.

3. Scant Evidence of Monetary Restraint

Neither activity developments in the most interest sensitive economic areas (such as housing and durable-goods consumption) nor the current status of financial asset valuations are suggestive of a restrictive credit environment in the U.S. Despite weak economic growth abroad, federal fiscal restraint, and a drag from inventory investment, the economy has grown 3.2% over the past four quarters. Business and financial market sectors that are most closely associated with monetary policy have all performed in precisely the opposite way one would expect if policy were restrictive. Housing demand is up, stock prices have exploded upward, and yield spreads between Treasury debt and that of non-investment-grade corporations are very thin.

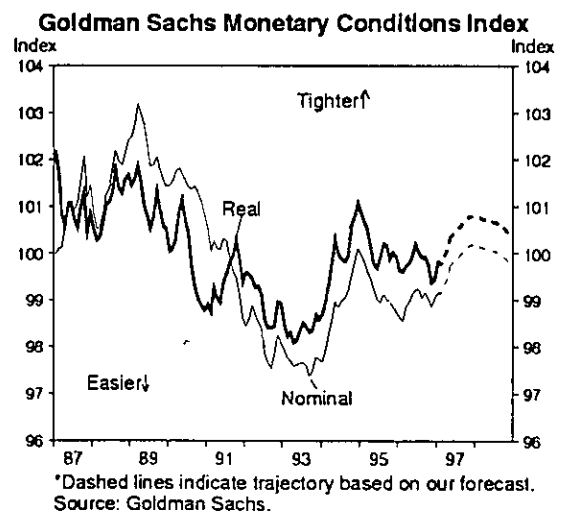
To be sure, the differential between the Federal funds rate and the trailing 12-month change in core retail prices—now 2.75%—is about 1% wider than a 40-year historical average. This spread, however, is very volatile over time, with one standard deviation around the mean since 1960 equal to 2.2 percent. This means that the current reading is less than half of a standard deviation above the mean, hardly a difference of statistical significance. In addition, there are good reasons why this spread should be wider today than the average in the 1950s and 1960s. Financial deregulation and global interlinked capital markets imply somewhat higher U.S. real interest rates than in the more tightly regulated earlier eras, while higher share prices have reduced the equity cost of capital, a consequence of which should be an offsetting increase in equilibrium real interest rates. Finally, it would

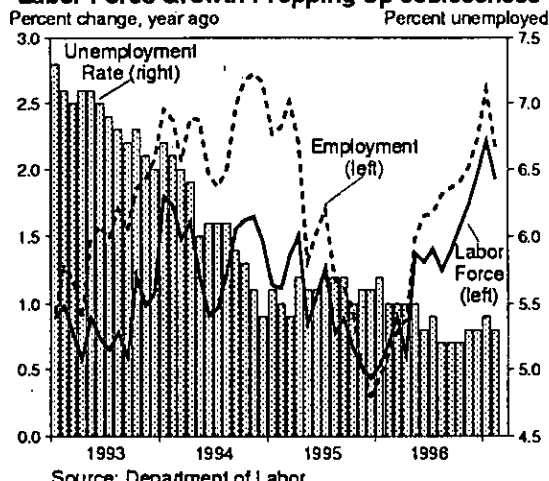
be dangerous to assume that the level of real interest rates associated with neutrality is invariant within the business cycle. When utilization rates and confidence are high, a wider spread between interest rates and inflation may be needed to keep economic growth on a trend path.

Consistent with these interpretations, the Goldman Sachs Monetary Conditions Index for the U.S. is still hovering at close to a neutral level. Assuming our forecasts for money-market rates and bond yields over the next year prove accurate, the GSMCI will move into restrictive territory, but not to the degree experienced during either of the last two major tightening episodes (1988-1989 and 1994-1995).

4. Wage Pressures Already Are Apparent

Both average hourly earnings and the employment cost index for wages and salaries are slowly gaining speed, suggesting that the labor market has tightened beyond the point at which labor costs can be expected to hold steady. Moreover, if the economy continues to expand faster than its long-term average the unemployment rate is likely to decline further, intensifying strains on labor resources. This would risk an even faster acceleration in the pace of pay awards. Throughout 1996, the decline in joblessness was retarded by an unusually rapid growth in the labor force (2.0% over the 12 months ending last December). Unfortunately, it is doubtful that this will continue, because the number of discouraged workers available to augment the labor supply has fallen quickly, reducing the pool of potential re-entrants.



**Goldman
Sachs****Labor Force Growth Propping Up Joblessness****5. Labor Costs Likely To Push Up Core Inflation**

If the pace of wage inflation continues to increase, it appears inevitable that some of these cost pressures will leak into prices, for three reasons. First, productivity trends almost never improve late in a business expansion, by which time the highest-quality resources have already been absorbed. Thus, it will be difficult to enhance output per hour so as to neutralize the upward pressure on unit labor costs from compensation gains. Second, special factors that helped suppress inflation in 1996, such as rapidly declining computer prices and falling medical care inflation, are not likely to persist to the same degree in 1997. Third, much of the improvement in the core CPI over the past two years has been an illusion created by changes in the Bureau of Labor Statistics methodology that lowered the inflation rate but did not apply retroactively.

Current Period Different From Last Fall

Last September, Chairman Greenspan and the rest of the FOMC elected to keep rates steady despite widespread expectations of a rate rise. Conditions at that time, however, were significantly different than at present, particularly with regard to trends in consumer activity and other key demand components. To be sure, Fed policy makers have retained an official expectation that GDP growth will slow substantially, toward a 2.0% annual rate from the recent 3.0%-3.5% average—the same view they held last summer. The major difference between now and then is that consumer outlay growth has remained vigorous, whereas such demand virtually stalled in the third period. Taking this together with the unexpected rebound in spending last quarter, there

should be much less comfort now with the forecast of an early return to trend growth. Additionally, the potential for an improvement in economic conditions overseas seems improved versus six months ago, with activity reports from the European continent as well as Japan displaying a modestly firmer tone.

Further Delay Difficult To Justify

Against this background, in our view it will be difficult for the FOMC members to provide a clear and convincing rationale for leaving short-term interest rates unchanged another eight weeks (the next scheduled policy gathering is on May 21). This is particularly true because Fed officials have already expressed a bias toward policy tightening for 8 1/2 months without taking any action. According to our records, this marks by far the longest period in the modern era of effective interest rate targeting (which began in late 1982) that the central bank has expressed a consistent policy leaning without changing rates; indeed, the previous record was less than half the duration of the current interval.

**Periods of Fed Policy Bias Without Action
(1983-Date)**

Period	Formal	
	Bias Toward	No. of Days
Feb 9 - May 23, 1983	Easing	104
Nov 15, 1983 - Jan 30, 1984	Tightening	77
Feb 11 - Apr 8, 1987	Tightening	56
Aug 16 - Nov 22, 1988	Tightening	99
Aug 22 - Oct 15, 1989	Easing	55
Aug 21 - Oct 28, 1990	Easing	69
Feb 5 - Apr 8, 1992	Easing	64
Oct 6 - Dec 22, 1992	Easing	78
May 18 - Aug 16, 1993	Tightening	91
July 3, 1996 - Date	Tightening	255

Only five days ahead of the FOMC meeting, on Thursday, March 20, Chairman Greenspan will deliver yet another set of remarks to lawmakers, this time at a Joint Economic Committee hearing. It is our expectation that he will repeat, or perhaps even heighten, his warnings about the potential for an early rate hike, just as he did in front of the same panel on January 31, 1994, four days before the last tightening round was commenced.

Bill Dudley

John Youngdahl



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Index of Hours Worked (% ch)	2.7	-1.6	0.8	0.8	5.8	3.9	
Average Hourly Earnings (% ch)	0.2	0.2	0.4	0.8	3.7	3.8	
Producer price finished goods index (% ch)	-0.4	-0.3	0.6	0.1	1.4	2.2	Apr 11
Excluding food and energy	-0.1	0.0	0.1	-0.1	0.0	0.4	
Consumer price index (% ch)	--	0.1	0.3	0.3	2.9	3.0	Mar 19
Excluding food and energy (% ch)	--	0.1	0.2	0.2	2.3	2.5	
Retail sales (% ch)	0.8	1.5	0.5	-0.1	8.6	5.1	Apr 11
Excluding motor vehicles (% ch)	0.5	1.4	0.3	0.2	7.4	5.4	
Industrial Production (% ch)	0.4	-0.1	0.4	0.8	3.9	3.8	Apr 16
Manufacturing	0.8	-0.3	0.6	0.8	4.5	4.3	
Capacity utilization (%)	83.3	83.2	83.5	83.4	83.2	83.2	Apr 16
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Trade balance (billions, monthly)	--	--	-10.3	-7.9	-10.0	-9.4	Mar 20
Merchandise	--	--	-16.6	-14.3	-16.1	-15.5	
Factory Orders (% ch)	--	2.5	-1.5	-0.5	3.8	5.2	Apr 2
Durable Goods	--	3.6	-1.8	-1.7	2.8	4.5	Mar 26
Personal Income (% ch)	--	0.3	0.7	0.6	5.9	6.1	Mar 31
Wages and Salaries	--	-0.1	1.1	0.8	6.7	6.9	
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U.S. Calendar

Focus for the Week Ahead

- Fed Chairman Greenspan will deliver one more round of congressional testimony prior to the March 25 FOMC meeting, this time before the Joint Economic Committee (March 20). He is unlikely to temper, and may well intensify, his warnings about the possibility of an early monetary tightening.
- Consumer prices are expected to rise 0.2%, both overall and excluding the food and energy groups (March 19). The core figure should be held down somewhat by a decline in apparel quotes.
- The trade deficit likely widened again in January, in part reflecting a reversal of the statistically suspect narrowing posted early in the fourth quarter of last year (March 20). The January surge in wholesale inventories hints that imports are reaccelerating.
- Housing starts should record strong gains for February for several reasons, including warm weather, robust new home sales volumes, low stocks of unsold dwellings, and a rebound from flood-depressed activity in the West (March 18).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		
			GS	Consensus	Last Report
Tue Mar 18	8:30	Housing Starts (Feb)	+12.0%	+5.2%	+2.0%
Wed Mar 19	8:30	Consumer Price Index (Feb)	+0.2%	+0.2%	+0.1%
		Excluding Food & Energy	+0.2%	+0.2%	+0.1%
Thu Mar 20	8:30	Trade Balance (Jan)	-\$11.6 Bil	-\$10.3 Bil	-\$10.3 Bil
	10:00	Philadelphia Fed Survey (Mar)	+15.0%	+18.0%	+17.4%
Fri Mar 21	2:00	Federal Budget Balance (Feb)	-\$47.5 Bil	-\$43.0 Bil	-\$44.3 Bil

- Homebuilders' Survey (Mon, Mar 17)
- Treasury Announces 2- and 5-Year Notes (Tue, Mar 19 - 2:30)
- Greenspan Testifies to the Joint Economic Committee (Thu, Mar 20 - 10:00)
- Import and Export Prices (Fri, Mar 21 - 10:00)
- Treasury Announces 1-Year Bill (Fri, Mar 21 - 2:30)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	5.8%	6.2%	6.8%
Forward	5.8	6.1	6.4
2 Yr T-Note	6.2	6.5	7.0
Forward	6.4	6.5	6.7
10 Yr T-Note	6.7	7.0	7.2
Forward	6.8	6.8	6.9

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.9%	3.5%	3.4%	2.4%	3.3%
Ind. Prod., Mfg.	4.6	3.8	4.6	2.8	4.5
CPI	3.3	3.6	2.8	2.9	3.2
After-Tax Profits*	10.9E	6.9	7.4	15.1E	5.0
Unemployment	5.3	5.3	5.1	5.4	5.1

* Excluding inventory profits; adjusted for depreciation distortions.

TO: Gene Sperling
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FROM: Gaia Federiconi
Goldman, Sachs & Co.

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RE:

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**Investment
Research**

DATE: Mar 14, 1997

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BS	Bearer Shares	ED	Equity Derivatives	OS	Ordinary Shares
CD	Convertible Debentures	ES	Equity Securities	PC	Participating Certificates
CFF	Convertible Preferreds	FR RS	Foreign Registered Shares	RBS	Registered Bearer Shares
CLA	Class A Shares	G	Genussschein	RS	Registered Shares
CLB	Class B Shares	Gds	Global Depositary Receipts/Shrs	ZC	Zero Coupon Convertibles
CS	Common Stock	New CLA	New Class A Special Shares		

CPF(RTRSY) Newco Corp. convertible preferred convertible into Reuters ordinary shares

EC(RTRSY) United News Euro convertibles convertible into Reuters ordinary shares

EC(ENT) Elf Aquitaine Euro convertibles convertible into Enterprise Corp. ordinary shares

EC(MMM) D&K Euro convertibles convertible into Minnesota Mining & Mfg common stock

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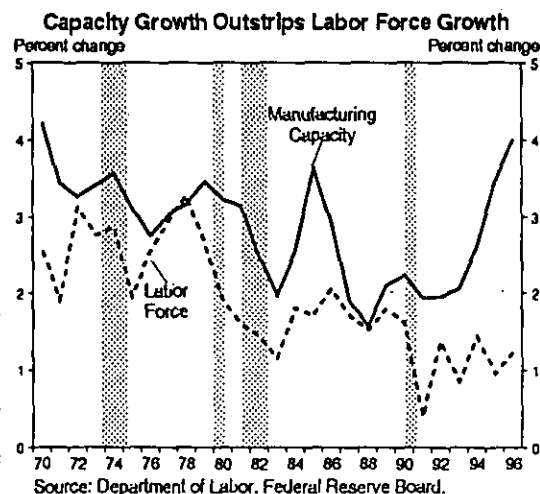
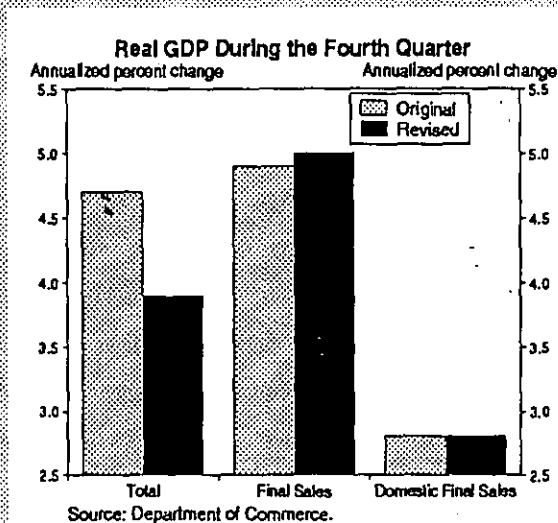
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U.S. Economics Analyst

Capital Spending: Inflation's Balance Wheel

- U.S. financial markets are taking more seriously Chairman Greenspan's warnings that continued strong growth and signs of rising labor-market stress may provoke credit tightening, now that he has said more explicitly that signs of higher inflation are not a prerequisite to such a rate rise.
- It remains a very close judgment as to whether or not the Fed will hike rates as soon as the March 25 FOMC meeting. Data due next week on labor market developments and factory conditions will likely tip the balance.
- Meanwhile, a markdown of fourth-quarter GDP growth, stemming entirely from reductions in inventory accumulation, means that a higher growth pace can now be expected in the first quarter of 1997. We have moved our growth target for this period from 1.8% to 2.5%, raising the expected first-half gain to 3.0%.
- One key factor behind benign inflation has been the surge in capacity growth that has resulted from strength in capital spending. Its traditional role as inflation's balance wheel has been enhanced in the Brave New Business Cycle, which stimulates business investment and features faster deliveries of capital equipment.
- Inflation has also benefited from sharp declines in computer prices and the fact that imports, rather than domestic production, account for almost all of the incremental capital spending since 1990. But inflation is apt to turn up in 1997, albeit at a gradual pace, as productivity gains fail to fill the gap between strong growth in output and slow growth in the labor force.



Trade Recommendations

- Stay long the June '97/June '98 Eurodollar futures calendar spread, raising stops to a close below 50 basis points and retaining a target of 90 basis points.
- Stay short December '97 Euro futures, moving stop down to a close above 94.00 from 94.15.
- Set shorts in June T-bond futures at 111.08, with a stop on a close above 112.16.

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**Issue No: 97/9
February 28, 1997**

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I. Weekly Wrapup

Economic and Market Overview

Bond and stock prices swooned in the wake of Fed Chairman Greenspan's "Humphrey-Hawkins" testimony, in which he cautioned that a preemptive tightening of monetary policy should not be ruled out. The re-pricing of the bond market to reflect some risk of a rate rise next month is entirely appropriate in our view, since we continue to assess the probability of such a move at close to 50%.

The latest economic reports have been virtually uniform in suggesting a continuation of sturdy expansion in demand and production. The Conference Board's confidence index for February (118.4) was essentially steady versus the 87-month high reached the prior month. Such high confidence is substantially tied to a perception of robust job availability, which seems justified in view of the strikingly low volume of first-time unemployment claims. Durable-goods orders posted a larger-than-expected jump in January, up 3.6% overall and 4.8% outside the volatile defense and aircraft categories. These gains completely reversed large declines over the previous two months. Unfilled order backlogs also rose steeply (+0.8%), implying pressure on factories to accelerate output. An uptick in the Chicago Purchasing Managers Index (to 56.2%) fits this pattern.

Revisions to fourth-quarter GDP echoed these soundings of firm business conditions. Though overall growth was revised down, from 4.7% to 3.9%, all of the reduction derived from a slower stock accumulation rate. Leaner inventories suggest that

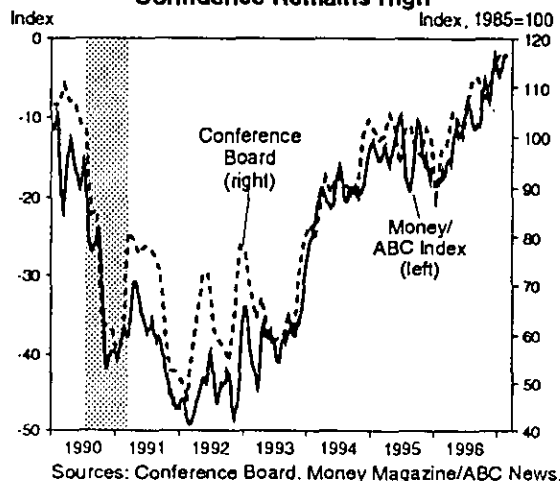
more growth can now be expected in the first quarter. Thus, we have revised up our GDP growth estimate for this period, from 1.8% to 2.5% annualized.

Federal Reserve Policy

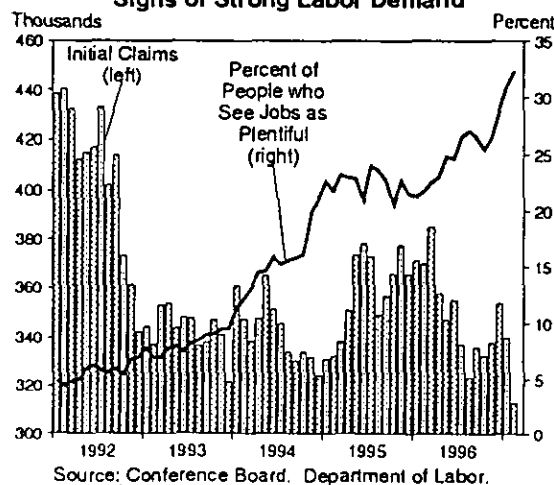
Chairman Greenspan has clearly signaled that he and other senior central bankers are creeping closer to a short-term rate increase. In his report to Congress, Greenspan offered an outlook for continued firm U.S. economic growth with upside risks to core inflation measures, especially if labor markets continue to tighten and workers begin to demand greater wage and benefit awards. Of particular note were the Fed chief's remarks that some of the main forces suppressing wage and price gains in recent quarters—job insecurity, corporate profit margin expansion, and a rising dollar exchange rate—may now be waning, as well as his statement that even a small inflation pickup must not be tolerated. The latter comment underscores the Fed's willingness to act before clear signs of faster price inflation emerge.

Coming reports on manufacturing activity and broad employment conditions will be of great importance in the central bank's decisions on interest rates next month. Given Chairman Greenspan's obvious focus on labor market developments, market participants are advised to pay close attention to both the size and the composition of the unemployed labor pool. A sharp drop in the unemployment rate or further evidence of a rise in the number of people voluntarily leaving jobs could tilt the balance in favor of an early start to the tightening process.

Confidence Remains High



Signs of Strong Labor Demand





Fiscal and Political Developments

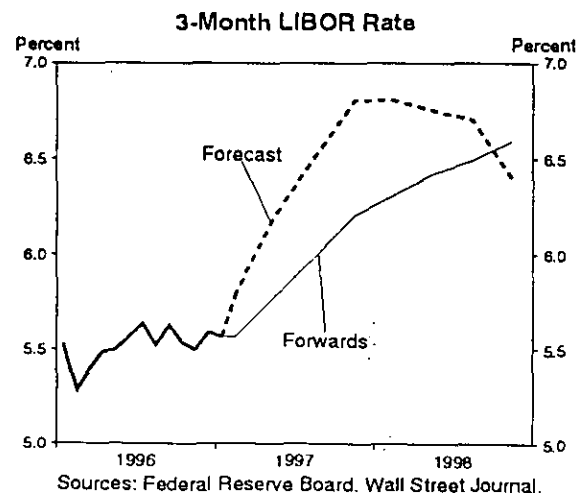
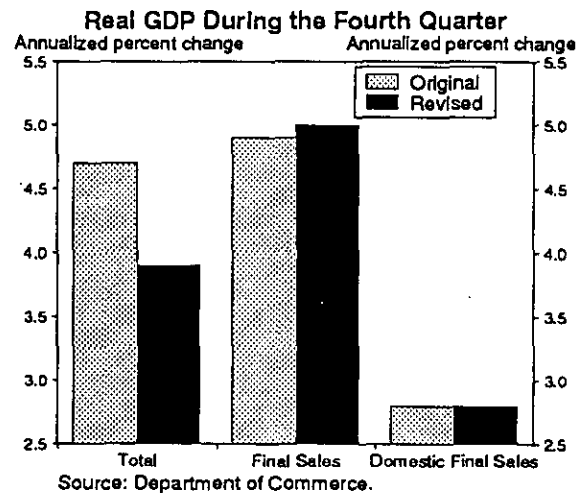
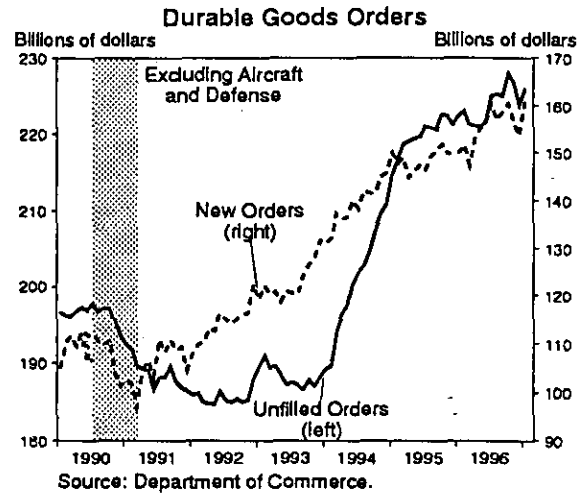
While a bipartisan deal to balance the budget remains likely, it does not look like this will be achieved before summer. Congressional leaders appear to be having a hard time coordinating the budget-writing effort, with top House members pursuing different agendas. Many Republican lawmakers may refuse to support any deal that does not contain a large net tax cut. A gap of more than \$60 billion exists between the fiscal 2002 deficit estimates of the White House and the Congressional Budget Office, and this must be bridged in a way that satisfies GOP conservatives while also allowing room for the steeper tax reductions they seek. On the Democratic side, political sensitivities related to the next presidential race may constrain flexibility. House Minority Leader Richard Gephardt (D-Missouri), a prospective challenger for Vice President Albert Gore in 2000, is refusing to take part in efforts to modify inflation indexation for the purpose of restraining growth in Social Security and other entitlement outlays. His stance may deter the Administration from supporting inclusion of a CPI adjustment in a budget accord.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Forward rates in the Eurodollar market once again reflect some risk of a Fed monetary tightening by midyear, but still not enough in our view to incorporate the distinctly more negative tone of Chairman Greenspan's comments and the strong forward momentum in economic activity suggested by recent indicators. Thus, we continue to recommend an outright short stance in December 1997 Euros, with stops reduced from 94.15 to 94.00 on the grounds that the market should not recover above levels that prevailed before the Fed chairman spoke. Similarly, long June 1997/June 1998 calendar spread positions should be retained, because coming economic reports should imply sturdy expansion, underscoring the potential for a sizeable cumulative rate rise over the next year. Raise stops for the calendar spread from 35 to 50 basis points.

We also sense that the tide has turned toward higher yields in the long duration sector of the market. Therefore, we would look for an opportunity to sell bonds at prices moderately above those which now prevail. Set shorts in June bond contracts on a rise to or above 111.08, with a stop on a close above 112.16.



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II. Capital Spending: Inflation's Balance Wheel

Benign inflation has certainly been the hallmark of the current business expansion, which features declining core rates of inflation in both consumer and producer prices on the eve of its sixth anniversary. In no small part, this is due to strong growth in capital spending, which so far has forestalled the emergence of serious inflationary constraints on U.S. capacity.

The notion that capital spending helps keep inflation under control, by expanding capacity, is nothing new. However, in the United States this role has been enhanced in recent years by various structural changes that have reduced the frequency of recessions—a regime we have termed the Brave New Business Cycle.¹ In this setting, the prospect of longer business expansions is apt to stimulate capital spending, while shorter delivery times for capital goods should help companies avert capacity constraints. Declining computer prices and rising import penetration in the capital goods sector have also reinforced the role of capital spending as an inflation preventative.

However, strong capital spending has not immunized the U.S. economy from inflation. Rapid growth in capacity provides no guarantee that productivity gains will fill the large gap between growth rates of output and labor input. Thus, we continue to expect inflation to turn up in 1997, albeit very gradually.

It also appears that year-to-year growth in capital spending has passed its peak in this business expansion. Rapid growth in capacity—4% per year in manufacturing and perhaps 3% overall—sets the stage for a slowdown over the next year or two, and it creates a clear risk of pronounced weakness in the unlikely event of a recession. But this is not necessarily bad news for U.S. capital goods producers, whose business has become increasingly international.

Inflation's Balance Wheel

Capital spending—defined as total business outlays on plant and equipment—is inherently less inflationary than any other form of expenditure. This is because it not only draws on current capacity but does so for the purpose of expanding future capacity.

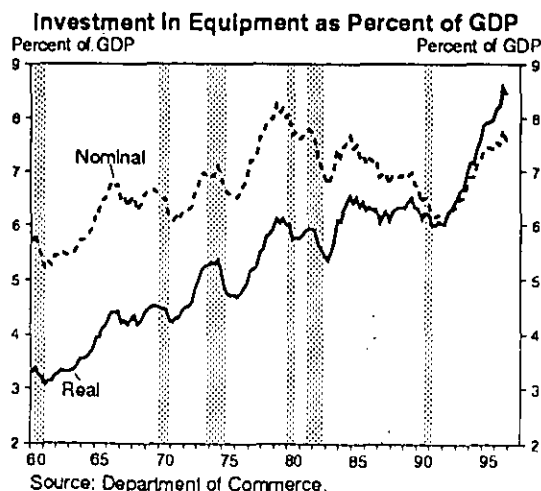
Thus, capital spending has always served as a balance wheel of sorts for inflation.

In our view, the advent of the Brave New Business Cycle has enhanced this role in four ways:

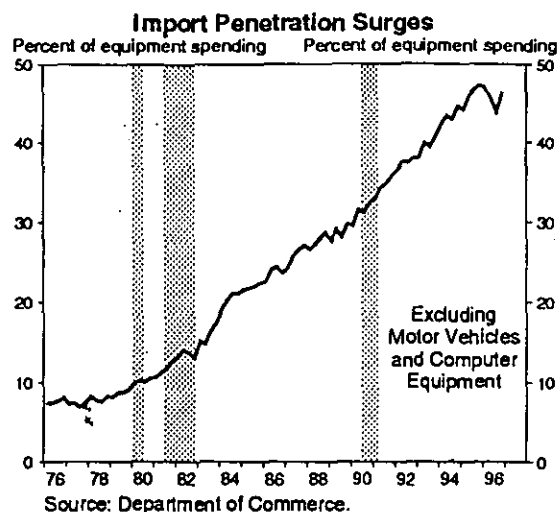
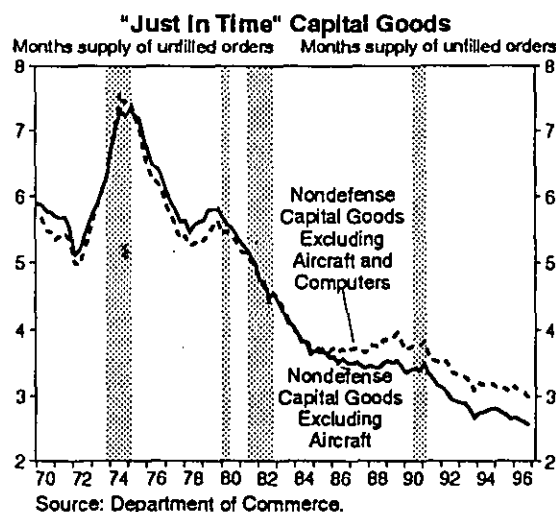
1. Over time, capital spending is apt to rise as a percentage of real GDP.

There are two reasons for this. First, cutting labor costs and keeping them under tight control has been a major motivation for the changes in corporate behavior that underlie the Brave New Business Cycle. One way to accomplish this objective is to provide a leaner work force with more capital per worker—that is, to invest more intensively in plant and equipment. Second, companies will be more willing to commit the funds needed for capital investment once they develop the confidence that business expansions will last longer.

On the surface, this does not appear to have happened. Since the last business cycle peak in the summer of 1990, real business spending has averaged 9.8% of real GDP, slightly less than the 10.0% average of the prior two cycles despite strong growth in recent years. But this is mainly due to the prolonged contraction in outlays for structures following the repeal of overly generous tax incentives in 1986. Outlays for business equipment have escalated sharply as a percentage of GDP, at least in real terms. Most of this escalation reflects the acquisition of computers and related equipment; however, even for other types of equipment the ratio of real outlays to real GDP has moved up slightly.



¹ For a detailed analysis, see William C. Dudley and Edward F. McKelvey, *The Brave New Business Cycle: No Recession in Sight*, January 1997.

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2. Capital equipment is getting cheaper, at least in relative terms.

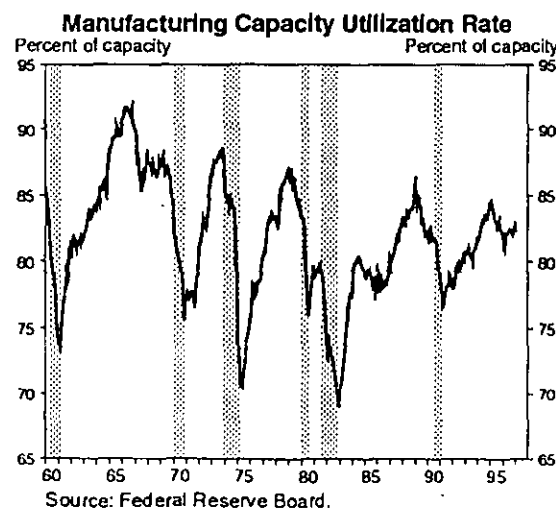
When it comes to nominal spending, the story is quite different. Even for equipment, nominal outlays have slipped relative to GDP—to 6.8% on average in this cycle from 7.2% in the preceding two cycles. This divergence reflects the 13.2%-per-year rate at which the deflator for computers and peripherals has been sliding, which has virtually offset the 2.8% annualized increase in prices of other types of equipment. While the difficulty of measuring the prices of computers cautions against putting too much confidence in the precision of this offset—or, for that matter, in the recorded strength of real capital spending—the basic point is clear: By investing heavily in computers, U.S. business firms have gotten a big bang for their investment buck and, in the process, helped contain U.S. inflation by steering the

composition of national expenditure toward items whose prices have been falling sharply.

3. Delivery times for capital goods are shorter.

In the 1970s, the ratio of unfilled orders to shipments of nondefense capital goods (other than aircraft) averaged 6.1, indicating an average delivery time of slightly more than 6 months. By 1996, this ratio had fallen to less than 3 months. While part of this downshift represents the shift toward computers and peripherals, which have short delivery times, the bulk of it represents faster delivery for other types of equipment. Thus, companies can bring capital equipment on line more quickly to alleviate capacity constraints as they begin to emerge.

The benefits of this are evident in the smoother path that capacity utilization has followed in recent years. Peaks in utilization have been progressively lower, and in the 1990s the standard deviation of quarterly changes in utilization has been cut by more than half—to 0.8 percentage points from 1.7 points in the prior two decades.



4. Capital spending has placed hardly any drain on existing domestic capacity.

Finally, one of the driving forces behind the emergence of the Brave New Business Cycle has been the rise in global competition, which has added an extra element of discipline to pricing. Nowhere is global competition more evident in the U.S. economy than in the capital goods sector, where the import penetration rate has shot up from about 31% in

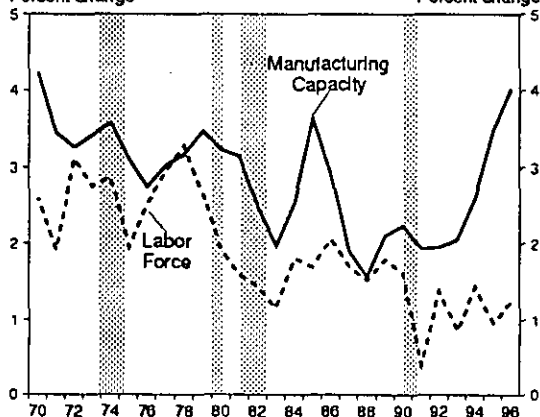


1990—already well above average—to 46% in 1996.² One implication of this surge in import penetration is that capital spending has placed almost no demand on domestic productive resources in the 1990s. This runs counter to the common perception that it has been a big growth driver. Once the increase in imports is netted out, the contribution of capital spending to real GDP growth in this expansion has been virtually nil. In essence, the benefits of contained inflation have been realized without the downside of draining existing capacity. Put differently, this decade's expansion of U.S. capacity has been accomplished almost entirely by importing excess capacity from abroad.

No Immunity From Labor Cost Pressures

Can capital spending continue to shield the U.S. economy from the labor-cost pressures that are slowly building? Probably not, because rapid capacity growth does not guarantee that productivity gains will fill the gap between growth rates in output and labor input. Although Federal Reserve figures indicate that manufacturing capacity grew 4% in 1996, the sustainable growth in the labor force is only about 1%. Thus, unless the economy slows from its current 3% trend, productivity growth must rise about 2% per year—more than double the current trend—to avert an acceleration in unit labor costs. Otherwise, inflation is apt to rise at least modestly as companies attempt to defend profit margins.

Capacity Growth Outstrips Labor Force Growth
Percent change



Source: Department of Labor, Federal Reserve Board.

Peak Growth Rates in Capital Spending

	Periods of Expansion				
	61Q1-69Q4	70Q4-73Q4	75Q1-80Q1	82Q4-90Q3	91Q1-Current
Qtrs Ahead of NBER Peak	16	1	4	25	N/A
Qtrs from Last NBER Trough	19	11	16	6	16

Risks Tilt Toward Slower Capital Spending

Rapid growth in capacity sets the stage for a slowing in business investment growth over the next year or two. Already, factory output can rise 4% per year without causing utilization to increase. Up-to-date figures for the total nonresidential capital stock are not available, but if past relationships hold, then the 3% real GDP growth we envision will not boost the utilization of existing capacity materially, and next year's growth slowdown will almost surely reduce utilization.

Under these circumstances, it seems likely that the peak growth rate for real capital spending in this expansion has passed. This underscores a change in the pattern of capital spending in the Brave New Business Cycle: Whereas growth in such spending has normally peaked toward the end of shorter expansions—hence the classification of capital goods stocks as “deep cyclicals”—in longer expansions, growth typically peaks well before the cycle peak in total output, normally in the fourth or fifth year. In the new regime, growth in capital spending will probably ebb during the late phase of an expansion, and there is a clear risk that recessions will provoke deeper declines in capital spending because capacity growth will generally be high.

Does this mean that investment in U.S. capital goods producers is unwarranted? Not necessarily. While soaring imports of capital goods have accounted for almost all of this decade's surge in equipment outlays by U.S. firms, growth in real exports of capital equipment has also been phenomenal, averaging 12% per year between 1990 and 1996. Thus, the future success of these companies increasingly lies in the growth of our major trading partners, where the best news on investment still lies ahead.

Ed McKelvey

² This calculation excludes computers and motor vehicles because imports of these items cannot be readily distinguished between business and consumer use.

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Key U.S. Economic Data

	Latest Monthly Data				6 Mo	12 Mo	Next
	'97 Feb	'97 Jan	'96 Dec	'96 Nov	Trend	Trend	Release
Nonfarm Payrolls (ch. Thousands)	--	271	261	181	209	246	Mar 7
Unemployment Rate (%)	--	5.4	5.3	5.3	5.3	5.4	
Index of Hours Worked (% ch)	--	-1.7	0.8	0.8	1.3	4.0	
Average Hourly Earnings (% ch)	--	0.1	0.5	0.8	4.3	3.8	
Producer price finished goods index (% ch)	--	-0.3	0.6	0.2	2.8	2.5	Mar 14
Excluding food and energy	--	0.0	0.1	0.1	0.4	0.6	
Consumer price index (% ch)	--	0.1	0.3	0.3	2.9	3.0	Mar 19
Excluding food and energy (% ch)	--	0.1	0.2	0.2	2.3	2.5	
Retail sales (% ch)	--	0.6	0.3	-0.1	4.3	4.9	Mar 13
Excluding motor vehicles (% ch)	--	0.4	0.0	0.2	3.0	4.6	
Industrial Production (% ch)	--	0.0	0.5	0.8	3.9	4.8	Mar 14
Manufacturing	--	-0.3	0.8	0.8	3.6	5.1	
Capacity utilization (%)	--	83.3	83.5	83.4	83.3	83.2	Mar 14
Manufacturing	--	82.2	82.7	82.4	82.3	82.2	
Housing Starts (annual rate, thousands)	--	1350	1323	1486	1425	1466	Mar 18
Single-family	--	1108	1005	1133	1120	1150	
Trade balance (billions, monthly)	--	--	-10.3	-7.9	-10.0	-9.4	Mar 20
Merchandise	--	--	-16.6	-14.3	-16.1	-15.5	
Factory Orders (% ch)	--	--	-1.3	-0.5	2.4	13.2	Mar 6
Durable Goods	--	3.6	-1.8	-1.7	2.8	4.5	Mar 26
Personal Income (% ch)	--	--	0.8	0.6	5.6	5.9	Mar 3
Wages and Salaries	--	--	1.2	0.8	6.3	6.9	
Purchasing Managers' Index (%)	--	52.0	53.8	52.4	52.0	50.7	Mar 3
Consumer Sentiment U Mich (Feb 86=100)	99.7	97.4	96.9	99.2	97.4	95.2	Mar 28
Conference Board (1985=100)	118.4	118.7	114.2	109.5	113.3	108.8	Mar 25

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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Goldman Sachs**U.S. Calendar****Focus for the Week Ahead**

- Payroll job growth likely slowed in February, due in part to depressing influences from unusually powerful seasonal adjustments (March 7). Other statistics in the monthly employment report should be relatively strong, however; in particular, hours worked are expected to rebound sharply, unemployment seems poised to decline at least 0.1%, and year-to-year growth in average hourly earnings may approach 4.0%.
- The national purchasing managers survey probably will show a pickup in manufacturing activity this month, led by gains in new orders (March 3).
- Personal spending appears to have risen sharply at the outset of 1997, temporarily outstripping income growth, which likely was dampened by poor weather in the western part of the country (March 3).
- Fed Chairman Greenspan returns to Capitol Hill for the final half of his semiannual monetary policy report (March 5). Although his prepared statement will be the same as that delivered this week, the Chairman's views on key issues may be clarified further in the question-and-answer session with House panel members.

Economic Releases and Other Events

Date	Time	Indicator	Estimate		
			GS	Consensus	Last Report
Mon Mar 3	8:30	Personal Income (Jan)	+0.4%	+0.1%	+0.8%
	8:30	Personal Consumption (Jan)	+0.7%	+0.5%	+0.5%
	10:00	Purchasing Managers Index (Feb)	53.5%	53.0%	52.0%
	10:00	Construction Spending (Jan)	-0.5%	+0.1%	-0.7%
		Domestic Motor Vehicle Sales (Feb)	13.0M	13.3M	13.6M
Tue Mar 4	10:00	New Home Sales (Jan)	-8.7%	-2.9%	-1.0%
	10:00	Leading Indicators (Jan)	+0.2%	+0.1%	+0.1%
Thu Mar 6	10:00	Factory Orders (Jan)	+2.3%	+0.7%	-1.3%
Fri Mar 7	8:30	Civilian Unemployment Rate (Feb)	5.3%	5.3%	5.4%
	8:30	Nonfarm Payroll Employment (Feb)	175,000	230,000	271,000
	3:00	Consumer Credit (Jan)	+\$6.0 bil	+\$5.5 bil	+\$4.9 bil

- Chairman Greenspan Delivers Monetary Policy Testimony To House Banking Subcommittee (Wed, Mar 5, 2:00)

- Chain-Store Sales Results (Thu, Mar 6)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	5.8%	6.2%	6.8%
Forward	5.7	5.9	6.3
2 Yr T-Note	6.2	6.5	7.0
Forward	6.2	6.4	6.5
10 Yr T-Note	6.7	7.0	7.2
Forward	6.6	6.7	6.8

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.9%	2.5%	3.4%	2.5%	2.9%
Ind. Prod., Mfg.	3.7	5.5	4.4	2.7	4.2
CPI	3.2	3.5	2.8	2.9	3.2
After-Tax Profits*	10.9E	6.7	7.3	15.1E	4.9
Unemployment	5.3	5.3	5.1	5.4	5.1

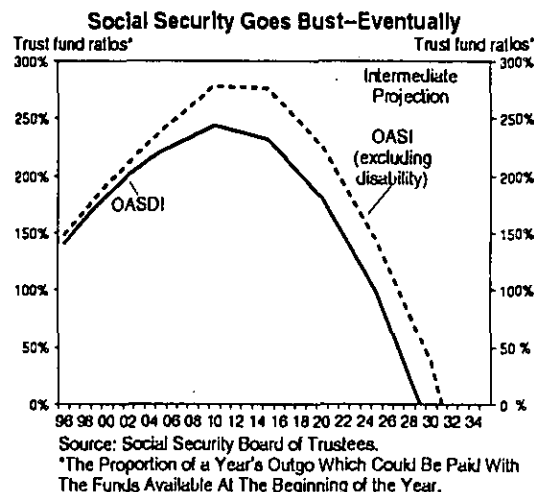
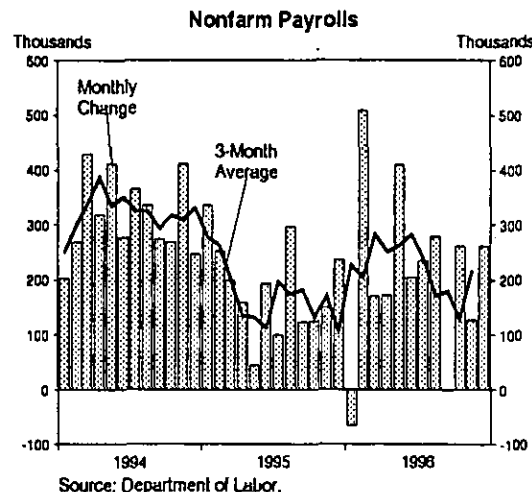
* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

Social Security Reform: No Free Lunch

- An unambiguously strong employment report for December, showing substantial gains in nonfarm payrolls, work weeks, and wages, is just the latest sign that the U.S. economy was gaining strength at yearend. There is a clear risk that our 3.6% estimate for fourth-quarter real GDP growth, recently revised from 3.0%, may be too low.
- So far, there is no clear evidence that pressures on wages and energy prices are feeding through to other prices. But this is an issue that will surely be on the minds of Fed officials as they approach the next FOMC meeting on February 4-5. In this regard, testimony by Chairman Greenspan slated for January 21 will be a key event in gauging the central bank's assessment of inflation risks.
- Recommendations by the Social Security Advisory Council to permit investment of Social Security funds in equities would surely raise equity prices if and when such measures were adopted. But part of this impact would be offset by interest rate increases required to attract buyers for Treasury debt that otherwise would be held in the OASDI Trust Fund.
- A more critical defect of the proposals advanced by the Council is the lack of significant new saving to help fund a pay-as-you-go system as the ratio of workers to retirees declines. Given the lack of both political urgency and a consensus on how to solve the Social Security problem, investors should not expect resolution of this issue anytime soon.



Trade Recommendations

- Stay short the Dec '97 Euro position triggered on break of 93.78, with a target of 93.40 and cover on a close above 93.90.
- Stay short March '97 T-bond futures, with a target of 109.00. Lower stop to a close above 111.16, from 113.00.

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**Issue No: 97/2
January 10, 1997**

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I. Weekly Wrapup

Economic and Market Overview

U.S. bond yields moved up this week as evidence of a substantial acceleration in real growth during the final quarter of 1996 continued to mount. This evidence culminated in a job report for December that was strong across the board. Payrolls rose 262,000 last month from a base that was revised up 46,000, and the latest job gains were widespread across industries. Work weeks lengthened 0.3 of an hour, both overall and in manufacturing. As a result, hours worked in the private nonfarm sector rose at a 3¼% annual rate last quarter, consistent with growth in real GDP of 3½%-4% or possibly more. The report also confirmed that unemployment, unchanged from a downward-revised 5.3%, is low enough to put upward pressure on wage inflation. Average hourly earnings jumped 0.5% in December, to a level 3.8% above the year-earlier reading—a six-year high.

So far, there is little evidence that wage acceleration is passing through to prices, a fact that gave the bond market brief relief on publication of benign December producer price data. Although finished goods prices jumped 0.5%—the third consecutive large increase—higher energy quotes (+3.1%) once again fueled most of the increase. Excluding food and energy, finished goods prices were only 0.1% higher, in line with the 0.6% year-to-year gain in this measure. Meanwhile, factory and wholesale stocks remain unusually low, implying that marginal demand gains should pass quickly through to production. Although factory stocks rose 0.4% in November, shipments and unfilled orders rose 0.7% and 0.4%, respectively. At the wholesale distribution level, inventories expanded

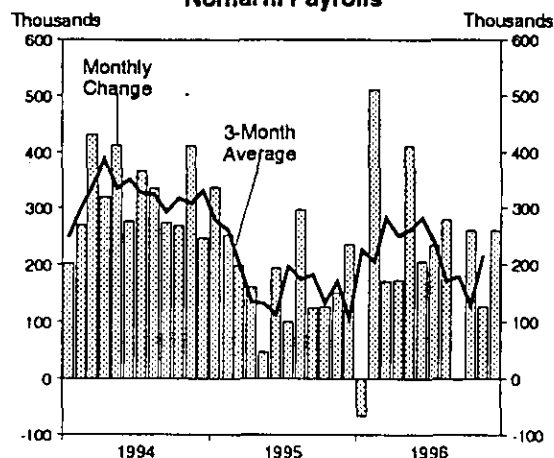
just 0.4% in October and November combined, while sales surged 1.6%. At 1.26, the inventory/sales ratio at wholesalers—which has shown no clear tendency to decline over the years—is now lower than at any time since early 1990.

In response to several recent robust economic reports, we have lifted our estimate of the fourth-quarter real GDP increase from 3.0% (annualized) to 3.6%, with risks skewed to the high side, as noted. Some of this extra output probably borrowed from the first quarter, but for the first half of 1997 on average we continue to look for real GDP to rise at a pace faster than 3%.

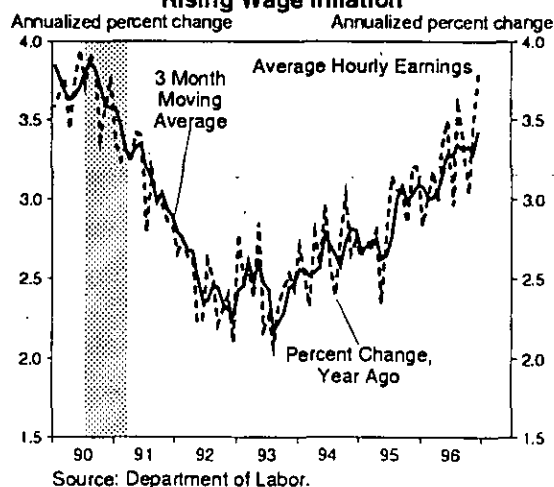
Federal Reserve Policy

Testimony on U.S. economic conditions by Chairman Greenspan before the Senate Budget Committee on January 21 looms as a potentially crucial event for financial markets. In recent months, the Fed chief has given virtually no public indication of how he assesses economic and inflation risks in the new year, so the potential for his remarks to contain surprising elements is fairly high. In light of widespread signs that the economy outperformed official expectations during the second half of 1996, gaining momentum at yearend, Mr. Greenspan may be getting concerned that the FOMC might soon need to act on the formal bias toward policy tightening—in place continuously for six months—to preserve its anti-inflation credibility. If so, then a sticky retail price report on January 14 could provide the motivation for the chairman to begin airing the fundamental case for greater credit restraint.

Nonfarm Payrolls



Rising Wage Inflation



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Fiscal and Political Developments

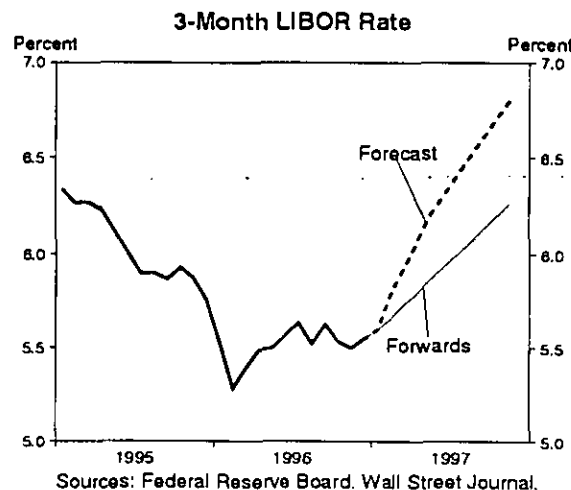
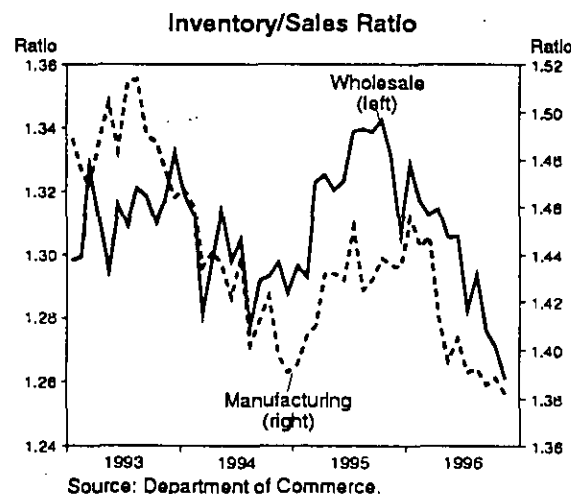
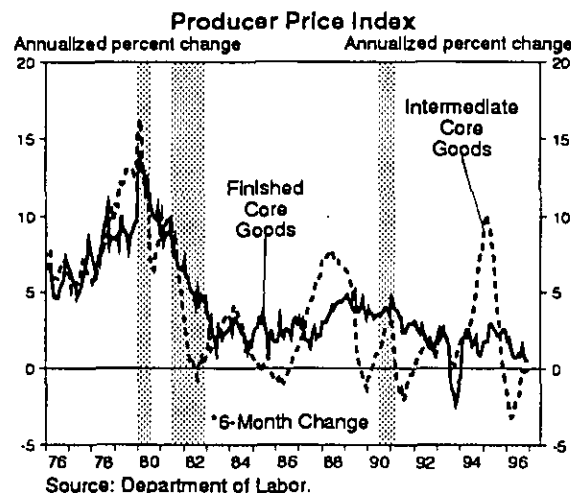
The federal fiscal debate will be less contentious this year than in 1995 or 1996. Even so, perceptions of partisan disagreement will probably grow in the near term. Ever since the U.S. Congress opened its 105th session on Tuesday, comments by several Republican leaders have underscored the likelihood that President Clinton's budget, slated for early February, will get a cool reception. Senate Majority Leader Trent Lott (R-Miss.) stated that Republicans will seek a \$124-\$150 billion overall tax cut over five years, about one and one-half times what the administration is likely to propose. Lott also said that any tax package would include a substantial cut in the capital gains levy, which no doubt will draw stiff opposition from many Democrats. In addition, Senate Budget Committee Chairman Pete Domenici (R-N.M.) strongly warned the president not to use accounting "gimmicks" and urged him to offer a plan featuring a gradual, steady decline in projected federal deficits rather than backloading all the spending reductions into 2001-2002. On current evidence, it appears that the White House will pass on most of this advice. If so, GOP leaders will be scrutinizing the president's priorities well into the spring.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

We would stay short the Dec '97 Euro position opened on the break of 93.78 following the job report for three reasons. First, risks on the coming week's retail sales and consumer price reports tilt to the high side of general expectations. Second, there is a growing risk that Greenspan will begin to prepare the markets for a tightening move when he testifies before Congress on January 21. Third, the Employment Cost Index report at the end of the month now looms very large as a factor influencing the thinking of Fed officials, and the risks are for a much larger gain in the fourth quarter given the strength in average hourly earnings. We would set a stop on a close above 93.90 and would maintain our target of 93.40.

On the long end, we would remain short March '97 T-bond futures, maintaining a target of 109.00, and dropping our stop to a close above 111.16 from 113.00. The bond market will be heavily influenced by expectations about the Fed. If sentiment shifts to expect a tightening by quarter end, then long bond yields could move back up to around 7%.



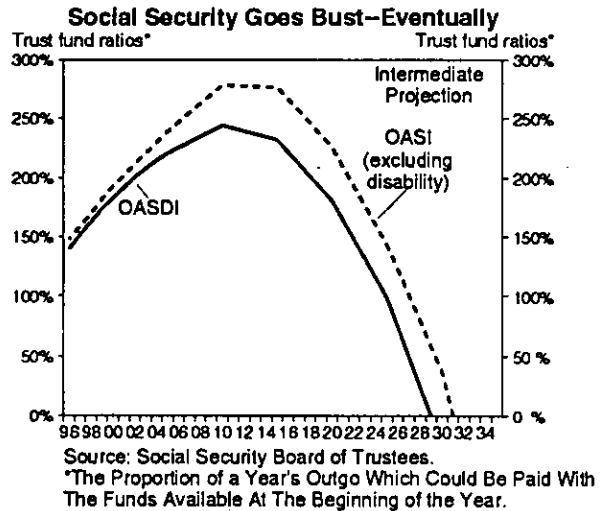


II. Social Security Reform: No Free Lunch

On January 6, the 1994-1996 Advisory Council on Social Security issued a number of recommendations to improve the nation's public pension system. The proposals address two related problems: First, the system is not actuarially in balance; although no imminent funding problem exists for Social Security per se, the retirement of the baby boom generation, which will begin in 2011, is projected to exhaust the Trust Fund by about 2030—well short of the 75-year planning horizon. Second, as a result, the public's confidence in Social Security has eroded as younger workers are increasingly skeptical that the program will provide them with adequate retirement income.

Of all the issues raised by the Council, the most far-reaching and controversial concerns the extent to which the investment of social security funds should be redirected from relatively low-yielding Treasury securities to higher-yielding private assets, especially equities. Such a move has obvious political appeal. By boosting the average prospective return on Social Security investments, it could close the funding gap without resort to the painful alternatives of reducing benefits and/or increasing taxes. At the same time, the prospect of higher returns in a more fully funded system would make Social Security look like a better deal to those now losing faith in the system.

For their part, investors are salivating at the prospect that a large influx of new cash will raise equity prices still further from already elevated levels. While it is reasonable to expect equity prices would be pushed higher by this new source of demand given the large volumes of funds involved, under two of the three plans yields on Treasury securities would also have to increase to entice new buyers for the Treasury securities that would otherwise be held by the Social Security trust funds. It is unlikely that the proposals would generate a sufficient increase in national saving to neutralize this upward rate pressure or to serve as the source of the resources necessary to provide a sounder footing for the financing of retirement benefits. Meanwhile, the reduced cost of equity capital would induce companies to deleverage their balance sheets further, thereby limiting the rise in equity prices. Investors looking for a quick boost to equity prices should also bear in mind that legislative resolution of the Social Security problem is years off, because it lacks both political urgency and a consensus solution.



Three Different Plans

The controversy about how far to "privatize" Social Security was underscored by a three-way split among the 13 members of the Council. Although the panel largely agreed on the notion that Social Security funds should be invested more broadly, as well as on many specific ways to improve the current system, it offered three separate plans, as follows:

1. **Maintenance of Benefits (MB) Plan.** The aim of this plan is to disturb the defined benefit nature of the existing Social Security program as little as possible. Thus, its focus is on making the current system actuarially sound by: (a) making all Social Security benefits taxable and depositing the tax proceeds in the OASDI trust funds; (b) steering the revenues from taxes on Social Security benefits now flowing to the Hospital Insurance Fund to the OASDI funds beginning sometime between 2010 and 2019; (c) extending coverage to state and local employees; (d) stretching the period for which benefits are computed from 35 to 38 years; and (e) boosting the 12.4% Social Security portion of the payroll tax by 1.6 percentage points in 2045. As part of this effort, this plan's advocates recommended further study of the possibility that up to 40% of the OASDI funds could eventually be invested in equities.
2. **Personal Saving Account (PSA) Plan.** At the other end of the spectrum, this proposal would transform a large chunk of the current Social Security system into a defined contribution plan



by diverting 5 percentage points of the payroll tax into mandatory retirement accounts, to be managed by beneficiaries under broad guidelines set forth by the government. The remaining 7.4% tax would finance a "floor of support" level of benefits. The transition cost of funding benefits under current rules for workers now older than 25 would be financed by a 1.52% increment to the payroll tax, to be levied over a 72-year period. Like the MB plan, this plan would cover state and local employees. It would also trim benefits by accelerating and extending already scheduled increases in the age of eligibility for benefits and making several other adjustments.

3. **Individual Account (IA) Plan.** In the middle, this plan would boost the payroll tax by 1.6 percentage points and use these funds to establish a defined contribution supplement to the current program, managed by the government along the lines of a 401(k) plan. This plan also includes state and local coverage, acceleration and extension of the age for benefits eligibility, and stretching the benefit computation period.

Equity Prices Rise, But So Do Interest Rates

There is a presumption in the financial community that adoption of the Council's proposals would cause equity prices to rise, perhaps significantly. This seems likely, at least for a transitional period, given the sheer magnitude of the potential reallocation of funds. Under the PSA plan, for example, the new individually managed accounts would have garnered about \$180 billion in 1996. If just half of this money had found its way into stocks, it would have absorbed almost all of the gross new equity issuance in 1996. Even the more moderate MB and IA proposals,

generating an estimated \$21 billion and \$28 billion in new annual equity investments respectively, would have made a significant dent in this new supply.

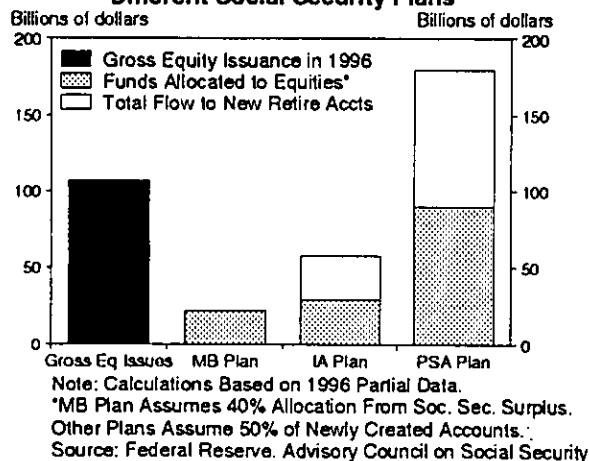
The flip side of this process is that buyers would have to be found for the Treasury securities that are now automatically placed in the Social Security trust fund, at least under the MB and PSA plans. (The IA plan does not entail reallocation of existing Social Security assets or future receipts.) The effect on the Treasury calendar could be huge—as much as \$180 billion per year in additional new offerings under the PSA plan. By comparison, marketable issues of Treasury notes and bonds totaled about \$580 billion in fiscal 1996. This large an increment to Treasury borrowing in the capital markets would almost surely push interest rates up, undermining part of the rise in equity prices.

The ultimate increase in equity prices would diminish somewhat further as a result of induced changes in corporate financing patterns. With the cost of equity capital falling further, U.S. firms would probably continue to delever their balance sheets. This suggests that a further impact would be a narrowing of credit spreads between corporate debt and Treasuries as the supply of corporate debt fell and the issuance of marketable public debt increased.

Little or No Increase in National Saving

In principle, the interest rate pressures we foresee could be alleviated, and perhaps avoided altogether, if changes in the Social Security program called forth enough new saving to fund the increased supply of Treasuries. This appears unlikely. In the MB plan, which probably has the greatest possibility of adoption, existing funds are merely reshuffled among alternative assets.

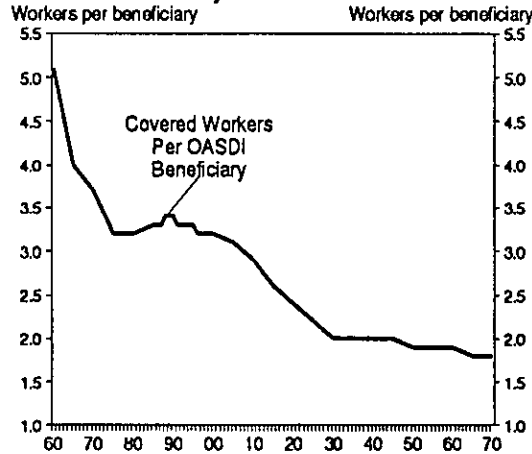
Potential Annual Flow to Equities Under Different Social Security Plans



By proposing immediate increases in payroll taxes (albeit for different purposes), the IA and PSA plans hold out some prospect of raising the national saving rate. This is because the additional taxes would reduce federal financing needs. If private saving remained unchanged, then overall national saving would rise. But this is a big "if" in view of the erosion of public confidence in Social Security that has occurred in recent years. To the extent that loss in confidence has prompted individuals to boost saving in an effort to fund their own retirement, then changes in Social Security deemed as significant improvements would have the opposite effect. In this regard, changes that engage individual beneficiaries most actively in the process, such as the IA and PSA



More Savings Required to Compensate For Baby Boom Retirement



Source: Social Security Board of Trustees.

plans, would be more likely to induce at least a partial offsetting decline in personal saving.

The impact on national saving is important not just because of its consequences for the prices of financial assets. Whether the plans result in a rise in national saving is critical in judging their likely success. Only if saving rises will the capital resources be created to help the country handle the surge in baby-boom retirees that will begin in about 15 years. Without a rise in national saving, changes to Social Security will not address this key problem: How to facilitate the transition of a pay-as-you-go system from more than 3 workers per retiree currently to about 2 workers per retiree by 2030? This is a particularly hard task if one must also keep any payroll tax increases small enough so not to disillusion the subsequent generation with poor implicit returns on their contributions into the system.

In this regard, we view proposals that merely would shift a portion of the trust fund into equities as a bit of a shell game. They are seductive to the policy makers because they allow the Social Security trust funds to project a higher expected return on assets, which helps inflate the projected trust fund balance. This in turn can postpone the day of projected insolvency and reduce the need for higher taxes—at least on paper. However, the higher projected return on equities is offset for the general economy by the upward pressure on interest rates. And the nation's ability to provide the resources to support the rising number of retirees is no greater than before because the shift does not raise savings and investment and, thus, the productive capacity of the economy.

Finally, we doubt that the Social Security Trust fund will actually realize the higher historical returns cited for equities versus Treasuries in the Council report—a margin of 4.7 percentage points per year—for two reasons. First, at the current level of equity prices, this equity risk premium is surely much smaller than 4.7 points. Although estimating this premium is fraught with difficulties, we would be surprised if the difference in expected annual returns were currently more than 2-3 points. In our view, part of the stock market's surge in recent years has been generated by shrinkage in the equity risk premium, presumably reflecting the less virulent nature of U.S. business cycles. Expansions are lasting longer, and inflation is behaving better much deeper into the cycle. Second, if the Social Security system were altered to funnel monies into equities, the equity market would move up in anticipation of this new source of funds. This would further reduce the equity risk premium, and hence the additional return on equities that the Social Security trust fund could earn. Because markets are inherently anticipatory, the trust fund would probably miss much, if not all, of the upsurge in equity prices that would be generated by its new demand.

No Solution Anytime Soon

The Advisory Council's report has focused financial market attention on the potential for a large infusion of Social Security funds into the equity market. But investors should bear in mind that Congress is not likely to act anytime soon, for two reasons:

1. **Social Security finances are not in dire straits at the moment.** As already noted, the OASDI Trust Fund is not projected to be depleted until about 2030. In contrast, the trustees of the Hospital Insurance Fund have projected that it will dry up in 2001. While the Council urged policy makers to act sooner rather than later on its Social Security proposals, it is a political fact of life that the squeaky wheel gets the grease.
2. **There is no clear consensus on how far to go in "privatizing" Social Security.** The fault lines evident in the Council's tripartite set of proposals attest eloquently to this basic fact. So does the muted response that the report has generated so far from the Administration and Capitol Hill. Until public opinion coalesces around a particular approach, which probably requires more of a crisis atmosphere than now prevails, the is apt to be little progress in reforming Social Security.

Bill Dudley

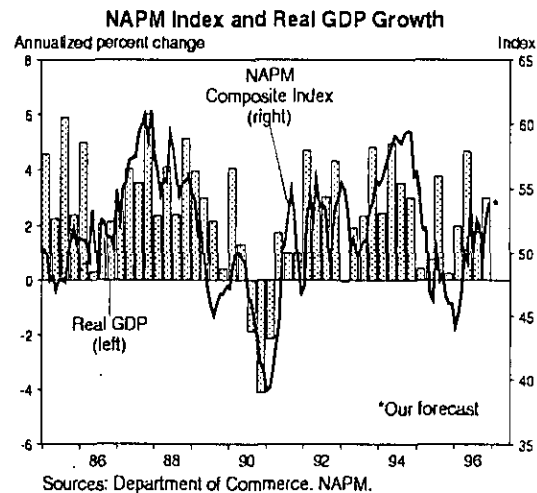
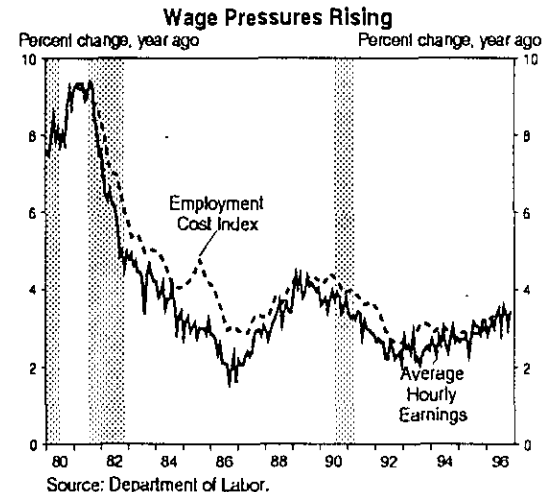
Ed McKelvey

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U.S. Economics Analyst

Four Issues for 1997

- Four issues are paramount in 1997: consumer spending, trade, inflation, and the budget outlook. Consumer spending and trade will be the major determinants of the economy's growth trajectory. If the economy grows at an above-trend pace, then inflation pressures are likely to intensify, forcing Fed officials to tighten monetary policy.
- Developments on the inflation front will be particularly important in influencing the interest rate environment. Not only would a pickup in inflation cause Fed officials to tighten monetary policy, but also a rise in inflationary pressures would damage the Fed's credibility, causing investors to demand a higher risk premium to hold longer-duration fixed-income assets.
- Yield curve risk premia will also be influenced by the outcome of the budget negotiations. Although the likelihood of a budget deal is high, the road to an agreement will probably be long and winding and the resulting amount of fiscal restraint very modest over the next few years.
- Data on new home sales, consumer confidence, the National Purchasing Managers' index, and construction spending were all very firm, reinforcing earlier signs that the economy is growing at an above-trend pace.
- This has increased the likelihood that Federal Reserve officials will need to tighten monetary policy in 1997. However, unless the forthcoming price reports indicate a meaningful uptick in inflationary pressures, Fed officials will probably be patient and wait until the March FOMC meeting or later before beginning to tighten.



Trade Recommendations

- Get short December '97 Eurodollars (currently 93.88) on a break below 93.78, with a target of 93.40.
- Reinstitute short position in March '97 bond future (currently 111.30) with a target of 109.00 and a stop on a close above 113.00.

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**Issue No: 97/1
January 3, 1997**

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I. Weekly Wrapup

Economic and Market Overview

U.S. securities prices fell steeply over recent days in response to news suggesting relatively buoyant business activity toward the end of 1996, which has regenerated concerns about possible Federal Reserve monetary tightening in the new year. For example, the National Association of Purchasing Management index for December rose to 54.0%, mostly due to a strengthening of new orders. Meanwhile, the housing and construction sectors are displaying sturdiness, with sales of new and existing homes up 14.2% and 1.8% in November, respectively, and real construction outlays rising by 1.7% in November. High housing stock turnover is an indication that monetary policy remains unrestrictive, and it may augur for further solid gains in personal spending on household durables. Prospects for at least respectable growth in consumption are also supported by confidence surveys, which remained in unusually high territory through yearend. In fact, the December poll by the Conference Board showed confidence at a seven-year peak, reflecting unusually upbeat assessments of job availability.

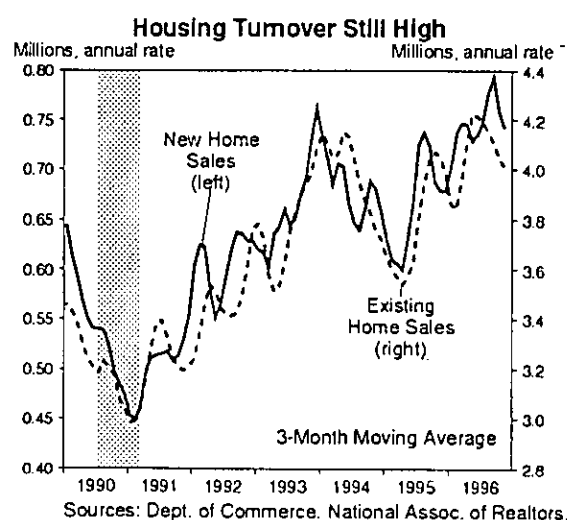
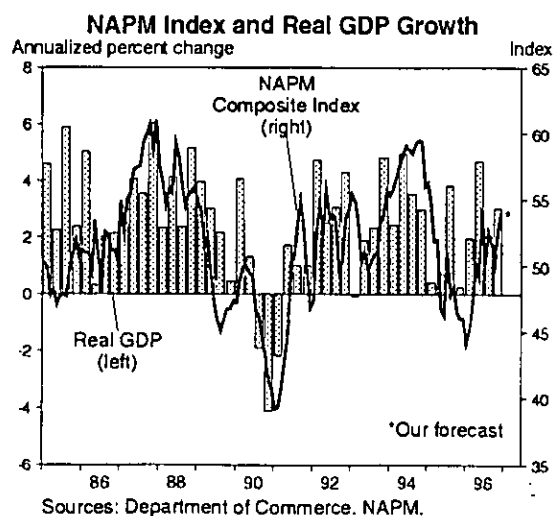
As yet, broad inflationary pressures have not yet appeared. The NAPM survey showed prices paid and vendor performance in relatively neutral territory, each between 51% and 52%. Given tight supplies of unemployed labor, however, as well as the gradual pickup in wage awards over the past two years, the risks remain tilted toward a creeping inflation in employment costs and retail prices so long as economic growth outpaces the long-term average.

Federal Reserve Policy

It would not be surprising if senior central bankers are growing more concerned that they may have underestimated the U.S. economy's forward momentum. We continue to believe, however, that no initial tightening is likely to occur before late March. Available fourth-quarter statistics on goods production, services consumption, and construction spending suggest that our 3.0% annualized growth outturn for that period is too low, and the firmness of indicators from late in the period raises a question as to whether the expansion might remain similarly solid in the first half of 1997. While there is little to suggest a developing inflation problem outside the energy arena, a steady escalation in wages and the virtually uninterrupted six-month upswing in crude oil prices could soon undermine the benign pricing environment that has existed since mid-1995. This suggests that the risk of Fed tightening within a few months is higher than generally believed.

Fiscal and Political Developments

Major elements in the forthcoming Clinton administration budget package will probably be leaked to the press over the next several weeks, before its official submission to Congress on February 3. During this period, it should become clear that movement toward a bipartisan deficit-cutting budget agreement will occur more slowly than many in the markets have hoped and anticipated. At this point, it appears doubtful that the President's budget proposals will depart materially from the last plan he endorsed, which offered virtually no fiscal





restraint in the near term in favor of steep and unspecified discretionary outlay cuts in the 2000-2002 interval. In addition, barring a last-minute change of heart, the new Clinton budget blueprint is unlikely to include a proposal to shave cost-of-living increases for federal benefits and income tax brackets, which is the option that would promise the greatest degree of long-range federal deficit restraint.

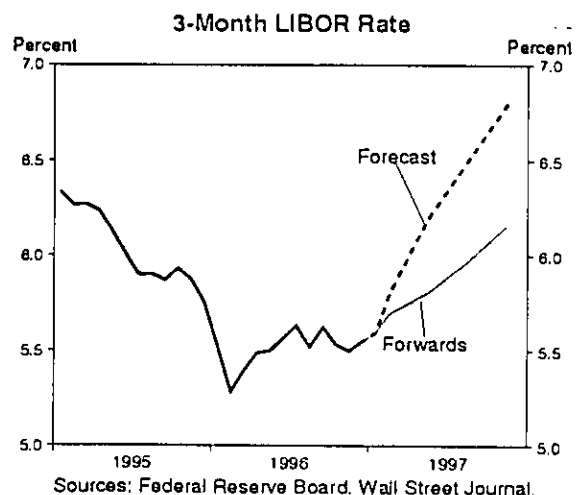
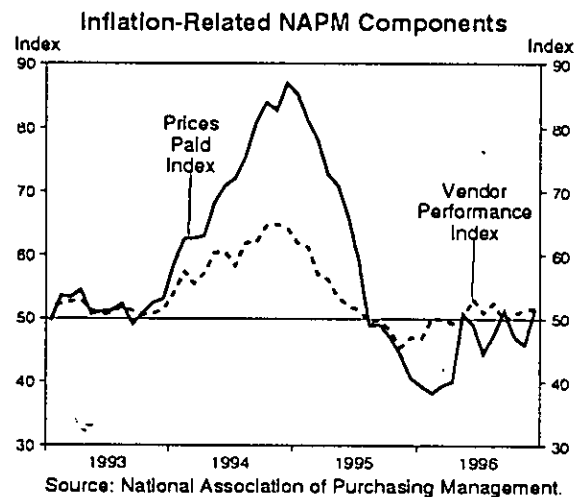
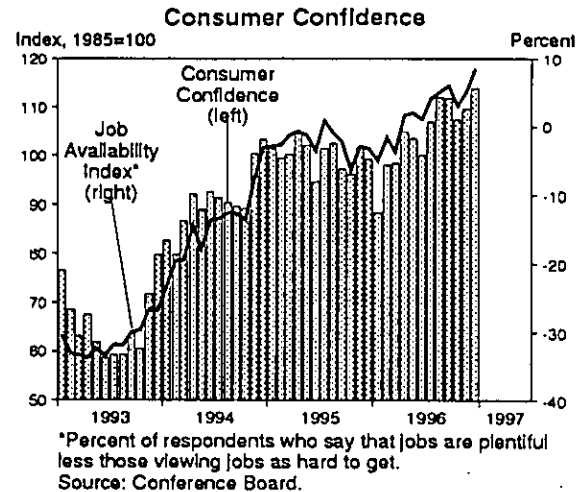
Republican Congressional leaders can be expected to express disappointment with the Clinton budget, especially its modest tax cut elements (which will probably exclude a broad capital gains reduction) and sleight-of-hand in medical entitlement program areas (moving some Medicare expenses out of the trust fund and into general budget accounts, without providing new revenues or material controls on program costs). Despite their protests, however, GOP lawmakers will be reluctant to engage in high-profile confrontation with the White House over federal finances, in view of their politically painful 1995-1996 experience. Hashing out the details of the next U.S. budget therefore will likely be a slow, deliberate process, possibly lasting many months as the normal legislative schedule is permitted to proceed.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Although bond yields are presently near the middle of the range we consider appropriate until it becomes clearer that Fed officials will need to tighten monetary policy, the decline in bond futures below the lowest prices witnessed in the prior selloff suggests that market participants are being forced to adjust their strategies from optimism toward neutrality or bearishness, a process that could take awhile longer and more price damage to complete. For this reason, we would advise a small short, with a tight stop (on a close above 113.00) in the March T-bond futures contract (currently 111.30) and a price target of 109.00.

The downward price trend has resumed in Eurodollar futures as well, and this should persist as expectations of future Fed tightening are revived, perhaps with the aid of cautionary commentary by top policy makers. Fed Chairman Greenspan's report on the economy to the Senate Budget Committee on January 21 could be a particular highlight in this regard. Shorts should be set in December 1997 Euros (currently 93.88) on a break of 93.78, with a target of 93.40.



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II. Four Issues for 1997

Four Issues to Focus on in 1997

Over the past year, cyclical forces represented by above-trend growth and rising wages have vied with secular issues such as prospects for budget restraint and a rise in the nation's pool of savings for the market's attention. Over the next year, this tug-of-war is likely to continue, with the cyclical side gradually gaining the upper hand, pushing interest rates higher.

As we see it, in 1997, the risks of monetary policy tightening significantly outweigh the prospects for monetary easing. This reflects three developments: 1) an economy that continues to operate at a high level of resource utilization, especially in terms of the labor market; 2) the prospects for continuation of above-trend growth that would tighten labor and manufacturing capacity further; and 3) increasing signs that tight labor markets are leading to a rise in wage pressures, which should gradually result in higher prices over time.

On the opposite side of the ledger, the prospects for a recession or a sustained growth slowdown appear to be very low: 1) Inventories are lean, with the significant overhang of inventories that developed in 1995 having been worked off by mid-1996; 2) Consumers have the wherewithal to sustain spending as favorable income and confidence trends remain intact; 3) Economic activity in the rest of the world (with the exception of Japan) appears likely to strengthen next year, diminishing the drag from trade that was felt throughout most of 1996; and 4) Fiscal

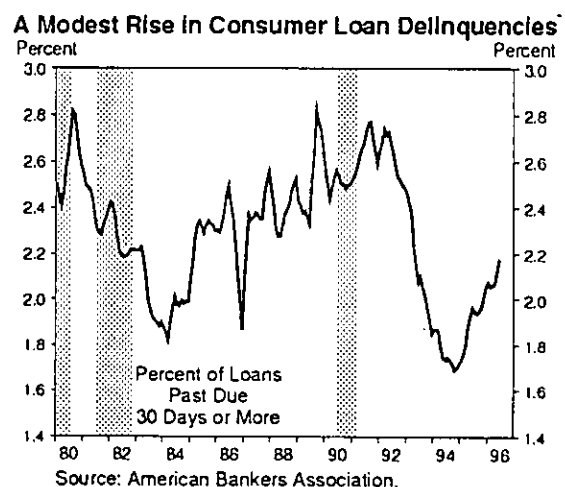
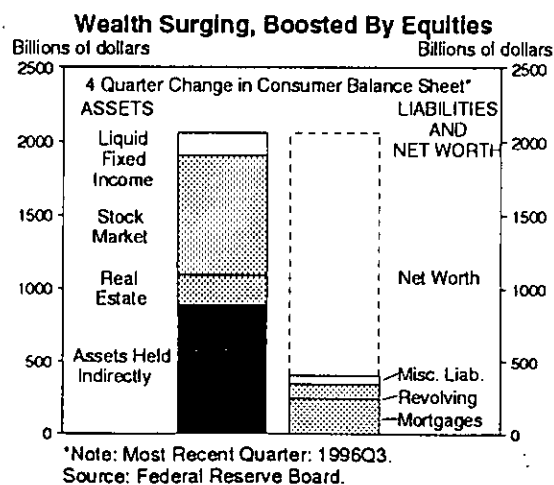
policy is unlikely to be restrictive in 1997, for the first time in several years.

Whether our view turns out to be correct depends mainly on how four issues evolve in 1997: 1) the strength of consumer demand; 2) the performance of the trade sector; 3) the behavior of wage inflation and its impact on prices; and 4) the budget outlook.

1. Consumer Spending

The willingness of consumers to spend continues to be the biggest source of disagreement among economists. The case for spending strength rests on the strength of income and employment trends, the high level of confidence, and the fact that the surging stock market has bolstered the household balance sheet. The case for weakness rests on the buildup of debt, the rise in loan delinquencies and bankruptcies, and the absence of significant pent-up demand for consumer durables and housing. To determine which side is right, two issues are paramount: Does the Q4 pickup in spending mean that the strong stock market gains are beginning to leak into the spending stream? Or will spending weaken anew and erode the favorable trends in income and confidence?

One surprise of 1996 was the fact that the strong stock market was accompanied by a rise in the household savings rate. If equity market gains start to cause households to increase their spending, the consequence will be greater growth in outlays than expected. A second surprise has been the persistent strength of payroll and income growth. For example,





over the past six months, monthly payroll employment gains have averaged 190,000 per month and real disposable income has risen at a 3.3% annual rate. If spending were to weaken, employment and income trends would suffer, further exacerbating the slowdown in spending.

The final tally on holiday spending may help settle this issue. After all, as such spending is largely discretionary, it will provide some evidence whether the run-up in equity prices or the climb in household debt is the predominant influence on household outlays.

2. U.S. Trade Performance

A second surprise in 1996 was the deterioration in the U.S. trade accounts. Although some of the widening in the U.S. trade balance can be explained on the basis of the large gap between domestic demand growth in the United States versus abroad, the persistence of trade deterioration in the third quarter at a time that domestic demand growth was slowing sharply suggests that this is not the only explanation. If the trade gap were to continue to widen, this could undermine U.S. income growth trends, because the income would flow to foreign producers and workers, rather than remain within the United States.

On balance, the outlook for trade in 1997 should be mainly determined by whether domestic demand growth abroad revives. The dollar's behavior is not likely to be particularly important for two reasons. First, U.S. trade performance is not very sensitive to modest changes in the dollar's valuation. Second, in 1996 the dollar appreciated only marginally on a trade-weighted basis, despite a hefty advance against the yen.

Domestic Demand Growth Correlations

	1996 Share of U.S. Exports (E)	Foreign Domestic Demand Growth		
		1995	1996E	1997E
Canada	22%	0.6%	2.0%	3.0%
Mexico	9	-6.9	2.5	3.0
Japan	11	2.2	4.6	1.1
European Union	20	2.2	1.1	2.1
Weighted by:				
'96 Export Share	—	0.3%	2.1%	2.4%

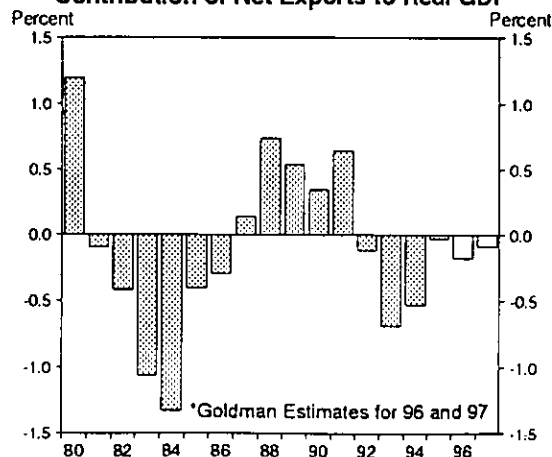
Source: Dept. of Commerce. Our estimates.

In terms of domestic demand growth abroad, we expect some improvement in 1997. Although Japanese demand is likely to slow sharply as fiscal policy is tightened, this should be more than offset by faster demand growth in Canada, Mexico, and Europe. Interest rates fell sharply throughout much of the world in 1996, and this should contribute to more buoyant economic activity in 1997.

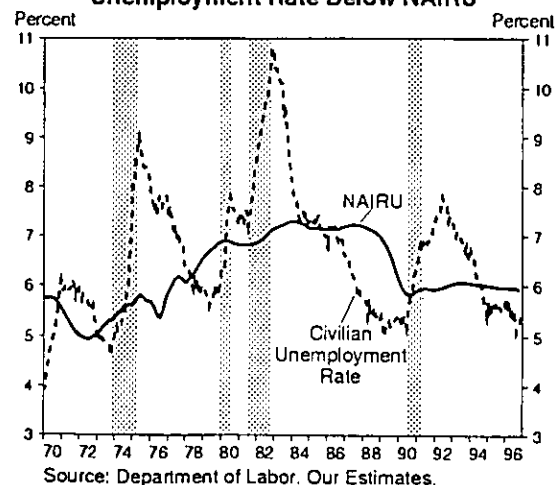
3. Wage Inflation and the Impact on Prices

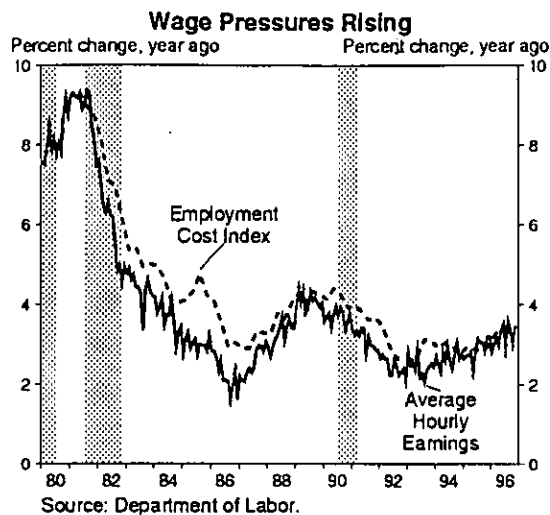
The general perception is that the relationship between tight labor markets and wage inflation has completely broken down. We remain very skeptical of that viewpoint. As we see it, wage inflation is behaving almost precisely as one might expect given the modest gap between our estimate of NAIRU (the non-accelerating inflation rate of unemployment) and the actual unemployment rate. What has clouded the picture are three special factors: 1) NAIRU is lower today than in the 1980s, which has reduced the size of the gap and the degree of upward pressure on wages; 2) Compensation cost inflation has been more muted because benefit cost inflation has slowed dramatically in line with the (forced) migration of workers from fee-for-service healthcare to managed care; and 3) The need for businesses to pass through wage

Contribution of Net Exports to Real GDP



Unemployment Rate Below NAIRU





increases has been muted by productivity growth, and their ability to raise prices has been constrained by foreign competition and the fact that capacity utilization rates are not unusually high.

Further gains in wage inflation appear assured, given the tightness of labor markets. More uncertain is whether businesses will be able to pass through such price increases. If economic activity picks up abroad as we expect, then this should help lessen international competitive pressures. On balance, we expect that businesses will be at least partially successful in this regard, leading to a modest uptick in inflationary pressures.

4. Outlook for the Budget

The budget outlook is an important aspect of the 1997 outlook as it will affect the risk premia that investors demand on longer-dated fixed income assets and, thus, will be an important determinant of bond yields. Meaningful fiscal restraint would allow monetary policy to be more accommodative over the long-term. Investors would anticipate this result, which would lead, all else equal, to lower long-term rates and a flattening of the yield curve.

Although the prospects for a budget agreement between the Clinton Administration and the Republican-controlled Congress appear quite bright, it is unlikely that progress toward a deal will be rapid or that a deal will result in significant fiscal restraint anytime soon. The Congressional Budget Office appears poised to project a significant lower baseline deficit (around \$150 billion) compared to May 1996, when the projected deficit was \$210 billion. This

means that the amount of fiscal restraint required to get to balance on paper will be significantly less than the amount of fiscal restraint over the past few years. This suggests that the Clinton administration will be able to balance the budget without resorting to the types of changes (e.g., adjustments to CPI-linked entitlement payments) that would have a big impact on the longer-term deficit outlook.

In evaluating any budget agreement, we would focus on four issues: 1) Is there an adjustment to the CPI for entitlements and tax bracket indexation; 2) Are the deficit cuts backloaded and/or temporary; 3) How much savings is generated by assuming that a balanced budget would result in lower interest rates and debt service costs; and 4) Are tax reductions large and potentially stimulative?

We also would be cautious about assuming that a balanced budget amendment will be enacted. Although the prospects for passage in the Senate have improved as the Republicans have increased their margin, they have diminished in the House, where the Republican majority has narrowed. Also, with the ability to wield a line-item veto, President Clinton has gained more leverage in convincing members of Congress to vote no. Finally, to be enacted, any amendment would have to be ratified by 38 state legislatures. That is likely to be a tall order, especially if state lawmakers begin to worry that balance might be achieved primarily at their expense via a reduction in federal block grants.

Other Issues

We view other issues such as the outlook for capital spending and the appetite of foreign investors for U.S. Treasury debt as less significant. That is because those outcomes will be determined mainly by how the general economic environment evolves. For example, if consumer spending is strong, pushing the economy to an above-trend growth pace, then capital spending is also likely to remain firm. In terms of foreign investors' appetite for Treasuries, we believe that it will be determined mainly by interest rate differentials and the credibility of fiscal and monetary policy. Although inflows at the 1996 rate seem unlikely, a big fall-off also seems improbable as interest rate differentials are likely to continue to favor the United States in 1997 and could even widen somewhat further.

Bill Dudley



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'96 Dec	'96 Nov	'96 Oct	'96 Sep			
Nonfarm Payrolls (ch. Thousands)	--	118	224	-2	177	208	Jan 10
Unemployment Rate (%)	--	5.4	5.2	5.2	5.3	5.4	
Index of Hours Worked (% ch)	--	0.4	-0.7	0.8	3.4	2.5	
Average Hourly Earnings (% ch)	--	0.8	-0.1	0.3	4.3	3.5	
Producer price finished goods index (% ch)	--	0.4	0.4	0.2	2.8	3.0	Jan 9
Excluding food and energy	--	0.1	-0.3	0.3	0.6	0.6	
Consumer price index (% ch)	--	0.3	0.3	0.3	2.6	3.2	Jan 14
Excluding food and energy (% ch)	--	0.2	0.2	0.3	2.6	2.6	
Retail sales (% ch)	--	-0.4	0.3	0.7	0.4	4.0	Jan 14
Excluding motor vehicles (% ch)	--	0.3	0.4	0.5	1.6	4.4	
Industrial Production (% ch)	--	0.9	-0.2	0.1	4.2	4.4	Jan 17
Manufacturing	--	0.8	-0.2	0.3	4.8	4.7	
Capacity utilization (%)	--	83.3	82.9	83.3	83.3	83.1	Jan 17
Manufacturing	--	82.2	81.9	82.3	82.3	82.1	
Housing Starts (annual rate, thousands)	--	1514	1386	1461	1476	1473	Jan 22
Single-family	--	1164	1082	1138	1164	1165	
Trade balance (billions, monthly)	--	--	-8.0	-11.4	-10.1	-8.9	Jan 17
Merchandise	--	--	-14.1	-17.5	-16.2	-15.0	
Factory Orders (% ch)	--	--	0.9	2.6	9.5	6.6	Jan 7
Durable Goods	--	-1.6	0.5	4.5	1.7	5.7	Jan 29
Personal Income (% ch)	--	0.5	0.0	0.6	5.3	5.5	Feb 3
Wages and Salaries	--	0.6	-0.1	0.7	6.0	6.0	
Purchasing Managers' Index (%)	54.0	52.7	50.2	51.7	51.9	50.1	Feb 3
Consumer Sentiment U Mich (Feb 66=100)	96.9	99.2	96.5	94.7	96.2	93.6	Jan 31
Conference Board (1985=100)	113.8	109.5	107.3	111.8	110.2	104.6	Jan 28

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- The non-durable goods component of the factory orders report for November should increase significantly, bolstered by higher petroleum prices. This should offset most, but not all, of the weakness in durable goods orders reported earlier (Jan 7).
- Producer prices for finished goods in December should rise significantly, boosted by sharply higher gasoline and heating oil prices. Excluding food and energy, however, the prices for finished goods should show a much more modest increase (Jan 8).
- Payroll gains in December should be sizable, boosted by strength in retail, government, and other service personnel. Other elements of the report such as the index of aggregate hours worked should also be on the firmer side. The unemployment rate should dip to 5.3% (Jan 10).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Tue Jan 7	10:00	Factory Orders (Nov)	+0.7%	-1.0%	+0.9%
Wed Jan 8	3:00	Consumer Credit (Nov)	+\$2.0 bil	+\$3.5 bil	+\$2.2 bil
Thu Jan 9	8:30	Producer Price Index (Dec)	+0.5%	+0.3%	+0.3%
		Excluding Food & Energy	+0.2%	+0.2%	+0.2%
Fri Jan 10	8:30	Civilian Unemployment Rate (Dec)	5.3%	5.4%	5.4%
	8:30	Nonfarm Payroll Employment (Dec)	+200,000	+173,000	+118,000

■ Chain-Store Sales Results (Thu, Jan 9)

■ Wholesale Trade (Thu, Jan 9 - 10:00)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	5.8	6.2	6.8
Forward	5.7	5.8	6.2
2 Yr T-Note	6.2	6.5	7.0
Forward	6.1	6.2	6.4
10 Yr T-Note	6.7	7.0	7.2
Forward	6.6	6.6	6.7

Key Nos. in the Business Outlook

	1996		1997	
	Q3	Q4E	Q1E	1996E
Real GDP	2.1%	3.0%	3.4%	2.4%
Ind. Prod., Mfg.	5.7	3.0	4.8	3.3
CPI	2.4	3.4	3.6	2.9
After-Tax Profits*	10.2	9.4	8.1	14.7
Unemployment	5.2	5.3	5.2	5.4

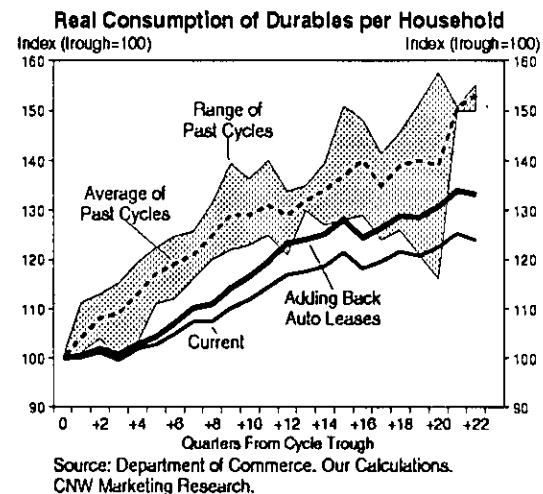
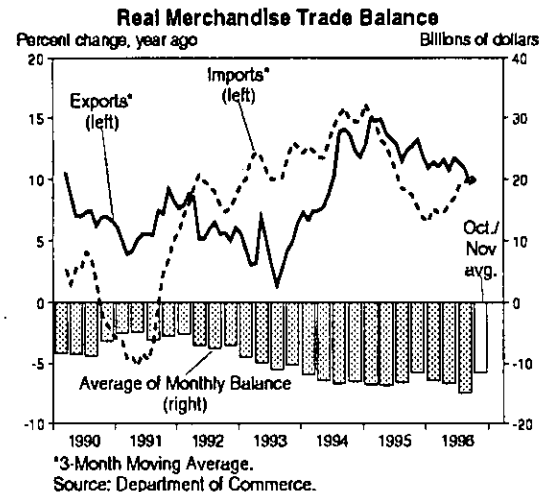
* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

Consumer Demand is Not Spent

- In light of the strength in industrial production and continued narrowing of the trade deficit, we are raising our 4Q GDP growth estimate to 4.3% (annualized) from 3.6%.
- With the economy exiting 1996 on such a firm note, Fed officials are likely becoming increasingly worried that the growth pace needs to slow if inflation is to be avoided. While the absence, so far, of price inflation does reduce the urgency for policy tightening, signs of rising wage inflation and of sustainable growth momentum argue for preemptive measures.
- The debate about whether consumption will be strong or weak in 1997 is, in part, a debate about whether the demand for durable goods has been satiated. As detailed in our center section, we find that aggregate gains in big-ticket purchases per household so far this expansion actually fall short of historical dictates. This conclusion holds even after adding back "hidden" forms of durables consumption, such as auto leasing.
- A key influence on durable goods behavior in this cycle has been a liberalization of financing, allowing for a smoothing of big-ticket purchases and reducing the incidence of boom/bust phases. Given this new paradigm of smoother growth, a slowing of durables does not imply an exhaustion of demand, but rather signals that other goods simply offer better value. This is consistent with our 1997 outlook that consumer durable goods growth will slow—held down by a modest ebbing in housing, but that non-durable goods will take up much of the slack.



Trade Recommendations

- Stay short the Dec '97 Euro, with a target of 93.40 and a stop on a close above 93.90.
- Stay short March '97 T-bond futures, with a target of 109.00 and a stop on a close above 111.16.

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**Issue No: 97/3
January 17, 1997**

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I. Weekly Wrapup

Economic and Market Overview

News of a surprisingly small rise in the December consumer price index excluding food and energy (+0.1%) triggered a smart rally in U.S. financial asset markets early this week. Efforts to push bond prices upward, however, have faltered in the face of fresh signs that economic growth is proceeding well above Federal Reserve desires and expectations, suggesting that the bias among policy makers toward possible credit tightening may be growing more pronounced. Industrial production jumped 0.8% in December, including a 1.1% rise in manufacturing output. The faster production pace drove capacity utilization to 83.8%, the highest reading since the summer of 1995. Moreover, the trade deficit widened only slightly in November, to \$8.4 billion, keeping the average monthly deficit in the fourth quarter about \$3.0 billion narrower than the average monthly gap in the third quarter. Based on these figures, we have raised our real GDP growth estimate for the fourth quarter to 4.3% (annualized). Though we see fourth quarter strength as borrowing a bit from the first quarter (estimated now at 2.4% versus 2.7% earlier), the underlying trend remains quite firm.

Other data during the week confirmed the message of solid growth in activity. Retail outlays increased 0.6% in December, while prior months' data were revised up a bit, particularly in the motor vehicle sector. Nominal consumer spending on goods clearly accelerated last quarter; excluding autos growth picked up to 4.5% annualized from almost zero in the third period. Restrained pricing for goods at the retail level (consumer prices for goods excluding food and

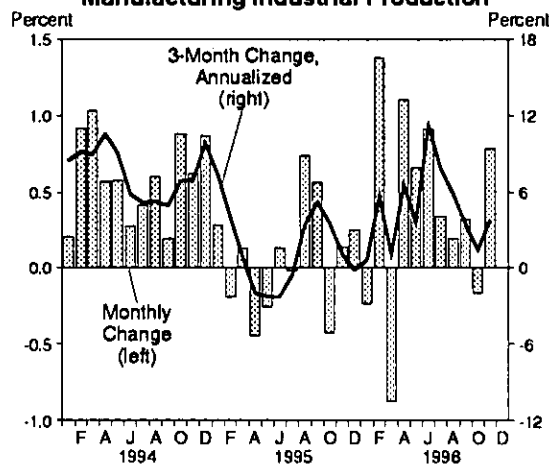
energy climbed just 0.9% annualized in the latest three months) implies that the volume of purchases is rising rapidly. Nonauto retail inventories, meanwhile, rose just 0.2% in November, so upward sales momentum should lead to relatively prompt reordering from suppliers. Consistent with that view, manufacturers in the Philadelphia Fed district reported a rebound in activity this month.

Despite firm growth, underlying inflation has remained strikingly mild. At 2.6%, the rise in consumer prices excluding food and energy over the past 12 months matches the low point for the past quarter century. The lack of price strains is especially evident in the tradable goods sector, where rapid expansion in domestic productive capacity and declining import prices is severely constraining the ability of U.S. firms to pass through cost increases.

Federal Reserve Policy

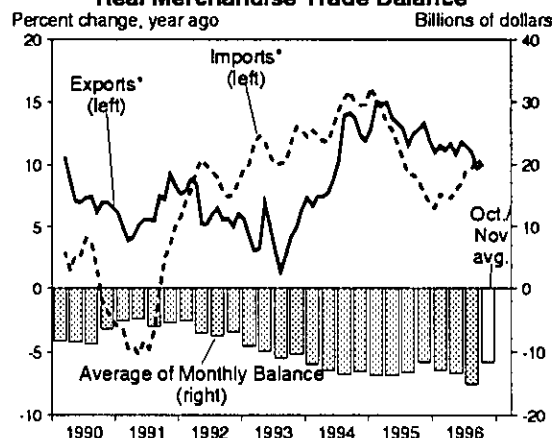
The thin core CPI rise last month has given the Fed even greater flexibility to await more information on early-1997 business developments before making any changes to interest rates. At the same time, in light of recent statistical reports, central bankers now probably perceive greater upside than downside risks for economic growth compared to their expectations—still unmet—for a sustained slowdown to historical norms. We therefore retain a view that the Fed will initiate another tightening cycle within the next several months. At the Senate Budget Committee hearing on Tuesday morning, Chairman Greenspan can be expected to give a relatively positive interpretation of the latest business

Manufacturing Industrial Production



Source: Federal Reserve Board.

Real Merchandise Trade Balance



*3-Month Moving Average.

Source: Department of Commerce.



developments, including price conditions, but also to stress that monetary policy must be anticipatory in order to extend indefinitely the life of this well-advanced expansion.

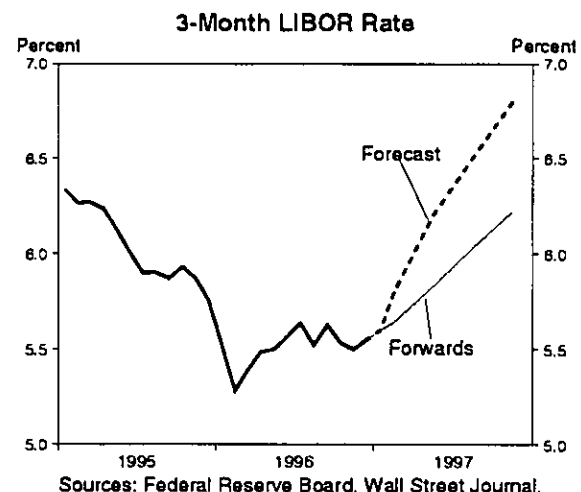
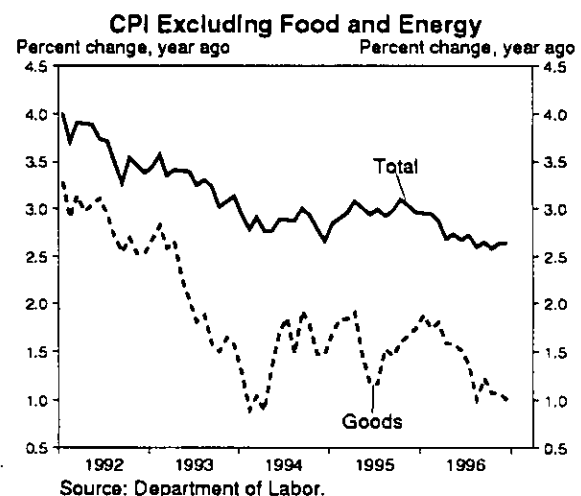
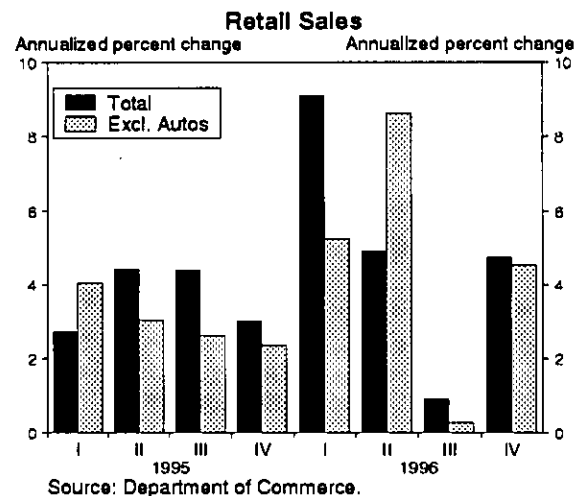
Fiscal and Political Developments

The escalation of partisan battles in the House over the severity of punishment for House Speaker Gingrich's admitted ethical lapses does not bode favorably for a swift agreement on a budget deficit elimination plan for fiscal 1998-2002. Not only has this matter distracted leaders of the lower chamber from substantive issues, it has quickly poisoned relations between the two parties, making compromise on sensitive topics such as entitlement spending restraint all the more difficult. That heightens the burden on the Senate, particularly Majority Leader Lott, to prevent a complete collapse in Republican-Democrat bargaining efforts. Thus far, Lott has indicated his desire for a deliberate course in addressing the budget this year, so market participants should not look for an early budget summit between lawmakers and the White House. President Clinton, meanwhile, seems to sense that all the rancor swirling around the Capitol is imperiling his second term agenda even before Inauguration Day; he has called for the House to quickly wind up the Gingrich investigation.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Although the bond market has already begun to build in a higher risk of Fed rate hikes this year, these concerns will probably rise between now and the February 4-5 policy meeting, as the drumbeat of firm economic reports should persist. The strong rise in activity late last year may soon trigger upward revisions to first-half 1997 GDP forecasts, while the next employment cost index release (on January 28) will likely be rather strong—we project a 1.0% rise. Such information should serve to keep any bond rallies muted in the near term. Chairman Greenspan's testimony before the Senate Budget Committee on Tuesday could also have a cautionary tone, putting additional downward pressure on prices. Thus, we would remain short both the December Eurodollar future, maintaining a target of 93.40 and a stop on a close above 93.90, and the December Treasury bond futures, keeping a stop on a close above 111.16 and a target of 109.00.





II. Consumer Demand is Not Spent

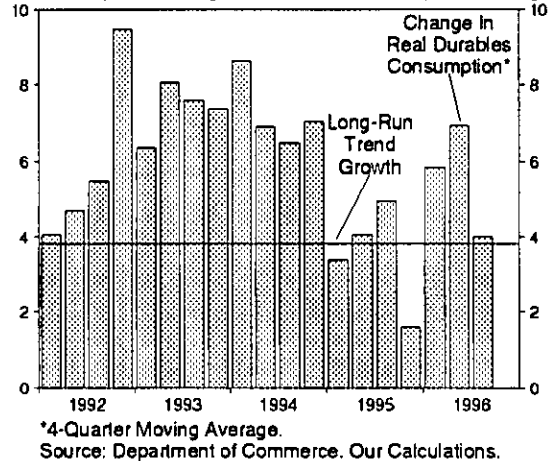
One battle line along which bulls and bears on the U.S. economy are currently divided is the question of whether consumption will be strong or weak in 1997. Those expecting growth to slow argue that spending will be weak, in part because pent-up demand for durable goods has been exhausted and because household desires for big-ticket items are now satiated. In contrast, others, like ourselves, believe that appetites for durables have not been satiated and that demand will remain solid at the household level, such that gains in personal income and net worth—alongside high levels of consumer confidence—will translate into respectable consumption growth.

When looking at the question of demand being either pent-up or satiated, the focus is usually on the outlook for growth in durable goods. This category has historically been quite volatile, with periods of credit stringency and low levels of confidence causing demand to go unsatisfied, resulting in a faster spending pace once credit spigots are again turned on and confidence is restored. Currently, consumption skeptics suggest that durables are still characterized by such boom/bust cycles, that the boom phase is behind us, and that a significant downward adjustment is now in store.

We disagree with this view. We find that so far this cycle, aggregate gains in durables per household have actually been below what past cycle ranges would dictate. This conclusion is true even after accounting for the recent explosion in leasing, a form of durables consumption which is "hidden" in business outlays on equipment. One key reason for changes in the pattern of big-ticket purchases relates to a liberalization of financing in this area. By expanding the pool of lenders, this has led to a dramatic smoothing of the growth path in durable goods, which has reduced both volatility and the incidence of pent-up demand¹.

We do believe that durable goods consumption growth will slow a bit in 1997. But this is not related to an exhaustion of pent-up demand. Instead, durables softness will likely be a response to higher

Durables Consumption During This Expansion
Annualized percent change Annualized percent change



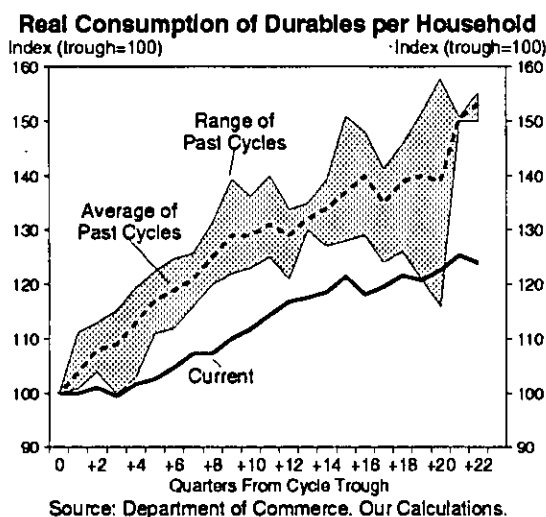
interest rates triggering a modest decline in housing, which should in turn lead to weakness in items such as furniture and appliances. This distinction between a housing-related deceleration versus an exhaustion of pent-up demand is important because so long as consumers are still willing to spend, some consumption should simply shift toward nondurable or service categories.

Choosing Sides on The Issue of Satiated Demand

Consumption skeptics argue that households gorged on durable goods purchases early this cycle, that pent-up demand has therefore been exhausted, and that consumers now have most of the big-ticket items they desire. Two pillars support the bond bulls case: 1) Real durable goods consumption growth rose above its long term trend in the 1993-94 period, as shown in Chart 1, and 2) pricing in durables has collapsed, hinting that recent volume gains may have been "bought" by manufacturers and retailers, rather than motivated by demand.

As we see it, however, the pattern of rapid, then sporadic growth shown in Chart 1 is normal for a business cycle expansion. In fact, the chart on page 5 shows that when stacked against previous cycle norms, the aggregate big-ticket purchases during this expansion thus far leave penetration, e.g. real durable levels per household, below rather than above trend. Some of the shift in penetration can be explained by an explosion in leasing activity of durable goods such as autos, because leases and rentals are classified in

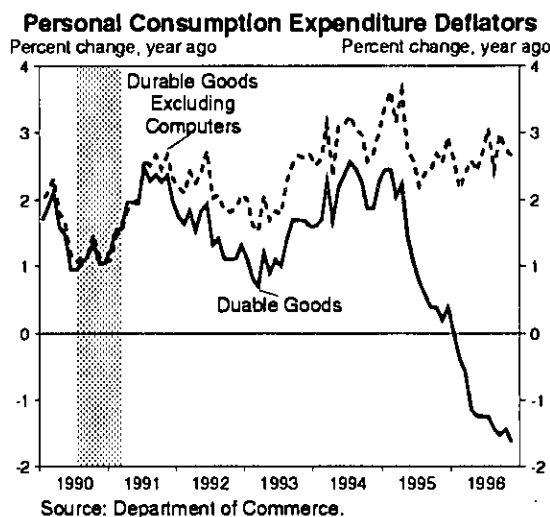
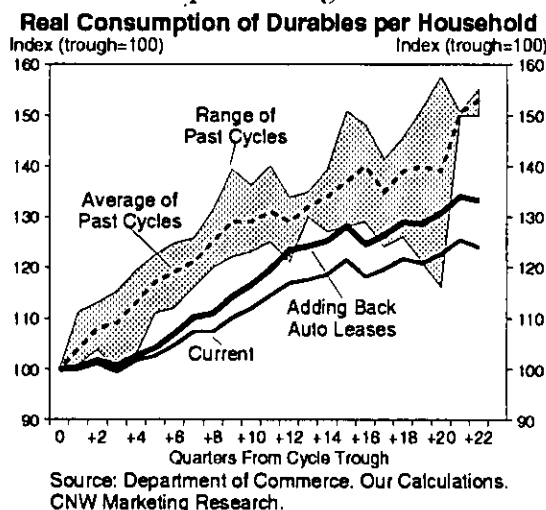
¹ The smoothing of the durable goods cycle is consistent with our analysis, as detailed in "The Brave New Business Cycle: No Recession in Sight", which suggests that deregulation and internationalization have encouraged long stretches of uninterrupted growth economy-wide.

GDP accounts as business fixed investments, rather than as consumer outlays. The effect is non-trivial: The chart below illustrates the path of durables this cycle, had the value of leased vehicles been accounted for as consumption. Since leasing has also grown in other areas, including furniture, audio, and video equipment, the true curve is actually slightly higher.

Even with leasing in the picture, however, durables per household appear to be slightly below the trend-line level expected at this point in an expansion. This does not mean we expect durables growth to now accelerate—some things have changed, as discussed below—but by the same token, we see no reason to expect a drop-off in growth based on pent-up demand arguments.

Nor do we see downward price pressures as a particularly damaging indictment of durable goods demand. While price changes for durables have



touched negative territory over the past few years, all of the downward pressure can be traced to steep declines in computer prices, as illustrated in the accompanying chart. In turn, computer price disinflation is partly related to productivity gains in that area. And, as a group, durable goods businesses have seen profits grow rather than narrow since 1994. Thus, volume gains do not appear to be coming at the expense of profitability.

A Different Battle Altogether

Clearly, though, the comparisons with past cycles suggest that something has changed in the world of big-ticket purchases. The major revolution has been a liberalization of the financing process, triggering a shift toward alternative forms of funding for durable goods purchases. Three changes are illustrative:

1. **Explosion of automobile leasing.** Since 1990, leasing activity has surged, accounting for 25.0% of total new vehicle sales by 1996, versus 7.7% in 1990. The annual value of new vehicles leased now exceeds \$80 billion. By requiring only small monthly payments (\$262, on average), leasing becomes a viable alternative for many households throughout much of the business cycle, allowing the boom and bust nature of the automobile cycle to be dramatically smoothed.
2. **Securitization of revolving credit and automobile loans.** New instruments such as CARDS and CARS, have allowed securitized pools of installment debt to grow from \$47 billion in 1990 to \$263 billion at the end of 1996. Much like the development of a secondary mortgage market, such securitizations allow new lenders, besides just depository institutions, to



participate in installment debt financing. This makes funding more plentiful, helping to smooth out volatility in spending.

3. **General loosening of credit standards.** Credit is now more freely extended to those households which, in the past, were only able to get financing during periods of strong economic growth and optimism. Since these are also the households experiencing (presumably) significant pent-up demands historically, this change should also act to smooth the durable goods cycle.

The upshot is that durable goods purchases have now become less volatile. The table below shows that the standard deviation for changes in durables consumption relative to trend has, in fact, come down considerably during this expansion. While lower volatility should not alter the underlying trend growth rate of durables, it may help to explain why the rebound at the outset of this cycle was lower than past experience would dictate².

Volatility of Real Durables Consumption

Business Cycle		Standard Deviation: % Change in Real Durables Consumption Relative to Trend
1960 Q3	1969 Q4	3.03
1970 Q1	1973 Q4	4.20
1974 Q1	1980 Q1	3.64
1980 Q2	1981 Q3	6.22
1981 Q4	1990 Q3	3.61
1990 Q4	1996 Q4	1.91

Implications and Outlook

The primary implication of the smoothing of durable goods spending is that this key consumption category has become less interest rate sensitive, meaning that larger rate increases are now needed to engineer changes in the trajectory of durables. Moreover, the enhanced efficiency of lending in this area, sparked by the liberalization of financing, has allowed financing costs to come down. In the long-run, these innovations could act to raise the desired level of durables per household—all else equal—much as financial engineering in the housing industry has seemingly boosted the equilibrium level of housing starts and sales.

Real Personal Consumption Estimates

		Total % chg	Durable Goods % chg	Nondurable Goods % chg	Services % chg
1996		2.4	5.5	1.4	2.4
1997	Q1	2.6	6.6	1.4	2.4
	Q2	2.4	2.3	2.5	2.3
	Q3	2.0	0.9	2.0	2.2
	Q4	1.7	-0.6	1.8	2.2

As for the near-term outlook, growth in durables may decelerate, in line with the modest ebbing of housing activity we foresee in 1997. Yet, unlike in the case of satiated demand—in which household demand simply runs out of steam—in a world of smoothed durables consumption, weakness in big-ticket items most likely signifies that other types of goods simply offer better value at present. It is thus reasonable to expect a substitution in relative growth terms toward nondurables. For instance, we estimate that growth in big-ticket purchases will be shaved from about 5.5% in 1996 to 2.4% by Q2, while nondurables consumption should pick up from roughly 1.3% in 1996 to 2.5% by Q2. Anecdotal evidence implies that this shift is already occurring—comparable store sales for hard goods retailers have suffered over the past three months, at a time when apparel and department stores have emerged as strong suits in the competitive retail game. On balance, the result should be respectable gains in overall consumption.

Jill Jacobs

² Admittedly, under this prescription, we would have expected the 1990-1991 durables downturn to be less sharp than past recessions. Instead, the correction appears to have been equally severe, possibly driven by the financial nature of the recession itself.



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'96 Dec	'96 Nov	'96 Oct	'96 Sep			
Nonfarm Payrolls (ch. Thousands)	262	127	261	-2	194	214	Feb 7
Unemployment Rate (%)	5.3	5.3	5.2	5.2	5.3	5.4	
Index of Hours Worked (% ch)	0.9	0.7	-0.7	0.8	2.2	3.6	
Average Hourly Earnings (% ch)	0.5	0.8	-0.1	0.3	3.8	3.8	
Producer price finished goods index (% ch)	0.5	0.4	0.4	0.2	3.5	2.9	Feb 14
Excluding food and energy	0.1	0.1	-0.3	0.2	0.6	0.6	
Consumer price index (% ch)	0.3	0.3	0.3	0.3	3.0	3.2	Feb 19
Excluding food and energy (% ch)	0.1	0.2	0.2	0.3	2.4	2.6	
Retail sales (% ch)	0.6	-0.2	0.7	0.7	3.8	4.5	Feb 13
Excluding motor vehicles (% ch)	0.6	0.0	0.7	0.5	3.3	4.4	
Industrial Production (% ch)	0.8	0.8	-0.1	0.2	4.3	5.1	Feb 14
Manufacturing	1.1	0.7	-0.1	0.3	5.1	5.6	
Capacity utilization (%)	83.8	83.4	83.0	83.4	83.4	83.2	Feb 14
Manufacturing	82.8	82.2	81.9	82.3	82.2	82.1	
Housing Starts (annual rate, thousands)	--	1514	1386	1461	1476	1473	Jan 22
Single-family	--	1164	1082	1138	1164	1165	
Trade balance (billions, monthly)	--	-8.4	-8.0	-11.4	-9.7	-9.1	Feb 19
Merchandise	--	-14.7	-14.1	-17.5	-15.8	-15.2	
Factory Orders (% ch)	--	-0.4	1.1	2.6	4.0	6.1	Feb 5
Durable Goods	--	-1.6	0.5	4.5	1.7	5.7	Jan 29
Personal Income (% ch)	--	0.5	0.0	0.6	5.3	5.5	Feb 3
Wages and Salaries	--	0.6	-0.1	0.7	6.0	6.0	
Purchasing Managers' Index (%)	54.0	52.7	50.2	51.7	51.9	50.1	Feb 3
Consumer Sentiment U Mich (Feb 66=100)	96.9	99.2	96.5	94.7	96.2	93.6	Jan 31
Conference Board (1985=100)	113.8	109.5	107.3	111.8	110.2	104.6	Jan 28

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- Chairman Greenspan's testimony to the Senate Budget Committee will be scrutinized for clues about how close he is to tightening monetary policy. The presence or absence of remarks about the need for preemptive monetary policy tightening, as well as thoughts on the sustainability of the economy's momentum will be a key gauge of the Chairman's thinking (Jan 21).
- Housing starts probably slipped 2.0%—to 1.48 million units—in December, after having surged 9.2% in November. This would still represent a firm level of starts, which appears sustainable given low inventory to sales ratios in the housing sector (Jan 22).
- The Federal Reserve's beige book roundup of economic conditions should provide regional flavor on both demand conditions and wage pressures. In areas of the country experiencing particularly robust growth, discussions of goods price changes could also prove noteworthy (Jan 22).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Wed Jan 22	8:30	Housing Starts (Dec)	-2.0%	-2.9%	+9.2%
Thu Jan 23	2:00	Federal Budget Balance (Dec)	+\$9.0 bil	+\$10.0 bil	+\$5.3 bil

- Inauguration Day (Mon, Jan 20)
- Greenspan Testimony—State of the U.S. Economy (Tue, Jan 21 - 10:00)
- Fed Beige Book (Wed, Jan 22 - 12:00)
- Import and Export Prices (Thu, Jan 23 - 10:00)
- Treasury Announces 1-Year Bill (Fri, Jan 24 - 2:30)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	5.8%	6.2%	6.8%
Forward	5.7	5.9	6.3
2 Yr T-Note	6.2	6.5	7.0
Forward	6.1	6.3	6.4
10 Yr T-Note	6.7	7.0	7.2
Forward	6.6	6.7	6.7

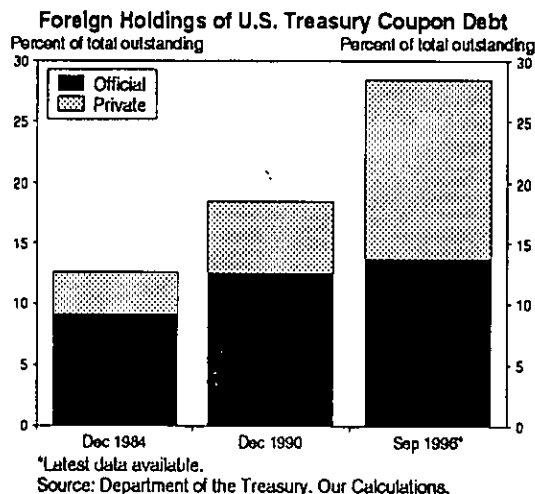
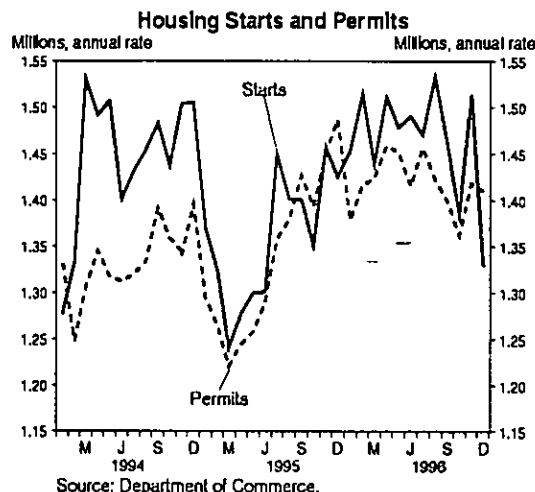
Key Nos. in the Business Outlook

	1996		1997	
	Q3	Q4E	Q1E	1996E
Real GDP	2.1%	4.3%	2.4%	2.5%
Ind. Prod., Mfg.	5.7	4.1a	5.7	3.3
CPI	2.3	3.2a	3.5	2.9a
After-Tax Profits*	10.2	11.3	6.6	15.2
Unemployment	5.3	5.3a	5.1	5.4a

* Excluding inventory profits; adjusted for depreciation distortions.

Foreign Demand for U.S. Treasuries: No Drop Likely Soon

- Chairman Greenspan's latest testimony implies that the next change in U.S. monetary policy will be a tightening. Such a move is unlikely to occur as early as the Feb. 4-5 FOMC meeting, however, barring a sharp, unexpected acceleration in the fourth-quarter employment cost index.
- Bad weather was partly responsible for the latest softer-than-expected readings on housing starts and jobless benefit claims. Meanwhile, the Fed's "beige book" summary of regional conditions did not show as clear a pick-up in growth as have the national economic data.
- Prospects for a budget-balancing accord remain good, although a large downward revision to the Congressional Budget Office's baseline deficit projection make it much easier to achieve such a deal without materially changing the trends in entitlements that cause longer-term imbalances.
- Foreign purchases of U.S. Treasury debt since early 1995 have been massive, with private investors absorbing the bulk of note and bond offerings. The regional distribution of Treasury coupon sales abroad has not changed, with Europeans accounting for about half.
- Our analysis indicates that past market returns are the primary determinant of private foreign demand for Treasuries, with changes in official behavior recently dominated by fluctuations in the dollar's value. The relative attractiveness of U.S. yields augurs for continued solid external purchases, barring a sharp acceleration in European economic growth.



Trade Recommendations

- Stay short the Dec '97 Euro, with a target of 93.40 and a stop on a close above 93.90.
- Stay short March '97 T-bond futures, with a target of 109.00 and a stop on a close above 111.16.

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**Issue No: 97/4
January 24, 1997**

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I. Weekly Wrapup

Economic and Market Overview

With hardly any new data to digest, financial market participants dissected Federal Reserve Chairman Alan Greenspan's Senate Budget testimony for clues about the near-term direction of U.S. monetary policy. What they found was initially to their liking, although most of the post-testimony gains had dissipated toward the end of the week—except in the case of the dollar, which reached a 4-year high against the yen.

The two figures that were released fell to the soft side of general expectations, although both followed sharp improvements and were clouded by bad weather. For example, starts of new housing units dropped 12.2% in December after rising 9.3% in November. Last month's losses were concentrated in the West, where heavy rains caused builders to put off breaking ground on many new projects. Permits for new home building, which are less prone to such disruptions, fell only 0.6%, to a level 6.1% above the starts rate. In the past, inversions between permits and starts have usually signaled a near-term rebound in starts. Likewise, initial claims for jobless insurance jumped 34,000 in the week ended January 18 after dropping 45,000 in the prior week; shifts in the weather were also partly behind these large swings.

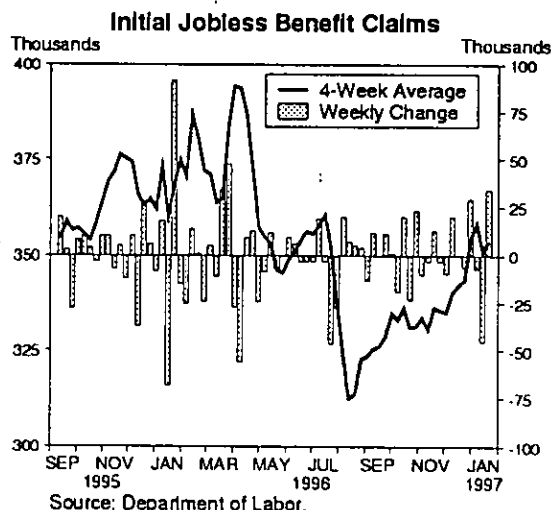
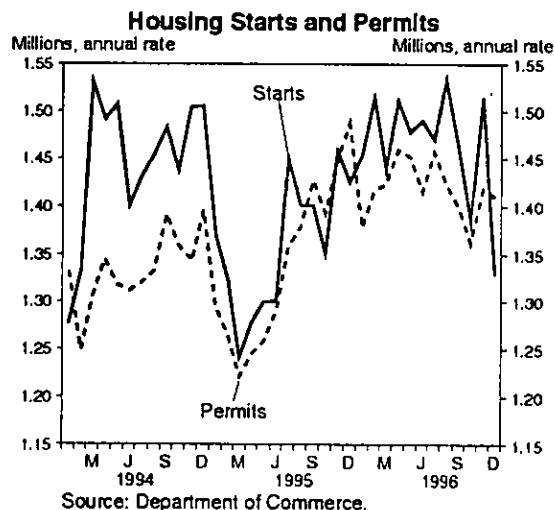
Unlike most recent economic indicators, the Federal Reserve's latest "beige book" found little evidence of a shift in the "moderate" pace of economic growth. Although most districts characterized local labor markets as tight, they reported only scattered signs of rising wage inflation—also in contrast to national indexes—and no increased price inflation outside the

energy sector. Over the past year, the Conference Board's survey of regional conditions has picked up a noticeable shift in the locus of economic strength from the nation's midsection to its coastal regions; while reduced export growth is probably the main reason, labor-market constraints may also be a factor.

Federal Reserve Policy

Chairman Greenspan's characteristically even-handed testimony on the economy's outlook and prospects did not indicate an imminent change in policy. In several respects, however, his remarks clearly imply that the next move—whenever it comes—will be a tightening. First, he was struck by the strength of recent growth and noted that it was occurring at a time when resource utilization was quite high. Second, he did not enumerate a list of reasons why this growth should slow, as he had in last July's Humphrey-Hawkins testimony. Together, these two points suggest that Mr. Greenspan now sees the risks as evenly balanced around an unsustainable growth trend. Third, he reiterated the importance of basing policy on forecasts rather than current trends. Finally, he devoted the bulk of his prepared remarks to an analysis of inflation and noted that the period of subdued wage and price pressures might be ending. Together, these last two points suggest that an uptick in inflation is not a prerequisite for monetary tightening and that labor market indicators will be critical in the Fed's policy deliberations.

In this context, the fourth-quarter employment cost index—due for release January 28—will be a key focus of attention. Fed officials regard this index as



the best gauge of labor costs, and they will be looking to see whether there has been much acceleration in total hourly compensation. If so, Mr. Greenspan's next trip to Capitol Hill, just two days later, might contain more warnings of an increase in interest rates.

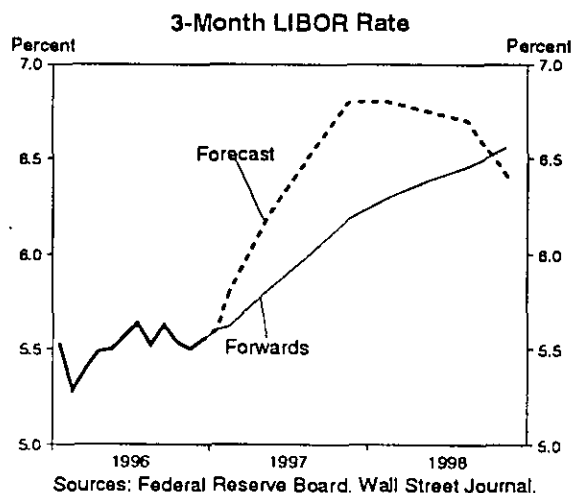
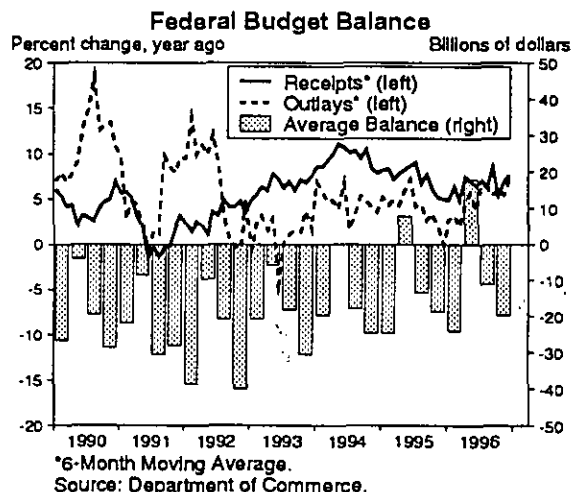
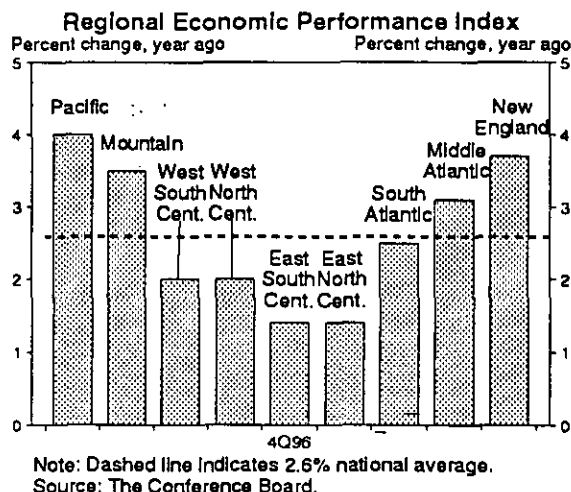
Fiscal and Political Developments

Prospects for an accord leading to a balanced federal budget in 2002 remain good, but several events in recent days underscore the likelihood that any such deal will skirt the fundamental issues leading to longer-term imbalance. First, a senior Congressional Budget Office official noted that the CBO would announce a large reduction to its baseline deficit forecast, shaving the estimated 2002 shortfall by about one-third. This makes it much easier to reach a balance in five years without seriously cutting entitlement outlays. Second, President Clinton closed part of the gap between his Medicare proposals and those of the Republican congressional majority, offering to cut \$138 billion in six years; however, this latest proposal would not make material headway either in resolving Medicare's longer-term solvency or in reducing overall public and private outlays on healthcare. Finally, in a move that could prolong the negotiations, several Senate Republicans, led by Finance Committee Chairman William Roth (R., DE), have increased the size of the tax cuts they will be seeking to \$194 billion, about double the cut most recently proposed by the administration; to the extent the final agreement embodies a large tax cut, meaningful long-term deficit reduction will be that much harder to achieve.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Although our enthusiasm for short positions is fading in light of the bearish sentiment in the bond market and our expectation that Fed officials will keep monetary policy unchanged at the Feb. 4-5 FOMC meeting, we would remain short for one more week. Our expectations of high-side surprises on the employment cost index report and real GDP growth in the fourth quarter could cause market participants to become more fearful of a tightening at the Feb. 4-5 FOMC meeting, pushing yields up. We would remain short both the Dec '97 Eurodollar future, with a stop on a close above 93.90 and a target of 93.40, and the March '97 T-bond future, with a stop on a close above 111.16 and a target of 109.00, closing out the bond short if our target were reached.



II. Foreign Demand for U.S. Treasuries: No Drop Likely Soon

There has been a notable shift in the composition of U.S. Treasury debt ownership over the past few years, with enormous foreign net purchases taking place amid reduced new issuance. While robust demands from overseas central banks have been widely recognized, data on foreign net Treasury purchases reveal that private buying has been even larger. In fact, private foreign holdings of coupon Treasuries have surpassed those of central banks, a radical change from earlier periods.¹ It is also noteworthy that, despite a marked step-up in the aggregate pace of buying, the regional distribution of overseas Treasury ownership has not changed much, with Europe remaining by far the largest source of demand.

Our analysis indicates that lagged Treasury market returns have been a key historical determinant of foreign purchases, with private investors tending to pursue mean-reversion strategies. Whereas the dollar's exchange value has not been a consistently significant influence, in the past two years foreign central banks have clearly changed their behavior, accumulating Treasuries in an effort to hold down their currencies in relation to the greenback and thereby stimulating domestic business activity.

Looking ahead, unusually attractive yields on U.S. debt relative to those in other major bond markets should help keep private foreign purchases on a firm path, but central bank demands are likely to wane now that the dollar has risen materially against most European currencies and the yen. The main risk to a continuation of these flows would be a significant acceleration in European economic growth, which would probably cause local bond yields to rise.

Historical Evidence on Foreign Treasury Purchases

We have reviewed statistics on international capital movements since the early 1970s to evaluate patterns of foreign demand in the U.S. government securities market. The major findings are as follows:

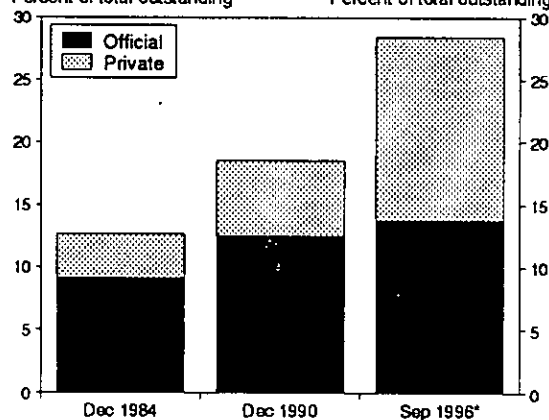
1. Total foreign acquisitions of U.S. debt have exploded since 1993. In the latest eleven quarters (ending September 1996), net overseas purchases of Treasury notes and bonds totaled

¹ Our analysis focuses on foreign ownership of coupon securities as data on Treasury bills are not available.

\$361.2 billion, nearly matching the total amount acquired over all previous periods (\$388.2 billion). The 27% annual foreign accumulation rate over that interval was more than four-and-a-half times the growth in the total stock of such debt (5.8%). External demands for Treasury bills, meanwhile, have also been exceptionally strong; based on custody account figures from the Federal Reserve, we estimate roughly \$200 billion in cumulative foreign central bank T-bill purchases over the past five years, exceeding the increase in total marketable bill supplies.

This marks the second major updraft in foreign demands for Treasuries during the past 15 years. The first such episode—beginning in 1984—coincided with the lifting of federal withholding taxes on interest paid to foreign entities.

Foreign Holdings of U.S. Treasury Coupon Debt
Percent of total outstanding



*Latest data available.

Source: Department of the Treasury. Our Calculations.

2. Among foreigners, private ownership of Treasury coupon issues has surpassed that of central banks and other official entities. Much has been written lately about the extraordinary rate of U.S. debt accumulation by foreign central banks. The surprising fact, however, is that the absolute volume of buying outside the bill sector has been far greater among private accounts. Private foreigners have expanded their Treasury coupon debt holdings by a cumulative 291% since 1990, compared to 78% among official institutions. Between December 1994 and September 1996, the annual growth rates for the two groups were 42.9% and 20.9%, respectively. These trends have driven private foreign



ownership of Treasury coupons above the combined volume held by central banks and international organizations for the first time, as of the third quarter of 1995. Only six years ago, foreign official organizations held more than twice as many U.S. government notes and bonds as non-U.S. private investors.

3. Excluding off-shore investment funds, the regional distribution of foreign demands for Treasury coupon securities recently has mirrored earlier patterns. Unlike the prior large acceleration in foreign purchases of Treasury issues during 1984-1986, when there was an appreciable shift in the regional composition of demand toward the Far East, the distribution of net purchases has not been materially altered of late. Since December 1994, close to 52% of foreign accumulation of U.S. notes and bonds has been in Europe, marginally greater than the 48% share attributable to that region between 1974 and 1994. Japanese purchases account for another 17%, slightly less than earlier averages, while non-Japan Asian nations continue to comprise 18%-19%.

Net Foreign Purchases of Treasury Coupons, By Region*
(% of total)

	1974-1994	Jan. 1995-Sep. 1996
Europe	48.1%	51.7%
Japan	21.6	17.3
Asia (ex. Japan)	18.3	18.7
All Other	12.0	12.3

* Excluding Caribbean countries, where flows are dominated by large investment funds.

Estimating Key Factors In Overseas Demand For Treasuries

In an effort to understand the main forces that normally determine non-U.S. demands for Treasury coupon issues, we have constructed an econometric model and analyzed quarterly data on purchases since 1984. In addition to total foreign net purchases, we have subdivided these transactions by type of buyer (private or official), and also by major regions of domicile (Europe, Japan, and non-Japan Asia).

Modeling Net Foreign Treasury Purchases

Dependent Variable	Treasury Return Terms	US \$ Return Terms	1995-1996 Dummy	Adjusted R-squared
Total	-1056.5* (399.3)	155.7 (805.1)	1083.0* (425.3)	0.57
Private	-819.4* (327.0)	276.5 (370.2)	-390.0 (403.9)	0.50
Official	-932.4* (310.1)	-241.4 (388.1)	976.1* (388.7)	0.29
Europe	-738.6* (324.5)	55.5 (379.3)	161.0* (59.4)	0.37
Japan	-566.2* (183.2)	229.8* (139.0)	78.1* (38.3)	0.36
Non-Japan Asia	-159.5 (137.9)	45.0 (96.7)	7.7 (25.3)	0.26

Notes: Constant, trend, trend-square, and error-correction terms are not shown. In almost all cases, they are significant and have the expected sign. Robust standard errors are in parentheses. * indicates that the coefficient is statistically significant at the 5% level. The dependent variable is the foreign net purchases of marketable Treasury Notes and Bonds in total and for each indicated subgroup. Reported coefficients on Treasury and U.S. dollar returns are the sum of four quarterly lags of the series. The sample period is 1984Q1 to 1998Q3.

Our model employs an error-correcting specification including two independent economic factors: (1) lagged Treasury bond returns, on the theory that foreign investment behavior is adaptive to recent yield movements, and (2) changes in the dollar exchange rate, since overseas investors care deeply about how returns on dollar-denominated investments translate into home-currency terms. In addition, because foreign central banks have lately endeavored to influence the dollar's market value to suit domestic economic objectives, we have added a dummy variable for 1995-1996, multiplied by the dollar exchange rate.²

This model is fairly successful in describing past patterns of foreign purchases of U.S. debt, accounting for 57% of the quarterly variations. Consistent with our expectations, past Treasury returns appear to be an important determinant of future foreign demands. We find that foreign investors tend to employ an adaptive mean-reversion strategy in their investments in notes and bonds, buying more when prices have

² Our model also includes trend, trend-squared, and error-correction terms to control for the quadratic growth in foreign Treasury holdings.

fallen and less when prices have risen. This result is observed for both private and official purchases, as well as for demands from both Europe and Japan.

Surprisingly, our analysis suggests that foreign investors have generally not altered their Treasury investment behavior based on changes in the dollar's value over the past twelve years. Coefficients on exchange rate terms were statistically insignificant in explaining total, private, official, European, and non-Japanese Asian purchases. Only in the case of Japan has the dollar exchange rate been a consistent determinant of the appetite for Treasury coupon debt.

We do find that the dollar has been an important factor in foreign demand for Treasury coupons in the official community over the past two years. Since the start of 1995, each 1% increase in the greenback's value has been associated with a roughly \$1 billion net purchase of U.S. government notes and bonds by overseas central banks. Regionally, such purchases have come primarily from Europe, but also to a lesser extent from Japan and non-Japan Asia. These results are broadly consistent with our earlier research on the unprecedented increase in Federal Reserve custody holdings of Treasury securities for central banks in the past several years (see *The Weekly Analyst*, October 22, 1996). Foreign monetary authorities clearly have been using purchases of Treasuries to lift the dollar's exchange market value, with the goal of stimulating their domestic economies via exports.

External Private Purchases of Treasuries Should Remain Sturdy For Awhile

The foreign impulse to purchase Treasuries will likely persist, though probably at a somewhat diminished pace. From the perspective of private foreign parties, the United States remains a relatively bright spot in the global bond universe. Yields on Treasury 10-year debt presently are only 34 basis points below the 1991-1995 average, whereas yields in most other major bond markets are dramatically lower on the same comparison. Based on our Global Economics Group's forecasts, which anticipate a persistence of this general condition, foreign private cash flows to the Treasury market should be well supported in the coming months.

At the same time, it would not be surprising if official purchases of Treasuries were somewhat more muted than in the recent period, because the "orderly adjustment" upward in the U.S. dollar's value sought by central banks has been largely accomplished. To be sure, the moderate dollar downturn that we project

U.S. Yields Look Relatively Attractive

Country	10-Year Bond Yields		
	1991-1995	1/23/97	Change
Japan	4.72%	2.60%	-2.12%
France	8.13	5.59	-2.54
Germany	7.35	5.72	-1.63
Spain	11.06	6.62	-4.44
Canada	8.68	6.63	-2.05
Sweden	9.80	6.71	-3.09
Italy	11.00	7.20	-3.80
United Kingdom	8.64	7.35	-1.29
8 Country Average	8.67	6.05	-2.62
United States	6.88	6.54	-0.34

over the next 12 months would probably attract foreign official investment in an effort to mitigate the descent. The degree of this demand should not be as great as in the past two years, however, since the economies of most other major industrial countries seem poised to gradually improve and, hence, the rationale for aggressive dollar support efforts is no longer as strong.

Major Risk: Possible Pickup In European Growth

Probably the greatest threat to a continuation of solid overseas demands in the Treasury securities market this year is the possibility that European economic activity will finally gain speed. With business conditions already buoyant in the United Kingdom, short-term interest rates on the European continent at modern historical lows, and the dollar relatively firm against the German, deutschemark, a number of fundamental factors conducive to a regional growth upturn are now in place. Should such a pick-up occur, bond markets in those countries would likely deteriorate as expectations for indefinitely accommodative monetary policies diminished. A rise in European interest rates would tend to squeeze yield differentials with the United States, and also would make a further appreciation of the dollar versus core European currencies more problematic. Under these circumstances, European appetite for U.S. government securities would probably shrink.

John Youngdahl

John Simpson

Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'96 Dec	'96 Nov	'96 Oct	'96 Sep			
Nonfarm Payrolls (ch. Thousands)	262	127	261	-2	194	214	Feb 7
Unemployment Rate (%)	5.3	5.3	5.2	5.2	5.3	5.4	
Index of Hours Worked (% ch)	0.9	0.7	-0.7	0.8	2.2	3.6	
Average Hourly Earnings (% ch)	0.5	0.8	-0.1	0.3	3.8	3.8	
Producer price finished goods index (% ch)	0.5	0.4	0.4	0.2	3.5	2.9	Feb 14
Excluding food and energy	0.1	0.1	-0.3	0.2	0.6	0.6	
Consumer price index (% ch)	0.3	0.3	0.3	0.3	3.0	3.2	Feb 19
Excluding food and energy (% ch)	0.1	0.2	0.2	0.3	2.4	2.6	
Retail sales (% ch)	0.6	-0.2	0.7	0.7	3.8	4.5	Feb 13
Excluding motor vehicles (% ch)	0.6	0.0	0.7	0.5	3.3	4.4	
Industrial Production (% ch)	0.8	0.8	-0.1	0.2	4.3	5.1	Feb 14
Manufacturing	1.1	0.7	-0.1	0.3	5.1	5.6	
Capacity utilization (%)	83.8	83.4	83.0	83.4	83.4	83.2	Feb 14
Manufacturing	82.8	82.2	81.9	82.3	82.2	82.1	
Housing Starts (annual rate, thousands)	1329	1514	1385	1461	1449	1465	Feb 20
Single-family	1024	1161	1088	1138	1133	1155	
Trade balance (billions, monthly)	--	-8.4	-8.0	-11.4	-9.7	-9.1	Feb 19
Merchandise	--	-14.7	-14.1	-17.5	-15.8	-15.2	
Factory Orders (% ch)	--	-0.4	1.1	2.6	4.0	6.1	Feb 5
Durable Goods	--	-1.6	0.5	4.5	1.7	5.7	Jan 29
Personal Income (% ch)	--	0.5	0.0	0.6	5.3	5.5	Feb 3
Wages and Salaries	--	0.6	-0.1	0.7	6.0	6.0	
Purchasing Managers' Index (%)	54.0	52.4	50.4	51.7	51.7	50.1	Feb 3
Consumer Sentiment U Mich (Feb 65=100)	96.9	99.2	96.5	94.7	96.2	93.6	Jan 31
Conference Board (1985=100)	113.8	109.5	107.3	111.8	110.2	104.6	Jan 28

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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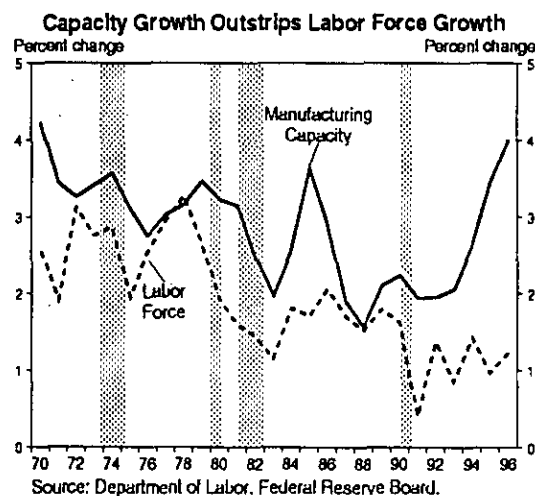
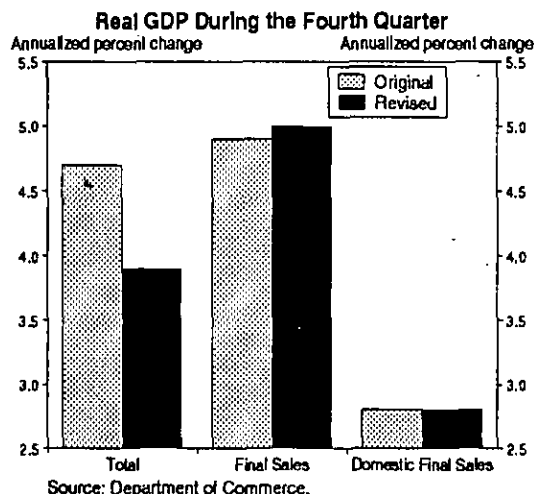
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U.S. Economics Analyst

Capital Spending: Inflation's Balance Wheel

- U.S. financial markets are taking more seriously Chairman Greenspan's warnings that continued strong growth and signs of rising labor-market stress may provoke credit tightening, now that he has said more explicitly that signs of higher inflation are not a prerequisite to such a rate rise.
- It remains a very close judgment as to whether or not the Fed will hike rates as soon as the March 25 FOMC meeting. Data due next week on labor market developments and factory conditions will likely tip the balance.
- Meanwhile, a markdown of fourth-quarter GDP growth, stemming entirely from reductions in inventory accumulation, means that a higher growth pace can now be expected in the first quarter of 1997. We have moved our growth target for this period from 1.8% to 2.5%, raising the expected first-half gain to 3.0%.
- One key factor behind benign inflation has been the surge in capacity growth that has resulted from strength in capital spending. Its traditional role as inflation's balance wheel has been enhanced in the Brave New Business Cycle, which stimulates business investment and features faster deliveries of capital equipment.
- Inflation has also benefited from sharp declines in computer prices and the fact that imports, rather than domestic production, account for almost all of the incremental capital spending since 1990. But inflation is apt to turn up in 1997, albeit at a gradual pace, as productivity gains fail to fill the gap between strong growth in output and slow growth in the labor force.



Trade Recommendations

- Stay long the June '97/June '98 Eurodollar futures calendar spread, raising stops to a close below 50 basis points and retaining a target of 90 basis points.
- Stay short December '97 Euro futures, moving stop down to a close above 94.00 from 94.15.
- Set shorts in June T-bond futures at 111.08, with a stop on a close above 112.16.

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**Issue No: 97/9
February 28, 1997**

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I. Weekly Wrapup

Economic and Market Overview

Bond and stock prices swooned in the wake of Fed Chairman Greenspan's "Humphrey-Hawkins" testimony, in which he cautioned that a preemptive tightening of monetary policy should not be ruled out. The re-pricing of the bond market to reflect some risk of a rate rise next month is entirely appropriate in our view, since we continue to assess the probability of such a move at close to 50%.

The latest economic reports have been virtually uniform in suggesting a continuation of sturdy expansion in demand and production. The Conference Board's confidence index for February (118.4) was essentially steady versus the 87-month high reached the prior month. Such high confidence is substantially tied to a perception of robust job availability, which seems justified in view of the strikingly low volume of first-time unemployment claims. Durable-goods orders posted a larger-than-expected jump in January, up 3.6% overall and 4.8% outside the volatile defense and aircraft categories. These gains completely reversed large declines over the previous two months. Unfilled order backlogs also rose steeply (+0.8%), implying pressure on factories to accelerate output. An uptick in the Chicago Purchasing Managers Index (to 56.2%) fits this pattern.

Revisions to fourth-quarter GDP echoed these soundings of firm business conditions. Though overall growth was revised down, from 4.7% to 3.9%, all of the reduction derived from a slower stock accumulation rate. Leaner inventories suggest that

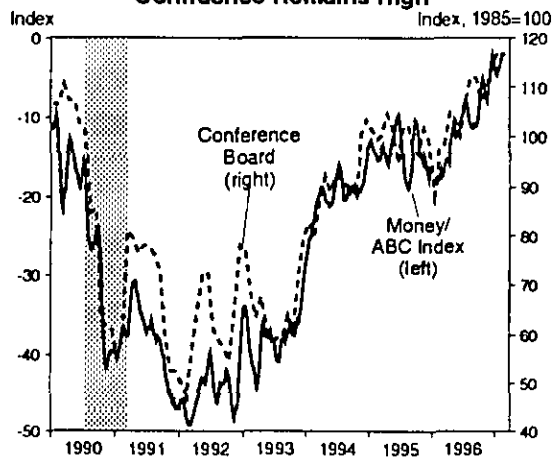
more growth can now be expected in the first quarter. Thus, we have revised up our GDP growth estimate for this period, from 1.8% to 2.5% annualized.

Federal Reserve Policy

Chairman Greenspan has clearly signaled that he and other senior central bankers are creeping closer to a short-term rate increase. In his report to Congress, Greenspan offered an outlook for continued firm U.S. economic growth with upside risks to core inflation measures, especially if labor markets continue to tighten and workers begin to demand greater wage and benefit awards. Of particular note were the Fed chief's remarks that some of the main forces suppressing wage and price gains in recent quarters—job insecurity, corporate profit margin expansion, and a rising dollar exchange rate—may now be waning, as well as his statement that even a small inflation pickup must not be tolerated. The latter comment underscores the Fed's willingness to act before clear signs of faster price inflation emerge.

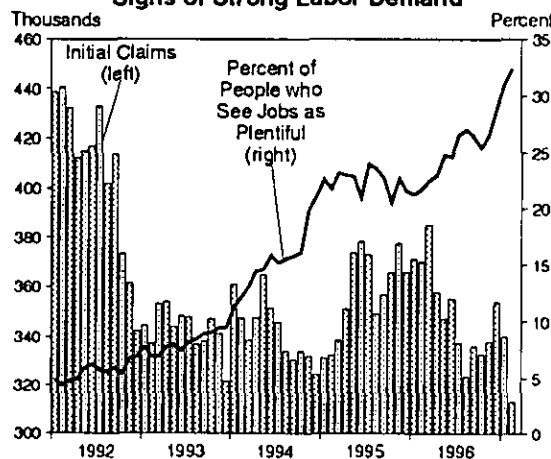
Coming reports on manufacturing activity and broad employment conditions will be of great importance in the central bank's decisions on interest rates next month. Given Chairman Greenspan's obvious focus on labor market developments, market participants are advised to pay close attention to both the size and the composition of the unemployed labor pool. A sharp drop in the unemployment rate or further evidence of a rise in the number of people voluntarily leaving jobs could tilt the balance in favor of an early start to the tightening process.

Confidence Remains High



Sources: Conference Board. Money Magazine/ABC News.

Signs of Strong Labor Demand



Source: Conference Board. Department of Labor.



Fiscal and Political Developments

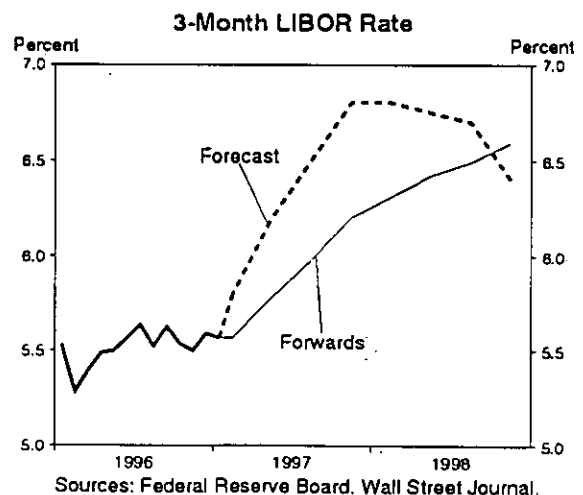
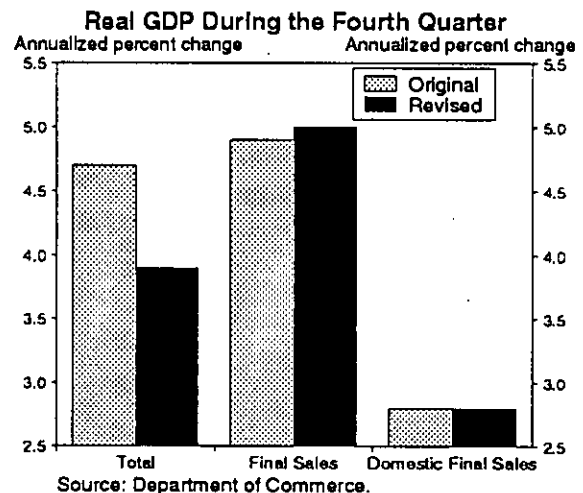
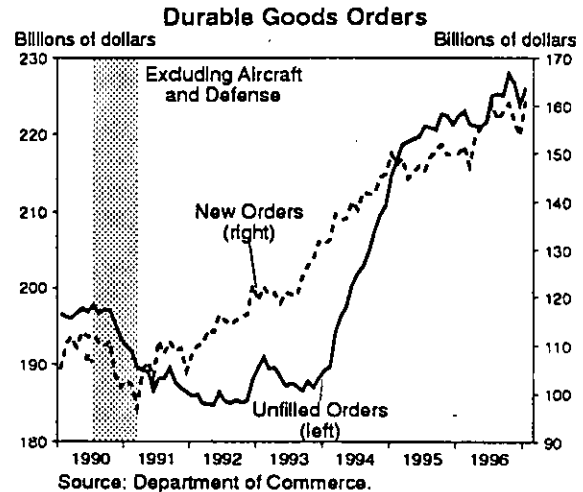
While a bipartisan deal to balance the budget remains likely, it does not look like this will be achieved before summer. Congressional leaders appear to be having a hard time coordinating the budget-writing effort, with top House members pursuing different agendas. Many Republican lawmakers may refuse to support any deal that does not contain a large net tax cut. A gap of more than \$60 billion exists between the fiscal 2002 deficit estimates of the White House and the Congressional Budget Office, and this must be bridged in a way that satisfies GOP conservatives while also allowing room for the steeper tax reductions they seek. On the Democratic side, political sensitivities related to the next presidential race may constrain flexibility. House Minority Leader Richard Gephardt (D-Missouri), a prospective challenger for Vice President Albert Gore in 2000, is refusing to take part in efforts to modify inflation indexation for the purpose of restraining growth in Social Security and other entitlement outlays. His stance may deter the Administration from supporting inclusion of a CPI adjustment in a budget accord.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Forward rates in the Eurodollar market once again reflect some risk of a Fed monetary tightening by midyear, but still not enough in our view to incorporate the distinctly more negative tone of Chairman Greenspan's comments and the strong forward momentum in economic activity suggested by recent indicators. Thus, we continue to recommend an outright short stance in December 1997 Euros, with stops reduced from 94.15 to 94.00 on the grounds that the market should not recover above levels that prevailed before the Fed chairman spoke. Similarly, long June 1997/June 1998 calendar spread positions should be retained, because coming economic reports should imply sturdy expansion, underscoring the potential for a sizeable cumulative rate rise over the next year. Raise stops for the calendar spread from 35 to 50 basis points.

We also sense that the tide has turned toward higher yields in the long duration sector of the market. Therefore, we would look for an opportunity to sell bonds at prices moderately above those which now prevail. Set shorts in June bond contracts on a rise to or above 111.08, with a stop on a close above 112.16.



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II. Capital Spending: Inflation's Balance Wheel

Benign inflation has certainly been the hallmark of the current business expansion, which features declining core rates of inflation in both consumer and producer prices on the eve of its sixth anniversary. In no small part, this is due to strong growth in capital spending, which so far has forestalled the emergence of serious inflationary constraints on U.S. capacity.

The notion that capital spending helps keep inflation under control, by expanding capacity, is nothing new. However, in the United States this role has been enhanced in recent years by various structural changes that have reduced the frequency of recessions—a regime we have termed the Brave New Business Cycle.¹ In this setting, the prospect of longer business expansions is apt to stimulate capital spending, while shorter delivery times for capital goods should help companies avert capacity constraints. Declining computer prices and rising import penetration in the capital goods sector have also reinforced the role of capital spending as an inflation preventative.

However, strong capital spending has not immunized the U.S. economy from inflation. Rapid growth in capacity provides no guarantee that productivity gains will fill the large gap between growth rates of output and labor input. Thus, we continue to expect inflation to turn up in 1997, albeit very gradually.

It also appears that year-to-year growth in capital spending has passed its peak in this business expansion. Rapid growth in capacity—4% per year in manufacturing and perhaps 3% overall—sets the stage for a slowdown over the next year or two, and it creates a clear risk of pronounced weakness in the unlikely event of a recession. But this is not necessarily bad news for U.S. capital goods producers, whose business has become increasingly international.

Inflation's Balance Wheel

Capital spending—defined as total business outlays on plant and equipment—is inherently less inflationary than any other form of expenditure. This is because it not only draws on current capacity but does so for the purpose of expanding future capacity.

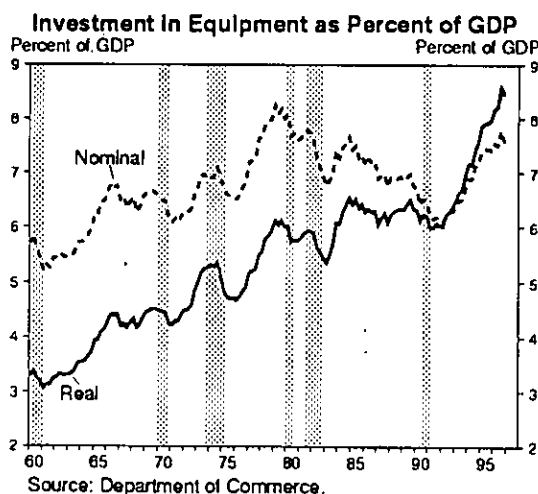
Thus, capital spending has always served as a balance wheel of sorts for inflation.

In our view, the advent of the Brave New Business Cycle has enhanced this role in four ways:

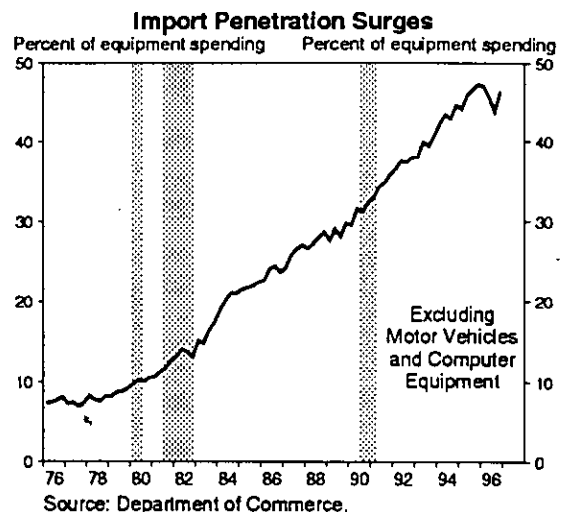
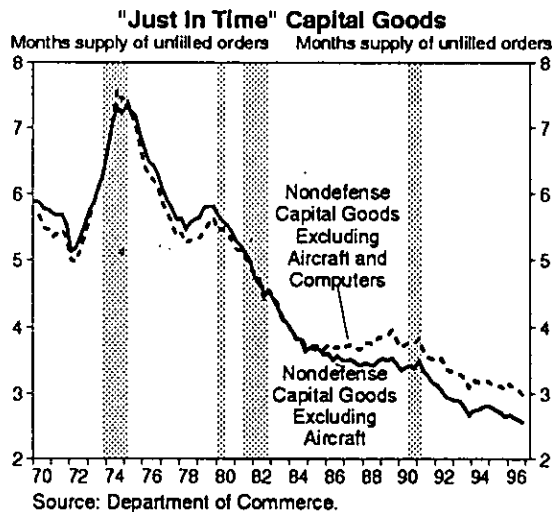
1. *Over time, capital spending is apt to rise as a percentage of real GDP.*

There are two reasons for this. First, cutting labor costs and keeping them under tight control has been a major motivation for the changes in corporate behavior that underlie the Brave New Business Cycle. One way to accomplish this objective is to provide a leaner work force with more capital per worker—that is, to invest more intensively in plant and equipment. Second, companies will be more willing to commit the funds needed for capital investment once they develop the confidence that business expansions will last longer.

On the surface, this does not appear to have happened. Since the last business cycle peak in the summer of 1990, real business spending has averaged 9.8% of real GDP, slightly less than the 10.0% average of the prior two cycles despite strong growth in recent years. But this is mainly due to the prolonged contraction in outlays for structures following the repeal of overly generous tax incentives in 1986. Outlays for business equipment have escalated sharply as a percentage of GDP, at least in real terms. Most of this escalation reflects the acquisition of computers and related equipment; however, even for other types of equipment the ratio of real outlays to real GDP has moved up slightly.



¹ For a detailed analysis, see William C. Dudley and Edward F. McKelvey, *The Brave New Business Cycle: No Recession in Sight*, January 1997.

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2. Capital equipment is getting cheaper, at least in relative terms.

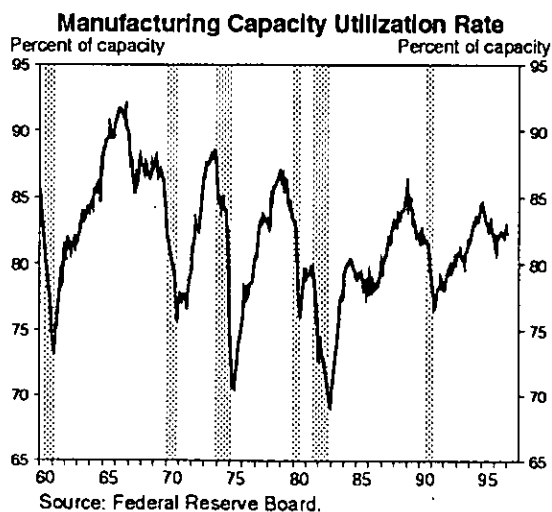
When it comes to nominal spending, the story is quite different. Even for equipment, nominal outlays have slipped relative to GDP—to 6.8% on average in this cycle from 7.2% in the preceding two cycles. This divergence reflects the 13.2%-per-year rate at which the deflator for computers and peripherals has been sliding, which has virtually offset the 2.8% annualized increase in prices of other types of equipment. While the difficulty of measuring the prices of computers cautions against putting too much confidence in the precision of this offset—or, for that matter, in the recorded strength of real capital spending—the basic point is clear: By investing heavily in computers, U.S. business firms have gotten a big bang for their investment buck and, in the process, helped contain U.S. inflation by steering the

composition of national expenditure toward items whose prices have been falling sharply.

3. Delivery times for capital goods are shorter.

In the 1970s, the ratio of unfilled orders to shipments of nondefense capital goods (other than aircraft) averaged 6.1, indicating an average delivery time of slightly more than 6 months. By 1996, this ratio had fallen to less than 3 months. While part of this downshift represents the shift toward computers and peripherals, which have short delivery times, the bulk of it represents faster delivery for other types of equipment. Thus, companies can bring capital equipment on line more quickly to alleviate capacity constraints as they begin to emerge.

The benefits of this are evident in the smoother path that capacity utilization has followed in recent years. Peaks in utilization have been progressively lower, and in the 1990s the standard deviation of quarterly changes in utilization has been cut by more than half—to 0.8 percentage points from 1.7 points in the prior two decades.



4. Capital spending has placed hardly any drain on existing domestic capacity.

Finally, one of the driving forces behind the emergence of the Brave New Business Cycle has been the rise in global competition, which has added an extra element of discipline to pricing. Nowhere is global competition more evident in the U.S. economy than in the capital goods sector, where the import penetration rate has shot up from about 31% in

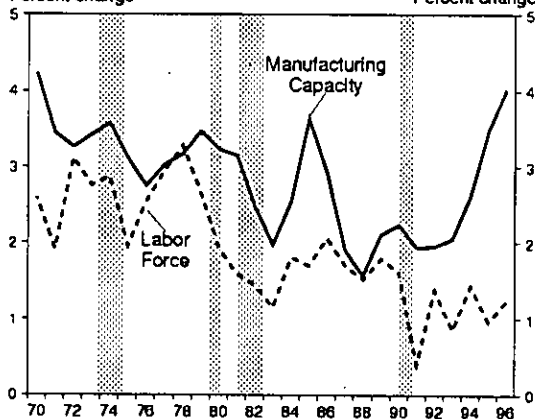


1990—already well above average—to 46% in 1996.² One implication of this surge in import penetration is that capital spending has placed almost no demand on domestic productive resources in the 1990s. This runs counter to the common perception that it has been a big growth driver. Once the increase in imports is netted out, the contribution of capital spending to real GDP growth in this expansion has been virtually nil. In essence, the benefits of contained inflation have been realized without the downside of draining existing capacity. Put differently, this decade's expansion of U.S. capacity has been accomplished almost entirely by importing excess capacity from abroad.

No Immunity From Labor Cost Pressures

Can capital spending continue to shield the U.S. economy from the labor-cost pressures that are slowly building? Probably not, because rapid capacity growth does not guarantee that productivity gains will fill the gap between growth rates in output and labor input. Although Federal Reserve figures indicate that manufacturing capacity grew 4% in 1996, the sustainable growth in the labor force is only about 1%. Thus, unless the economy slows from its current 3% trend, productivity growth must rise about 2% per year—more than double the current trend—to avert an acceleration in unit labor costs. Otherwise, inflation is apt to rise at least modestly as companies attempt to defend profit margins.

Capacity Growth Outstrips Labor Force Growth
Percent change



Source: Department of Labor, Federal Reserve Board.

Peak Growth Rates in Capital Spending

	Periods of Expansion				
	61Q1-69Q4	70Q4-73Q4	75Q1-80Q1	82Q4-90Q3	91Q1-Current
Qtrs Ahead of NBER Peak	16	1	4	25	N/A
Qtrs from Last NBER Trough	19	11	16	6	16

Risks Tilt Toward Slower Capital Spending

Rapid growth in capacity sets the stage for a slowing in business investment growth over the next year or two. Already, factory output can rise 4% per year without causing utilization to increase. Up-to-date figures for the total nonresidential capital stock are not available, but if past relationships hold, then the 3% real GDP growth we envision will not boost the utilization of existing capacity materially, and next year's growth slowdown will almost surely reduce utilization.

Under these circumstances, it seems likely that the peak growth rate for real capital spending in this expansion has passed. This underscores a change in the pattern of capital spending in the Brave New Business Cycle: Whereas growth in such spending has normally peaked toward the end of shorter expansions—hence the classification of capital goods stocks as “deep cyclicals”—in longer expansions, growth typically peaks well before the cycle peak in total output, normally in the fourth or fifth year. In the new regime, growth in capital spending will probably ebb during the late phase of an expansion, and there is a clear risk that recessions will provoke deeper declines in capital spending because capacity growth will generally be high.

Does this mean that investment in U.S. capital goods producers is unwarranted? Not necessarily. While soaring imports of capital goods have accounted for almost all of this decade's surge in equipment outlays by U.S. firms, growth in real exports of capital equipment has also been phenomenal, averaging 12% per year between 1990 and 1996. Thus, the future success of these companies increasingly lies in the growth of our major trading partners, where the best news on investment still lies ahead.

Ed McKelvey

² This calculation excludes computers and motor vehicles because imports of these items cannot be readily distinguished between business and consumer use.

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Key U.S. Economic Data

	Latest Monthly Data				6 Mo	12 Mo	Next
	'97 Feb	'97 Jan	'96 Dec	'96 Nov	Trend	Trend	Release
Nonfarm Payrolls (ch. Thousands)	--	271	261	181	209	246	Mar 7
Unemployment Rate (%)	--	5.4	5.3	5.3	5.3	5.4	
Index of Hours Worked (% ch)	--	-1.7	0.8	0.8	1.3	4.0	
Average Hourly Earnings (% ch)	--	0.1	0.5	0.8	4.3	3.8	
Producer price finished goods index (% ch)	--	-0.3	0.6	0.2	2.8	2.5	Mar 14
Excluding food and energy	--	0.0	0.1	0.1	0.4	0.6	
Consumer price index (% ch)	--	0.1	0.3	0.3	2.9	3.0	Mar 19
Excluding food and energy (% ch)	--	0.1	0.2	0.2	2.3	2.5	
Retail sales (% ch)	--	0.6	0.3	-0.1	4.3	4.9	Mar 13
Excluding motor vehicles (% ch)	--	0.4	0.0	0.2	3.0	4.6	
Industrial Production (% ch)	--	0.0	0.5	0.8	3.9	4.8	Mar 14
Manufacturing	--	-0.3	0.8	0.8	3.6	5.1	
Capacity utilization (%)	--	83.3	83.5	83.4	83.3	83.2	Mar 14
Manufacturing	--	82.2	82.7	82.4	82.3	82.2	
Housing Starts (annual rate, thousands)	--	1350	1323	1486	1425	1466	Mar 18
Single-family	--	1108	1005	1133	1120	1150	
Trade balance (billions, monthly)	--	--	-10.3	-7.9	-10.0	-9.4	Mar 20
Merchandise	--	--	-16.6	-14.3	-16.1	-15.5	
Factory Orders (% ch)	--	--	-1.3	-0.5	2.4	13.2	Mar 6
Durable Goods	--	3.6	-1.8	-1.7	2.8	4.5	Mar 26
Personal Income (% ch)	--	--	0.8	0.6	5.6	5.9	Mar 3
Wages and Salaries	--	--	1.2	0.8	6.3	6.9	
Purchasing Managers' Index (%)	--	52.0	53.8	52.4	52.0	50.7	Mar 3
Consumer Sentiment U Mich (Feb 66=100)	99.7	97.4	96.9	99.2	97.4	95.2	Mar 28
Conference Board (1985=100)	118.4	118.7	114.2	109.5	113.3	108.8	Mar 25

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- Payroll job growth likely slowed in February, due in part to depressing influences from unusually powerful seasonal adjustments (March 7). Other statistics in the monthly employment report should be relatively strong, however; in particular, hours worked are expected to rebound sharply, unemployment seems poised to decline at least 0.1%, and year-to-year growth in average hourly earnings may approach 4.0%.
- The national purchasing managers survey probably will show a pickup in manufacturing activity this month, led by gains in new orders (March 3).
- Personal spending appears to have risen sharply at the outset of 1997, temporarily outstripping income growth, which likely was dampened by poor weather in the western part of the country (March 3).
- Fed Chairman Greenspan returns to Capitol Hill for the final half of his semiannual monetary policy report (March 5). Although his prepared statement will be the same as that delivered this week, the Chairman's views on key issues may be clarified further in the question-and-answer session with House panel members.

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Mon Mar 3	8:30	Personal Income (Jan)	+0.4%	+0.1%	+0.8%
	8:30	Personal Consumption (Jan)	+0.7%	+0.5%	+0.5%
	10:00	Purchasing Managers Index (Feb)	53.5%	53.0%	52.0%
	10:00	Construction Spending (Jan)	-0.5%	+0.1%	-0.7%
		Domestic Motor Vehicle Sales (Feb)	13.0M	13.3M	13.6M
Tue Mar 4	10:00	New Home Sales (Jan)	-8.7%	-2.9%	-1.0%
	10:00	Leading Indicators (Jan)	+0.2%	+0.1%	+0.1%
Thu Mar 6	10:00	Factory Orders (Jan)	+2.3%	+0.7%	-1.3%
Fri Mar 7	8:30	Civilian Unemployment Rate (Feb)	5.3%	5.3%	5.4%
	8:30	Nonfarm Payroll Employment (Feb)	175,000	230,000	271,000
	3:00	Consumer Credit (Jan)	+\$6.0 bil	+\$5.5 bil	+\$4.9 bil

- Chairman Greenspan Delivers Monetary Policy Testimony To House Banking Subcommittee (Wed, Mar 5, 2:00)

- Chain-Store Sales Results (Thu, Mar 6)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	5.8%	6.2%	6.8%
Forward	5.7	5.9	6.3
2 Yr T-Note	6.2	6.5	7.0
Forward	6.2	6.4	6.5
10 Yr T-Note	6.7	7.0	7.2
Forward	6.6	6.7	6.8

Key Numbers in the Business Outlook

	1996	1997		1996	1997E
	Q4	Q1E	Q2E		
Real GDP	3.9%	2.5%	3.4%	2.5%	2.9%
Ind. Prod., Mfg.	3.7	5.5	4.4	2.7	4.2
CPI	3.2	3.5	2.8	2.9	3.2
After-Tax Profits*	10.9E	6.7	7.3	15.1E	4.9
Unemployment	5.3	5.3	5.1	5.4	5.1

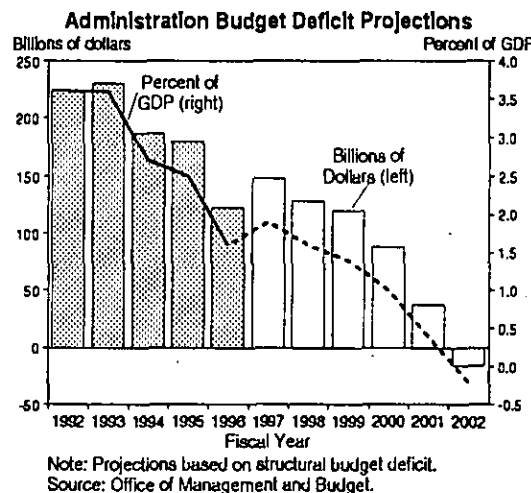
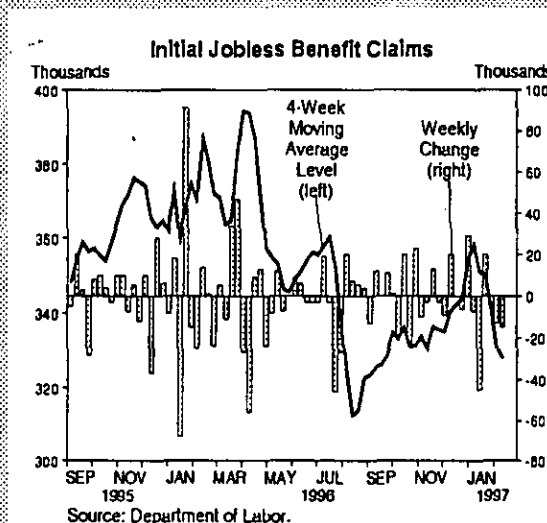
* Excluding inventory profits; adjusted for depreciation distortions.

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U.S. Economics Analyst

No Meaningful Fiscal Restraint Before the Millennium

- Although the retail sales report was a bit softer than expected, especially when the downward revision to non-auto retail sales was taken into consideration, other indicators suggest that the prospects for further solid gains in consumer spending remain intact.
- Both the Johnson Redbook and Mitsubishi chain store indices firmed this week, initial unemployment claims registered another drop, pushing the 4-week moving average to its lowest level since September, and the uptrend in consumer confidence is continuing.
- The prospects for a balanced budget agreement remain excellent. Republicans apparently plan to use the Clinton plan as a starting point in constructing their own proposal.
- The bad news is that it appears increasingly likely that a deal will not result in any meaningful fiscal restraint until the next millennium. In the Clinton budget plan, the fiscal restraint is extremely backloaded. This suggests that a budget deal will not have near-term implications for the conduct of monetary policy.
- The budget plan also avoids hard choices by adopting more favorable economic assumptions than those used under Congressional Budget Office scoring. This enables balance to be achieved with much less real deficit restraint. Differences in economic forecasts might be finessed through means of a "trigger" mechanism that would cut spending and suspend tax cuts in 2001-2002 if necessary, allowing Republicans to squeeze in bigger tax reductions.



Trade Recommendations

- Long March T-bond target was reached; we are neutral on bonds at the current price level.
- Stay long the June '97/June '98 Eurodollar future calendar spread, with a stop on a close below 35 basis points and a target of 90 basis points.
- Short position in December 1997 Euro futures was triggered this week. Stay short with a target of 93.50, and a stop on a close above 94.25.

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**Issue No: 97/7
February 14, 1997**

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I. Weekly Wrapup

Economic and Market Overview

U.S. financial markets this week were buoyant. The stock market surged as the Federal Reserve's decision to keep policy on hold at the February 4-5 FOMC meeting enabled investors to stop worrying about interest rates and instead focus on positive earnings surprises. Later in the week the bond market joined in, rallying after the Treasury's quarterly refunding was completed. Meanwhile, the dollar continued to advance, ignoring the G-7 finance ministers' statement that its appreciation had gone far enough.

On the economic front, the news was mixed. For example, in terms of consumer spending, both the Mitsubishi and Johnson Redbook chain store indices showed strength in the latest week. In contrast, retail sales in January were a touch weaker than expected, rising 0.6% overall and 0.4% excluding autos, and the rise in non-auto retail sales originally reported last month for December (+0.6%) was revised away.

Despite the ambiguity concerning household spending, most signs suggest that the economy continues to advance. For the household sector, the favorable confluence of a surging stock market, strong payroll employment gains, and rising confidence remains intact. This can be seen in the 15,000 further decline in initial unemployment claims during the February 8 week, which was sufficient to push the four-week moving average down to 328,000, the lowest since September 1996. Similarly, the weekly ABC/Money Magazine consumer sentiment survey showed an uptick into positive territory (+1) for the first time in more than a decade.

Producer prices for finished goods declined 0.3% in January. Despite this, inflation pressures have probably not subsided, judging by steady 0.1% monthly gains in core intermediate goods prices. The 0.2% decline in manufacturing output in January is unlikely to be meaningful given the vagaries of the weather and the mid-week timing of New Year's Day.

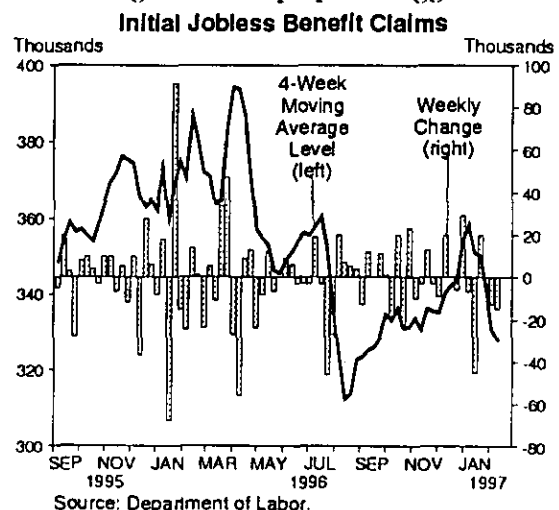
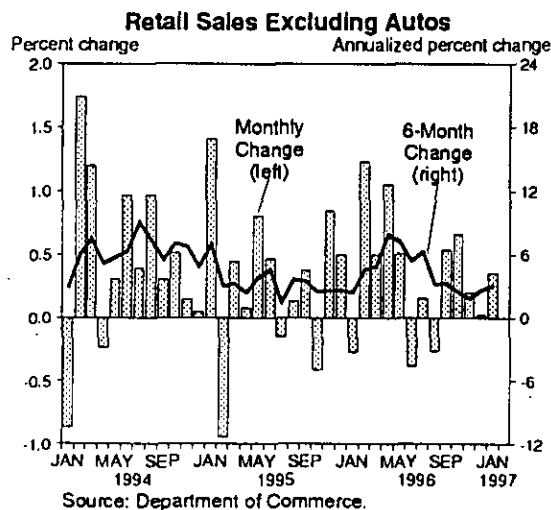
Federal Reserve Policy

Two press reports during the week suggested that Federal Reserve officials are paying closer attention to the growth rate of the broad monetary aggregates, M2 and M3. Our own view is that Fed officials are unlikely to put much weight on the monetary aggregates one way or the other, because it is still too early to tell if a stable linkage between money growth and nominal GDP growth has been reestablished.

Chairman Greenspan's semiannual Humphrey-Hawkins testimony before the House Banking Committee on February 27 will be the next important crossroads for judgments about his intentions concerning the course of monetary policy. With the consumer sector remaining healthy and the stock market continuing to surge, it appears likely that his testimony will be at least as cautionary as last month's musings when he stressed the need for the Federal Reserve to act preemptively in order to keep inflation in check.

Fiscal and Political Developments

The apparent willingness of Republican officials to use the Clinton administration budget as a starting point in crafting their own proposal suggests that any





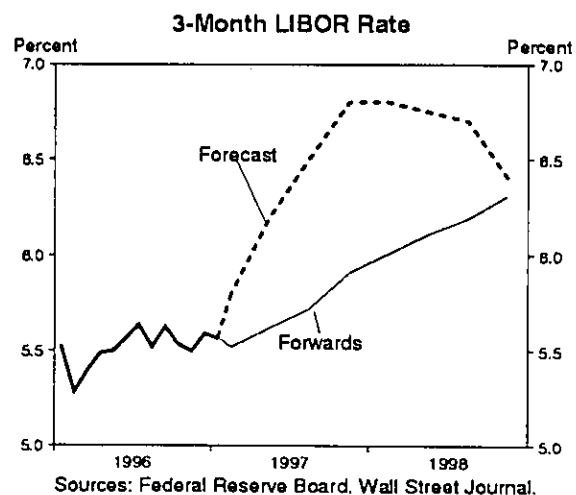
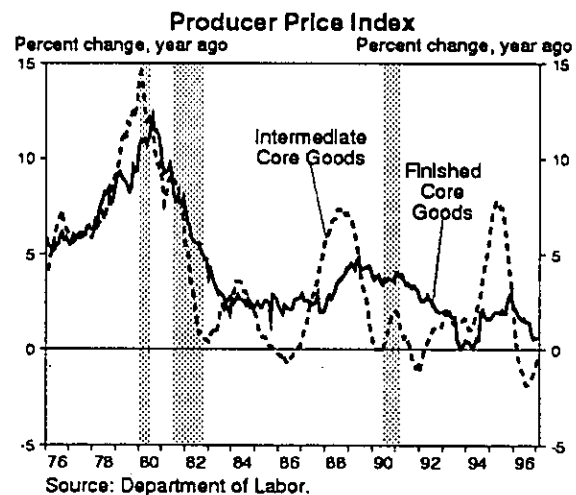
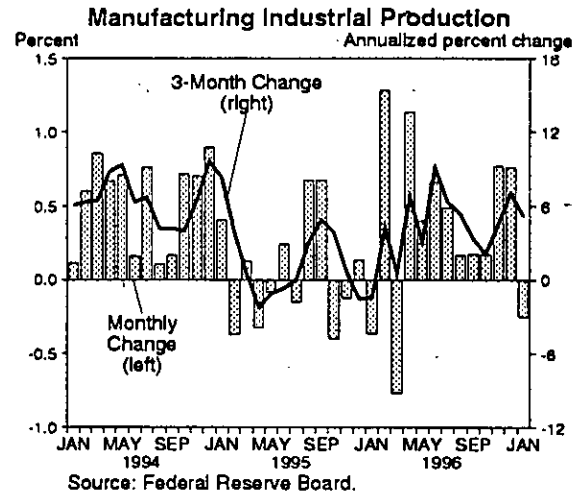
balanced budget agreement will not generate significant fiscal restraint for several years (see center section for a more detailed discussion of the budget outlook). One of the attractions of the Clinton budget plan to legislators is his use of more optimistic economic assumptions than the Congressional Budget Office. This significantly reduces the magnitude of spending cuts needed to achieve balance in 2002. Clinton then squares the circle and gets his budget scored as balancing under the CBO's assumptions by implementing a "trigger" that would cut spending and sunset most tax cut proposals after 2000 if such changes were needed to reach balance. This mechanism may prove attractive to Republicans, who want to squeeze more tax cuts into their plan—especially a reduction in the capital gains rate—without slashing outlays in the next few years.

Momentum for a broad-based capital gains tax cut is growing. For example, this past week the second-ranking Senate Democrat, Wendell Ford of Kentucky, endorsed a sliding-scale capital gains levy, with the rate falling as the holding period lengthened. We expect that President Clinton will accept a broad-based capital gains tax cut as part of a balanced budget deal as long as his own initiatives, such as increased spending on education, are accommodated.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

Our target of 114.00 for the March T-bond futures was reached. We would adopt a neutral posture for the time being. It is difficult to envision the rally extending to levels reached last Fall, given that the economy remains firm and that rules out any prospect for an easing of monetary policy. Anxieties about what Chairman Greenspan might say in his Humphrey-Hawkins testimony on February 27 should gradually increase, capping any further bond price advance. The January CPI report is also a potential risk for the market. We would remain long the June '97/June '98 Eurodollar calendar spread, with a stop on a close below 35 basis points and a target of 90 basis points to reflect our bearish posture on the outlook for short-term rates. We also would retain the short Dec '97 Eurodollar futures position triggered by this week's rally, with a target of 93.50 and a stop on a close above 94.25.





II. No Meaningful Fiscal Restraint Before the Millennium

Prospects for an agreement between President Clinton and Congress this year on a medium-term plan for federal fiscal balance remain very favorable. On February 6th, the White House released budget proposals that project a \$17 billion surplus in fiscal 2002, which would be the first surplus in 33 years. While House and Senate leaders expressed disappointment with a number of specific items or omissions in the president's plan, they appear prepared to use his submission as a starting point for developing a Congressional budget resolution that also provides for balance within five years. Elected officials from both major parties are giving their highest priority to reaching such a deal, and are displaying much greater flexibility on substantive policy issues than was the case in 1995 or 1996.

Despite these hopeful signs for a bipartisan accord, however, this year's budget-writing process is unlikely to alter the currently neutral fiscal impulse on the economy for the next few years, nor should it materially alleviate concerns about the long-term outlook for federal finances. Most of the deficit restraint in the president's budget is delayed until 2000 or later, and the vast majority of those savings would derive from asset sales, projected interest rate declines, or non-guaranteed cuts in areas subject to annual appropriations, rather than from long-term structural changes. Congress is displaying no inclination to press for reforms of entitlement spending programs that go beyond those outlined by the Administration, but instead is pushing for broader tax relief, and might accede to accounting devices for the out-years as a means of reaching that goal. With fiscal policy already shifting from a negative to an essentially neutral influence on domestic business activity, this year's budget debate should not be expected to inhibit the Federal Reserve from using monetary tightening to brake the persistent above-trend pace of real GDP growth.

President Clinton's Budget: No Further Restraint Before 2000

The president's budget outline for fiscal years 1998-2002 illustrates the degree to which the national politicians' taste for fiscal restraint has faded since early last year. To be sure, the latest Clinton budget does promise balance by fiscal 2002, meeting the target established by the Republican majority in Congress. It does so, however, by employing a number of time-worn accounting tricks, such as

lumping asset sales and other unusual revenues into the final year of the period, and planning the expiration of certain spending programs just prior to the deadline for budget balance. If these highly dubious elements are excluded, and the more conservative set of economic assumptions preferred by the Congressional Budget Office is employed, the White House forecast of a \$17 billion surplus in 2002 turns into a deficit of about \$76 billion, or 0.8% of GDP. That would be little changed from the fiscal 1996 shortfall (1.4% of GDP).

A Balanced Budget Mirage in 2002?

	\$Billions
Fiscal 2002 Budget Balance (OMB)	+\$17.0
Less:	
Difference Between OMB and CBO	
Budget Assumptions	68.0
Audio Spectrum Auction	22.1
Strategic Petroleum Reserve Sales	1.1
Acceleration of State Unemployment	
Insurance Taxes	1.3
Other Asset Sales	0.7
	-93.3
Adjusted Fiscal 2002 Balance	-\$76.3

Even on its own terms, the Administration's fiscal plan would require essentially no further belt-tightening through the end of this decade. Compared to its estimate of the baseline (or "current services") budget, the Administration would trim the deficit by only \$21.6 billion during fiscal years 1998 and 1999, or 0.1% of GDP. This pales in comparison to the actual 0.7% average annual cut in the structural deficit as a percent of GDP between fiscal years 1993 and 1996.

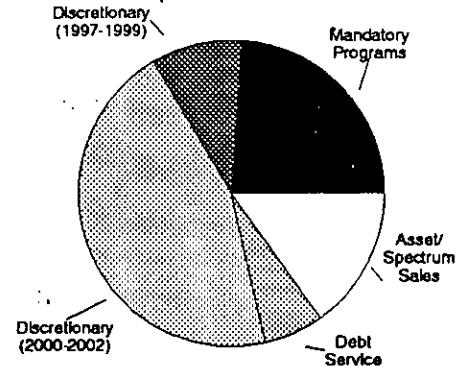
The composition of proposed budget savings for fiscal years 1997-2002 also reveals a limited willingness to promptly tackle either discretionary outlay excesses or—more importantly—the rapid growth of mandatory spending programs, which is the main source of expected future budget difficulties. Out of \$252.1 billion in estimated aggregate six-year savings versus the baseline deficit, only one-third reflects structural changes to entitlements such as Medicare and Medicaid or swift cuts in discretionary programs (primarily in the defense budget). The balance is comprised of major asset sales, spectrum auction proceeds, estimated debt service reductions, and savings in discretionary outlays that cannot be legislated by this Congress.

Congressional Pressure For Cuts Shifts From Entitlements to Taxes

In a stark contrast to the last two years, there is no sign that the Congressional leadership plans to push for a more aggressive attack than the Administration on growth in federal entitlement outlays. After a bruising election campaign in 1996, out of which their House majority was slimmed, Republican lawmakers are showing little support for another strong effort to squeeze these popular but expensive items. Rather than press for reforms that would offer more dramatic savings beyond the millennium, the leadership now seems inclined to largely accept the president's recommendations on Medicare and Medicaid with some relatively minor modifications.

Similarly, the potential for an early, large downward adjustment to annual cost-of-living changes in Social Security benefits and income tax brackets has receded. Studies by the Boskin Commission and the Federal Reserve, which both found that the official consumer price index greatly overstates the actual pace of price increases, have handed politicians a stronger analytical basis for modifying indexation procedures to a degree that would enormously reduce prospective deficits, particularly in the crucial period beyond 2010. Neither the Administration nor

Sources of Proposed Deficit Cuts, 1997-2002



Source: Office of Management and Budget. Our Calculations.

Congress, however, appears willing to make the first move in this direction, for fear of drawing harsh attacks from affected parties and political opponents. Thus, any index rule changes this year will likely be technical in character and minor in size.

Rather than renew pressure for mandatory program reforms, GOP lawmakers this year appear to be emphasizing broad-based tax reductions as an essential component of any budget agreement. This means that, to the extent they can be found, outlay savings beyond those endorsed by President Clinton will likely be used to fund an expansion of tax relief

Proposed Budget Deficit Reduction, By Category
(Fiscal Years, \$ Billions)

	1997	1998	1999	2000	2001	2002	1997-2002
Baseline Deficit*	-\$127.7	-\$119.5	-\$140.1	-\$127.6	-\$108.5	-\$100.8	
Clinton Budget*	-125.6	-120.6	-117.4	-87.1	-36.1	+17.0	
Change in Deficit	<u>-\$2.1</u>	<u>+\$1.1</u>	<u>-\$22.7</u>	<u>-\$40.5</u>	<u>-\$72.3</u>	<u>-\$117.7</u>	<u>-\$252.1</u>
Sources of Deficit Reduction:							
Spending Cuts:							
Discretionary:							
Defense	-0.7	-5.3	-14.6	-14.4	-21.9	-23.2	-79.5
Non Defense	0.0	-0.6	-3.3	-8.3	-18.8	-27.0	-58.0
Mandatory:							
Medicare	0.0	-4.3	-11.4	-22.2	-27.8	-34.6	-100.2
Medicaid	0.0	1.4	0.4	-1.4	-3.9	-5.8	-9.3
Other Mandatory	0.2	5.1	7.2	8.0	5.4	0.5	26.2
Tax Changes	-1.6	7.0	1.4	3.7	5.5	4.9	22.4
Asset Sales	0.0	0.0	0.0	0.0	0.0	-1.9	-1.9
Spectrum Sales	0.0	-2.1	-1.8	-3.8	-6.3	-22.1	-36.1
Debt Service	-0.1	-0.1	-0.7	-2.1	-4.5	-8.5	-15.9
	<u>-\$2.1</u>	<u>+\$1.1</u>	<u>-\$22.7</u>	<u>-\$40.5</u>	<u>-\$72.3</u>	<u>-\$117.7</u>	<u>-\$252.1</u>

* Based on Clinton administration economic forecasts.

Source: Office of Management and Budget.

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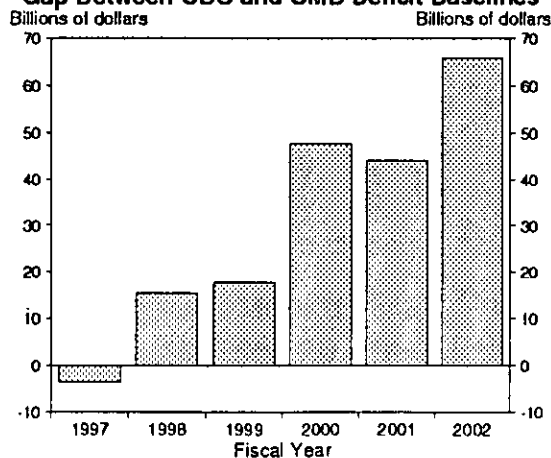
well beyond the \$22.4 billion, five-year net amount backed by the Administration. Taxation differences probably represent the biggest remaining hurdle to a budget accord, although in the end it should not prove insurmountable given strong desires on both sides for a deal.

In fact, to achieve a budget compromise that includes the bigger tax cuts they seek, the Republicans might accept a modified version of the president's proposal for a "trigger" mechanism that would cancel tax abatements and make across-the-board spending reductions in fiscal years 2001-2002 in the event that proves necessary to produce actual budgetary balance in the final year. A device of this kind would enable lawmakers to use the Administration's economic assumptions, which suppress the baseline deficit forecasts for 2001-2002 by a combined \$108 billion. Thus, it would permit the budget to be balanced on paper without much tough fiscal medicine.

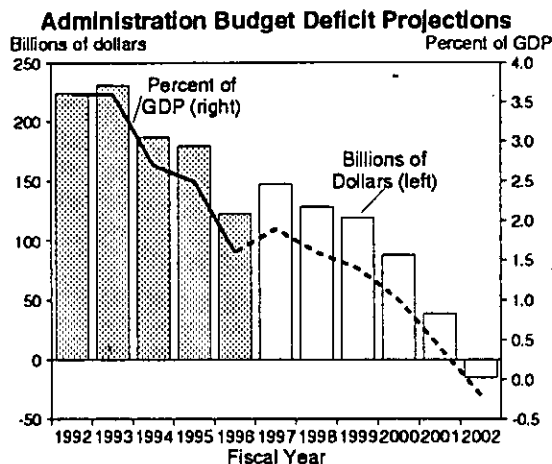
Budget Should Carry Little Weight in Fed Policy Decisions

From 1993 through early 1996, senior U.S. central bankers needed to pay close attention to the federal budget-writing process as they evaluated the appropriateness of monetary policy changes in response to domestic economic and financial developments. Arguably, the Fed's decision to leave interest rates steady at strikingly low levels throughout 1993 despite signs of growing strains on resource supplies owed much to the large-scale deficit reduction effort undertaken by President Clinton in his first budget. Steps to ease credit in 1995 and early 1996, similarly, no doubt were encouraged by the drive for fresh spending cuts that dominated the last Congress.

Gap Between CBO and OMB Deficit Baselines



Source: Senate Budget Committee.



Note: Projections based on structural budget deficit.
Source: Office of Management and Budget.

Those conditions no longer appear to be present. The deficit as a percent of GDP, both in actual and structural terms, has leveled off or edged up slightly, and it likely will not move down again to any notable degree until at least fiscal 2000. In the near run, there is a very high probability that any budget agreement will include tax abatements weighted toward middle-income households, which could lend support to personal consumption at a time when inventories are at historic lows and labor supplies are exceptionally tight.

For these reasons, we would expect the Fed to give the budget little or no weight this year in their monetary policy deliberations. Financial market participants, consequently, should not expect that the outcome of the budget process will have a perceptible impact on the trajectory of short-term rates in 1997.

John Youngdahl



Key U.S. Economic Data

	Latest Monthly Data				6 Mo Trend	12 Mo Trend	Next Release
	'97 Jan	'96 Dec	'96 Nov	'96 Oct			
Nonfarm Payrolls (ch. Thousands)	271	261	181	261	209	246	Mar 7
Unemployment Rate (%)	5.4	5.3	5.3	5.2	5.3	5.4	
Index of Hours Worked (% ch)	-1.7	0.8	0.8	-0.7	1.3	4.0	
Average Hourly Earnings (% ch)	0.1	0.5	0.8	-0.1	4.3	3.8	
Producer price finished goods index (% ch)	-0.3	0.6	0.2	0.2	2.8	2.5	Mar 14
Excluding food and energy	0.0	0.1	0.1	-0.2	0.4	0.6	
Consumer price index (% ch)	--	0.3	0.3	0.3	3.0	3.2	Feb 19
Excluding food and energy (% ch)	--	0.2	0.2	0.2	2.6	2.7	
Retail sales (% ch)	0.6	0.3	-0.1	0.7	4.3	4.9	Mar 13
Excluding motor vehicles (% ch)	0.4	0.0	0.2	0.7	3.0	4.6	
Industrial Production (% ch)	0.0	0.5	0.8	0.2	3.9	4.8	Mar 14
Manufacturing	-0.3	0.8	0.8	0.2	3.6	5.1	
Capacity utilization (%)	83.3	83.5	83.4	83.0	83.3	83.2	Mar 14
Manufacturing	82.2	82.7	82.4	82.0	82.3	82.2	
Housing Starts (annual rate, thousands)	--	1329	1514	1385	1449	1465	Feb 20
Single-family	--	1024	1161	1088	1133	1155	
Trade balance (billions, monthly)	--	--	-8.4	-8.0	-9.7	-9.1	Feb 19
Merchandise	--	--	-14.7	-14.1	-15.8	-15.2	
Factory Orders (% ch)	--	-1.3	-0.5	1.1	2.4	13.2	Mar 6
Durable Goods	--	-1.9	-1.7	0.6	-1.6	0.6	Feb 27
Personal Income (% ch)	--	0.8	0.6	0.1	5.6	5.9	Mar 3
Wages and Salaries	--	1.2	0.8	-0.1	6.3	6.9	
Purchasing Managers' Index (%)	52.0	53.8	52.4	50.4	52.0	50.7	Mar 3
Consumer Sentiment U Mich (Feb 66=100)	97.4	96.9	99.2	96.5	96.7	94.3	Feb 28
Conference Board (1985=100)	116.8	114.2	109.5	107.3	111.9	107.0	Feb 25

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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**Goldman
Sachs****U.S. Calendar****Focus for the Week Ahead**

- The consumer price index for January is likely to be a bit firmer than in recent months. Not only might higher energy prices push up the overall index, but also there have been some chronic seasonal adjustment problems with the CPI that increase the chances for a bad reading early in the year (Feb. 19).
- The trade deficit for December is apt to widen sharply, due to a combination of strong imports (particularly in the petroleum group) and flat exports (Feb. 19).
- A rebound in housing starts in January from the depressed December reading is likely, but should be dampened by weakness in the West, where severe flooding presumably constrained building activities (Feb. 20).

Economic Releases and Other Events

<u>Date</u>	<u>Time</u>	<u>Indicator</u>	<u>Estimate</u>		<u>Last Report</u>
			<u>GS</u>	<u>Consensus</u>	
Wed Feb 19	8:30	Consumer Price Index (Jan)	+0.3%	+0.3%	+0.3%
		Excluding Food & Energy	+0.3%	+0.1%	+0.1%
	8:30	Trade Balance (Dec)	-\$10.7 bil	-\$10.0 bil	-\$8.4 bil
Thu Feb 20	8:30	Housing Starts (Jan)	+3.5%	+6.8%	-12.2%
	10:00	Philadelphia Fed Survey (Feb)	+9.0%	n.a.	+11.3%

- Homebuilders' Survey (Tue, Feb 18)
- Kansas City Fed Survey (Wed, Feb 19 - 11:00)
- Treasury Announces 2- and 5-Year Notes (Wed, Feb 19 - 2:30)
- Treasury Announces 1-Year Bill (Fri, Feb 21 - 2:30)

Interest Rates: Forecast vs. Forward Yields:

	<u>3 mo</u>	<u>6 mo</u>	<u>12 mo</u>
LIBOR 3 mo	5.8%	6.2%	6.8%
Forward	5.6	5.7	6.0
2 Yr T-Note	6.2	6.5	7.0
Forward	5.9	6.1	6.2
10 Yr T-Note	6.7	7.0	7.2
Forward	6.4	6.4	6.5

Key Numbers in the Business Outlook

	<u>1996</u>	<u>1997</u>		<u>1996</u>	<u>1997E</u>
	<u>Q4</u>	<u>Q1E</u>	<u>Q2E</u>		
Real GDP	4.7%	1.8%	3.4%	2.5%	2.9%
Ind. Prod., Mfg.	3.7	3.6	4.4	2.7	4.2
CPI	3.2	3.5	2.8	2.9	3.2
After-Tax Profits**	10.9E	6.7	7.3	15.1E	4.9
Unemployment	5.3	5.3	5.1	5.4	5.1

** Excluding inventory profits; adjusted for depreciation distortions.

I. Weekly Wrapup

Economic and Market Overview

U.S. bond prices rallied as most components of the payroll and household employment reports were softer than anticipated. To market participants, this confirmed the wisdom of the FOMC's decision to keep monetary policy unchanged.

Although the payroll gain in January of 271,000 was firmer than the consensus view, the guts of the report were weak, with the workweek collapsing to its lowest level in a year and that pulling down the index of aggregate hours worked by 1.7%. In addition, average hourly earnings managed only a 0.1% advance, and the civilian unemployment rate ticked up to 5.4%. The weakness in hours worked and earnings, however, is suspect. Hours worked are likely to rebound in February, along with the workweek (assuming normal weather), and average hourly earnings were no surprise given big rises in the prior two months. Thus, the employment reports do not change the picture of an economy that is still marching forward with considerable momentum.

The latest indicators of household income and spending have been surprisingly strong. Total personal income climbed 0.8% in December, largely fueled by a 1.2% jump in wage and salary earnings. Total real income is rising at roughly 3½% annualized, somewhat faster than a year ago. Personal consumption, meanwhile, moved up 0.3% in real terms, showing no slowdown from the fourth-quarter average pace. Personal demands for big-ticket items were especially buoyant around the turn of the year. New single-family home sales edged

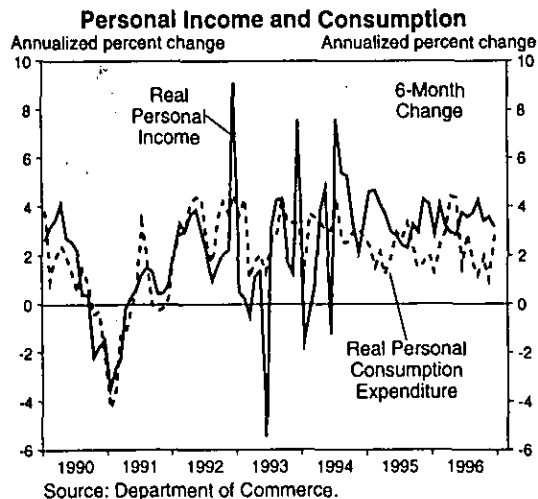
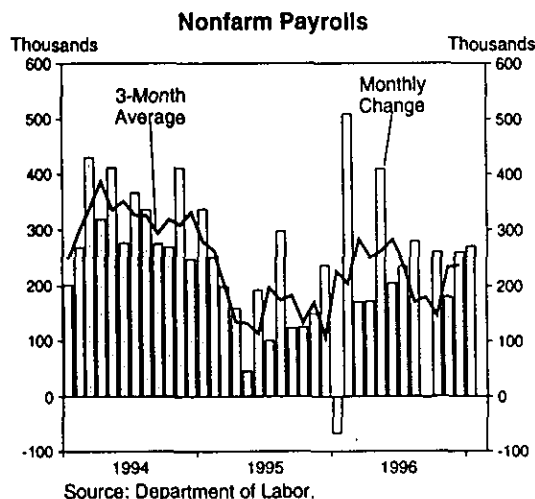
down only 1.0% in December to 783,000 annual units, further shrinking the supply of unsold new dwellings, which is now about 15% below normal relative to sales. In the motor vehicle industry, domestic producers had sales in January totaling 13.6 million annualized, matching their best performance since last February.

In contrast to the solid trends in domestic spending, U.S. factory statistics lately have softened. Purchasing managers reported a decline in their composite index to 52.0% in January, and factory orders fell 1.3%, including a 0.7% decline for nondurable products. It is doubtful, however, that this signals an incipient retrenchment in manufacturing production. Low factory inventories (-0.3% in December) and a renewed decline in weekly unemployment claims (four-week average down to 331,000, the lowest since November) suggest that the goods-producing sector will rebound.

Federal Reserve Policy

The FOMC's decision to keep monetary policy unchanged extends to over a year the period of stability in the federal funds rate. In the past quarter century, only once—during the period between late 1992 and early 1994—have U.S. central bankers gone longer without changing their stance.

Judging from the tone of the December 17 FOMC meeting minutes, the potential for a tightening within the next few months remains high. At that time, officials were inclined to think that prices were more likely to accelerate than slow down. In addition,



policy makers clearly expressed concerns for the first time about the potential for strength in equity markets to generate unexpectedly brisk consumer outlays, given the sharp and sustained rise in household wealth since late 1994. While Fed leaders concluded seven weeks ago that "anticipatory tightening was not yet called for," it seems clear that their patience with above-trend economic expansion and progressive reductions in the free labor supply was beginning to wear thin.

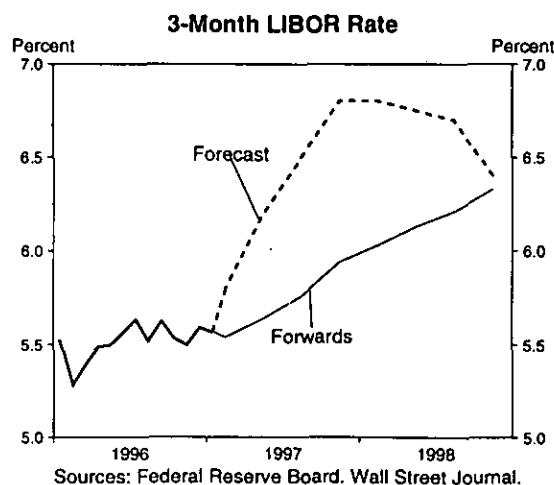
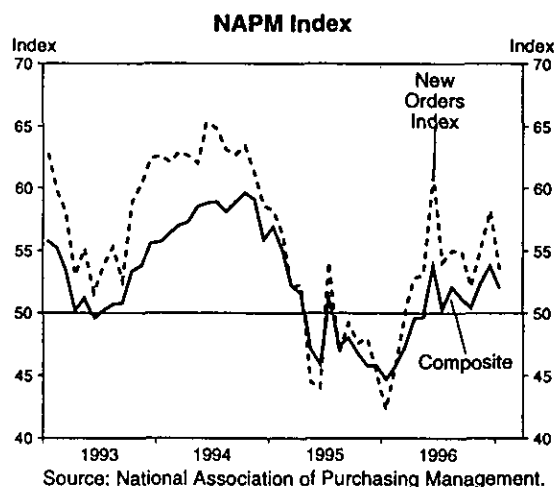
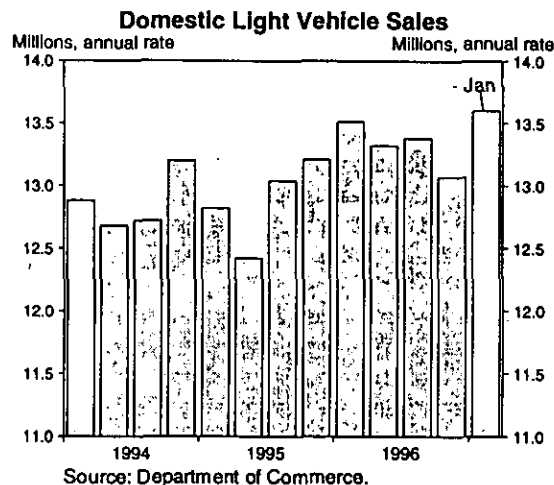
Fiscal and Political Developments

Official Clinton administration budget proposals confirmed suspicions that the taste for aggressive budget restraint has faded. Fully 84% of the total projected deficit reduction falls in fiscal years 2001-2002, while in the next two years the shortfall would grow a bit as taxes were cut and education spending padded. Just as predictable was the response of Republican leaders, who criticized these elements of the plan as well as the administration's adoption of more optimistic economic assumptions than those put forward by congressional budget estimators last month. House and Senate committees with jurisdiction over budgetary issues will now hold hearings on the Clinton blueprint, which could last for several weeks. This will give top lawmakers an opportunity to highlight their areas of disagreement with the president, and it will delay until spring any concrete legislative steps toward bridging those gaps.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

We would stay long March '97 T-bond futures for another week, maintaining our target of 114.00 and establishing a stop on a close below 111.24. However, given the sharp flattening of the yield curve in the short end of the market—a washing out of expectations concerning future Fed tightening, we would look to establish long June '97/June '98 Eurodollar calendar spread trades at or below 50 basis points (currently 48 basis points), with a stop on a close below 35 basis points and a target of 90 basis points. Given the sharp rally in Dec '97 Eurodollar futures, we would also begin to look for opportunities to get short, suggesting establishing shorts at prices at or above 94.15 (currently 94.08), with a target of 93.50 and a stop on a close above 94.25. The FOMC minutes indicate that Fed tightening remains likely, but that outcome is no longer priced into the Eurodollar futures market.



II. The Bond Risk Premium and the Brave New Business Cycle

The business cycle has changed in significant ways in recent years—dampening inflation pressures and extending the duration of expansions.¹ This leads to an important question: Do these changes also have long-term implications for bond and stock market valuation? Specifically, should the brave new business cycle result in higher or lower risk premiums on U.S. Treasury bonds and U.S. equities?

In this weekly, we analyze the implications for the bond market.² We conclude that there are some reasons for the brave new business cycle to cause bond risk premiums to shrink somewhat over time—helped by lower inflation volatility and the fiscal dividend generated by an extended business expansion. We also find that the risk premium embodied in the current yield curve appears to be about the right size.

Measuring the Bond Risk Premium

The bond risk premium measures the expected incremental return from holding a Treasury bond until maturity compared to the return obtained from rolling a series of Treasury bills over the same time frame. It is the compensation to bond holders for: 1) the higher price volatility of longer-dated instruments stemming from changes in real interest rates and inflation expectations, and 2) the potential opportunity costs versus investing in short-term instruments should real interest rates and/or inflation expectations trend secularly higher over time.

Unfortunately, the bond risk premium is not directly observable. That is because the risk premium on bonds is relative to the expected return on a series of future short-term obligations, not the current level of short-term rates. If current short-term interest rates are lower or higher than what investors expect in the future, then the yield curve will also tend to be steeper or flatter than the bond risk premium embodied in it.

Over the long-run, a good proxy for this premium is the average yield curve spread between Treasury bonds and Treasury bills. That is because errors between anticipated and actual short-term rates presumably cancel out over time. To assume

otherwise would imply that investors make chronic errors in their expectations of future short-term rates over time. Thus, the average shape of the yield curve probably provides a reasonable approximation of the long-term risk premium.

On this basis, the average yield curve spread between 10-year T-notes and 3-month T-bills (bond equivalent basis) has averaged 121 basis points over the 1957-1996 period. This is not much different from the average yield spread of 134 basis points in 1996.

However, the yield curve spread over the long run, which generates an estimate of the historical bond risk premium, tells us little about the appropriateness of the current yield curve spread. After all, factors that affect the risk premium may have changed as the economy has evolved, potentially lowering or raising the bond risk premium over time. To see if this is the case, we must undertake two steps. First, we need to estimate the size of the current bond risk premium. Second, we need to compare that figure to the risk premium that we estimate should result given changes in those factors that have influenced its size over time. These include changes in the size of the budget deficit, interest rate differentials between the U.S. and abroad, and the volatility of real interest rates and inflation.

To measure the bond risk premium, we first need to estimate how the yield curve shape depends upon expectations about future short-term rates. That portion of the yield curve slope unexplained by such expectations gives us an estimate of the bond risk premium.

We try two different methods in making this adjustment. First, we assume that expectations about future short-term rates are formed in an adaptive way. Investors look at the recent level of short-term rates to determine their expectations about the future. Under

10-Year Notes versus 3-Month Bills*

Period	Average Spread (basis points)
1957-1982	77
1983-1996	204
1957-1996	121
1996	134

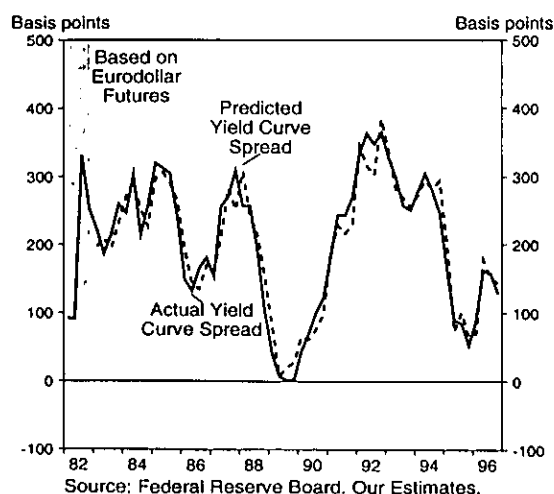
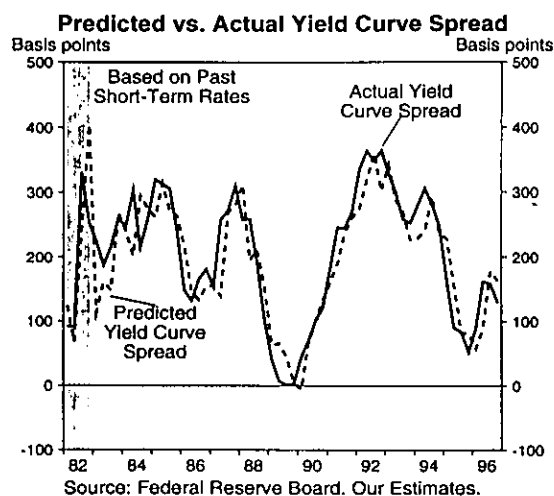
* T-bill yields on a bond equivalent basis.

¹ See *The Brave New Business Cycle: No Recession in Sight*, January 1997 for details.

² Our evaluation of the implications of changes in the business cycle on the equity risk premium will follow in two weeks.

this method, we find that the most recent three years of short-term interest rates explain most of the fluctuations in the yield curve shape, suggesting that expectations are formed in that way. Second, we assume that expectations about future short-term rates are embodied directly in Eurodollar futures prices. We find that this method actually has a somewhat greater power in explaining the shape of the yield curve. Its chief disadvantage is that the time series of Eurodollar futures data does not go back nearly as far in time as the historical short-term rate data.

As shown below, both methods appear to do a good job in predicting the shape of the yield curve. Under the first method, the predicted yield curve spread between 10-year Treasury notes and 3-month T-bill yields (bond equivalent basis) is currently about 162 basis points, under the second method about 143 basis points. Both are not much different than the current 117 basis point yield curve spread.



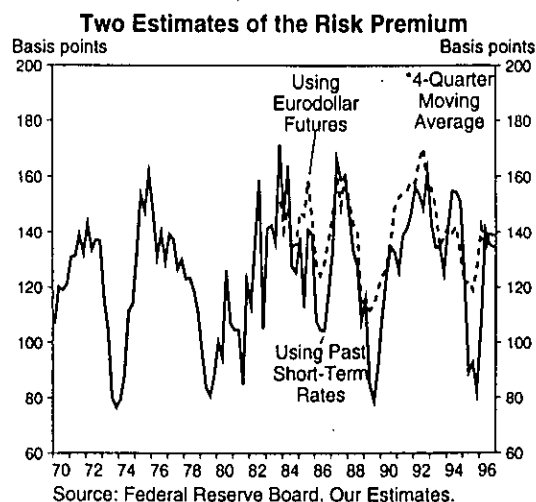
After adjusting for expectations about short-term rates, we obtain estimates for the bond risk premium. As can be seen below, although our estimates of the bond risk premium fluctuate over time—sometimes sharply—there is no clear trend suggesting that the bond risk premium has fallen or increased on a secular basis. Instead, there is an obvious cyclical component, which suggests that there are factors that influence the size of the risk premium at any point in time.

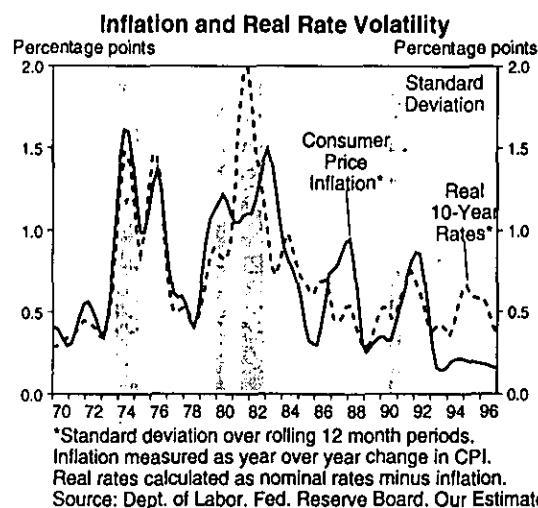
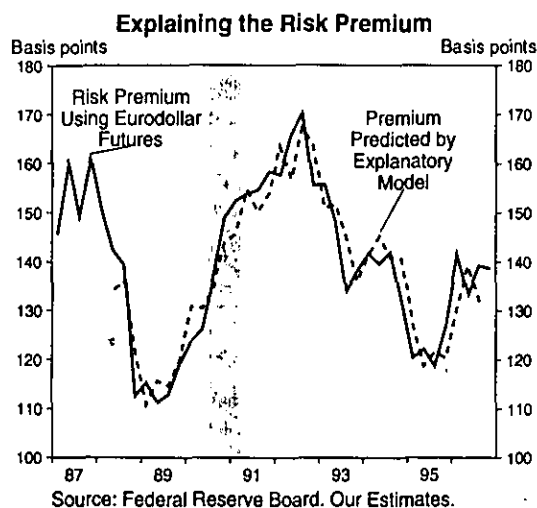
What Influences the Bond Risk Premium

Given these two estimates of the bond risk premium, the next step is to identify those factors that influence its size. Once we have these factors in hand, we can assess whether the current bond risk premium is too high, too low, or about right. We can also then evaluate whether the brave new business cycle—by changing these critical factors—implies changes in the size of the bond risk premium over time.

We find that four factors explain much of the variation in the risk premium: changes in the budget deficit, the size of the 10-year note interest rate differential between the U.S. and Japan, the level of implied price volatility on the rolling 10-year Treasury note future, and the absolute level of short-term interest rates. These factors work distinctly better in explaining the risk premium estimates developed from Eurodollar futures prices than from historical short-term interest rates.

The rationale for why these factors matter is generally straightforward: A narrowing budget deficit reduces the supply of Treasuries and causes investors to become less nervous that debt pressures will force the central bank to reflate; the size of the interest rate





differential between the U.S. and abroad influences the appetite of foreign investors for Treasury notes; higher implied volatility implies greater uncertainty about the path of real interest rates and inflation, which together determine the level of nominal interest rates over time.³

Taking these factors into consideration, the current shape of the bond yield curve appears about right. The current risk premium embodied in the bond yield curve is slightly lower than the 1983-1996 average because the budget deficit has been declining, interest rate differentials between the U.S. and Japan are unusually wide, and the implied price volatility on the 10-year Treasury note future is slightly lower than its average level over the period.

Looking forward, there are some reasons to expect that the bond risk premium could decline modestly over time. In particular, the deficit is likely to shrink further given our expectation that the Clinton administration and Congress will reach a balanced budget agreement this year. In addition, changes in the nature of the business cycle suggest that inflation volatility—a major component that affects implied price volatility—is likely to remain low and could even fall further over time. Aspects of the brave new business cycle, such as global competition and more flexible labor and capital markets, should keep inflation in check over time.

³ Why the level of short-term interest rates matters in explaining the risk premium is more difficult to explain. Perhaps it captures an idea of the degree of deviation from a "normal" level of short-term rates, above and beyond that captured by expectations embodied in Eurodollar futures.

At the same time, it appears unlikely that the risk premium will get back to the very low levels reached during the 1950s and 1960s, when the average yield curve spread between 10-year Treasury notes and 3-month Treasury bills was less than 80 basis points. Most importantly, there are limits to how far implied price volatility can decline when one component of such volatility—the volatility of real interest rates—is likely to remain relatively high. Real interest rate volatility should be held up by the fact that the economy has become less interest rate sensitive due to the elimination of interest rate ceilings on deposits and the development of mortgage securitization. In addition, the fact that Federal Reserve officials now appear to be more willing to tighten monetary policy before inflation pressures manifest themselves also implies greater fluctuations in real interest rates.

On balance, the dampening of inflation pressures is likely to be a more significant factor on the bond risk premium than any increase in real rate volatility. Splitting the sources of price volatility into real interest rate and inflation components shows that inflation volatility is the more powerful influence. This presumably occurs because inflation, unlike real interest rates, can move to a permanently higher or lower level generating long-term losses and gains for bond investors. In contrast, the losses and gains from movements in real rates will not generally be long-lasting because real interest rates tend to be strongly mean-reverting. For example, if real rates are high, the economy slows, leading to lower real rates. Thus, changes in the nature of the business cycle should tend to shrink the bond risk premium a bit further over time.

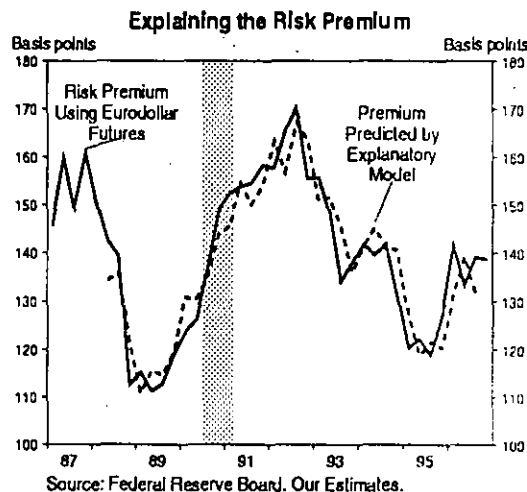
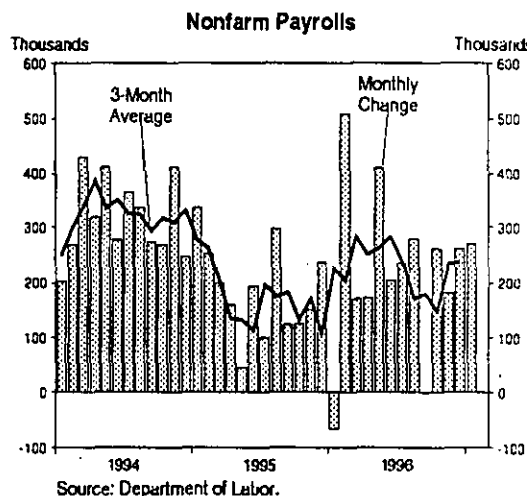
Bill Dudley, Jill Jacobs

**Goldman
Sachs**

U.S. Economics Analyst

The Bond Risk Premium and the Brave New Business Cycle

- First-quarter real GDP growth is likely to slow sharply to around 1.8% annualized (down from our earlier estimate of 2.4%) due to a sharp reversal in trade. This slowdown is wholly statistical noise rather than real, unlike the slowdown last summer. Underlying demand trends remain firm, as confidence, income, and employment trends continue to support spending.
- The decline in aggregate hours worked of 1.7% in January and the 0.1% rise in average hourly earnings do not foreshadow economic weakness. The drop in hours reflects a temporary collapse in the workweek, and the softness in earnings follows big gains in the prior two months.
- Although the current yield spread between 10-year Treasury notes and 3-month T-bills is slightly higher than its long-run average over the past forty years, it does not currently appear to be too high. The risk premium embodied in that spread can vary over time, due to changes in inflation volatility, interest rate volatility, the budget deficit, and the spread between U.S. and foreign interest rates. In light of these factors and expectations about the probability of tightening, the current reading is about right.
- In the future, the bond risk premium is likely to come down a bit, due to lower inflation volatility and a falling government deficit—both consequences of the brave new business cycle. It is unlikely, however, that the bond risk premium or the yield curve spread will return to the low readings of the 1950s and 1960s, since changes in the nature of the business cycle imply higher real interest rate volatility.



Trade Recommendations

- Stay long March '97 T-bond futures, maintaining target of 114.00 and setting a stop on a close below 111.24.
- Go long June '97/June '98 Eurodollar calendar spread at 50 basis points or lower, with target of 90 basis points and a stop on a close below 35 basis points.
- Go short Dec '97 Euro future at or above 94.15, with target of 93.50, and a stop on a close above 94.25.

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**Issue No: 97/6
February 7, 1997**



I. Weekly Wrapup

Economic and Market Overview

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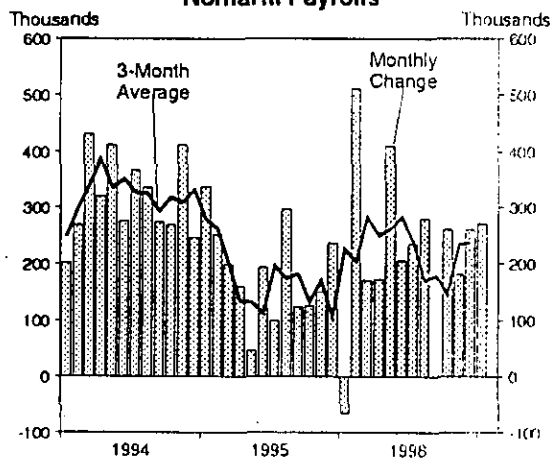
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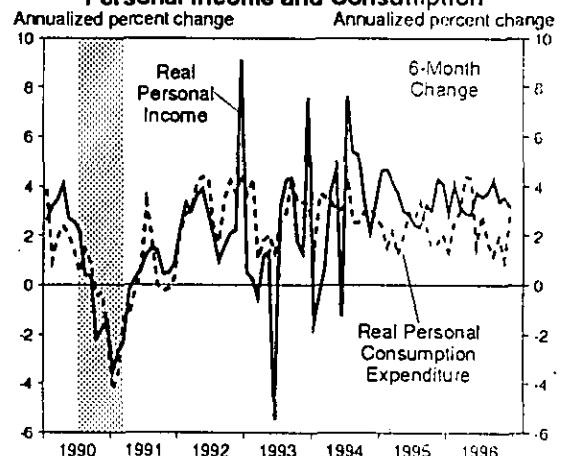
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Nonfarm Payrolls



Source: Department of Labor.

Personal Income and Consumption



Source: Department of Commerce.



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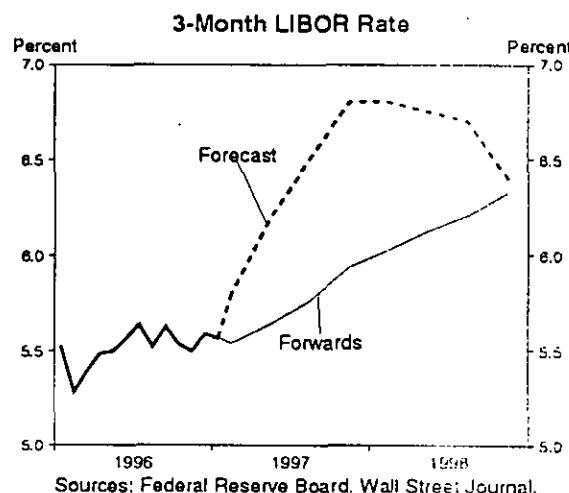
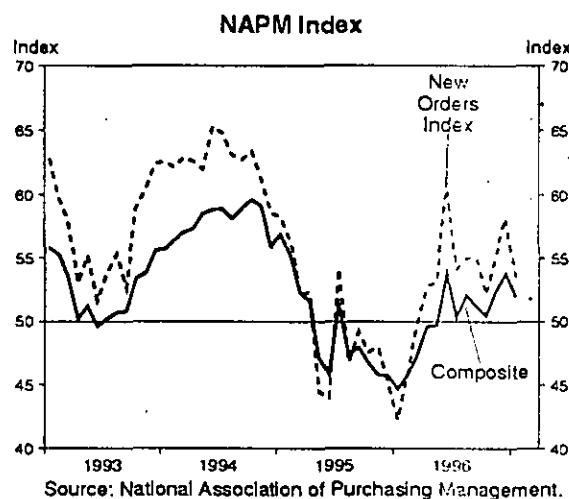
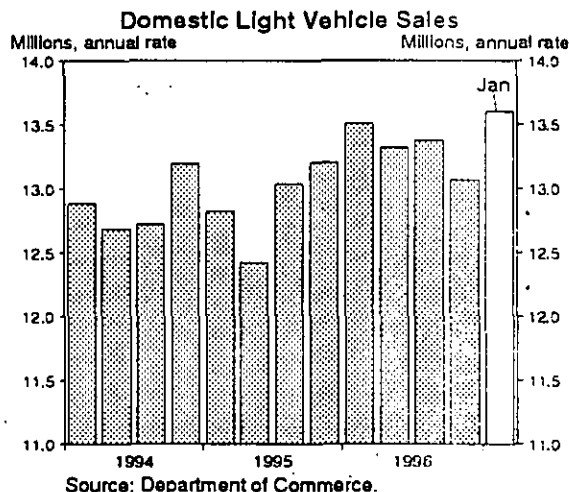
Fiscal and Political Developments

Official Clinton administration budget proposals confirmed suspicions that the taste for aggressive budget restraint has faded. Fully 84% of the total projected deficit reduction falls in fiscal years 2001-2002, while in the next two years the shortfall would grow a bit as taxes were cut and education spending padded. Just as predictable was the response of Republican leaders, who criticized these elements of the plan as well as the administration's adoption of more optimistic economic assumptions than those put forward by congressional budget estimators last month. House and Senate committees with jurisdiction over budgetary issues will now hold hearings on the Clinton blueprint, which could last for several weeks. This will give top lawmakers an opportunity to highlight their areas of disagreement with the president, and it will delay until spring any concrete legislative steps toward bridging those gaps.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

We would stay long March '97 T-bond futures for another week, maintaining our target of 114.00 and establishing a stop on a close below 111.24. However, given the sharp flattening of the yield curve in the short end of the market—a washing out of expectations concerning future Fed tightening, we would look to establish long June '97/June '98 Eurodollar calendar spread trades at or below 50 basis points (currently 48 basis points), with a stop on a close below 35 basis points and a target of 90 basis points. Given the sharp rally in Dec '97 Eurodollar futures, we would also begin to look for opportunities to get-short, suggesting establishing shorts at prices at or above 94.15 (currently 94.08), with a target of 93.50 and a stop on a close above 94.25. The FOMC minutes indicate that Fed tightening remains likely, but that outcome is no longer priced into the Eurodollar futures market.





II. The Bond Risk Premium and the Brave New Business Cycle

The business cycle has changed in significant ways in recent years—dampening inflation pressures and extending the duration of expansions.¹ This leads to an important question: Do these changes also have long-term implications for bond and stock market valuation? Specifically, should the brave new business cycle result in higher or lower risk premiums on U.S. Treasury bonds and U.S. equities?

In this weekly, we analyze the implications for the bond market.² We conclude that there are some reasons for the brave new business cycle to cause bond risk premiums to shrink somewhat over time—helped by lower inflation volatility and the fiscal dividend generated by an extended business expansion. We also find that the risk premium embodied in the current yield curve appears to be about the right size.

Measuring the Bond Risk Premium

The bond risk premium measures the expected incremental return from holding a Treasury bond until maturity compared to the return obtained from rolling a series of Treasury bills over the same time frame. It is the compensation to bond holders for: 1) the higher price volatility of longer-dated instruments stemming from changes in real interest rates and inflation expectations, and 2) the potential opportunity costs versus investing in short-term instruments should real interest rates and/or inflation expectations trend secularly higher over time.

Unfortunately, the bond risk premium is not directly observable. That is because the risk premium on bonds is relative to the expected return on a series of future short-term obligations, not the current level of short-term rates. If current short-term interest rates are lower or higher than what investors expect in the future, then the yield curve will also tend to be steeper or flatter than the bond risk premium embodied in it.

Over the long-run, a good proxy for this premium is the average yield curve spread between Treasury bonds and Treasury bills. That is because errors between anticipated and actual short-term rates presumably cancel out over time. To assume

otherwise would imply that investors make chronic errors in their expectations of future short-term rates over time. Thus, the average shape of the yield curve probably provides a reasonable approximation of the long-term risk premium.

On this basis, the average yield curve spread between 10-year T-notes and 3-month T-bills (bond equivalent basis) has averaged 121 basis points over the 1957-1996 period. This is not much different from the average yield spread of 134 basis points in 1996.

However, the yield curve spread over the long run, which generates an estimate of the historical bond risk premium, tells us little about the appropriateness of the current yield curve spread. After all, factors that affect the risk premium may have changed as the economy has evolved, potentially lowering or raising the bond risk premium over time. To see if this is the case, we must undertake two steps. First, we need to estimate the size of the current bond risk premium. Second, we need to compare that figure to the risk premium that we estimate should result given changes in those factors that have influenced its size over time. These include changes in the size of the budget deficit, interest rate differentials between the U.S. and abroad, and the volatility of real interest rates and inflation.

To measure the bond risk premium, we first need to estimate how the yield curve shape depends upon expectations about future short-term rates. That portion of the yield curve slope unexplained by such expectations gives us an estimate of the bond risk premium.

We try two different methods in making this adjustment. First, we assume that expectations about future short-term rates are formed in an adaptive way. Investors look at the recent level of short-term rates to determine their expectations about the future. Under

10-Year Notes versus 3-Month Bills*

Period	Average Spread (basis points)
1957-1982	77
1983-1996	204
1957-1996	121
1996	134

* T-bill yields on a bond equivalent basis.

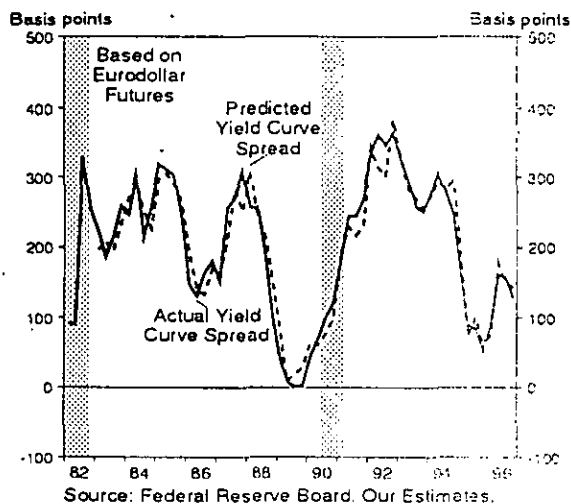
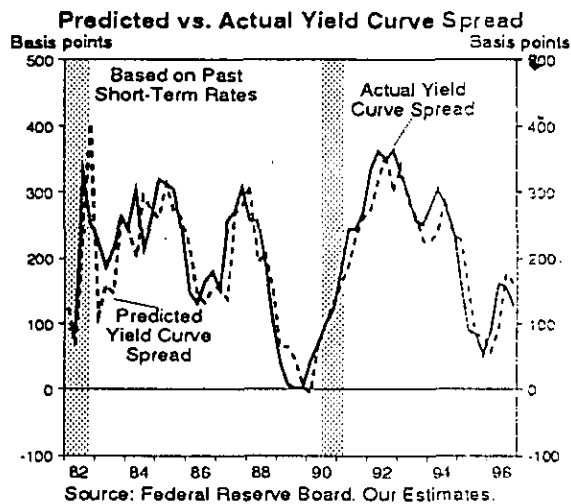
¹ See *The Brave New Business Cycle: No Recession in Sight*, January 1997 for details.

² Our evaluation of the implications of changes in the business cycle on the equity risk premium will follow in two weeks.



this method, we find that the most recent three years of short-term interest rates explain most of the fluctuations in the yield curve shape, suggesting that expectations are formed in that way. Second, we assume that expectations about future short-term rates are embodied directly in Eurodollar futures prices. We find that this method actually has a somewhat greater power in explaining the shape of the yield curve. Its chief disadvantage is that the time series of Eurodollar futures data does not go back nearly as far in time as the historical short-term rate data.

As shown below, both methods appear to do a good job in predicting the shape of the yield curve. Under the first method, the predicted yield curve spread between 10-year Treasury notes and 3-month T-bill yields (bond equivalent basis) is currently about 162 basis points, under the second method about 143 basis points. Both are not much different than the current 117 basis point yield curve spread.



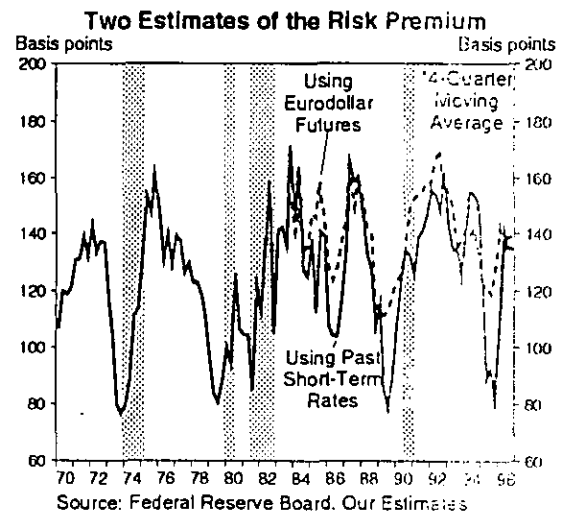
After adjusting for expectations about short-term rates, we obtain estimates for the bond risk premium. As can be seen below, although our estimates of the bond risk premium fluctuate over time—sometimes sharply—there is no clear trend suggesting that the bond risk premium has fallen or increased on a secular basis. Instead, there is an obvious cyclical component, which suggests that there are factors that influence the size of the risk premium at any point in time.

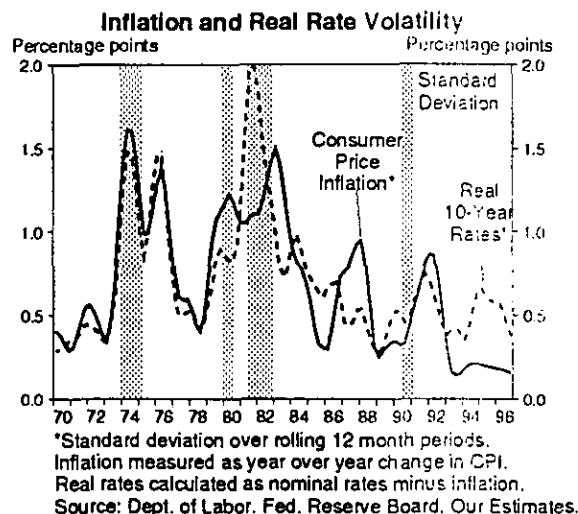
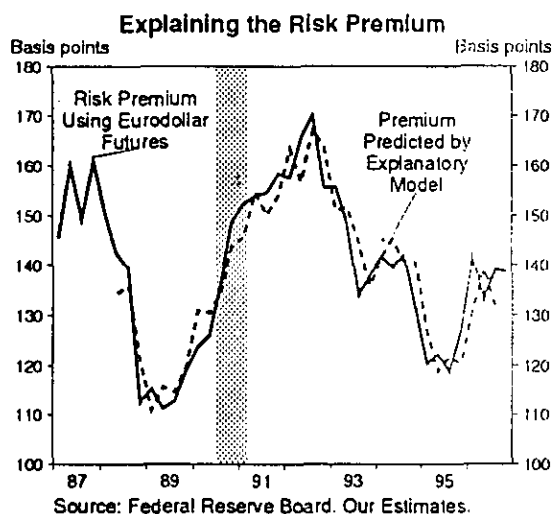
What Influences the Bond Risk Premium

Given these two estimates of the bond risk premium, the next step is to identify those factors that influence its size. Once we have these factors in hand, we can assess whether the current bond risk premium is too high, too low, or about right. We can also then evaluate whether the brave new business cycle—by changing these critical factors—implies changes in the size of the bond risk premium over time.

We find that four factors explain much of the variation in the risk premium: changes in the budget deficit, the size of the 10-year note interest rate differential between the U.S. and Japan, the level of implied price volatility on the rolling 10-year Treasury note future, and the absolute level of short-term interest rates. These factors work distinctly better in explaining the risk premium estimates developed from Eurodollar futures prices than from historical short-term interest rates.

The rationale for why these factors matter is generally straightforward: A narrowing budget deficit reduces the supply of Treasuries and causes investors to become less nervous that debt pressures will force the central bank to reflate; the size of the interest rate





differential between the U.S. and abroad influences the appetite of foreign investors for Treasury notes; higher implied volatility implies greater uncertainty about the path of real interest rates and inflation, which together determine the level of nominal interest rates over time.

Taking these factors into consideration, the current shape of the bond yield curve appears about right. The current risk premium embodied in the bond yield curve is slightly lower than the 1983-1996 average because the budget deficit has been declining, interest rate differentials between the U.S. and Japan are unusually wide, and the implied price volatility on the 10-year Treasury note future is slightly lower than its average level over the period.

Looking forward, there are some reasons to expect that the bond risk premium could decline modestly over time. In particular, the deficit is likely to shrink further given our expectation that the Clinton administration and Congress will reach a balanced budget agreement this year. In addition, changes in the nature of the business cycle suggest that inflation volatility—a major component that affects implied price volatility—is likely to remain low and could even fall further over time. Aspects of the brave new business cycle, such as global competition and more flexible labor and capital markets, should keep inflation in check over time.

At the same time, it appears unlikely that the risk premium will get back to the very low levels reached during the 1950s and 1960s, when the average yield curve spread between 10-year Treasury notes and 3-month Treasury bills was less than 80 basis points. Most importantly, there are limits to how far implied price volatility can decline when one component of such volatility—the volatility of real interest rates—is likely to remain relatively high. Real interest rate volatility should be held up by the fact that the economy has become less interest rate sensitive due to the elimination of interest rate ceilings on deposits and the development of mortgage securitization. In addition, the fact that Federal Reserve officials now appear to be more willing to tighten monetary policy before inflation pressures manifest themselves also implies greater fluctuations in real interest rates.

On balance, the dampening of inflation pressures is likely to be a more significant factor on the bond risk premium than any increase in real rate volatility. Splitting the sources of price volatility into real interest rate and inflation components shows that inflation volatility is the more powerful influence. This presumably occurs because inflation, unlike real interest rates, can move to a permanently higher or lower level generating long-term losses and gains for bond investors. In contrast, the losses and gains from movements in real rates will not generally be long-lasting because real interest rates tend to be strongly mean-reverting. For example, if real rates are high, the economy slows, leading to lower real rates. Thus, changes in the nature of the business cycle should tend to shrink the bond risk premium a bit further over time.

Bill Dudley, Jill Jacobs

Why the level of short-term interest rates matters in explaining the risk premium is more difficult to explain. Perhaps it captures an idea of the degree of deviation from a "normal" level of short-term rates, above and beyond that captured by expectations embodied in Eurodollar futures.



Key U.S. Economic Data

	Latest Monthly Data				6 Mo	12 Mo	Next
	'97 Jan	'96 Dec	'96 Nov	'96 Oct	Trend	Trend	Release
Nonfarm Payrolls (ch. Thousands)	271	261	181	261	209	246	Mar 7
Unemployment Rate (%)	5.4	5.3	5.3	5.2	5.3	5.4	
Index of Hours Worked (% ch)	-1.7	0.8	0.8	-0.7	1.3	4.0	
Average Hourly Earnings (% ch)	0.1	0.5	0.8	-0.1	4.3	3.8	
Producer price finished goods index (% ch)	--	0.5	0.4	0.4	3.5	2.9	Feb 14
Excluding food and energy	--	0.1	0.1	-0.3	0.6	0.6	
Consumer price index (% ch)	--	0.3	0.3	0.3	3.0	3.2	Feb 19
Excluding food and energy (% ch)	--	0.1	0.2	0.2	2.4	2.6	
Retail sales (% ch)	--	0.6	-0.2	0.7	3.8	4.5	Feb 13
Excluding motor vehicles (% ch)	--	0.6	0.0	0.7	3.3	4.4	
Industrial Production (% ch)	--	0.7	0.8	0.0	3.8	4.3	Feb 14
Manufacturing	--	1.0	0.6	0.0	5.0	4.9	
Capacity utilization (%)	--	83.5	83.2	82.8	83.2	83.1	Feb 14
Manufacturing	--	82.6	82.1	81.8	82.2	82.1	
Housing Starts (annual rate, thousands)	--	1329	1514	1385	1449	1465	Feb 20
Single-family	--	1024	1161	1088	1133	1155	
Trade balance (billions, monthly)	--	--	-8.4	-8.0	-9.7	-9.1	Feb 19
Merchandise	--	--	-14.7	-14.1	-15.8	-15.2	
Factory Orders (% ch)	--	-1.3	-0.5	1.1	2.4	13.2	Mar 6
Durable Goods	--	-1.9	-1.7	0.6	-1.6	0.6	Feb 27
Personal Income (% ch)	--	0.8	0.6	0.1	5.6	5.9	Mar 3
Wages and Salaries	--	1.2	0.8	-0.1	6.3	6.9	
Purchasing Managers' Index (%)	52.0	53.8	52.4	50.4	52.0	50.7	Mar 3
Consumer Sentiment U Mich (Feb 66=100)	97.4	96.9	99.2	96.5	96.7	94.3	Feb 28
Conference Board (1985=100)	116.8	114.2	109.5	107.3	111.9	107.0	Feb 25

Note: Percentage changes are month to month for last four months, annualized for 6-12-month trends. 6- and 12-month figures for levels (e.g., unemployment rate) are averages over those periods.

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U.S. Calendar

Focus for the Week Ahead

- Retail sales for January are apt to be firm, given the relatively strong comparable store sales results reported for major retail chains and the likelihood that at least some of the jump in unit vehicle sales will be reflected in the auto sales component (February 13).
- Overall producer prices were likely boosted again in January by the continued pass-through of higher oil prices. Increases in the core PPI will be more muted, in line with the somewhat benign gains reported in recent months (February 14).
- Overall production and manufacturing output should edge up in January, despite the drop in factory hours worked. Utility production appears to have risen substantially and a sharp increase in temporary workers (classified as service workers in payroll figures) should also boost goods production (February 14).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Tue Feb 11	10:00	Nonfarm Productivity (Q4 '96—Prel.)	+2.3%	n.a.	+0.3%
Thu Feb 13	8:30	Retail Sales (Jan)	+1.0%	+0.5%	+0.5%
		Excluding Autos	+0.5%	+0.4%	+0.5%
Fri Feb 14	8:30	Producer Price Index (Jan)	+0.3%	+0.3%	+0.5%
		Excluding Food & Energy	+0.1%	+0.1%	+0.1%
	9:15	Industrial Production (Jan)	+0.2%	+0.2%	+0.7%
	9:15	Capacity Utilization (Jan)	83.4%	83.5%	83.5%
	10:00	Business Inventories (Dec)	-0.3%	+0.2%	+0.1%

- G7 Meeting (Sat, Feb 8)
- Treasury Quarterly Refunding (Feb 11-13)
- Richmond Fed Survey (Tue, Feb 11 - 10:00)
- Atlanta Fed Survey (Wed, Feb 12 - 10:00)
- Consumer Sentiment—Prel. (Fri, Feb 14 - 10:00)

Interest Rates: Forecast vs. Forward Yields:

	3 mo	6 mo	12 mo
LIBOR 3 mo	5.8%	6.2%	6.8%
Forward	5.6	5.6	6.1
2 Yr T-Note	6.2	6.5	7.0
Forward	6.2	6.2	6.3
10 Yr T-Note	6.7	7.0	7.2
Forward	6.5	6.6	6.6

Key Numbers in the Business Outlook

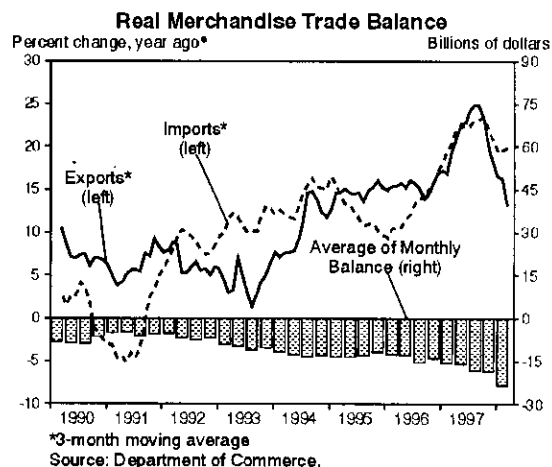
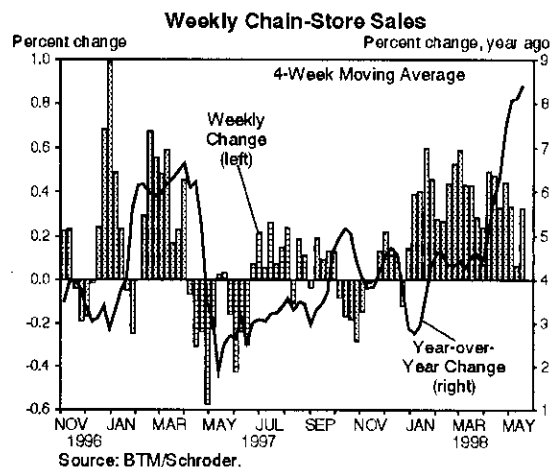
	1996	1997		1995	1997E
	Q4	Q1E	Q2E		
Real GDP	4.7%	1.8%	3.4%	2.6%	2.9%
Ind. Prod., Mfg.	3.7	3.6	4.4	2.7	4.2
CPI	3.2	3.5	2.8	2.9	3.2
After-Tax Profits**	10.9E	6.7	7.3	15.1E	4.9
Unemployment	5.3	5.5	5.1	5.4	5.1

** Excluding inventory profits; adjusted for depreciation distortions.

Tug-of-War Update: Home Team Still Winning

This issue of the U.S. Economics Analyst is in an abridged, four-page format. The center section and the tables of historical and forecast data have been omitted. Our regular format will resume with our next issue, dated May 29, 1998.

- As widely expected, the Federal Open Market Committee left interest rates unchanged at its May 19 meeting. However, minutes from the March meeting show that a consensus within the Committee expects higher rates ahead. Any such move would be telegraphed by Chairman Greenspan; his public appearances therefore deserve special attention in coming weeks.
- Domestic demand is still winning the tug-of-war with the Asian crisis for dominance in U.S. growth. The best example of this recently is the ongoing strength in weekly indicators of retail sales, which point to another solid gain in real consumer spending during the second quarter. Although housing starts slipped in April, they remain at very high levels.
- The record \$13-billion trade deficit reported for March also attests to the strength of domestic demand in the sense that the major surprise was a large increase in imports. Although trade with the Pacific Rim continued to deteriorate on a year-to-year basis, there is no evidence that imports from Asia are rising disproportionately.
- The latest budget data, featuring a record \$125-billion surplus in April, are increasing the likelihood of fiscal stimulus via significant tax reduction, a development that could add to pressures on Fed officials to lift interest rates.



Trade Recommendations

- Stay short June '99 Eurodollar futures, with a target of 93.50 and a stop on a close above 94.30.

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Issue No: 98/20
May 22, 1998

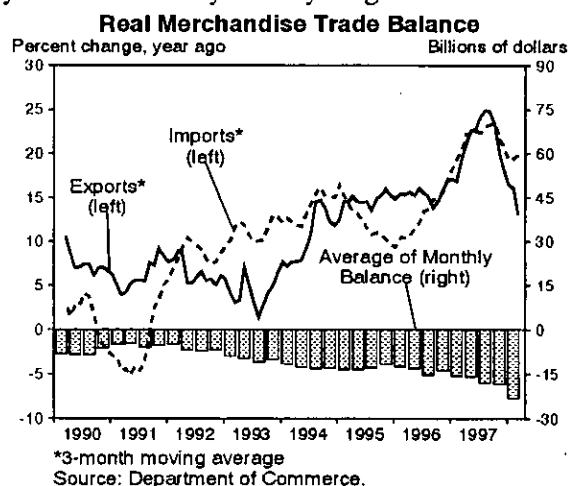
I. Weekly Wrapup

Economic and Market Overview

Prices of U.S. stocks and bonds rose after the Federal Open Market Committee held interest rates steady on May 19, but fell back when minutes from the March 31 meeting proved more cautionary than expected. Meanwhile, fresh data indicate that domestic demand is still winning the tug-of-war for U.S. growth.

The U.S. trade deficit soared to a record \$13.0 billion in March despite several gap-reducing factors—lower oil prices, a rebound in aircraft exports, and the deletion of television payments for the Nagano Olympics. For the first time, the merchandise shortfall topped \$20 billion in nominal terms and \$25 billion in 1992 dollars. Imports rose sharply in March, implying that strength in domestic demand remains a key factor in this deterioration. Although the shortfall with 14 Pacific Rim nations narrowed \$1.2 billion (not seasonally adjusted), this decline was much smaller than the norm for March, a month when exports to the region rebound sharply. Purchases from Asia, meanwhile, have risen at about the same pace as total imports over the past year, and both growth rates are in line with past experience during periods of strong domestic spending.

Consumption remains on a solid upward track, judging from the latest weekly data on retail sales. In the first three weeks of May, the BTM/Schroder index of such sales stood 0.8% above its April average and 8.3% above its year-earlier level—a record for this 8-year-old series. Although results from the Johnson Redbook survey are not as robust, they too show solid year-to-year gains of around 5%.

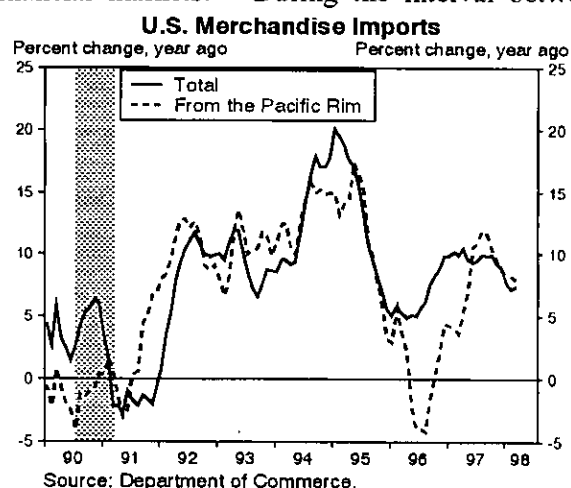


On the surface, housing figures looked a bit weaker in April, as starts fell 2.3%. However, new construction in the high-value-added, single-family sector rose 0.7%. Moreover, declines in total starts during March and April occurred from a level that was boosted by unusually warm weather. In the national survey of homebuilders, both current and expected new home sales were reported to be very high in May. Thus, the bigger surprise for this sector as well as in retailing has been that the payback for warm first-quarter weather has not been larger.

Federal Reserve Policy

The key message from the policy record of the March FOMC meeting is that a consensus had already emerged that a policy tightening would likely be called for at some point. This is clear from two passages in the text: (1) a reference to "the Committee's judgment" that available information made "some tightening a likely prospect in the not too distant future," while (2) "... in the view of some, a tightening move was not inevitable." The first statement carries the weight of the full group, whereas the second is expressed as a minority opinion. Coupled with commentary to the effect that the committee saw no obvious reason why the economy's strength would dissipate on its own, it seems that most Fed officials saw tightening as an issue of "when" rather than "whether."

The minutes also reinforce our view that any such move is apt to be preceded by a clear warning, so as not to "produce an outsized and undesirable response in financial markets." During the interval between



the two meetings, a number of FOMC members voiced concerns about the risks of strong growth, yet the panel declined to move in May in the face of this strength. This suggests that notice of imminent tightening will be given by Chairman Greenspan, who is probably still among those who need to be convinced that such action is unavoidable.

Fiscal and Political Developments

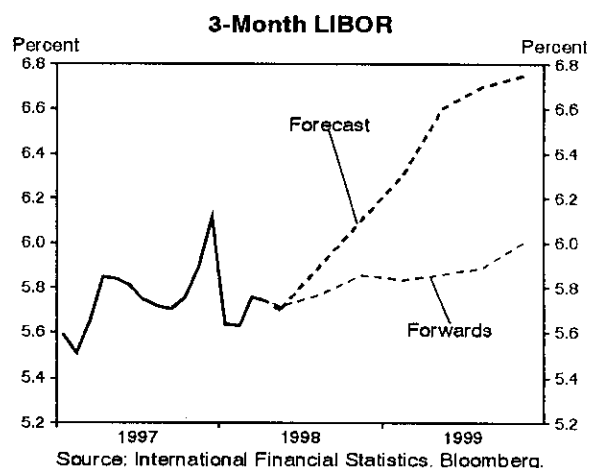
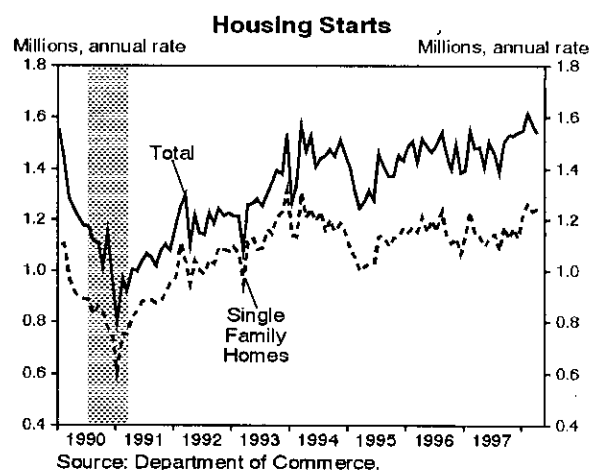
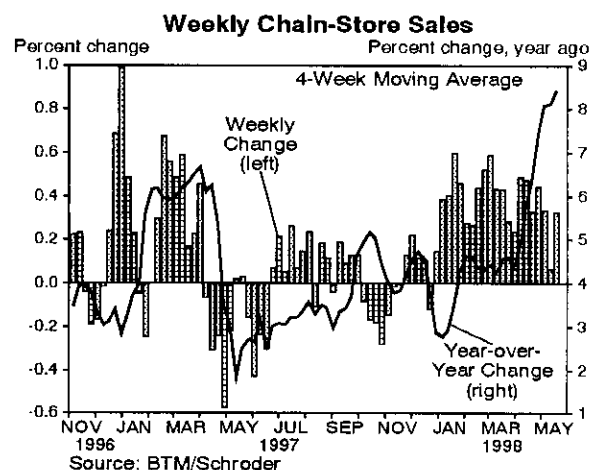
An elimination of the current passive fiscal tightening would add to the Fed's anxieties. For that reason, it is noteworthy that election-year politics and enhanced prospects for sustained large surpluses have begun to weaken the dam that has held back pressure for tax cuts. The huge April budget surplus (\$124.6 billion, up from \$93.9 billion last year) has lent support to the notion that fiscal trends will run far ahead of official forecasts. That, in turn, is encouraging politicians to drop their insistence on directing any unexpected revenues toward the Social Security program. House Budget Committee Chairman John Kasich (R-OH) has pushed through his panel a plan that would phase out the "marriage penalty"—extra taxes owed by two-earner families—with savings from federal spending. Speaker Gingrich has agreed to push for adoption of this blueprint by the full chamber. A difficult conference with the more cautious Senate leadership looms, but even such a staunch fiscal conservative as Senator Pete Domenici (R-NM) has lately hinted at a willingness to use prospective revenues from higher tobacco levies for early income tax abatements.

Market Outlook and Comments on Value

Note: The following comments reflect trading views and may differ from our longer-term interest rate forecast.

The tone of the FOMC minutes conforms with our sense that the risks of a second-half monetary policy tightening are creeping higher. Prices for Eurodollar futures with 1999 expiration dates, however, hardly incorporate normal risk premia over current 3-month LIBOR rates, and they certainly do not suggest any broad expectation for credit tightening over coming quarters. Hence, we retain a recommendation for short positions in June '99 Euro futures, with a target of 93.50 and a stop on a close above 94.30.

Treasury bond prices continue to be trapped between competing forces: low overseas yields and declining securities supplies on one side and growing Fed policy dangers on the other. We do not expect this battle to be resolved swiftly, and so would stay on the sidelines awhile longer.





U.S. Calendar

Focus for the Week Ahead

- Inventory accumulation was faster and the trade deficit deeper than reported in the advance GDP report for the first quarter. Whether growth was faster or slower than the 4.2% annual rate now on record is unclear, but estimates of solid increases in domestic final sales aggregates should remain largely intact. We also estimate that (unadjusted) after-tax net corporate income changed little from the fourth quarter (May 28).
- Firm spending and income gains in April will set the stage for another solid increase in real domestic final sales in the second quarter (May 29).
- Recent reports by regional Federal Reserve Banks (Philadelphia and Kansas City) suggest that the factory conditions have firmed despite the drag from Asia. Thus, we look for the Chicago purchasing managers' index and similar reports from other regional chapters to stay comfortably above 50% (May 29).

Economic Releases and Other Events

Date	Time	Indicator	Estimate		Last Report
			GS	Consensus	
Tue May 26	10:00	Consumer Confidence (May)	135.0	135.3	136.7
	10:00	Existing Home Sales (Apr)	-3.0%	-1.8%	+2.5%
Thu May 28	8:30	Real GDP (Q1—Preliminary)	+4.2%	+4.3%	+4.2%
	8:30	Chain-Weight Price Index (Q1—Preliminary)	+0.9%	+0.9%	+0.9%
	8:30	After-Tax Profits (Q1—Preliminary)	+0.1%	n.a.	-2.3%
	10:00	Durable Goods Orders (Apr)	+1.2%	+0.4%	+0.5%
Fri May 29	8:30	Personal Income (Apr)	+0.4%	+0.4%	+0.3%
	8:30	Personal Consumption (Apr)	+0.6%	+0.5%	+0.5%
	10:00	Chicago Purchasing Managers Index (May)	58.5%	n.a.	58.6%

- Treasury 2-Year Note Auction (Wed, May 27)
- APICS Survey (Thu, May 28 - 8:30)
- Help-Wanted Index (Thu, May 28 - 10:00)
- Treasury 5-Year Note Auction (Thu, May 28)
- U. of Michigan Consumer Sentiment—Final (Fri, May 29 - 10:00)

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