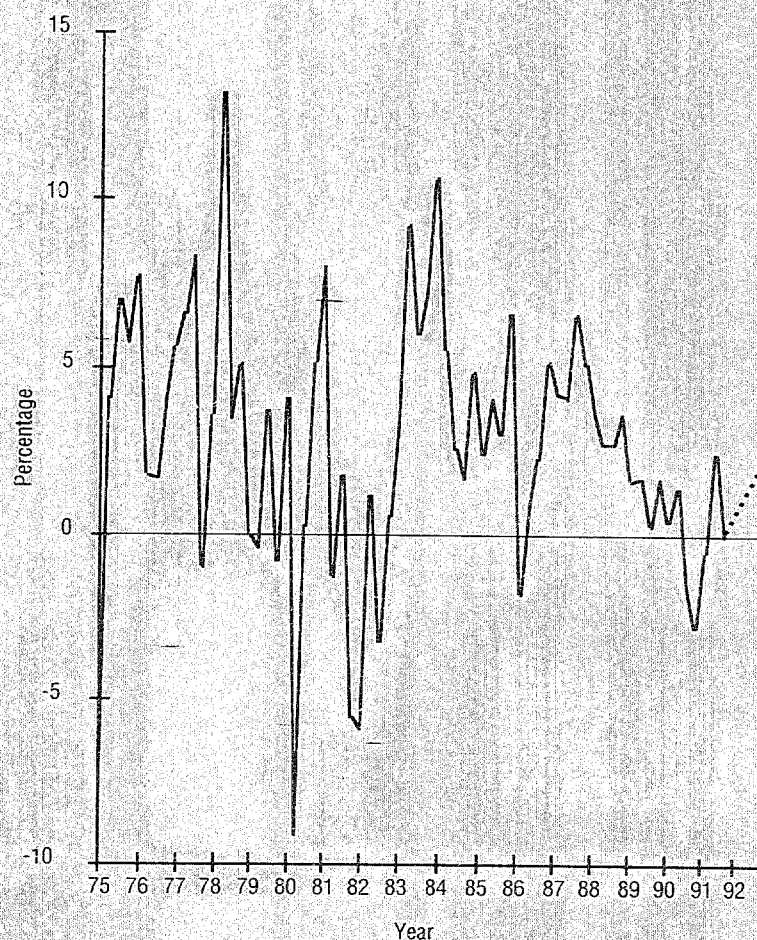


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Business Review

Percent Change in GNP



The Outlook for 1992

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- | | | | |
|-----------|---|-----------|--|
| 1 | Bruce L. Jaffee
The Outlook for the National Economy in
1992: Introduction and Overview | 21 | Thomas L. Guthrie
Fort Wayne |
| 3 | George W. Wilson
Personal Consumption Expenditures | 23 | Patrick M. Rooney
Columbus |
| 6 | Lawrence S. Davidson
Nonresidential Investment and Inventory
Change | 25 | Richard L. Pfister
Bloomington |
| 8 | R. Jeffery Green
Unemployment and Inflation in 1992 and
the Resulting Fiscal and Monetary Policy
Issues | 26 | Dilip Pendse
Kokomo |
| 9 | Jürgen von Hagen
The International Economy | 31 | Ashton I. Veramallay
Richmond/Connersville/New Castle |
| 11 | Michael Simkowitz and George Hettenhouse
Financial Markets and Corporate Earnings | 32 | John E. Peck
South Bend/Mishawaka-Elkhart/Goshen |
| 12 | R. Brian Webb
Real Estate Markets | 34 | Marvin Fischbaum
Terre Haute |
| 14 | Morton J. Marcus
Indiana's Recession in Graphics | 35 | Maurice Tsai
Evansville |
| 18 | Robert Kirk
Indianapolis | 36 | Barry C. Ritchey
Anderson |
| 20 | Leslie P. Singer
Northwest Indiana | 37 | Fay Ross Greckel
Jeffersonville-New Albany (Louisville Area) |

The Outlook for the National Economy in 1992: Introduction and Overview

Bruce L. Jaffee

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Last year at this time we predicted that the end of 1990 and most of 1991 would be characterized by a relatively brief and mild recession. Our forecast in terms of national aggregates was almost exactly on the mark, though the recession was a bit more severe and prolonged than we predicted last November. We had estimated, for example, that unemployment would peak at 6.5%, but it reached 7% last summer and now stands at approximately 6.8%. On a year-over-year basis, we forecasted real GNP to grow between 0.1% and 0.5%, but it now looks like the "growth rate" for the year will be approximately -0.5%. We expected weak consumer and investment spending and relatively strong growth in net exports, and these general trends did occur. While our forecasting record was excellent last year, 1992 may prove to be a challenge.

Unlike some forecasters, we do not predict a "double-dip" recession—two recessions in rapid succession. However, we do expect that although the recession ended in mid-1991, growth in fourth quarter 1991 and first quarter 1992 will be very weak at best, and recovery through 1992 will be sluggish. Taken as a whole, the three years of 1990-1992 are likely to be characterized as an unusually long period of stagnation. For 1992 we expect real growth in GNP to be only in the 1.7-2.2% range, with growth in most quarters being between 0.5-2%. This growth is less than half of what usually occurs during the first full year after a recession.

Personal consumption expenditures make up approximately two-thirds of GNP in the United States. Because of expected slow growth in disposable personal income and low levels of consumer sentiment, we expect that consumption spending is unlikely to lead the economy forcefully out of the 1990-91 recession. For the year we expect real consumption expenditures to grow at about a 2% rate, roughly in line with the expected increase in consumer income.

Automobile sales are expected to improve in 1992, albeit from the depressed levels of 1991. Declines in interest rates, financing incentives, significant new model introductions, and the replacement cycle all augur for a better car, truck, and van market in 1992. In general, though, consumer durables are likely to remain weak, as housing starts and residential investment grow only moderately from the depression-like levels we saw in 1991. For 1992 we see housing starts averaging approximately 1.2 million units, far below the peak of approximately 2 million starts reached about 20 years ago.

Nonresidential investment is traditionally the most volatile sector of the nation's economy. Its real growth rate has fallen every year since 1987, when it increased at a 6% rate. It fell to a rate of growth of 2% in 1990 and about a -3% rate in 1991. For 1992 we expect a modest recovery, with business investment growing at about a 2.1% rate. Most of this growth, however, will come from equipment spending and inventory accumulation. Factory and office building construction is likely to remain flat. At least another year will be necessary to work off the excess supply in these subsectors. Corporate profits tend to be closely correlated with business investment, and we expect moderate improvements in corporate profits throughout 1992.

The international sector has been one in which the U.S. economy has shown significant improvement in the last few years. Our trade deficit is now relatively small as our exports have increased at a robust rate in the last few years. However, we predict relatively little growth in net exports for 1992 as our major trading partners experience slow growth. In the long run we see export opportunities in Eastern and Central Europe, but for at least the next year most of these countries will be better candidates for foreign aid than for customers of our exports. The value of the dollar is unlikely to change very much next year. We also see oil prices remaining relatively constant, with crude oil prices averaging about \$20 for 1992.

With our prediction of a weak economy in 1992 we are also forecasting a relatively low rate of inflation. Consumer prices should increase at no more than 4% for the year, and the broader GNP deflator should be about 0.5% less. Unemployment, however, is likely to remain troublesome. For all of 1992, we

Table
GNP and Its Components

	1990 (\$ bil. 1982)	% Change from Previous Year ¹ 1991 (est.)	1992 Forecast
GNP	4,157	-0.5	2.1
Personal Consumption Expenditures	2,682	0.3	1.9
Gross Private Domestic Investment	688	-7.3	5.3
Nonresidential Fixed	515	-3.0	1.9
Residential Fixed	177	-12.7	2.3
Change in Business Inventories	-4	\$-16.5	\$5.0
Net Exports	-34	\$-17.3	\$-15.8
Exports	632	3.9	3.9
Imports	665	1.2	3.7
Federal Government Spending	344	0.5	0.1
State and Local Spending	477	0.4	0.3

Note: GNP numbers released by the government for 1991 and 1992 are likely to be complicated by two statistical factors. First, at the end of 1991 many of the constant dollar figures were "re-benchmarked" from 1982 to 1987. In addition, federal government agencies are likely to focus more on gross domestic product (GDP) rather than gross national product (GNP), following the trend in most countries of the world. GDP measures the value of all the final goods and services produced by workers and capital located in the United States. GNP, on the other hand, measures the value of all the final goods and services produced by workers and capital supplied by U.S. residents.

¹Except for Change in Business Inventories and Net Exports, both of which are in billions of 1982 dollars.

see the unemployment rate falling in the 6.5-6.9% range.

Government spending on goods and services at national, state, and local levels is likely to remain flat in 1992. The federal government is understandably concerned about the size of its deficit, and the peace dividend, if it is ever received, will not occur until after next year. Fiscal policy will remain expansionary, not due to any explicit counter-cyclical program but rather to the now chronic imbalance between federal revenues and expenditures. Monetary policy, as measured by M2, is likely to loosen further in 1992 if, as we expect, inflation remains under control and economic growth is anemic. State and local spending will be restrained by the relatively poor fiscal condition of most of the large states in the country.

There were two areas in last year's forecast in which we erred significantly: interest rates and equity prices. Although we correctly forecasted the direction of interest rates—namely, downward—they actually declined significantly more than we had predicted, in part due to the economy being slightly weaker in

1991 than we thought and inflation being a bit lower. Last year we predicted that stock market prices would rise only modestly, by no more than 5 or 10%. In fact, the major averages increased approximately 25% in 1991.

These factors are not independent. The decline in interest rates was a driving force for the gain in stock market prices during 1991 rather than dividend growth or corporate earnings. Whereas we do expect corporate profits to improve modestly in 1992, we think interest rates have about hit their low points, especially the short maturities, and should rise slightly by the middle of 1992. Thus, we will essentially repeat last year's forecast for the stock market: It now appears to be fully valued, and any further significant increases in prices will occur after 1992.

On balance, we see 1992 as a year of stagnation but still positive growth, a year that will be better than 1991, but certainly well below average for the first full year after a recession. The **Table** summarizes the key components of GNP for the year. Real GNP growth and inflation trends are illustrated in **Figures 1 and 2**.

Figure 1
Percent Change in GNP

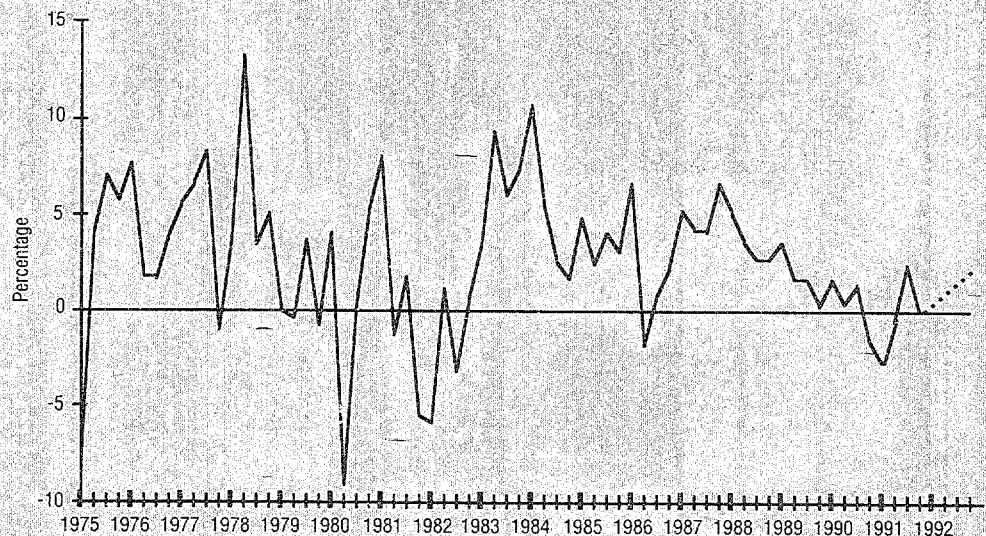
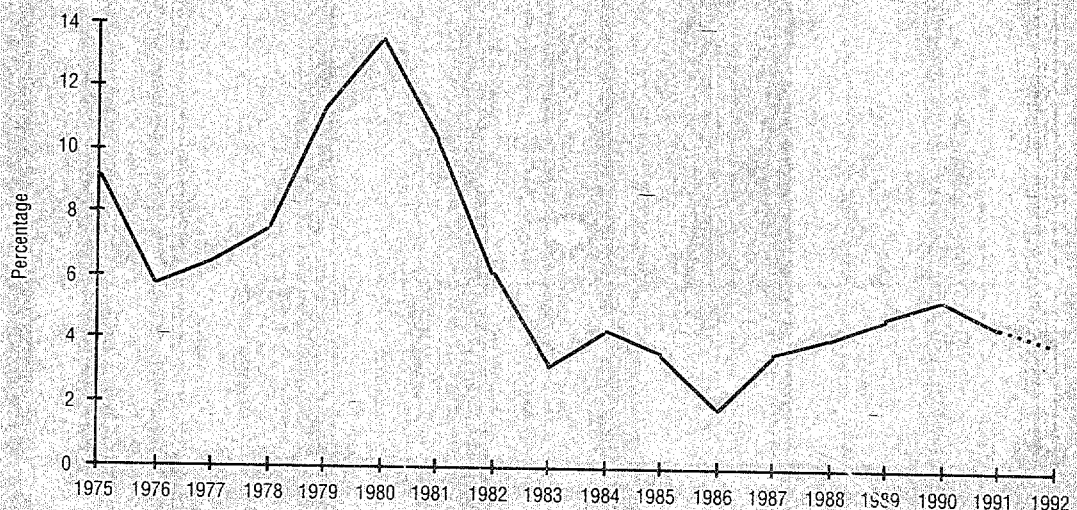


Figure 2
Percent Change in Consumer Price Index (CPI)



Personal Consumption Expenditures

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We need not debate the issue of when or whether the economy has yet reached bottom. In fact, we will doubtless not know until the end of the next recovery, or until the NBER group makes its "official" findings on this matter. We can, however, note that in GNP terms the rate of decrease slowed in second quarter 1991, and that in GDP terms a small turnaround may have occurred late in the second quarter and/or during the third quarter. Whatever the case, we do know that the economy remains sluggish and is emitting much conflicting evidence regarding growth.

One thing is certain. The largest component of GNP, personal consumption expenditures (C), has been growing slowly or falling since late 1988. With almost two-thirds of real GNP (or more precisely, 65

percent of GNP on average since 1986) behaving sluggishly for so long, there should be little surprise about either the recession or the tepid revival, if in fact the bottom has been reached.

The problem with blaming this on the behavior of C is that it is far from clear whether C is cause or consequence of GNP behavior. We have all been taught that the "consumption function" makes C dependent upon some concept or measure of disposable household income (Y_d) and whatever other things are measurable and seem to be influential. But these "other things" include the level of GNP itself, transfer payments to households, and whatever else goes into determining Y_d , plus such items as the real value of household assets, consumer liquidity, debt, interest rates, and expectations—all of which are in part dependent upon changes in or the level of GNP itself. Thus $C = f(\text{GNP})$ and $\text{GNP} = g(C)$. The circularity is, as has been said, "benign and not malignant" largely because C and especially its major components are not strictly or completely determined by the state of the economy we seek to explain. In short, there are many instances of C and GNP or Y_d changing at different rates or even moving in opposite directions, especially using quarterly data. Small shifts in average propensities to consume out of GNP or Y_d are enough to cause large changes in the overall economy, since C is so overwhelmingly greater than

each of the other components of GNP. There is some discretion left in consumer behavior even in the most complete versions of the so-called "consumption function."

The evidence suggests that C is clearly *not* fueling any recovery. Other indicators, such as retail sales and personal outlays in recent months, reinforce consumer reluctance to spend. A sharp drop in two indices of consumer confidence was also recorded for October and November 1991 to levels below those reached during the lowest phases of the contraction(s) of 1980-1983. The reasons given for sluggish C include:

1. Lack of consumer confidence. Indeed, some refer to outright "fear" for the future in terms of more layoffs, persistent unemployment, or lower real future income. Such fears presumably would lead to spending reticence at the present time to save more for a perceived bleak immediate and even long-term future.

2. Households are paying off some of what is billed as an excessively high level of debt and thus are not buying so many goods and services.

3. Consumers are less anxious—and presumably less able—to borrow to spend even using credit cards because the interest cost is no longer tax deductible and banks demand better credit ratings.

4. The baby boom generation is entering the "prime saving" phase of the life cycle and is even more preoccupied with financing their children's educations and funding their own retirement—which should lead to higher savings ratios, but perhaps more so in the future than at present.

5. Consumption is rising slowly due to high unemployment rates and employment levels below those of 1990 and 1989; this leads to lower aggregate real wage and salary incomes. At the same time, real average gross weekly earnings (total private, nonagricultural industries) have declined every year since 1984 except for 1986, and every month compared with the same month in the previous year since August 1990. Aggregate wage and salary disbursements deflated by the CPI have thus declined in 1990 over 1989 and were lower in second quarter 1991 than in any year since 1987. The same is true of total personal income similarly deflated. The sluggish growth of C is thus largely due to unemployment and lower earnings per employed worker, which show up as reduced real aggregate personal income. Yet the unemployment rate in this recession remains a full 3-4% below that of the recession of the early 1980s, when monthly rates over 10% were recorded several times. The highest monthly unemployment rate in the present recession was 7% in June 1991 for all civilian workers. Yet the behavior of consumption was far more buoyant in the early recovery phase in 1983 than appears in the second or third quarters of 1991.

assuming that the second quarter in fact represents the so-called "first recovery quarter." In short, the evidence suggests a more passive behavior of C than in earlier recoveries. It is clear we cannot be certain that the present recovery has yet begun or that it began in second quarter 1991. But the recovery, when it comes, is unlikely to be buoyant if consumption continues to lag or its growth rate mainly parallels that of household real disposable income.

6. It may be that C is lagging because of a decline of household real wealth as well as expectations of diminished "permanent income." The general decline in home values over the past several years may have served to dampen the inclination to consume. In fact, it is estimated that household net worth, mostly real estate, declined in 1990 by \$181 billion, which is reported to have been the first decline in two generations. Because the coefficients of household wealth in recent estimates of the consumption function are positive, though not large (ranging be-

"Consumption cannot be expected to be the dynamic leader out of the current recession."

tween .04 and .06), the unexpected fall of household asset values instead of the usual annual increase of some 8.3% between 1946 and 1989 clearly induces a mood of caution or reticence with respect to consumption outlays, both directly and by creating incentives to rebuild asset values by spending less than usual out of household incomes. Although there is no evidence yet of a rise in household savings ratios in the aggregate, the decline in household net worth puts a real damper on purchases of consumer goods as well as consumer confidence. The *quality* of consumer credit is also affected negatively, which makes already reluctant lenders even less interested in household loans.

The upshot of all this is that consumption cannot be expected to be the dynamic leader out of the current recession. An examination of the broad components of consumption in terms of durables, nondurables, and services does not provide much of a clue to the future and will be omitted here.

Yet so long as consumption does not seriously lag behind disposable income, sooner or later inventories will be drawn down to the point at which production and employment will increase. There is little evidence that consumption has even lagged behind disposable income in recent months, despite all the

rhetoric and selective evidence of consumer concerns. The sharp declines in inventories should soon do their work and begin to stimulate production, employment, and earnings. If the federal government even begins to help a little bit in the form of at least middle- and lower-class income and social security tax relief or other direct payments, including extended unemployment benefits or accelerated infrastructure investment, consumption may once again become a catalyst of short-run growth.

Consumer Confidence and Public Policy

It is difficult to envisage anything that might stimulate consumption in the short run other than a sustained increase in real disposable income. There is nothing in the recent data to suggest, however, that consumers will not respond to such increases and may even raise consumption more than disposable income grows. But the reticence to spend much more or at a faster rate is significantly affected by a growing malaise, uncertainty, and pessimism on the part of households. The asset base of households is declining. Unemployment remains stubbornly high, affecting people and occupations not previously prone to extensive layoffs such as white-collar, professional, and managerial employees in both the service and goods-producing sectors, including all levels of government. State and local public employment has become more insecure as revenues decline and large areas of federal employment associated with defense and other activities no longer needed in the post "Cold War" era are also shrinking, which affects employment in the private sector as well. We have in a sense "democratized" the unemployment rate—anyone can become unemployed, not only factory or blue-collar workers.

There are, however, abundant areas in which increased public initiatives are long overdue, having been neglected for over a decade already. More resources are clearly needed and can be justified on strictly benefit-cost or efficiency criteria in such areas as public infrastructure—highways, airports and airways, and seaports in transportation alone. There are more urgent needs in areas such as education, waste disposal, sanitation, and health care, among others. Homelessness amid an excess supply of housing is absurd. Yet there is no evidence that public sector response is or will be anything but defensive, tepid, even negative, and will continue to stress budget balancing at the expense of all else. The critical domestic public sector needs remain singularly unmet and appear to have overwhelmed the capacity or ingenuity of elected officials to address. A responsive government seems to have become a thing of the past. Thus, fiscal policy remains inert and chained to large deficits, themselves associated in part with

previous initiatives gone sour, such as the savings and loan fiasco and subsequent fumbling of the bailout. Talks of tax relief thus get bogged down at the federal level by budget concerns and quibbling over which taxes to change, by how much, and when. State and local governments are pushed into higher taxes, further restraining growth of Y_p , as the federal government unloads greater responsibilities upon them without the requisite resources.

Worries on the expenditure side are subject to similar constraints, while proposals for increased welfare outlays, such as extending the benefits period for unemployment compensation or direct payments to households for "child support," are routinely derided on principle or because they will increase the deficits that are alleged to raise interest rates and deter further growth or nullify the initial stimulus to consumption. This effect will not, of course, occur under present circumstances. Nor is there any direct relationship between interest rates and federal government borrowing except under extreme assumptions that do not now exist and are unlikely to prevail in the near future. In fact, changes in the level of interest rates are *inversely* related to changes in the federal government deficit in the short run. The failure to respond to urgent needs in the face of persistent "too high" unemployment rates because of the believed impact upon the deficit is surely one of the great cop-outs and policy failures of the twentieth century. Much of government expenditures constitute "investment" by any reasonable conception of that term. The total federal government deficit is not all "dissavings." Yet the U.S. is the only country in the world that continues this accounting fiction. Many also argue, more cogently, that tax reductions or expenditure increases now would not have a positive impact until much later when, it is hoped, the economy will be recovering smartly and will thus engender inflation, higher nominal interest rates, and other horrors believed bad enough to deter even considering them now. It is already too late, in the fatalist view.

The inability, in addition to the unwillingness, to develop a fiscal quick fix is also made more difficult by political bitterness between the parties and between Congress and the White House enhanced by the recent confirmation proceedings of Judge Thomas, the scandals over the abuse of Congressional perks, and White House absorption in foreign affairs to the neglect of the economic malaise at home.

It has become obvious to increasing numbers of households that nobody is minding the store, that the feds are incapable of anything but Hoover-like responses to the national economy. Households and the state and local communities will be left to fend for themselves. The message from Washington seems to

be that "prosperity is just around the corner," so nothing need be done, a song we heard some 60 years ago and more recently from the Vice President. So households hunker down in disbelief and vow to wreak vengeance upon inept, corrupt officials through term limitations and throwing the rascals out next November. At the same time, consumers are protecting their wallets; they are fearful of the immediate future and of the long-run outlook for an economy undergoing significant transformation in a fast-changing world without much help from the fiscal center—the one place from which a jump-start for a stalled economy could be forthcoming but likely will not. This gloomy consumer mood will keep consumption growth pretty much tied to changes in real, disposable income, which itself is unlikely to grow until employment and real rates of remuneration increase or household tax rates decrease. Other sectors of the economy, accounting for barely one-third of GNP, will have to improve sharply before a sustainable recovery really gets under way. This is a circularity that, unlike the income-consumption reciprocal relationship, is not benign but, rather, malignant.

Nor is consumer confidence or Y_c itself liable to be positively influenced by monetary policy. The Fed seems incapable of stimulating its favorite target, M_2 , for reasons inherent in the old saw of the depression days: "It's easier to pull on a string than push." If monetary policy is truly the only game in town, the situation is even worse than already suggested. The fragility of the banking system and its regulation does not inspire much confidence either.

Maybe, as recently argued, we need a new version of WPA programs (another depression reference) and a renewed vision of government as "employer of last resort." The need at the moment is clearly to get more purchasing power into household pockets and do it fast. We should not be too picky about how this is done so long as it ends up quickly in the hands of middle- to lower-income groups and is in the form of a kind of automatic stabilizer that shrinks as the expansion it helps initiate becomes more buoyant. If policy up to the early 1980s was too activist, as some have alleged, since then it has been virtually moribund. Perhaps it is a good thing 1992 is a presidential election year. This should focus the attention of electoral aspirants to move quickly to reduce the alienation of those whose votes they need.

The year 1992 can be a reasonably decent but not great year, with aggregate GNP and GDP growth of about 2%—pretty slow for a recovery year. That may, however, provide "breathing space" for more sensible and consistent longer-range policies to raise the U.S. growth rate to levels more consistent with its potential.

Nonresidential Investment and Inventory Change

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Nonresidential investment (NRI) consists of spending by business firms on structures (manufacturing plants, office buildings, and other structures) and producers' durable equipment. Though NRI fell during the recession of 1991-92, its downward tumble was modest compared to the average performance of NRI during the recessions of the 1970s and 1980s. It is typical for NRI, though with a lag, to be a strong performer in a recovery period. During the recovery of 1992, however, we believe NRI will settle into only a modest pace, growing at not more than around 2%. The inventory decumulation that usually typifies a recession should be complete by the end of 1991 or early 1992. With the inventory sales ratio back to normal and a sluggish recovery, we expect inventories to accumulate during 1992 at a rate of about \$5 billion.

This modest recovery for business spending in 1992 has its roots in both short- and long-term changes in the economic environment. Consider the longer-term view first. The economic expansion that began in November 1982 has been generally slowing since around 1986. The growth rate of NRI has fallen every year since 1987, when it grew at a 6% rate. By 1990, the growth rate had shriveled to a mere 2%; a decline for 1991 is likely when final figures are released.

This pattern of slowdown conforms well with an economy that was reaching high capacity utilization. The unemployment rate had inched downward, labor costs were rising, and productivity was slowing. The Federal Reserve was limiting money growth and borrowing costs were rising. Whereas these factors point to a need for more business spending to expand capacity, they also explain how a general squeeze on business liquidity and profits, rising bankruptcies, and general instabilities in the banking and financial sectors created a less-than-sanguine outlook. After 1986, forecasts of an imminent recession were increasingly advanced and measures of consumer confidence were pointing toward a future with less-than-buoyant demand for goods and services.

Nevertheless, until the Gulf War heated up, we did not believe a recession was inevitable and we predicted continued growth, albeit at a slower pace. Although the combination of factors mentioned above could easily lead a nation into a recession, it didn't seem to be happening in the U.S. this time around. This is partly because the Federal Reserve was doing

"Managers will find themselves in 1992 with considerable uncertainty as they consider new expansions."

a better job of managing money than it did in past recessions. It is also partly due to the fact that prices and interest rates seemed more flexible, cushioning and reversing extreme changes in spending. When spending started to expand rapidly, interest rates would rise and nip the excess spending; when housing and autos would weaken, interest rates would fall and resuscitate the consumer.

The events of the war did push the American economy into a recession, but it has been mild compared to past ones. Now with the war over, we find the nation more or less back where it was before the invasion of Kuwait. What will happen in 1992 is partly determined by a recovery from a shallow recession, and partly caused by a continuation of longer-term stagnating factors. Until these longer-term factors are fully played out, we should see a continuation of slow though variable economic growth.

What are these longer-term factors? A look at the data reveals that the equipment component of NRI was, until the 1990-91 recession, a significant source of economic strength. Since recovery began in 1982, equipment purchases have gone from about 7.5% of GNP to over 9.5%. In real terms, these purchases grew by more than 10% per year. The slowdown is revealed more clearly in the structures category of NRI, whose share of GNP declined from 4.6% of GNP to 2.9%. Since 1985, the real dollars spent on structures per year has declined from about \$150 billion to around \$115 billion in 1991.

There are many explanations for the slowdown in structures. One recurrent theme, however, is that the changes in the tax environment in the 1980s lowered the return on capital. Business taxes were increased in 1982 and then again in 1984. Taxes were reformed in 1986. The investment tax credit was eliminated, depreciation schedules were lengthened, the lowest tax rate on capital-gains was increased, special tax provisions for real estate were restricted,

social security taxes were increased, and the minimum wage level was raised. This new tax environment now constrains managers as our cities are experiencing continuing significant vacancies in both office and retail space. One current estimate is that new office and retail construction in 1992 will amount to 5% less footage than was built in 1991.

Increasing international competitiveness will continue to plague those who make capital purchases. Even though this competition demands more productive steel and auto factories, intense competition has made it more difficult to find the funds for these projects. Consolidation hasn't been too hard on the tools industry, but it has limited new plant construction. Of course, building plants for international transplants has limited the fall in construction.

Managers will find themselves in 1992 with considerable uncertainty as they consider new expansions. The government has not yet finished its financial reform legislation, which could make it easier or harder for builders to be eligible for new real estate loans. A lot depends on how real estate is valued on bankers' books. Of course, the recession has stirred up more talk about tax change, and business planners will be busy in 1992 analyzing how these proposals will affect their bottom lines. They will also be looking for ways to restore liquidity lost in the recession. Until profits return to normal and until a good environment for external funding returns, it may be some time before structures will show much growth.

Nevertheless, as the economy climbs out of the recession, NRI will recover from the shorter-term recessionary factors that caused its level to decrease during 1991. As a slow but positive recovery takes shape, capacity utilization will climb above 80%, profits will increase, and we should start to see a measured turnaround in both equipment and structures. The latter will stop falling and stabilize. An increase in equipment of about 3% will lead to a rebound of NRI of around 2%.

Inventory change in 1992 should start to turn positive, as firms have worked off most of the overhang of goods acquired from very weak sales in early 1991. Whereas the inventory/sales ratio shot up early in 1991, it is back to the low-to-normal range after decreasing inventories at an annual rate of about \$25 billion over the first three quarters of the year. Inventory decumulation peaked at around \$33 billion in second quarter 1991, followed by a reduction of around \$15 billion in third quarter 1991. If this pattern holds up, the draw-down stage should be completed by the end of 1991. Because most planners expect a slower-than-normal recovery from the recession, managers will take a conservative stance with respect to inventories in 1992, adding inventories at a rate of about \$5 billion during the year.

Unemployment and Inflation in 1992 and the Resulting Fiscal and Monetary Policy Issues

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Background

The Iraqi invasion of Kuwait in August 1990 led to the recession of 1990-91 and produced predictable movements in inflation and unemployment. As shown in **Table 1**, inflation rose in third quarter 1990 in response to higher oil prices, then eased as oil prices declined. The unemployment rate also rose in third quarter 1990 and has continued to rise through the recession, reaching 6.8% in second quarter 1991 and remaining near that level since.

The unemployment rate typically rises during recessions as firms cut production and lay off workers. The increase of 1.5% in the unemployment rate during this recession is mild by historical standards. In all the recessions since 1957, with the exception of the very short one in 1980, the increase in the unemployment rate from the business cycle peak prior to the recession to the trough of the recession was greater than we have experienced during the recession of 1990-91. However, with low growth anticipated for at least the next year, the unemployment rate will remain stuck at fairly high levels.

The oil price shock of 1990 and the resulting recession have posed severe problems for the conduct of both fiscal and monetary policy. Fiscal policy has been dominated for a decade by large federal deficits. These deficits have made it very difficult to engage in countercyclical fiscal policy because to do

so would, at least in the short run, increase the already enormous deficits. In fiscal year 1989, before the recession began, the federal deficit was \$153 billion. The combined effects of recession and the escalating costs of the thrift bailout pushed the deficit to \$220 billion in fiscal year 1990 and to a record \$269 billion in fiscal year 1991, which ended last September 30.

Because the deficit precluded an active fiscal policy, monetary policy

was left alone as a tool for controlling inflation and ending recession. But monetary policy, no matter how effectively conducted, cannot do both simultaneously. The traditional first priority of the Federal Reserve has been to control inflation, and that remained its first priority in 1991. Using M2, the broader measure of the money supply, the growth of the money supply slowed early in 1991 and showed almost no increase at all from May through mid-October.

In normal times, such slow money growth would produce a rise in interest rates as the demand for credit exceeded its supply. However, in a recession the demand for credit falls, so even if the Federal Reserve slows the growth of the money supply, interest rates typically fall in a recession. The recession of 1990-91 was no exception. In the 12-month period ending in early December 1991, the yield on 90-day Treasury Bills fell by more than 2.5%. Other interest rates also fell.

Gauging the stance of monetary policy at this time is very difficult. If one judges monetary policy by interest rate movements or by the growth in bank reserves, monetary policy has been somewhat expansionary. If one judges by movements in M2, monetary policy has been very restrictive. The problem is that none of these measures is controlled completely by the Fed. They all respond to other influences as well as to Fed policy. Interest rates fall as the economy weakens, for example, and declining interest rates can induce savers to switch balances out of assets that are in M2 to other assets, producing slow M2 growth. Bank reserves can be affected by consumers' preferences for holding currency rather than deposits.

Although monetary policy is hard to gauge, it remains important. The Fed needs to provide sufficient liquidity to get the economy moving.

Outlook

The outlook is for federal purchases of goods and services to remain almost constant in real terms during the coming year, as shown in **Table 2**. We anticipate that increases in nondefense programs will be offset by declines in defense. The declines in defense do *not* imply a "fiscal dividend." The deficit is projected to rise above \$300 billion next year and could be even higher if the increases in the cost of acquiring failed financial institutions continue to rise. There has been much talk of tax cuts recently in Washington, but reducing taxes to help consumers when the deficit is so high will lead to still higher deficits down the road. Even tax reductions to help increase productivity and growth need to be coupled with measures for deficit reduction, or financial markets could react negatively.

The federal government has been issuing government securities at a tremendous rate in the last

Table 1
Inflation and Unemployment

Date	Personal Consumption Deflator (% change, annual rate)	Unemployment Rate (percent)
2Q1990	4.3	5.3
3Q1990	5.9	5.6
4Q1990	6.6	5.9
1Q1991	3.0	6.5
2Q1991	2.9	6.8
3Q1991	2.7	6.8

Table 2

Forecasts of Selected Variables (billions of 1987 dollars, except where noted)

	4Q1991	1Q1992	2Q1992	3Q1992	4Q1992
Federal purchases of goods & services	382	380	379	378	377
State & local govt. purchases of goods & services	550	552	554	556	557
Rate of change of M2 (SAAR ¹)	4.5%	5.0%	5.2%	5.2%	5.3%
Rate of change of GDP deflator (SAAR ¹)	3.7%	3.7%	3.6%	3.3%	3.3%
Unemployment rate percent	6.9%	6.9%	6.9%	6.9%	6.9%

¹ Seasonally adjusted annual rate

few years to finance the deficit, and risk-averse lending institutions have been buying them in large quantities. From 1988 through 1990, the last full year for which data are available, financial institutions increased their holdings of U.S. Treasury securities and federal agency securities by \$371 billion, an increase of 25% in just two years. The result of this was that these financial institutions did less lending to firms for productive investments than they otherwise would have. Indeed, nonresidential fixed investment rose only 3.4% in real terms (1987 dollars) from 1988 to 1990. The deficit is hampering economic growth by channeling private savings into covering the federal deficit rather than financing the growth of the private sector.

Red ink is not unique to the federal government. States and localities are running deficits as well and, because of that, Table 2 shows that we expect aggregate purchases of goods and services by state and local governments to grow only at a little over 1%, in real terms, from fourth quarter 1991 to fourth quarter 1992.

We expect the Federal Reserve will ease its current restrictive monetary policy and allow M2 to grow at about a 5.2% rate from fourth quarter 1991 through fourth quarter 1992. This is near the center of the current target range. With inflation continuing at fairly low rates and economic growth slow, the Federal Reserve will come under increasing pressure to get the economy moving again.

As a result of a fairly restrictive fiscal policy and a moderate monetary policy, economic growth will be sluggish in 1992. Unemployment will remain high as employment gains barely match increases in the labor force. As a result, the unemployment rate will remain stuck near 7% throughout 1992.

Weak economic growth and fairly high unemployment will produce only modest increases in wage rates, so labor cost increases will be small. We expect oil prices to remain fairly stable during 1992 as increases in Kuwaiti oil production and even some Iraqi supplies increase world production. This all combines to keep inflation in the 3.3-3.7% range during 1992.

The International Economy

Jürgen von Hagen

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This past year was one of wide-ranging economic and political changes in an environment of slowing economic growth and reduced inflation. In fact, some of the changes that carry lasting promise for the world economy have gone virtually unnoticed. Following the short war in the Gulf and the return of oil prices to pre-crisis level, most of the attention has focused on Eastern Europe and the Soviet Union. After the euphoria of the peaceful revolutions in Poland, Hungary, Czechoslovakia, and East Germany, a more sobering assessment of the economies points to many severe problems—outdated industrial structures, frail financial systems, huge ecological damages. Reform programs struggle with a plethora of “chicken and egg” questions in the sequencing of changes—whether to first privatize state industries and then introduce market-oriented reforms or vice versa, or whether to first stabilize the state budget and then introduce new currencies or vice versa. To break the circularity of these arguments requires bold political leadership, which unfortunately is not always in place in the fledgling democracies. Thus, it now seems that the transition to market economies will be much slower and more painful than first expected.

Economic and political developments are even more uncertain in the former Soviet Union. The dissolution of the USSR and the formation of the new Commonwealth of independent states only reveal politically the rapid disintegration of the socialist economy in recent years. Today the republics suffer from hyperinflation, economic depression, and the virtual breakdown of trade among themselves. The remaining trade occurs in the form of barter among monopolistic enterprises. Observers agree that the most important problem is not the lack of goods, but the absence of a functioning distribution system. Economic aid will not achieve much before the distribution problem has been solved.

The civil war in Yugoslavia points to the possibility of military conflicts among the members of the former communist bloc as central power fades away. Clearly, the risk of nuclear and conventional warfare among the newly emerging countries poses new military responsibilities for the West. It will require restructuring and appropriate equipment of our forces to swiftly intervene in crisis areas, making a general arms reduction unlikely. Adding this to the cost of

destroying Soviet nuclear arsenals—a burden the U.S. and Europe have begun to shoulder—means that the “peace dividend” is still a long way off.

East Germany is the exceptional success among the former socialist countries. It has benefited from West Germany's massive financial aid, but even more so from quickly adopting West Germany's legal and financial infrastructure and the ability to “import” West German management and public administrators. The German monetary union was a success inasmuch as it did not lead to a serious surge in inflation. The rapid approach to privatization and confrontation of East German industry with Western competition, together with large real wage hikes pushed through by aggressive West German unions for their new colleagues in the East, caused unemployment to rise to more than 20% in East Germany. Germany's unemployment insurance largely fetters the immediate social consequences of unemployment, but there is a risk of political unrest in the Eastern part of Germany. One year after unification, there are now signs of a turnaround in the labor market. As in the post-war period, medium and small industries and businesses have become the most dynamic sector and the driving force for economic growth and modernization. The lesson for the rest of Eastern Europe is not to rely too much on modernizing large state enterprises, but to foster the development of small and medium-sized innovative businesses. The most critical issue in Germany now is the deterioration of government finances since unification, reflecting the huge subsidies and transfers paid by West Germany to facilitate unification. For the first time in a decade, Germany now has a current account deficit, reflecting the large capital inflows from abroad.

The rising German government deficit, combined with a tight monetary policy, has caused interest rates to rise in Germany and Western Europe. Real economic growth slowed to about 3% for 1991 in West Germany and somewhat less than that in the European Community. The U.K., which is recovering from its recession, is the exception to this trend. Unemployment has generally nudged upward in Western Europe during the last year. The Japanese economy shows slowing growth as well, with falling inflation and steady unemployment rates.

Table
World Economic Indicators

	Output Growth		CPI Inflation	
	1991	1992	1991	1992
World	0.9%	3.0%	4.5%	4.0%
U.S.	-0.3%	2.1%	4.5%	3.9%
Japan	4.5%	3.5%	2.8%	1.9%
West Germany	3.2%	2.2%	3.5%	3.9%

Despite the uncertainty and disarray in Eastern Europe and the former Soviet Union, 1991 has also brought remarkable achievements in economic policy. The European Free Trade Association agreed on the formation of the European Economic Space, which promises to become the world's largest area of free trade and mobility of people, capital, and goods. On the other side of the Atlantic, Mexico has shown good progress with the reform programs initiated in 1989. Inflation is below 15% for the first time in a decade, with economic growth around 4%. As a result of the recovery, and of the Bush administration's “Brady Plan” to restructure and reduce Mexican foreign debt, Mexico's foreign debt burden fell to nearly 30% of GDP in 1990, after exceeding 60% in 1986. The cornerstone of the reform program is a far-reaching effort to privatize public enterprises and deregulate the economy. Further south, Argentina promises to become another success story of economic reform. Inflation seems to be under control, and the government recently announced a program for privatization of the country's huge state enterprise sector, deregulation, and trade liberalization. Both Mexico and Argentina enjoy significant capital inflows today.

Turning to the world economic outlook in 1992, as summarized in the Table, economic growth will rebound as the U.S. gradually recovers from its recession and output in Eastern Europe starts to pick up. World economic growth in 1992 is projected at 3%. Consumer price inflation will continue to slow in the industrialized world to around 4%. Oil prices should remain fairly constant, unless a disruption of Russian oil supplies causes a shortage in Eastern Europe. However, given the large potential for energy saving in the Eastern economies, where energy consumption per dollar of GNP is estimated at four to five times higher than in Western Europe, the price effects of such a shortage should be neither large nor lasting.

For the U.S., the economic trends in the rest of the world are likely to imply a stabilization of real export growth at around 4%, similar to 1991. Import growth will rise above the 1% of 1991 to a rate of 3-4% in 1992. Thus there will be little room for a further improvement of the current account deficit, which will remain small. As the U.S. economy recovers slowly and gains strength relative to Europe and Japan, there may be some strengthening of the dollar. International capital flows will be directed away from the U.S. to Western Europe (especially Germany, France, and Italy), Latin America, and eventually Eastern Europe. With U.S. government bond yields now 70 basis points below Germany's and no reason to expect a rise in U.S. rates relative to European and Japanese rates, there is little room for a substantial increase in the value of the dollar from the international financial markets.

Financial Markets and Corporate Earnings

Michael Simkowitz and George Hettenhouse

Professor of Finance and Director, Alumni Programs, Indiana University School of Business; Associate Dean, Research and Operations, and Professor of Finance, Indiana University School of Business

Another year has passed and it is time again for our mothers' foolish sons to try to predict what will happen in the financial markets in the coming year. The job is a little bit easier than last year's, since we now know that the United States can thoroughly whip Iraq on the field of battle; but we still don't know whether we know how to lick a puny recession, and this year will tell us whether George Bush can whip a Democrat who doesn't ride in a tank and wear funny hats. To get a feeling as to what we should expect in the financial markets this coming year, we must consider what will happen with corporate earnings and interest rates.

Since 1966 there have been six periods in which the earnings of the S&P 400 industrial average have declined on a year-to-year basis: 1967-68, 1969-70, 1974-75, 1981-82, 1984-86, and the current 1989-91. Using a ball park estimate of \$22.25 for the 1991 earnings on the S&P 400, this translates into a 15% decline in earnings since 1989. This decline is about the average of the aforementioned declines. Following the previously mentioned declines, earnings have rebounded the following year by approximately 19%. It is our considered opinion that the rebound from 1991-92 will be at least as good as the average of the past rebounds. The reason for our being so optimistic is not that we expect the economy to rebound vigorously; we think there are a number of factors that will relatively help reported earnings:

1. Inventory balances are lean throughout the economy. In past recessions producers have had large excess inventory balances to work off, thereby postponing the recovery of operations and profitability. With modern inventory management tools—better information systems and an increased attention to just-in-time inventory management—inventories are actually lower now than they were before the recession. As the economy recovers and producers begin to fill distribution channels with goods, there will be an immediate benefit to the bottom line.

2. With relatively low inflation levels and the dismal earnings performance during the recession, companies have quietly raised prices. Profit margins actually increased in second quarter 1991 without any

gain in production. These higher prices should help reported profits once volume picks up.

3. The country may be poised for a capital equipment boom. Corporations and government alike have underinvested in infrastructure during the 1980s. The recovery may be the excuse both sectors need to begin rebuilding the country's capital stock. Perhaps some portion of the lowered defense spending will go to this important area. Health in this sector of the economy is more widely beneficial than booms in other parts of the U.S. economy.

4. The age of the U.S. auto fleet is now close to eight years. Consumers can't postpone replacements much longer, in spite of the sticker shock they feel in the showroom. The new models of U.S. producers seem competitive in price, performance, and appearance. The aggressive selling of leasing as an alternative to buying automobiles may hasten the return of purchasers to the auto market.

5. The U.S. economy continues to enjoy growth in export sales. The merchandise trade balance continues to be in deficit and is likely to remain so as the recovery encourages consumers to purchase imported goods. The good news is the solid growth in U.S. exports; the U.S. retains a comparative advantage in exporting to its Canadian and Mexican neighbors. Economic recovery in Europe, combined with the insatiable needs of Eastern European countries, could further stimulate exports. Of particular interest are pollution control technologies, an area in which the U.S. is a world leader.

American companies appear poised to take advantage of an economic upturn. Many have used the recession as an excuse to cut back on excess overhead and improve productivity. While these actions have served to worsen unemployment—both blue- and white-collar—during the recession, companies are now poised to recover strongly once the economy points in the upward direction.

This past year has seen a decline in interest rates, both on the long and the short end of the term structure, far greater than the consensus forecast a year ago. As we write this on All Saints Day, three-month treasury bills are yielding approximately 5%, one-year T-bills approximately 5.1%, five-year notes around 6.8%, ten-year bonds at 7.5%, and 30-year bonds at about 7.9%. We believe long-term rates are going to have a hard time coming down much further from where they are now. Although there may be an influx of foreign capital into the U.S. financial markets, there is a good chance that, unlike in prior periods, an increasing amount of this money will be directed toward the equities market and less of it toward the fixed income markets. In general, U.S. interest rates are no longer substantially higher than overseas interest rates, and barring expectations of a

rapidly rising dollar, there is not much incentive for foreigners to buy U.S. bonds. It is our considered opinion that in general, 30-year rates will have difficulty getting lower than 7.5% and higher than 8.6%. On the short end, we would expect interest rates to stay between 5% and 5.5% until the recovery is well under way, around second quarter 1992. There may be a surprise move of long rates to the upside if for some reason the markets begin to anticipate inflation. We doubt there will be "sound reasons" for fear of inflation, but fears, by their very nature, do not need sound reasons. Ironically, the most likely reason for a spike-up in long rates would be an overly energetic move by the Fed to increase the liquidity in the system, thereby raising fears of a money-driven inflation.

Given this scenario, an investor does not have an obviously superior strategy to follow. Returns on long-term government bonds should approximate the yield maturity of around 7.5% to 8%. Since there is a greater probability, though small, of a spike-up in long rates as opposed to a spike-down in long rates, bond investors will have difficulties envisioning a scenario whereby returns on long-term bonds in the next 12 months exceed 8 or 9%. The return on cash equivalencies will be low, running in the 4.5 to 5% range.

The stock market is by no means a bargain, nor is it terribly overpriced given the substantial decline in interest rates. As of today the yield on the S&P 500 is approximately 3.2%; to put that into some historical perspective, at the market top in August 1987 the yield was approximately 2.6%, whereas in July 1982, before this bull market exploded, the yield was 6.2%. Looking at that range one would say this market is pretty scary, since the current yield is much closer to what the yield was at the market top than at the market bottom, but for the 20 years from 1954-1974 the average yield was 3.28%. Thus we see that the market spent 20 years with its average yield approximately where the yield is today. It is our expectation that the yield on the market, or the rate in which dividends are capitalized, will not change much between now and 12 months from now, whereas we should expect dividends to accelerate their growth and be 5 to 7% higher 12 months from now. If this scenario comes to pass, then investment in the stock market today should yield 8 to 10% return. If the dividend yield on the market should fall below 2.9%, then all investors should reduce their reliance on equities. Given our expectations of dividend increases, this would occur if the S&P 500 reaches 430 (DJIA: 3370) in the first half of the year and 460 (DJIA: 3570) in the second half. (The S&P 500 ended the year at 417; DJIA: 3169).

Given these forecasts, the long-term investor with a horizon of greater than five to ten years should maintain a heavy concentration in equities. This is

because far greater long-term damage will be done to his or her wealth position by missing a leg of a bull market than by trying to avoid the periodic market corrections. The shorter-term investor should obviously be looking at some substantial investment in bonds. We don't think the reward-risk ratio is enough to make bonds of maturities greater than ten years very attractive, but you really must go out to seven years to gain a significant yield to maturities. The more speculative investor who enjoys gambling on his or her ability to time the market may want to dance back and forth between equities and cash equivalence.

In summary, we believe that the investor is going to have a hard time finding among the short-term cash equivalents, bonds, and equities a vehicle for earning much more than 10 or 11%. It is important to realize that during that 20-year period from 1954-1974, the investor in the stock market only earned 9% compounded annually, and that includes dividends. The big money in the stock market is made in the early stages of a bull market. In the period from July 1982 to December 1986, the investor in the stock market realized a compound return including dividends of close to 26%. If the investor is going into the stock market in 1992 expecting a 26% return, he or she will be disappointed. If, on the other hand, he or she desires to do better than can be done in bonds, we believe there is a 70/30 chance of that wish coming *true* by investing in the red, white, and *blue*.

Real Estate Markets

R. Brian Webb

*Assistant Professor of Finance, Indiana University
School of Business*

Housing

The good news for the housing markets is that mortgage rates are at their lowest levels in 15 years. Fixed-rate mortgages fell to 8.25% by the end of 1991, and adjustable-rate mortgages are available at less than 6%. Fixed-rate mortgages of less than 8% are possible in 1992 if inflation rates remain low and the Federal Reserve Board continues to lower interest rates in an attempt to stimulate the economy. Low mortgage rates typically spur housing starts, and this additional construction activity helps lead the economy out of a recession. The bad news for the housing markets (and the economy), however, is that low mortgage rates have promoted substantial refinancing

activity but have not ignited demand for new houses or additional construction activity. Housing starts for 1991 may be fewer than 1 million units—the first time since 1945 that housing starts have fallen below this level. For perspective, housing starts peaked at a seasonally adjusted annual rate of 1.97 million units in January 1972, fell to a low of 837,000 units in November 1981, and ended 1990 at 1.2 million units. Housing starts for 1992 are expected to return to 1990 levels (1.2 million units) due to lower mortgage rates and the gradually improving economy.

Construction activity has been slow to respond to lower interest rates during 1991 for two primary reasons. First, demand for new housing has continued to be weak because consumers are generally not confident in the security of their jobs, and because personal savings are at low levels (making additional household debt both unattainable and undesirable). Unemployment usually has its primary effect on the

"The credit crunch affecting new construction in the housing markets is having an even more dramatic impact on commercial real estate."

low-income households, but during the current recession it has shaken middle- and upper-income households as well. The spending binge of the 1980s spurred by the overactive use of credit cards has caused household savings to drop below 4%, significantly lower than it has been at the beginning of all the other economic recoveries since 1945. With little savings to meet the more stringent down-payment requirements of lending institutions and a basic fear of taking on substantially more debt, consumers are standing on the sidelines even as housing affordability is on the rise. Second, the deleveraging of the banking system due to stricter capital requirements and falling real estate values has created a "credit crunch." Developers in many parts of the country are finding it impossible to finance the speculative building that has generated two-thirds of new housing construction nationwide for the past 20 years. With these impediments to both supply and demand, construction activity remains sluggish.

The long-term outlook for housing demand indicates that a return to the level of construction activity witnessed in the early 1970s is doubtful, as the composition of the U.S. population is being driven by the wave of the "Baby Boom." The number of households in the 25-34 age bracket (the largest source of first-time home buyers) is currently shrink-

ing and is expected to remain at lower levels into the 21st century. The number of households in the 35-64 age bracket is increasing, but real wealth for this age group is stagnant—indicating that dramatic increases in the demand for more expensive or vacation houses may not be forthcoming.

Housing markets in the Midwest are stronger than in the nation as a whole, however, because the savings and loan crisis never hit the proportions seen in other parts of the country, and housing prices appreciated gradually during the 1980s rather than appreciating rapidly as they did in many parts of the country. The median home price in Indiana in 1991 is approximately \$64,000, compared with more than \$100,000 for the rest of the nation. This gap, in conjunction with a recovering economy, suggests that home prices in Indiana should continue to rise gradually through 1992 and beyond.

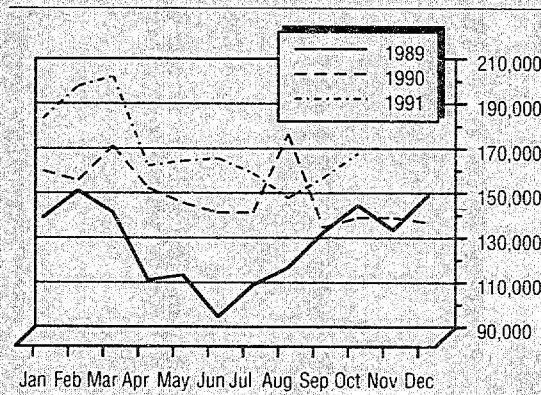
Commercial Real Estate

If national housing markets are weak, commercial real estate markets are even weaker. The combination of deregulation of financial institutions and tax law changes favorable to real estate stimulated annual commercial real estate construction by 1985 to more than twice the level observed in 1980. Whereas the supply of commercial space increased dramatically during the 1980s, demand leveled off due to the merger and "downsizing" activities of corporate America. The result has been steadily rising vacancy rates and steadily falling rental rates and values. Office vacancy rates rose from 3.7% in 1980 to 16.8% in 1986, and continued to rise to 17.5% by 1991. Office rental rates and values peaked in 1984, and both have fallen 40% in real terms by 1991. If additional demand for office space remains sluggish, it will take from seven to ten years to work off the excess supply nationwide.

The credit crunch affecting new construction in the housing markets is having an even more dramatic impact on commercial real estate. Not only have construction loans for commercial real estate become virtually nonexistent; the 40% decline in values from 1984 levels has made refinancing maturing loans on existing commercial real estate difficult. Declining commercial real estate values have already had obvious effects on the savings and loan and commercial banking industries and are starting to draw into question the solvency of some major life insurance companies. Fundamental forces of supply and demand suggest that a much smaller construction industry will exist in the future and that the commercial real estate industry will not participate in any economic recovery that takes place in 1992. The lack of construction activity will limit the strength of the economic recovery overall.

Indiana's Recession in Graphics

Figure 1
Number of People Unemployed in Indiana



Morton J. Marcus

Director, Indiana Business
Research Center, Indiana
University

Figure 2
Total Establishment Employment

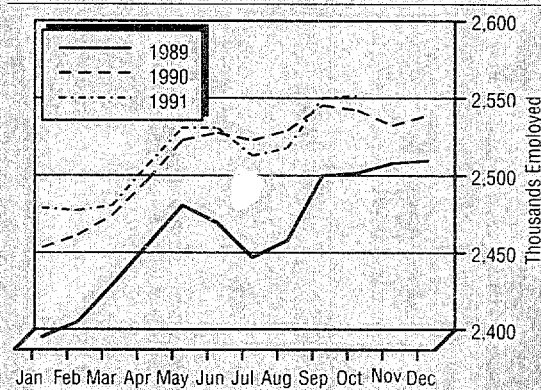
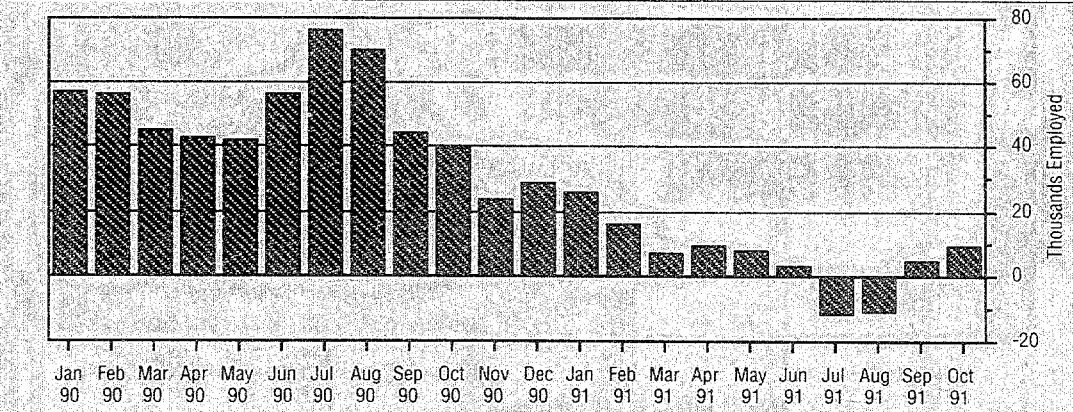


Figure 3
Change in Establishment Employment



T

his article offers an overview of Indiana's experience in the recession.

Very briefly: Unemployment has risen, but establishment employment is at record levels. The jobs lost in Indiana have been in the private sector, and, on balance, confined to manufacturing. Within manufacturing, nondurables have advanced consistently, with durables goods accounting for the declines we observe.

The recession can be seen concentrated largely in transportation equipment and the metals industries that supply products for durable goods. Many Hoosier workers made virtually no gains in real average weekly earnings in the past two years. As a result, they too reduced their purchases of new vehicles and new homes.

For those who wish some commentary with their pictures:

Figure 1. We estimate that the average number unemployed during 1991 will prove to be in excess of 176,000. This is an increase of 22,200 over 1990 (+14.4%) on top of a 21,700 (16.4%) increase in the prior year. However, since the first quarter of the year, the number unemployed has shown considerably less fluctuation than in the two previous years.

Figure 2. Along with the rise in unemployment, there has been a rise in the number of persons employed in the state. By October 1991, total establishment employment was higher than ever before.

Figure 3. In 20 of the last 22 months, employment has exceeded the level it held one year earlier. But the increases became smaller and smaller as 1990 progressed into 1991. Finally, in the summer of 1991, employment failed to rise for two consecutive months over year earlier levels. Recently employment growth has resumed.

Figure 4
Public and Private Sector Employment Growth

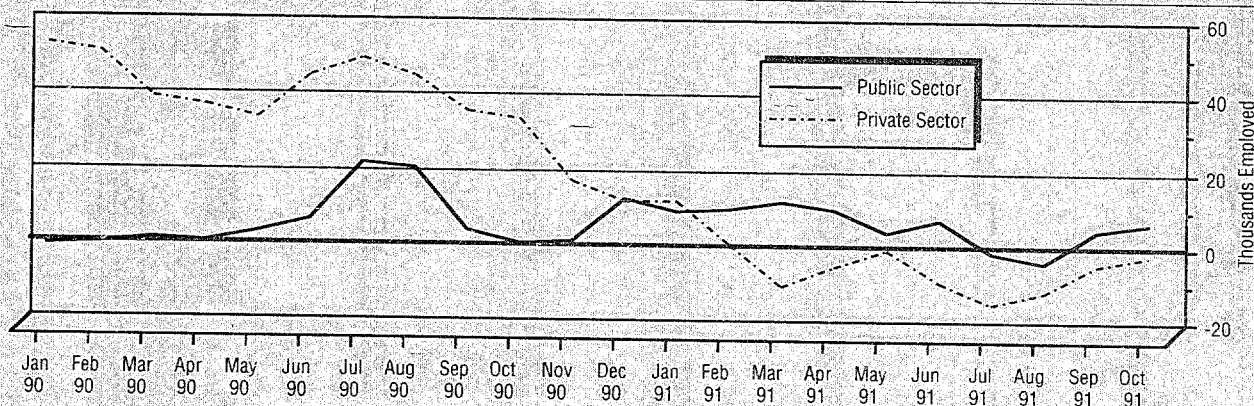


Figure 5
Manufacturing and Nonmanufacturing Employment Growth

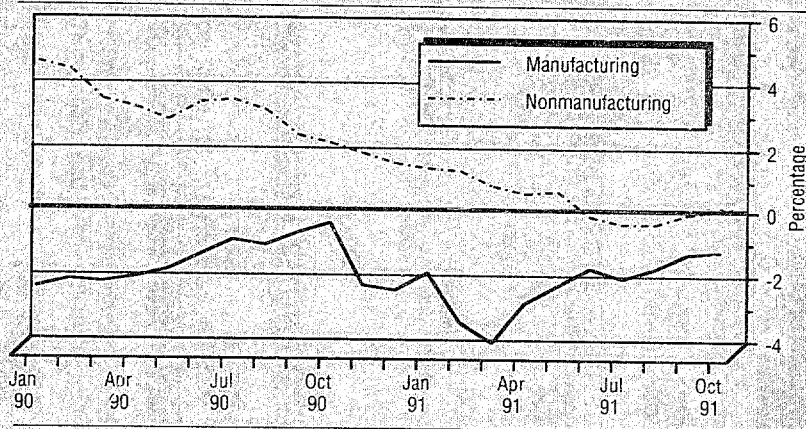


Figure 6
Employment Growth in Durables and Nondurables

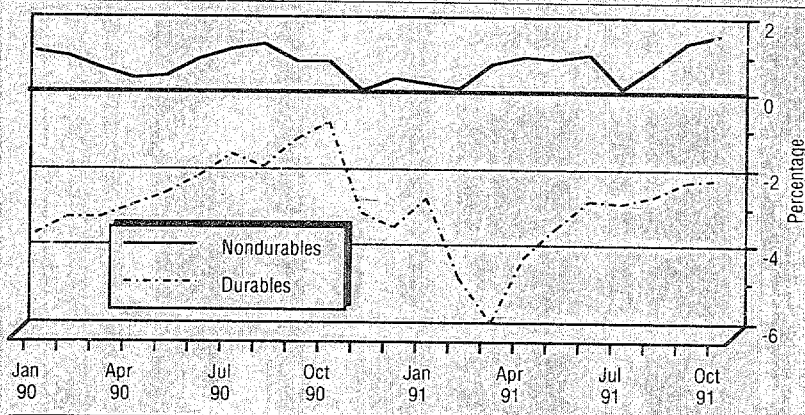


Figure 4. The decline in employment growth (as seen in the comparison of each month with its year-earlier counterpart) is a private sector phenomenon. Public sector employment has shown year-to-year same month growth with but one exception: August 1991. At the same time, the trend for the private sector is generally downward from the beginning of 1990 into the spring of 1991. Since summer 1991 there has been an upward movement in the data, although gains have yet to be made manifest.

Figure 5. The experience of nonmanufacturing employment is positive but declining during the recession. Almost each month the increase over the same month of the preceding year declined, until this past summer when a slight improvement began. Manufacturing, however, saw no month in the past 22 with a positive increase over the same period of the prior year.

Figure 6. But within manufacturing, nondurables (including chemicals, printing and publishing, food, and so forth) have a consistent record of gains. The declines have been strictly in the durable goods sector.

Figure 7
Equipment Manufacturing Employment

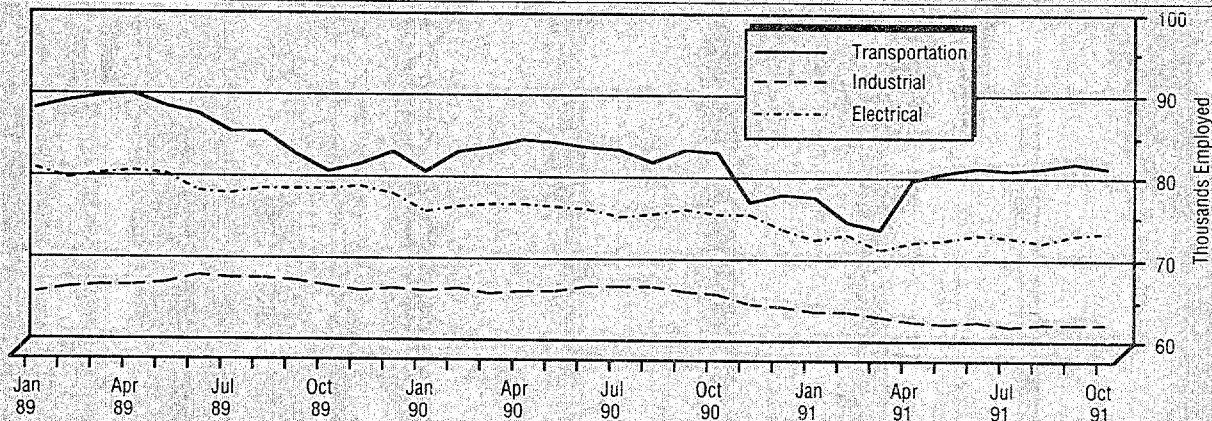


Figure 8
Primary and Fabricated Metals Employment Growth

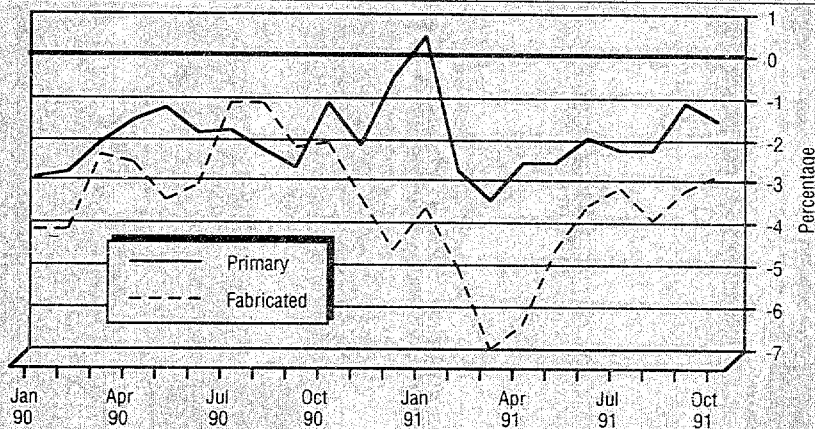


Figure 9
Average Weekly Earnings, Durable and Nondurable Manufacturing

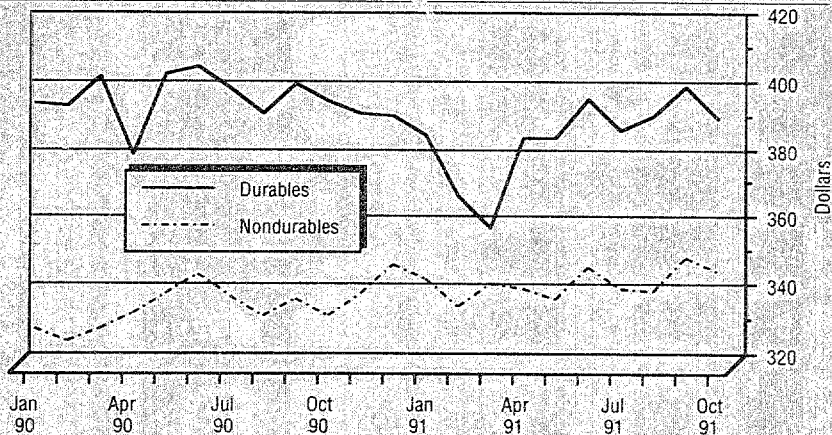


Figure 7. Employment in equipment manufacturing (electrical and industrial) has been declining moderately since early or mid-1989. However, employment in transportation equipment has been responsible for most of the job losses in the past two years.

Figure 8. Other job losses have occurred in the mills and factories that produce primary metals (steel or aluminum) as well as the workplaces in which those metals are fabricated into thousands of products for durable consumer and producer goods.

Figure 9. Workers in durable goods factories saw considerable declines (nearly \$50) in their real weekly earnings between June 1990 and March 1991. Since then, however, much of those losses have been regained. In October 1991, real average weekly earnings were just 1.2% (\$4.86) below the same month a year earlier. For workers in nondurable goods production, the trend has been upward throughout the past two years. In the past year, their real gains have been \$13.03 per week, or +3.9%.

Figure 10
Average Weekly Earnings: Trade, FIRE, Services

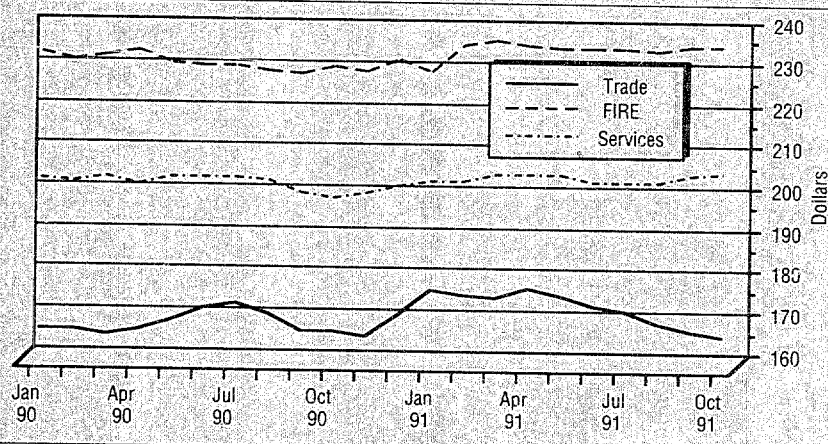


Figure 11
Change in Number of New Vehicle Sales

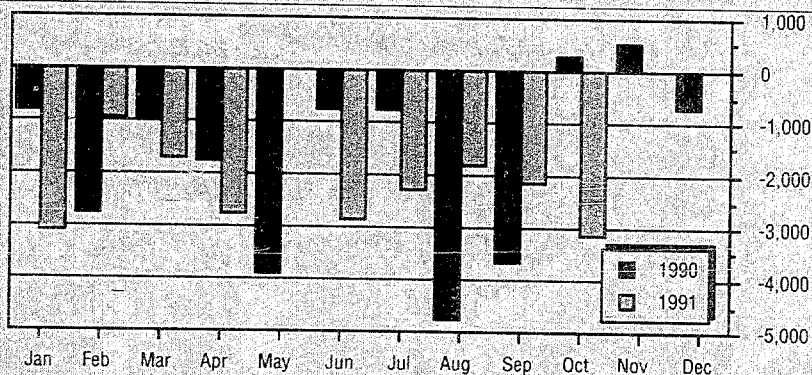


Figure 12
Change in Number of Housing Starts

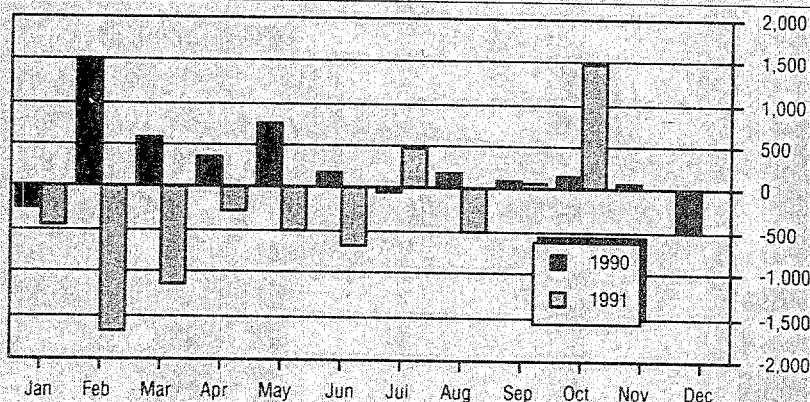


Figure 10. Workers in other sectors of the Indiana economy have seen little real progress in the past two years. Average weekly earnings, adjusted for price changes, are virtually unchanged in Finance, Insurance, and Real Estate, as well as in Services. After some temporary improvement, average real weekly earnings in wholesale and retail trade in October 1991 were almost equal to where they started in January 1990.

Figure 11. The lack of progress in wages has led to Hoosiers buying fewer new cars and trucks. New vehicle registrations (courtesy of R.L. Polk) have been down in 20 of the past 22 months when compared with the same month a year earlier. For 1991, we expect the final figures to show registrations totaling 125,500 units, down nearly 59,000 units from 1989.

Figure 12. Housing starts in 1990 generally improved over 1989, but from November 1990 to August 1991, F.W. Dodge reports that Indiana housing starts were lower in 8 of 9 months. August and September showed gains once again as the economy began to emerge from the recession. For the year, 1991 is expected to produce fewer than 21,000 Indiana housing starts, compared with more than 28,000 in 1990.

The impression left by this pictorial representation is of a recession that hit bottom in spring 1991 and has shown signs of recovery since then. At first, it was a highly selective recession, but as time went on, its effects spread. It may take several more months for the positive consequences of lower interest rates to make themselves fully felt, but we expect to see each of these measures of economic activity take a more positive path in 1992.

Indianapolis

Robert Kirk

Professor of Economics, Indiana University Purdue University at Indianapolis; with data assistance from the Statistical Services Division of the Indiana Department of Employment and Training Services

Employment growth for the Indianapolis metropolitan economy is expected to begin the year slowly (1% annual rate), expand at an increasing rate, and end the year at a 2% annual rate. Growth in real personal income and real wages and salaries, the primary component of personal income, will follow a similar pattern. The unemployment rate, running below the national average, will continue to do so.

This forecast assumes no tax legislation to stimulate the economy. However, because the U.S. taxpayer is facing \$52 billion in new federal and state tax increases in fiscal year 1992, some type of temporary tax relief tailored to appeal to the middle-class voter is possible.

Recession in the Midwest

The media have emphasized the regional character of the recession with the Northeast being hit hard and the Midwest less so. At the metropolitan level, this message is generally true, as the **Table** indicates, though manufacturing in Detroit and St. Louis contracted more than the United States.

A closer examination indicates that St. Louis has been affected by aerospace and automobile layoffs. Similarly, Detroit has been affected by automobile and

industrial machinery cutbacks. The automobile industry is cyclical and sales are expected to increase later in 1992, but the Big Three face some long-term problems. An accounting rule change (FASB No. 106) requires firms to add a liability to their balance sheet after January 1, 1993, to reflect future post-retirement health and other benefits. These changes are particularly burdensome for the Big Three automakers because they have a very large retiree population. They are responding to the accounting change by looking for ways to reduce employer contributions to retiree health plans. Health care costs per car produced by the Big Three are already at least three times greater than for Japanese transplants.

For Indianapolis, services and retail trade will be the primary sources of employment growth, which continues the pattern of the 1980s. The retailing industry shows a lot of entry and exit with the closure of the downtown L.S. Ayres store and the entry of Venture occupying a former retailer's stores. A major regional megastore retailer and a regional drugstore chain are expected to enter the Indianapolis marketplace in 1992. Food stores and restaurants continue to open where there are new housing developments. Some major construction projects will be approaching completion, such as the State Office Building, Indiana Farm Bureau, and several projects on the IUPUI campus. Others, such as Eli Lilly, St. Vincent's Hospital, and Veterans' Hospitals, continue.

Circle Centre Mall and United Airlines

Forms for the Circle Centre Mall parking garage are being poured, which is part of the city's contribution. But the private sector financing and signing of agreements with anchor retailers remains to be done (at the time of this writing). Financial participation by local firms should help obtain financing. Beginning construction soon is important because property tax revenues from the increased assessed valuation of the mall are needed in 1994 to service the tax-increment bonds issued by the city.

The northwest portion of the Indianapolis International Airport will be a beehive of construction activity. Currently, the U.S. Postal Service Express Mall hub is being constructed with a 356-day completion schedule. Next door to the hub is the site for the United Airlines maintenance facility, which will overhaul engines and airframes and is scheduled to open in late 1994.

UAL is committed to at least 6,300 high-paying jobs, investment of \$800 million in plant and equipment, and a \$250 million payroll by 2004. An airline executive indicated that the current base for union employees at the San Francisco UAL maintenance facility is approximately \$45,000 (with benefits of \$55,000).

Table
Change in Employment in Selected Midwestern Metropolitan Areas and the U.S., 3Q1990-3Q1991

	Total Employment	Manufacturing Employment
Columbus, OH	1.4%	0.2%
Cincinnati, OH	1.3%	-2.9%
INDIANAPOLIS	1.2%	-0.6%
Chicago, IL	0.7%	-0.6%
Louisville, KY	0.7%*	-1.5%*
St. Louis, MO	-1.1%	-5.7%
Detroit, MI	-1.9%	-4.0%
U.S.	-1.4%	-3.4%

*July and August only

Source: Various states' Departments of Employment and author's calculations.

What are the city's incentives? One is \$111.5 million in cash to help UAL on its construction costs. The other is a tax incentive for UAL. Competing cities imposed no personal property tax on UAL's equipment and inventory. Therefore, to make Indianapolis's offer competitive, UAL wanted an agreement that if it paid personal property tax to the city, it would get it back.

How will the city pay? Bonds will be issued, and to get the best terms the city is pledging the revenue flow from the county option income tax (COIT). Also, the revenue from the personal property tax on equipment and inventory in the Airport Development Zone—a taxing district where UAL will be located—is pledged to amortize facility debt.

Current uses of revenue from COIT include the homestead credit, the Metropolitan Emergency Communications Agency (MECA), township and corporation distributions, and the Police and Fire Pension Supplemental Trust Fund. The city's union contract with police and firemen expires at the end of 1992. They will make a claim, in the interests of public safety, for a share of COIT revenue. As mentioned above, revenue from COIT has been pledged for debt service on the 25-year \$111.5 million UAL bond issue. The Goldsmith administration will have three years to develop other revenue sources to make the debt service payments.

Mayor Hudnut and Governor Bayh have been applauded for holding UAL accountable to repay a portion of the incentives if the agreed-upon number of jobs to be created and investment in plant and equipment do not occur. When the economic impact of this type of project is estimated, a multiplier is applied to the construction of the facility, the wages arising from the annual increased employment, and the annual purchases made to operate the facility. Construction is to begin in the fall of 1992. The multiplier for the construction industry is higher than other industries' multipliers because many of the inputs in construction are obtained locally, which means that the dollars remain within central Indiana.

It must be remembered that the facility will open in 1994 with an estimated 700 jobs, then increase in stairstep fashion over a ten-year period. To realize the total projected economic impact, both UAL and local economic developers have their work cut out for them to attract the aerospace-related suppliers. UAL, being the number one customer of Boeing, expects to have some leverage on Boeing's locating a warehouse in Indianapolis. Impact analysis based on the multiplier concept is usually used when there is a single investment as opposed to a series of investments over ten years, as with UAL. Much can happen over ten years!

How does UAL fit into a theory of urban growth? Growth is promoted by knowledge spillovers. Cities

grow because people in cities interact with other people, sometimes within their own industries but more importantly outside of their industry. In the case of UAL, it is the manufacturing technology it brings that may spawn other technologies. The city has a responsibility to provide a supportive environment for these knowledge spillovers to occur.

How will local governmental units in Marion County participate in the expected growth arising from Circle Centre Mall and UAL? Apprehension arises in Decatur Township, for example, because an economic development area (tax-increment financing district) has been extended in the vicinity of the Indianapolis airport to finance the city's infrastructure improvements that will be needed as new businesses and residences occur. Local government units facing increased demands for services need a growing tax base to finance these services. However, the revenue from the real property tax base in the TIF district may be pledged to service the bonds that financed infrastructure improvements. There will be some tough choices in a few years between new roads and new schools.

Environmental Concerns

Reducing pollution will be a big issue in the 1990s. For example, several northeastern states appear to be adopting California's stricter auto emission standards. General Motors is responding by moving ahead on a mass-produced electric car. However, before the car can be sold, dealerships must be able to service electric cars. A potential market exists for Hoosiers to develop service equipment and train technicians.

The Clean Air Act Amendments of 1990 with respect to sulphur dioxide emissions are expected to cost \$4 billion per year nationally. The estimation of benefits ranges from \$2 billion to \$9 billion per year. The wide range is the result of conclusions from the National Acid Precipitation Assessment Program that the percentage of acidified lakes is less than first anticipated and the role of power plant emissions is unclear. The Clean Air Act includes an approach, long advocated by economists, in which power plants can meet their emission reductions using a variety of methods, including purchasing "excess" emission reductions from other sources that reduce by more than required by the legislation. For example, PSI Energy Inc. plans to meet its requirements with scrubbers and fuel shifting, and then sell "emission reduction credits" if the market for credits develops.

Investment in pollution control may lower the long-run growth rates of the capital stock and consumption through higher utility rates. Demand-side management is being considered in the form of incentive payments to consumers to use energy more efficiently. Tax policy from 1981-1986 encouraged

investment through accelerated depreciation allowances and investment tax credits. In the 1990s, accelerated depreciation is not available for investment in pollution control equipment and incentive payments to consumers are treated in a way that undermines their effectiveness. It is hoped that lower mortgage rates will stimulate the housing sector, but the increased disposable income from reduced monthly mortgage payments may, in time, be partially offset by higher electric rates.

Northwest Indiana

Leslie P. Singer

Professor of Economics, Indiana University Northwest

The traditional view of the business cycle is that a downturn first occurs in manufacturing—that is, in the goods-producing industries—which then, ripple-like, spreads through the economy, causing declines in aggregate output and employment. Indeed, this was the case in the 1979-1989 double-dip recession which, in northwest Indiana, extended well into the 1985-1986 period. We experienced a succession of dips, as shown in **Table 1**.

The massive downturn in steel employment caused by secular (long-term) restructuring trends and by disruptions due to breakdowns in collective bargaining generated a cycle in which upper turning points were not characterized by percentage increases, but rather by a diminution of rates of decline.

It wasn't until 1987 that, because of manufacturing exports driven by the precipitous fall in the exchange rate of the dollar, steel and manufacturing employment began a modest cyclical upturn, about a declining secular trend. Northwest Indiana regained about 6% of the more than 20% employment that had been previously lost.

The lower turning point of the current cyclical downturn was in April 1991, with a loss of employment of 6.8%, about a still declining secular trend. We are predicting a cyclical upper turning point in steel, for first or second quarter 1992, with almost no growth thereafter.

Throughout this entire period, the nonmanufacturing sector, including the volatile construction industry, has never shown a decline at any of the turning points. There was relatively high growth (8-10%) at the upper turning points, and lower growth (less than 1-1.6%) at the lower turning points.

Northwest Indiana has, in fact, two economies: the steel industry, which is on a declining secular trend as restructuring proceeds; and the nonmanufacturing as well as the non-steel sector. The latter sector appears to be secularly completely stable. Nonmanufacturing is on a continued secular growth path, with a few possible slowdowns in the rate of growth. Non-steel employment was 21,700 in 1984, when steel employed 63,300 workers. Non-steel employment is currently about 22,000, and steel employment averages about 33,000 (as shown in **Table 2**).

Both steel and non-steel manufacturing lay off personnel for secular reasons, such as downsizing due to restructuring. The firms prefer to adjust cyclically by reducing weekly hours. As shown in **Table 1**, weekly hours were 43.81 at the cyclical upturn and fell to 38.91 hours during the latest lower turning

Table 1
Historical Overview of Business Cycle in Steel and Total Employment in Northwest Indiana as Measured by Maximum 12-Month Drop or Rise, 1985-1991

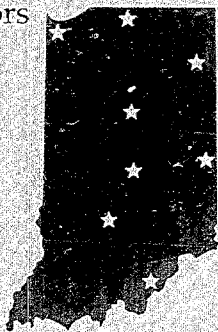
Steel					
Lower Turning Points	Feb. 85 (-20.16%)		Oct. 86 (-32.18%)		Apr. 91 (-6.78%)
Upper Turning Points		Sep. 85 (-1.05%)	[Strike]	Jan. 88 (18.98%)	
Total Employment					
Lower Turning Points	Jan. 85 (-3.35%)		Sep. 86 (-4.08%)		June 91 (1.28%)
Upper Turning Points		Sep. 85 (5.24%)		Feb. 88 (6.39%)	
<i>Note: Values in parentheses are percentage increases or declines over a 12-month span.</i>					
Growth Rates of Non-Mfg. at Turning Points					
	Jan. 85 (.45%)	Sep. 85 (7.58%)	Sep. 86 (10.69%)	Jan. 88 (8.42%)	Apr. 91 (1.57%)
Weekly Hours					
	39.41	42.42	43.37	43.81	38.91

Indiana University

IU Connections



We Are
One University
With Eight Front
Doors



Indiana University's 3,600 full-time faculty members teach nearly 94,000 students at campuses in Bloomington, Indianapolis, South Bend, Gary, Kokomo, New Albany, Richmond, and Fort Wayne. The University also offers programs in Columbus, Elkhart, and many other sites.

Dear Friends:

Indiana University is people — students, faculty, staff, alumni, and friends — all those who contribute to the University and benefit from it. The IU family includes leaders who have achieved national and international recognition in a broad array of fields — and have studied at our campuses, taught in our classrooms, and carried out their scholarship and research in our libraries and laboratories. The University has gained a reputation worldwide for the excellence of our academic programs and for major contributions to the advancement of knowledge.

I am delighted to share with you, on the following pages, a few words about some of the extraordinary individuals with IU connections, and the remarkable achievements that distinguish our University.

Indiana University is equally proud of the thousands of people in the IU family who may be less widely known but are making important contributions to their communities. Indiana graduates are found in key positions throughout our State, providing the leadership and commitment that are essential to economic strength and the quality of our lives.

Indiana University makes a difference, directly and indirectly, in the lives of people across Indiana and beyond.

The University is key also to making a difference in the economic future of our State. An educated and creative work force is essential if Indiana is to compete in the information-intensive, high-technology environment of the coming decade, when four out of five new jobs will require a college degree. IU has unparalleled resources to ensure that our State will have this highly qualified work force.

It is vital for Indiana that IU's resources are known, valued, and used to the fullest. I invite you to join with us in a new initiative — Hoosiers for Higher Education, an intensive public awareness campaign to achieve these goals. Hoosiers for Higher Education is described on page four of this insert.

I am confident that, working together, we can help to build Indiana for the 21st century.

Cordially,

Thomas Ehrlich
President



IU Connections

Following are some of the many famous people with IU connections.



■ For 13 years IU political science graduate Jane Pauley greeted millions of early risers as co-host of "Today" on NBC. She now has her own prime-time news program, "Real Life with Jane Pauley."

■ Earning his doctorate in zoology from IU at the age of 22, James Watson became, at 34, the youngest person ever to receive the Nobel Prize. He was cited, along with British scientists Francis Crick and Maurice Wilkins, for discovery of the structure of DNA.



■ In 1946 IU faculty member Hermann Muller was awarded the Nobel Prize in Medicine and Physiology for demonstrating that X rays can be used to induce genetic mutation.

■ IU graduate Evan Bayh became the country's youngest governor in January 1989. His father, former U.S. Senator Birch Bayh, is also an IU graduate.



■ Former IU swimmer Mark Spitz won seven gold medals at the Olympic Games in Munich in 1972 — a record of Olympic achievement that has never been equaled.

■ Four-time Emmy Award-winning NBC sportscaster Dick Enberg received his early broadcast experience as a play-by-play announcer for IU sports. He holds a doctoral degree from the IU School of Health, Physical Education, and Recreation.



■ U.S. Vice President Dan Quayle and his wife Marilyn Tucker Quayle are both 1974 graduates of the School of Law at Indiana University-Purdue University at Indianapolis.



■ Pulitzer prize-winning journalist Ernie Pyle brought the daily lives of soldiers in World War II to millions of

Americans through his newspaper articles. An IU classmate of Chancellor Herman B Wells during the early 1920s, he was a writer and editor for the student newspaper — now the *Indiana Daily Student*.

■ IU biology professor Alfred Kinsey was an expert on gall wasps before he turned his scientific expertise toward human subjects. Asked to teach a course on marriage, he discovered how little information was available on human sexuality. With the publication of *Sexual Behavior in the Human Male* in 1948 and *Sexual Behavior in the Human Female* in 1953, he became famous for opening the field of human sexuality to scientific research.

■ IU Department of Theatre and Drama alumnus Kevin Kline began his stage career as a minor character in an IU production of Shakespeare's *Macbeth*. His distinguished career on stage and screen includes roles in *Sophie's Choice* and *The Big Chill*. In 1989 he received an Oscar for best supporting actor for his portrayal of a bumbling burglar in *A Fish Called Wanda*.



■ The pioneering work on stannous fluoride was carried out at Indiana University in the 1940s and '50s by Professor of Dentistry Joseph Muhler. Stannous fluoride has revolutionized preventive dentistry around the world.

■ Well-known country singer Janie Fricke received her first voice training as a member of the IU Singing Hoosiers. She was a vocalist on Elvis Presley's last recorded album.



■ Bloomington was a "hotbed of hot music" when Hoagy Carmichael was a law student at Indiana University in the 1920s. Hoagy wrote his famed "Stardust" on a battered piano in the old Book Nook restaurant on Indiana Avenue, and went on to become one of America's most popular composers.



■ Former IU basketball star Isiah Thomas, as captain of the 1989 world champion Detroit Pistons, led his team to its first NBA title. A scholarship in his name supports majors in IU's criminal justice department — the field in which he received his degree.

■ Violinist Joshua Bell, a 1989 graduate of the School of Music, has won acclaim here and abroad for his artistry. At age 23, he is the youngest-ever recipient of the IU Distinguished Alumni Service Award.



■ Statesman and political leader Wendell Willkie earned two IU degrees and went on to run for President of the United States in 1940 against Franklin D. Roosevelt. Later, Willkie toured the world in support of FDR's foreign policy during World War II. In 1943 he wrote *One World*, a book that advocated the formation of a postwar world organization and has been translated into virtually every major foreign language.

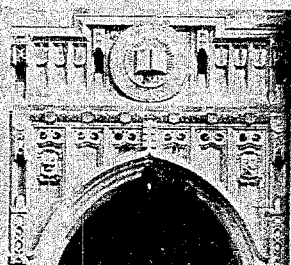


IU Distinctions

■ Indiana University, with 853 degree programs on eight campuses, is one of the largest university systems in the United States. More than 80 percent of Hoosiers live within a 50-mile radius of an IU campus.

■ For their research and scholarship, IU faculty have won 171 Guggenheim Awards, 55 National Endowment for the Humanities Fellowships, two Pulitzer Prizes, a Nobel Prize, and more than 300 other national and international competitive awards.

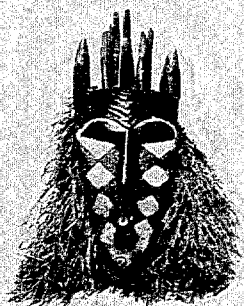
■ Indiana University is known as the "Mother of College Presidents." Nearly 200 IU alumni have gone on to head institutions of higher education, including the current presidents of 10 historically black colleges and universities.



■ The Indiana Memorial Union, the center of student life on the Bloomington campus, is the largest student union building in the world.

■ The following IU schools are consistently ranked among the nation's top five in various ratings: Business; Health, Physical Education, and Recreation; Journalism; Library and Information Science; Medicine; Music; Optometry; and Public and Environmental Affairs. IU's Department of Chemistry is rated among the

nation's top five chemistry programs and is the largest in terms of undergraduate degrees granted each year. The IU School of Music, the Folklore Institute, and the Instructional Systems Technology program have been ranked number one in the country by *The Chronicle of Higher Education*.



■ The IU Art Museum, housed in a building designed by I.M. Pei, is one of the top university art museums in the country. The museum is known particularly for its collections in the ancient classical arts; the arts of the Americas, the Pacific, and Africa; and the major formative movements of the twentieth century.

■ IU's School of Medicine is the second largest medical school in the country, and the School of Nursing is among the largest nursing schools.

■ The Indiana University Libraries, with 54 libraries across the state, are among the most extensive in the country. The collections include nearly seven million bound volumes and 23 million other materials. The IU Libraries are open to all citizens of Indiana.

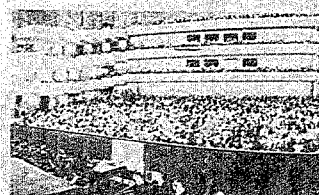
■ Indiana University has more than 342,000 living alumni.

■ In 1867 Indiana University became one of the first state universities to admit women. The first woman graduate, Sarah Parke Morrison, received the bachelor's degree in 1869 and later became an adjunct professor of literature at IU.



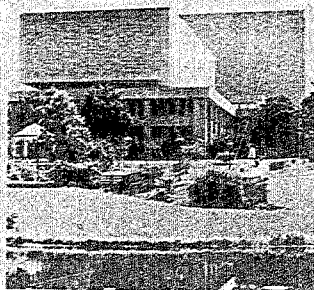
■ Indiana University confers more than 13,000 degrees each year, 40 percent of them at the master's, doctoral, and professional levels. Since its founding in 1820, the University has granted approximately half a million degrees.

■ Scientists from around the world come to Indiana University to conduct experiments at the IU Cyclotron Facility, which includes a synchrotron-cooler ring. Research at the cyclotron has resulted in a number of important discoveries about the structure of the nucleus and the force that binds it together.



■ The widely renowned IU School of Music is the largest in the world. With a faculty that includes world-famous performing artists and students from around the globe, the music school offers nearly 1,000 performances each year.

■ Indiana University students, faculty, and staff form the sixth largest community in Indiana.



Hoosiers for Higher Education

Indiana University for Indiana's Future



"It's important to make the citizens of Indiana aware of the tremendous treasure we have in terms of the University. I've seen the University turn people around — their lives are enriched by higher education and then they contribute to their community and enrich the lives of others."

— Darcia King-O'Brien, middle school teacher, South Bend, and 1991 Indiana Teacher of the Year

For information on how you can join Hoosiers for Higher Education in working for Indiana's future, please return the following form:

"The future of Indiana University and the State of Indiana are inextricably linked," says President Thomas Ehrlich.

"Business and industry look to Indiana University to provide the highly educated men and women — as well as the research and expertise — that are key to our State's economic challenges."

Indiana alumni and other friends of the University are joining forces in a new program called Hoosiers for Higher Education to support IU in helping to strengthen Indiana's economy. The program was launched in 1991 by the IU Alumni Association. "Our goal," says University Director of Alumni Relations Jerry Tardy, "is to enhance active support for higher education, and for Indiana University in particular, among civic, business, and governmental leaders."

President Ehrlich explains the impetus for the program:

"When we ask legislators how we can make the needs of the University a priority for State budget consideration, the answer is invariably, 'We must hear from our own constituents.' Hoosiers for Higher Education is designed to make

the public more aware of the vital link between a strong University and a strong Indiana."

Every community in Indiana has doctors, teachers, lawyers, business leaders, and many others who received their education at Indiana University. Every community benefits from the research and services the University provides in business, science, medicine, education, and economic development, among a host of other areas.

"We are delighted that former Indiana Governors Otis Bowen and Matthew Welsh have agreed to lead the steering committee for Hoosiers for Higher Education, which includes other distinguished leaders from the private and public sectors throughout Indiana," says President Ehrlich.

"We invite all citizens of our State to work together through Hoosiers for Higher Education to strengthen public and governmental support for Indiana University. We must bring all the resources of our great University to the task of building Indiana's prosperity for the next century."



"I tell young people that the best investment they can make in themselves is their own education. And I believe the best investment Indiana can make is in the education of its citizens."

— Larry Lee, president of Leepoxy Plastics, Inc., Fort Wayne



"Higher education is no longer a luxury; today it's a necessity. It's essential for the future well-being of our state and our nation."

— Betty Dickerson, hospital nursing supervisor, Gary

Please send me more information on Hoosiers for Higher Education.

Name _____

Address _____

City _____ State _____ Zip _____

Phone (Home) _____ (Office) _____

Complete and mail to:

Sue Talbot, Director, Alumni Education Programs
Indiana University Alumni Association
Fountain Square, Suite 219
P.O. Box 4822
Bloomington, Indiana 47402-4822
(812) 855-0582
FAX (812) 855-8266

Table 2
Seasonally Adjusted Forecasts of Employment in Lake and Porter Counties (000s)

	Actual 3Q 1991*	Predicted 3Q 1991	4Q 1991	1Q 1992	2Q 1992	Forecast 3Q 1992	4Q 1992	1Q 1993	2Q 1993
Total Employment	246.5	245.1	247.1	247.6	248.1	248.8	248.8	249.3	249.5
Nonmanufacturing	190.9	191.4	193.1	192.4	193.2	193.9	194.7	195.4	196.2
Manufacturing	55.6	53.7	54.0	55.2	54.9	54.9	54.1	54.9	54.3
Steel	33.1	32.7	33.0	33.3	32.9	32.5	32.3	32.2	32.7
Non-Steel	22.5	21.2	21.0	21.9	22.0	22.4	22.8	23.7	23.6
Trade	68.8	67.3	69.0	69.3	69.6	69.9	70.2	69.9	70.1

*The actuals for 3Q 1991 are not seasonally adjusted, whereas the predicted values are seasonally adjusted.

Table 3
Wages and Weekly Hours (Payroll Annualized; in \$ billion)

	3Q 1991*	4Q 1991	1Q 1992	2Q 1992	3Q 1992	4Q 1992	1Q 1993	2Q 1993
Manufacturing Payroll	2.029	1.932	2.016	2.032	2.132	2.180	2.080	2.192
Steel Payroll	1.309	1.253	1.310	1.279	1.379	1.415	1.385	1.441
Payroll, Non-Steel	0.719	0.700	0.706	0.713	0.753	0.765	0.735	0.751
Payroll Services	2.698	2.722	2.731	2.869	3.009	3.106	2.989	3.092
Weekly Hours (Mfg.)	41.3	41.1	41.6	41.9	41.1	40.2	41.4	42.0

*The actuals for 3Q 1991 are not seasonally adjusted, whereas the predicted values are seasonally adjusted.

point. In **Table 3**, we also show a cyclical loss of about 16.9 million manufacturing payroll dollars, in spite of slightly higher nominal hourly wages.

The nonmanufacturing sector made unbelievable strides, in spite of the national downturn. Three Wal-Marts, one OMNI, several small and medium-sized shopping complexes, numerous warehouses, restaurants, expansions of supermarkets, hotels and motels, repair workshops, several public works projects, banks, health-care facilities, new housing units and office space, and public utility expansion created an aura of local prosperity notwithstanding the continued secular decline in steel and a national recession.

There will be a slight slackening in retail sales, as well as a slow upturn in automobile sales and in big-ticket items in local department stores. Some, though not all, of the restraint in consumer spending is induced by national events. Some restraint is induced by the drop in interest rates, and a drop in capital gains that reduced the incomes of our relatively large retired population. We do not foresee cumulative reductions in consumer spending that would significantly stifle vibrant local entrepreneurship. With unemployment in the non-urban regions of Lake and Porter counties at less than 4% (more than 7% overall), the fear of job losses is insignificant. Moreover, local banking and financial institutions are profitable and liquid.

Are there any worries looming on the horizon? Consider the following: In 1989, the U.S. shipped 84,100,000 tons of steel; 84,981,000 tons were shipped in 1990; and we estimate 79,502,000 in 1991. Local mills account for about 27.8 to 28.3% of national output. However, what affects our local integrated mills—that is, smelting mills—is the decline in sheet and strips, where local mills hold a considerable edge. Sheet shipments in 1989 were 41,261,000; in 1990, they were 39,784,000; and we estimate 38,031,000 in 1991. The automobile industry purchased 11,180,000 tons of sheet in 1989, 10,444,000 in 1990, and we estimate 8,453,000 in 1991. The proportion of sheet in total steel production is expected to fall from 49.1% in 1989, to 46.8% in 1990, to 45.1% in 1991. In other words, our local mills, which have done splendidly by increasing productivity, are nevertheless operating in a shrinking market. On the other hand, the newly emerging mini-mills, or melting mills, are operating in an expanding market. Moreover, Voluntary Restraint Agreements protected the mini-mill market at the expense of integrated local mills. During the current recession, Indiana integrated mills lost a little under 2,000 jobs, whereas Indiana mini-mills gained over 400 jobs.

Perhaps northwest Indiana does not show as much concern as the rest of the nation for the plight of corporate bureaucracies, which have become bloated during a decade of economic expansion. Lake and Porter counties had been slimming down for nearly a decade. Some found jobs in other parts of the country, others established new businesses locally. The antidote was entrepreneurship, not hurriedly contrived remedies, which may not take effect any time soon.

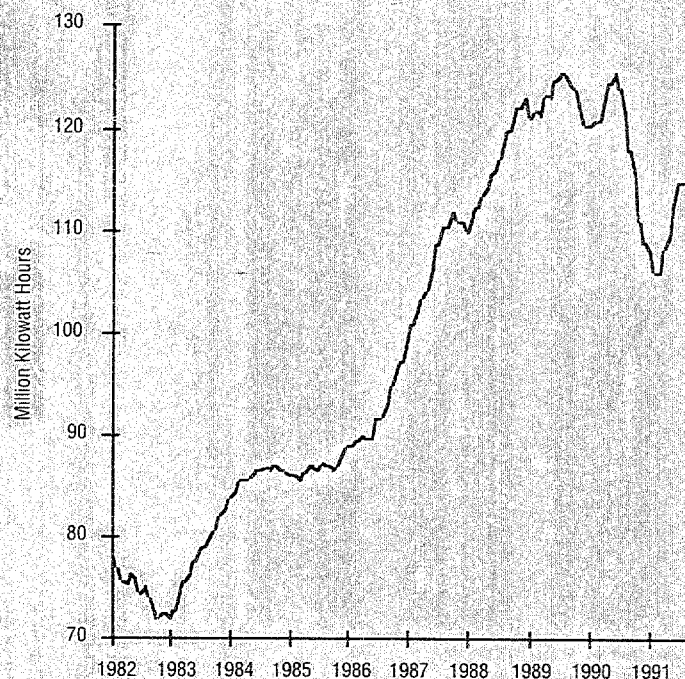
Fort Wayne

Thomas L. Guthrie

Director, Community Research Institute, and
Associate Professor of Business and Economics,
Indiana University Purdue University Fort Wayne

Given the debate concerning the current direction of the national economy, the first order of business is to get some sense of the current direction of the Fort Wayne area¹ economy. All the data series (not subject to revision) except one² have had significant bounces off their earlier year lows. Building permits for single-

Figure
Use of Electricity by Industry in the Fort Wayne Area (5-Term Moving Average)



Source: Indiana Michigan Power Co.
Data seasonally adjusted by the Community Research Institute, IPFW.

family houses are up, help-wanted advertising increased for the first time in almost two years, initial unemployment claims decreased—that signals an increase in economic activity—and industrial use of electricity is up (see the **Figure**).

Consistent with the apparent behavior of the national economy, the Fort Wayne area data series have stalled recently. For example, industrial use of electricity was essentially unchanged in September and October (see the **Figure**).

Corresponding to the recent rebounds in the three data series, Fort Wayne area payroll employment increased 2,300 between March and September. This offset the 2,500 decrease experienced between July 1990—the first official start of the national recession—and last March.³

The behavior of the data series noted above prompts two conclusions. First, their behavior is consistent with the widely circulated theory that the national economy is headed for a double-dip recession. Second, the impact to date of the national recession on the area economy has been almost a non-event, especially when compared with the previous two debacles, 1973-75 and 1979-82.⁴

Why has the area economy escaped the recession relatively unscathed? And more important, will the source(s) of relative strength continue in 1992?

One obvious source is the relative strength of the Fort Wayne area real estate sector—both residential and commercial—compared to the widely reported disasters occurring on both coasts. Fort Wayne did not participate in the real estate euphoria of the 1980s and is not participating in the current blow-off. This is likely to continue.

A second source is the likely strength of manufacturing for export. I say likely because I am not aware of data at the area level to support the hypothesis. But state-level data do exist. It was recently reported that between the first half of 1989 and the first half of 1991, manufactured exports from Indiana grew 37.2%.⁵ Given the overemphasis on manufacturing in northeast Indiana compared to the state, it is appropriate to assume that the relative impact on the Fort Wayne area economy was even greater than at the state level.

Will this source of relative strength continue? Yes, because the competitiveness of exports is likely to increase in the near term. Given the apparent determination of the Federal Reserve to drive short-term interest rates to whatever level is needed to revive the national economy, the outlook for U.S. short-term interest rates is not likely to appear particularly appealing vis-à-vis comparable foreign rates. This, in turn, reduces the demand for dollars, thereby reducing the exchange rate of the dollar.

Domestic auto sales (and production) are currently anemic. However, other data suggest that the U.S. auto fleet is relatively old and badly in need of replacement. The probability is high that sometime in 1992, the auto sector will gather significant strength. Northeast Indiana will benefit accordingly, given its concentration of auto related manufacturing.

The national outlook is that a double-dip will not occur. I agree, but I suggest that whether it occurs is not the weighty question. The weighty question is, "When are we finally going to feel better?"

With respect to the Fort Wayne area economy, the approach of spring 1992 should bring a more favorable view of area economic conditions. During the 1992 calendar year, area employment is forecast to increase 2-3%—that is, 4,000 to 6,000 jobs. The area economy appears positioned to garner more than its share of the subdued increase in U.S. economic activity forecasted.

Notes

1. The official definition of the Fort Wayne metropolitan area is Allen, DeKalb, and Whitley counties.

2. The only data series not rebounding was bank deposits of the four "Fort Wayne" banks. This was consistent with

the trend nationally. Through the first eight months of 1991, demand deposits were essentially unchanged.

3. Although the changes in employment are consistent with the other reported indicators of economic activity, the employment data are subject to revisions that are sometimes major. That is, relying primarily on preliminary employment data to gauge the current state of the area economy can be hazardous.

4. This is not meant to appear insensitive to those in the area who have lost jobs or are unsuccessfully seeking employment. The point, for purposes of analysis, is that the apparent loss of 2,500 jobs over less than a year pales in comparison to, for example, the 1979-82 recession. Then the area economy lost approximately 30,000 jobs over almost four years.

5. *Economic Trends*, Federal Reserve Bank of Cleveland, October 1991.

Columbus

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The employment picture for Columbus is improving from earlier this year, but it is substantially worse than it was a year ago, as is evidenced by the most recent employment and unemployment rates, unemployment insurance claims, and our Help Wanted Advertising Index (see **Table 1**). Although the unemployment rate averaged 5.8% in third quarter 1991, which is lower than it was in the second quarter (6.6%), it is higher than it was a year ago, when it measured 4.9% in third quarter 1990. The number of workers employed has actually increased 4.4% from a year ago. Although the number of unemployed has increased almost 25% from a year ago, the good news is that the number unemployed has declined 11.3% from the second quarter to the third quarter of this year.

Likewise, initial unemployment insurance claims are down 37.6% and continued unemployment insurance claims have fallen almost 39% between second and third quarter 1991. Unfortunately, continued unemployment insurance claims have almost doubled from a year ago. Our Help Wanted Advertising Index has increased 26% from second to third quarter 1991, but has declined 9% from third quarter 1990 and 16% from two years ago. All of these trends suggest that the local economy has experienced some labor market volatility, but the range of the volatility was substantially smaller during this past recession than during the Reagan recession.

According to a recent Indiana Department of Workforce Development study, manufacturing employment in Bartholomew County fell in 1989 to 14,264 from a four-year high of 14,800. Both of these figures remain significantly below the 16,600 figure in 1980. After growing during the first half of the decade, manufacturing wages in the county have fallen steadily since 1987. Average weekly earnings in the all-industry average for the county followed a similar pattern during the past decade.

Residential building permits have recovered dramatically. After falling 44% from third quarter 1990 to fourth quarter 1990, the estimated value of building permits is down only 1.2% in third quarter 1991 from a year ago. Likewise, the average value per permit fell by almost one-fourth from the beginning of 1990 to the beginning of 1991, but the average value in third quarter 1991 has increased about 12% both from second quarter 1991 and third quarter 1990.

The average selling price in the local real estate market has increased \$950 from a year ago, or just over 1% from \$77,570 in third quarter 1990 to \$78,520 in second quarter 1991. However, the Housing Affordability Index for Columbus fell slightly from 162 in second quarter 1990 to 159 in second quarter 1991 (third quarter data are not yet available), as the median home price increased a fairly dramatic 12%. This compares to a similarly small decrease in the state's Housing Affordability Index (from 158 to 154), as the median home price in the state increased 6.7% from \$60,000 to \$64,000.

New and used car sales are showing signs of the recession. New car sales were more than one-third lower in third quarter 1991 than they were a year ago. New car sales were 3% lower than in second quarter 1991. Whereas used car sales were about 4% lower in the third quarter from second quarter 1991, they were almost 8% greater than a year ago, suggesting that consumers have deferred auto consumption or simply bought used cars instead of new ones.

The analysis of the success of our "Fortune 500" firms depends on whether one takes a prospective or historical perspective. Prospectively, both Arvin and Cummins have received favorable press regarding the effects their cost-savings and strategic changes should have in the future. For example, the *Indianapolis Star* (July 9, 1991) ran a story entitled "Creating a New Arvin." It emphasized the strategic attempt to "go global" as an auto supplier and simultaneously shed some of its non-auto related businesses. In 1986, foreign sales constituted only 7% of Arvin's total sales. By 1990, this percentage had grown to 35%. In the same period, total sales virtually doubled from \$870 million to \$1.7 billion.

Yet an important dislocation in this adjustment process was the dramatic 25% wage cut that Arvin

Table 1
Columbus Area Data

	3Q 1991	2Q 1991	% Change 2Q-3Q	3Q 1990	% Change 3Q 90-91
<i>Labor Market</i>					
Number Employed	30,297	29,844	1.5%	29,020	4.4%
Number Unemployed	1,880	2,120	-11.3%	1,507	24.8%
Unemployment Rate	5.8	6.6	-12.1%	4.9	18.4%
Cont'd Unemployment Ins. Claims	4,635	7,591	-38.9%	2,429	90.8%
Initial Unemployment Ins. Claims	438	702	-37.6%	439	-0.2%
Help Wanted Advertising (1987 = 100)	163	129	26.4%	179	-8.9%
<i>Residential Construction</i>					
Est. Value of Permits Issued (\$ million)	1,847	1,792	3.1%	1,870	-1.2%
Number of Permits Issued	20	21	-4.8%	22	-9.1%
Average Value per Permit (\$ million)	93.9	84	11.8%	83.7	12.2%
<i>Real Estate</i>					
Number of Homes Sold	NA	289	NA	285	NA
Average Number of Days Listed	NA	121	NA	118	NA
Average Market Price (sold)	NA	\$78,520	NA	\$77,571	NA
<i>Auto Sales</i>					
New Car Sales	384	396	-3.0%	604	-36.4%
Used Car Sales	2,690	2,807	-4.2%	2,495	7.8%

Note: NA = not available.

Sources: Indiana Business Research Center, Indiana University; The Republic; Multiple Listing Service; Indiana Bureau of Motor Vehicles

Table 2
Columbus Area Financial Performance

	All-Industry Average	Special Machinery	Cummins	Auto Parts Industry	The "New" Arvin
% Change 3Q Sales from 1990	0	-8	3	-3	-2
% Change 3Q Profits from 1990	-22	-51	NM	-18	-20
Return on Equity	9.8	6.1	-39.2	0.4	4.7
Price Earnings Ratio	22	26	NM	NM	24
12 Months' Earnings/Share	1.77	1.52	-13.19	-0.8	0.89

Note: NM = not meaningful (implication is negative earnings).

Source: Business Week, November 18, 1991.

felt was necessary to make in order to compete. Furthermore, Arvin has been forced to reexamine its staffing levels, especially white-collar employees, at both of its Columbus-based divisions. This has resulted in an estimated layoff of 150 employees. All of these changes suggest the evolution of a more focused and more competitive firm, which should be able to penetrate markets around the world.

Looking at **Table 2**, the "New Arvin" has significantly outperformed its subindustry grouping (auto parts) in all but one measure—percentage change in

third-quarter profits. Unfortunately, because the auto parts industry is very cyclical, it is difficult to separate out what is cyclical and what changes are due to differences in profitability. When compared to the all-industry composite, Arvin has had less to be enthusiastic about. Although the stock market favors Arvin (its price-earnings ratio exceeds that of the all-industry average), its return on common equity and its earnings per share for the past 12 months are both about one-half those for the all-industry average.

Arvin has been experiencing some sluggishness in "after-market" sales, which is contrary to expectations. During a recession, one would expect that sales for original equipment would fall, as individuals postpone buying new cars. The flip side is that one expects after-market sales to grow, as individuals seek to maintain their older vehicles longer. In either case, the lower sales today implies some additional pent-up demand that should be released once consumers become convinced that the recession is over.

Likewise, Cummins has had several recent developments that look promising, but it has had rough sledding in getting to that point. Cummins has announced plans for a joint venture with the Russian firm KamAZ, which is reportedly the largest heavy-duty truck manufacturing firm in the world. Although both firms are investing only \$500,000, the "potential" looms large. If the economies of Eastern Europe and the former USSR respond to the new market-oriented structure, there should be increased demand for trucks—if there are more goods being produced. Furthermore, the Department of Energy announced that Cummins was selected to head a \$14 million joint venture to develop and test small solar electric systems.

Prospectively, stock analysts project profits for Cummins for all of next year and the "foreseeable future," with share prices increasing as much as 30% in the next 12-18 months. Diversification into smaller horsepower engines (approximately 70% of 1990 production was from products that did not exist in 1980), the 30% reduction in floor space, and the 36% reduction in employment since the early 1980s were all part of the pain, but should contribute to the gains in the 1990s.

Pent-up demand from delayed replacements in heavy-duty trucks should greatly help Cummins' numbers—once truckers start replacing their rigs. However, Roger Penske has invigorated Detroit Diesel, which is turning out profits and increasing employment, as its market share has grown dramatically from 3.2% in 1987 to 23% for the first half of 1991 (28% in June 1991). Improved fuel efficiency and quality at Detroit Diesel, combined with engineering problems with the 1988 product at Cummins, contributed to the shift in market share.

Historically, with the exception of sales growth from third quarter 1990 to third quarter 1991, Cummins has significantly underperformed relative to both the "special machinery" industry and the all-industry composite. Additionally, losses sustained in five of the last six years, a debt-capital ratio exceeding 40%, and a 10-point drop in market share from the historical average of 50% for the past 10 to 20 years may leave many market participants skeptical.

In other area firms, Economic Development reports that there have been 114 new jobs added through local expansions and an increase of investment of \$15.9 million. Indiana Metal Coating is the only new firm since the last issue, but it represents a \$4 million investment and 15 new jobs.

Local Forecast

The recent announcements that Cummins recalled 45 workers in November and had planned to recall an additional 70 workers in December were due to a shift in product mix to the more labor-intensive electronic version and does not suggest that we have necessarily reached the bottom. Furthermore, it indicates that the pent-up demand for heavy-duty truck engines may be becoming translated into realized demand. However, this good news is largely offset by the layoff of an estimated 150 white-collar workers at Arvin. Auto manufacturers are scaling back from an expected increase in output in the fourth quarter, which suggests that Arvin's austerity days are far from over.

Now let's examine the local ramifications of various possible economic outcomes. First, the most likely outcome (60% probability) is that the recession is over, but that real economic growth will be in the 2 to 2.5% range—well below the typical robust growth historically experienced during the first four quarters following a recession—with low inflation (3.5-4% range) and moderately high unemployment, bouncing around the 6-7% rates.

Locally, slow real growth would be enough to continue to increase local employment and slowly lower the local unemployment rate. However, these modest changes are not likely to make much difference in how well off people feel. Nor is it likely to be enough to generate substantial profits for either Arvin or Cummins.

Given the recent adverse economic news, coalesced with record deficits, which have tripled the national debt since 1980, yielding an impotent fiscal policy, and an economy experiencing a credit crunch, which has left it impervious to monetary policy, there is no sector in a clear position to lead the economy out of the recession. This role typically falls on the shoulders of consumers, so any further deterioration of consumer confidence or expectations may have a self-fulfilling effect on economic outcomes. These

factors generate at least a 40% probability that we will experience a double-dip recession.

A double-dip recession would be associated with falling real growth, increased unemployment, and slightly lower inflation (3-3.5%). Most likely it would defer some of the pent-up demand for both new cars and heavy-duty engines, hurting our local "Fortune 500" firms. In this case, the local economy would be hurt by the recession but not as badly as would have been the case a decade ago. As the recent recession has demonstrated, the downsizing and restructuring that American manufacturers generally—and Arvin and Cummins specifically—have undergone have enabled them to weather the storm with relatively fewer layoffs and other dislocations.

Finally, there is a small chance (less than a 10% probability) that the recovery will take off with robust growth (5-6% real growth) by the second half of next year. Though this is quite unlikely, it is possible because inflationary expectations and real interest rates are down from earlier in the decade, and certainly down from the late 1970s. Such growth would be a panacea for the local economy. Robust growth is linked to growing real incomes and consumer demand. Subsequently, the pent-up demand for new autos and heavy-duty trucks would explode, generating an increase in local employment and incomes and a fall in the number of unemployed workers, which would drive the local unemployment rate down as low as the 2-3% range.

Bloomington

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A year ago, the Bloomington economy (defined as Monroe County, which is the Bloomington Metropolitan Area) was in the midst of a slowdown. Today, however, the local economy appears to be picking up—though not all signs point this way.

The promising signs for Bloomington are in the overall employment picture. For total establishment employment, the first nine months of 1991 showed increases over the same months of 1990 (see the Table). By contrast, the first nine months of 1990 showed declines over the same months of the previous year. The declines in monthly employment in 1990 followed several years of strong growth in which the year-over-year growth rates for

Table
Year-to-Year Percent Changes in
Monthly Establishment Employment,
Bloomington, 1990-1991

	1990	1991
January	0.7	1.1
February	0.0	1.2
March	-1.4	1.1
April	-2.1	1.6
May	-2.6	-1.6
June	-3.1	2.6
July	-5.3	2.6
August	-4.9	2.8
September	-4.0	1.7
October	-3.3	2.0
November	-3.5	---
December	0.7	---

Bloomington were substantially greater than the state averages. The slowdown in employment growth for Bloomington in 1990 occurred while the state's total was showing strong growth. For the first nine months of 1991, however, Bloomington's employment picked up while the state's total leveled off and even declined from year-ago third quarter levels. By October 1991, Bloomington's establishment employment had increased by more than 6,000 jobs from a low of 53,300 in August 1990.

Despite this pickup in employment, the unemployment rate for the first ten months of 1991 averaged a little higher than in the first ten months of 1990 (3.84% versus 3.45%). These unemployment rates are, however, still quite low—much below the state and national rates.

Employment in retailing, which had declined markedly in 1990, showed strong growth in the first ten months of 1991. For this period, employment grew by an average of nearly 9% over the same months of 1990. By October 1991, retail employment had increased by 2,200 over the 1990 low. Employment in selected services grew rapidly in 1990 until December, which began a seven-month period of declines or no changes from the same months a year ago. In third quarter 1991, however, service employment began to show increases over year-ago levels. October was unchanged from October 1990.

Manufacturing employment began a slow decline in 1989, but stabilized in 1991 at a level about 8% below the peak reached in 1988. Some local manufacturers are currently doing well: General Electric with its side-by-side refrigerators; Thomson with its high-tech, big screen television sets; Cook with its medical instruments and devices. Others—notably, Otis Elevator and Westinghouse—are not doing as well. Otis has been hit hard by the slow construction activity and has had to lay off workers. Manufacturing employment is typically volatile over the business cycle, but Bloomington is not affected as much as some areas because only about 15% of its total establishment employment is in manufacturing, a much lower share than for many economies. By contrast, Indiana has about 25% of its total employment in manufacturing.

Construction activity remains weak. The F.W. Dodge reports show the value of contracts let for residential construction for the first ten months of 1991 about even with year-ago levels. Non-residential construction is down about 18% in terms of value of contracts. Data on building permits tell the same story. Another sign of weakness is in initial claims for unemployment insurance benefits, which have been higher than last year in 10 of the last 12 months (through September 1991). The level of the claims does, however, appear to be on a downward path.

The recent performance of the Bloomington economy suggests that it can continue to do as well or better than the state in 1992. But it cannot continue to grow strongly unless there is reasonable growth of the national and state economies. Indiana University has always had a stabilizing effect on Bloomington's employment levels, but even I.U. is experiencing a small employment decline this academic year. If the forecast for slow but steady growth for the U.S. economy holds up, Bloomington should have a reasonably good year in 1992.

Kokomo

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Every twist and turn in the auto sector, the linchpin of Kokomo's economy, brings out seasons of joy and laughter or sorrow and tears. As in the recession of 1981-82, in this latest recession the economy was hurt by the one-two punches of the auto slump and an economic downturn. Fortunately the punches were not so hard and the impact was less staggering.

Why wasn't the latest local recession severe? To begin with, both the local and national economies were in fairly good shape before the recession began. Second, the slump in the national economy in general, and the auto sector in particular, was not shockingly severe. Local auto plants effectively fine-tuned inventories and production schedules, and fewer excesses occurred this time. Third, local manufacturers have widened and broadened their product lines and markets. Finally, under an agreement signed by both the labor union and management, idled workers now get placed in the JOBS Bank program, a joint UAW-GM program providing a safety net for laid-off workers. They get to keep jobs, draw salaries, and use idle time to upgrade their skills. It is a sort of private sector's automatic stabilizer.

Improvements in at least four local economic indicators suggest that the economic clouds started disappearing in July. First, factory work week hours improved gradually by 2.5 hours, from a low of 37.3 hours in February to a high of 39.7 hours in August, disregarding a weather-related downturn in March. The ice storm in March—Kokomo's worst in 25 years—knocked out electric power supply to thousands of homes and businesses and paralyzed Kokomo's economic life. In that month, the average

manufacturing work week sank to its lowest level ever—25.1 hours, down 40% from its normal work week.

Second, the announcements of temporary auto worker layoffs decreased in frequency. Also, the temporary layoff numbers remained in low levels (100-200) since August. Third, the unemployment rate continuously showed a downtrend from a high of 14.4% in March to a low of 6.5% in August. Finally, the number of auto workers in Delco's JOBS Bank program declined 90% by November, from a peak of 610 in May 1991.

The Roller Coaster of Joblessness

The early months of 1991 registered massive layoffs at local auto plants. In March, for example, more than 3,000 auto workers remained on one-week furlough. The number of auto workers placed in Delco Electronics' JOBS Bank swelled gradually to 610 in May. The temporary weekly layoffs continued at high levels through the middle of the year and then tapered off. By November, Delco had called back all idled workers and a majority of JOBS Bank participants.

During the first three quarters of 1991, the jobless rate ranged from a high of 14.4% in March—the highest in eight years—to a low of 6.5% in August. The average unemployment rate remained at an agonizingly high level of 9.3%, compared with 5.8% a year ago. Beginning in April, however, the jobless rate improved continuously.

Short on Work Week, Long on Earnings

The average manufacturing work week, a key gauge of the economy's health, remained below 40 hours throughout the first eight months of 1991. As the **Table** shows, among the state's manufacturing oriented regions, Kokomo slowed down the most.

Despite a reduced work week and no overtime pay, the average manufacturing weekly earnings in Howard County stood at \$844 in first quarter 1991—second highest in the state. The first quarterly payroll was \$285 million, just \$1 million above the same quarter last year.

Table
Manufacturing Data for Kokomo
and Selected Indiana Cities

	<i>Mfg. Jobs as % of Total Employed</i>	<i>Manufacturing Work Week (# Hrs.)</i>
	<i>Jan-Aug 1991</i>	<i>Jan-Aug 1991</i>
Elkhart	49%	39.2
Kokomo	38%	38.7
Anderson	32%	41.4
INDIANA	25%	41.2

Losses in Service and Goods-Producing Sectors

A slowdown in the manufacturing work week, lack of overtime pay, and cautious spending by consumers hurt the job front. Unlike a year ago, when the service sector showed strong gains, both the service and the goods-producing sectors endured losses in 1991. In August, for example, 1,200 fewer jobs existed in the goods-producing sector than in August 1990. The service sector had 600 fewer jobs during August 1990-91. The retail trade sector had 800 fewer jobs in August 1991 than a year ago.

Housing Sector

Overall, the housing sector lacked strength and vigor; its performance can best be described as mild, not wild. The number of building permits issued through the first three quarters of 1991, excluding sign permits, totaled 441, just 1% below the mark of 12 months ago, and the lowest since 1984. The decline was broad based, however. Whereas the number of residential permits rose 2% to 390, non-residential permits plunged 20% to 51. The dollar value of permits issued totaled \$24.33 million, compared with \$41.14 million a year ago.

Single-family building permits totaled 121, down 5% from a year ago. Unlike last year, the average value of single-family dwelling permits eased to \$102,000 from \$105,000 a year ago, a drop of 3%. The number of multi-unit housing permits stood at only nine, compared to 14 a year ago, a drop of 36%. The average value of a multi-unit housing permit remained at \$144,000, compared with \$171,000 a year ago. Overall, the permit value of both single-family and multi-family units declined in 1991. Swimming pools failed to make a big splash this year. Only 17 swimming pool permits were issued, compared with 21 a year ago.

Home sales in the first half of 1991 totaled 491, down 13% from the same period a year ago. The median home price, however, jumped 14% in the second quarter to \$54,500. It was, nonetheless, 15% below the state's median home price of \$64,000. A majority of houses sold during the first six months of 1991 remained at the low end of the price range. The local housing affordability indices—212 in the first quarter and 192 in the second quarter—strongly suggest that housing is quite affordable for average wage-earners.

New Inns, More Expansions, Mergers, and Acquisitions

Despite a nationwide slump, the Bavarian Inn and the Fairfield Inn joined the crowded hotel/motel population in Kokomo, causing the number of available hotel rooms in the city to jump 12% to 670. Along with hotels and motels, local businesses announced future

building expansion and construction plans totaling \$67.9 million. Such plans include Kokomo Center School Corporation's (KCSC) multi-phase educational plan estimated to cost about \$51 million, Indiana American Water Company's \$16.1 million building and improvement plan, and St. Joseph's Hospital's plan to build a modern day care center. The KCSC's educational plan will provide and promote a well-rounded quality education for area students and prepare them for the careers of the 21st century.

In October, NIPSCO, the state's largest utility, acquired 74-year-old Kokomo Gas and Fuel Co., the state's fifth largest and Kokomo's only gas utility operation. Kokomo Gas and Fuel employs 81 people and serves 30,000 customers in and around the "city of firsts."

A number of changes occurred in the banking and finance sector beginning in third quarter 1991. While the shares of Central Indiana Bank Corporation hit the NASDAQ trading floor in July, Salin Bank of Camden opened its branch in Kokomo in the same month. In September, although Kent Financial Corporation of Michigan called off its plans to acquire Hasten Bankcorp, parent of Kokomo's First National Bank, Ameritrust Corporation, parent of Ameritrust Bank of Howard County, agreed to merge with Society Corporation. Both Ameritrust and Society Corporation are Cleveland-based bank holding companies.

Kokomo received generous publicity in two different news media. In September, Kokomo was featured in *Indiana Business Magazine*. Two months later, Delco Electronics was featured on *Lifestyles*, a television series devoted to firms involved in producing high-quality products.

Santa's Early Arrival

After 16 years of planning, countless meetings, and overcoming many roadblocks, the two jewels in Kokomo's retail business crown—the 33-acre Kokomo Mall built in 1963 and the 18-acre Markland Mall built in 1968—were united in November via a widened and extended 17th Street. Although the project cost \$1.25 million, it is a trend setter. Hopefully many more malls will be united this way in the future. In the same month, as if that was not enough, Wal-Mart, the nation's fastest growing retailer, Sam's Club, and Meijer's announced plans to open their stores on the northeast side of Kokomo. It was like Christmas in November! Also, a new shopping mall will be built on the fast-growing northeast side of the city. The total cost of these stores and a mall could be as high as \$15 million.

Rise in 1990 Retail Sales

Although sales volume dipped in 1989, it was up in 1990, according to *Sales and Marketing Management*.

Retail sales in Kokomo totaled \$789.8 million in 1990, up 0.5% from a year ago. In retail sales per household, Kokomo's state ranking improved dramatically, from 7 in 1989 to 3 in 1990. However, in the same category, Kokomo's national ranking skidded 15 places last year to 102. Whereas the general merchandise and automotive businesses each registered a 4% decline, the eating and drinking establishments and food stores posted a 1 to 3% rise in sales. The furniture, fixtures, and appliance stores registered a hefty 21% increase in 1990, while the drug stores posted an 11% increase.

Indiana's Richest Town

The latest Labor Bureau statistics indicate that despite a drop of 0.1% in the average annual income in 1990 to \$27,104, Kokomo retained its mantle as Hoosierland's richest town. Not only that, Kokomo's average income in 1990 was 25% above the state average of \$21,699 and 10% above the national average of \$24,675, according to the same source. Nationally, Kokomo's average income in 1990 ranked 20th among 320 metropolitan areas.

Another source, *Sales and Marketing Management*, detected that in 1990 the median household spendable income, or effective buying income, in Kokomo was \$28,282, up 2% from a year ago. For the first time, after being ranked at the top in the state for five consecutive years, Kokomo's median household income slipped to fourth highest in the state in 1990. Nationally, it plunged 31 places to 121 among 320 metropolitan areas.

One out of every five households in Kokomo earned at least \$50,000 in spendable income in 1990, according to *Sales and Marketing Management*. Once again, after leading the state for the past five years, Kokomo tied with Indianapolis for first place in 1990. The spendable income of all households in Kokomo totaled \$1.3 billion, down \$7 million from a year ago, according to the same source.

Confidence-Building Delco News Nuggets

No discussion of the local economy would be complete without referring to developments at Delco Electronics, General Motors' largest Indiana operation, employing about 11,000 people in Kokomo. It is the most stabilizing force in the local economy.

Unlike a year ago, Delco did not announce new capital expansion plans. However, there were many positive developments:

- Delco was chosen to mass produce sensing and diagnostics devices for GM's 1994 model year vehicles;
- Delco's emphasis on high quality was recognized in November in the TV show *Lifestyles*;
- For the first time in Kokomo's and the state's

history. General Motors, the world's largest industrial operation, held its monthly 20-member board meeting on the Delco premises. The landing of a 20-member board in April itself suggests that Delco Electronics is a jewel in the GM crown.

Good and Bad News for Agriculture

On the agricultural front, it appears that farmland values in the area are on the rise. According to the Federal Reserve Bank of Chicago, farmland values in June 1991 stayed 1 to 2% above the 1990 levels. The summer drought harmed corn and soybean crops in the Hoosier heartland. That will take its toll on farmers' incomes.

Discouraging News on the Population Front

On the negative side, Kokomo received discouraging news regarding its population. Erosion of population is one unmistakable pattern emerging from the recently released census data. The data point out that both the city and the county lost population in the 1980s. Howard County lost 6,069 residents during

"The closure of the base is tantamount to losing a family member. The 40-year-old Grissom has been a stable, reliable, resourceful, social, and almost recession-proof part of Hoosierland."

1980-1990. Although 49 counties in the state lost population during the 1980s, Howard County is one of the top 16 counties with population decline in excess of 7%. The only comforting fact is that, without an exception, the neighboring counties also lost population. Some of the drop in population can be explained by the shrinking size of the average family. Another reason is migration due to lack of jobs or to retirement.

The 1990 census shows that Kokomo is the state's 11th largest city. A major shift occurred in the 1980s in the city's population. Whereas the population of whites declined by 7%, the nonwhite population increased by 10%. Among the ethnic groups, the population of African Americans rose by 3.2%, the Hispanic population gained 16%, and other ethnic groups' population increased 11%.

In metropolitan terms, the Kokomo metropolitan area's population dropped by 6.5%, from 103,715 in 1980 to 96,946 in 1990. According to the Census Bureau, nationally the Kokomo metropolitan area ranked 263, down 20 places from the rank of 243 in 1980.

Friday, June 29, 1991: A Day of Infamy

Economic development news from the surrounding areas is important to Kokomoans because it means job opportunities for Howard County residents. The most disheartening news was about Grissom Air Force Base. Although it was known for some time that the Pentagon was contemplating the idea of closing some of the nation's domestic military bases to reduce defense spending, residents of the Hoosier heartland hoped that Grissom would not be on the hit list. Alas, their hopes were shattered on June 29, when the Base Closure Realignment Commission (BCRC) voted unanimously to include Grissom on the closure list. In August, acting on both the BCRC's recommendation and the nation's lawmakers' vote, President Bush nailed the coffin, so to speak. The final decision amounted to a permanent loss of the 305th Refueling Wing. Grissom's pride and the Air Force's "24-hour flying gas stations," without any change in the reserve units. As if adding insult to injury, the alert duties of active military personnel ceased in the first week of October, resulting in a loss of a source of extra income to active-duty personnel.

Although the decision to scuttle the base was carried out with military precision and swiftness, the transition period will be hard, drawn out, and difficult to swallow for many residents of the region. The closure of the base is tantamount to losing a family member. The 40-year-old Grissom has been a stable, reliable, resourceful, social, and almost recession-proof part of Hoosierland. Sprawling over 3,200 acres of land, the base is the region's third largest employer: active-duty personnel, reservists, and civilians totaled 5,130 in 1991, with a gross salary of \$88 million.

Encouraging Developments

Although Peru will be adversely affected by the closing of Grissom, its manufacturing base is expected to grow more in the coming years. In May, GenCorp Automotive announced plans to expand existing manufacturing and warehousing facilities. This will add 40 jobs, boosting the existing work force by 70%. The expanded facility will be used to produce auto components for Mazda under a technical agreement with Kurashiki Kako Co., Ltd. of Japan. Woodcrest Manufacturing, a maker of youth furniture, announced plans to move to a larger facility in Peru and add 130 workers to its existing 120. Finally, Peru's ailing

Kokomo Tube Co., employing 33 (down 40% from its peak in early 1991), was acquired by Ultra-Cast, Inc.

Another Japanese-owned firm, Sumitomo Corp. of America, made inroads into the Hoosier heartland. In May, construction work began in Frankfort on a \$15 million electrical steel slitting plant. The plant will create 30 new jobs.

In Cass County, the Logansport Memorial Hospital announced a two-phase multimillion dollar capital expenditure plan. The construction work on Phase I, a \$2.15 million medical office complex, began in 1991 and will be completed in 1993. Phase II construction, an addition of a new wing to the hospital at an estimated cost of \$15 million, will begin in 1994 and be ready for occupancy in 1995.

Amcast Industrial Corporation, a producer of auto parts, selected Gas City for its \$20 million wheel manufacturing facility. The new facility, to go into operation in 1993, will create 150 new jobs. In Delphi, Indiana Packers Inc.'s new \$30 million pork processing plant, when in full operation, is expected to create up to 600 jobs.

WHAT'S IN STORE FOR KOKOMO IN 1992?

Normally, a strong and quick rebound occurs after the end of a deep and long recession. Such a scenario is not in the offing. To begin with, the current recession at both the national and the local levels was not deep and long compared with the 1981-82 recession. In the last recession, the peak U.S. jobless rate was 10.7%, whereas locally it was 20.4%. During the current recession, the jobless rate peaked at 7% nationally and 14.4% locally.

During the first six months of national recovery in 1983, the local unemployment rate skidded at an average monthly rate of two percentage points and then gradually tapered off. During the current recession as well, local unemployment fell sharply at an average monthly rate of two percentage points during the first three months and then tapered off. In the last recession the housing market was extensively battered. Permits for single-family homes plunged from 70 to 80%, compared with a drop of 7-8% this time. The number of houses sold sank at least 50% during the last recession's peak, compared with a drop of 13% in this recession.

Economy to Gain Momentum by Midyear

The economic recovery in 1992 will likely be lethargic compared with past upswings. Much depends on consumer spending; a lack of enthusiasm on their part will force Detroit's auto makers to keep production levels low, at least during the first two to three months of 1992. With the beginning of the second quarter, however, continued low interest rates and band-aid government programs should inspire con-

sumers to loosen their purse strings and flash credit cards at local stores. By midyear, consumer spending will gain some momentum.

The employment situation should remain relatively stable. The average unemployment rate in 1992 should hover around 7.5%, with a range of 6-12%. For a month or two, the jobless rate will remain in double digits. Auto workers will likely face short-term layoffs, some as long as two weeks. Such layoffs will not be massive, however. The manufacturing work week will inch upwards, with the yearly average remaining slightly above 40 hours.

In general, the outlook for new entrants and/or re-entrants into the job market is likely to remain soft. The retail trade sector should endure losses in 1992. There will be an increase in construction-related jobs. The manufacturing sector, in general, will show smaller job losses than in 1991. The service sector will likely post more losses than a year ago.

Housing Sector to Remain Active

Falling mortgage rates will ignite activity in the housing sector. First-timers as well as trade-up buyers will likely generate some momentum during the peak real estate market season. Overall, sales of existing homes and their prices will post a 5-10% gain over 1991.

"The manufacturing base is stable, the composition of the work force is changing toward more white-collar jobs, the service sector has received a shot in the arm in the form of the arrival of a few big-name retail stores, and the overall mood in the region is upbeat."

levels. Lower interest rates should also ignite residential and non-residential construction activity. Single-family home permits will perk up to 160, 8-10% higher than in 1991. The number of residential and non-residential building permits issued, excluding sign permits, should exceed the levels reached in 1991.

The definite landing of big-name retail stores—Wal-Mart, Sam's Club, Cub Foods, and Meijer's—in the immediate future should open up opportunities for jobs in the retail and service sectors. It is estimated that these stores could create at least 500 new

jobs. The stores will be a catalyst for further growth in the service sector. Their presence will lure shoppers from the outlying areas to Kokomo. The "City of Firsts" has the potential to become a major retail hub north of Indianapolis.

Grissom Air Force Base Fallout

A gradual phaseout of the 305th Refueling Wing, to be carried out during 1992-94, will mean permanent departure of 2,400 active-duty personnel along with their "birds." The civilian workforce will be trimmed by 125 by the end of 1992. Most of the remaining 700 civilians will relocate, retire, or lose their jobs by 1994. Whereas 76% of the active-duty personnel and civilians reside in Miami County, 12% live in Howard County, 4% in Cass County, and the remaining 8% in other nearby counties.

The reality will soon dawn on the Hoosier heartland in 1992. The sounds of roaring airplanes will tone down. Once the base is padlocked or mothballed, it will have a chilling effect on the region. Those whose fortunes have remained tied to the base will be the unfortunate ones. Because of the base closure, Miami County could lose 15 to 17% of its population, whereas Howard County could lose 1 to 2%.

The loss of income, population, and labor force will rattle the local economies. The hardest hit will be Bunker Hill and Peru, followed by Kokomo and Logansport. Maconaquah School Corporation could lose four out of every ten students. An elementary school drawing nine out of every ten students from base personnel could virtually shut down in the immediate future. Consequently, some teachers will lose their jobs. Indiana University at Kokomo, Ball State University, and Indiana Wesleyan University are all going to be potential losers. IUK could lose 2 to 4% of its student population.

The region's retail trade sector will certainly feel the impact of the loss of business from base personnel. Retail sales in Peru and Bunker Hill could drop by as much as 15%; Kokomo retailers could lose 2 to 4%. Overall, the retail sector in the region is likely to lose between 150 to 300 jobs.

Military retirees from the state's different regions, as well as some from Michigan and Ohio, who have used Grissom's commissary, PX, and medical care facilities will no longer travel to the base and spend money at local stores, shops, hotels, motels, and eating and drinking establishments. Apartment complexes will register a rise in vacancy rates. Local real estate agents will see a swelling of the number of houses listed for sale. Local depository institutions could lose a sizable amount of deposits.

With the closing of Grissom, one more cloud of uncertainty is removed from the Hoosier heartland's economic skies. After lights dim at the base in 1994,

efficient reuse of its facilities will be a real challenge to community leaders, lawmakers, and the general public. Realistically speaking, no new single industry in the immediate future will fill the vacuum created by the base closure. Though the opportunities may be countless, so are the hurdles.

Better Times Ahead

The silver lining to all recent developments is that the manufacturing base is stable, the composition of the work force is changing toward more white-collar jobs, the service sector has received a shot in the arm in the form of the arrival of a few big-name retail stores, and the overall mood in the region is upbeat. The new transportation bill approved by both houses of Congress should help complete some of the road expansion projects. All in all, better times are in Kokomo's cards, provided Hoosier heartlanders are willing to endure some pain and suffering caused by short-term disturbances.

Richmond/Connersville/ New Castle

Ashton Veramallay

Director, Center for Economic Education, Indiana University East

There is mixed news on the home front. On the positive side, the Richmond area is poised for an upturn in economic activity in 1992. Recent plant openings, existing plant expansions, and new plant announcements will give the local area a much needed boost to arrest the economic hemorrhaging taking place, particularly in the manufacturing sector. Although 80% of the respondent firms to my survey are being adversely affected in varying degrees by current economic conditions, 74% of these firms are optimistic about the future course of the economy; 34% plan to expand in 1992. The national economic recovery, I think, has suffered a cardiac arrest. It will be in intensive care for another two quarters.

Local construction activity is on the rise. Its estimated value for 1991 is \$25 million, reflecting a 10% increase over 1990. It is expected to be much higher for 1992. The housing market is relatively favorable. In fact, it is a buyers' market, given the attractive rates of interest. Newcomers to the city tend to find housing relatively cheap here and often opt for houses in the \$80,000-\$130,000 range. Local homeowners also tend to move into upscale housing.

Furthermore, as Wayne County's population grows older, there would be an increased demand for retirement units, health care services, and leisure activities. The county's median age (31.6 years) is higher than the national median (30.8 years). This demographic profile, however, could be changed by more births, immigration, or both.

Retail trade in the fourth quarter would be much better than last year's. Area merchants can expect moderate growth in sales for the holiday season. Consequently, there would be a jolly ringing of the cash registers, although it would be less robust than in previous years. There is not much pent-up demand for consumer durables. Early sales, promotions, discounts, and other gimmicks are meant to lure reluctant shoppers. It is important to note that consumers are increasingly becoming more sophisticated and selective. They are shopping for bargains. They want to stretch their dollars, especially during recessionary times. It is instructive, too, for merchants to understand that retail trade accounts for 21% of the county's employment.

On the negative side, laid-off employees would be rehired gradually as the national economy rebounds. Indiana is expected to do better than the rest of the nation. If that is so, then Wayne County's unemployment rate would hover around the 5-7% range.

Also, there would be a continuing loss of high-paying jobs from the manufacturing sector, which accounts for about 40% of the total employment. Unquestionably, the closings of Natco, Nettle Creek, and Manville have affected Richmond's net gain in both employment and income creation.

There is likely to be no significant net gain in retail trade, particularly in supermarket, fast food, and hardware businesses, when the retail pie is being sliced smaller and smaller. The problem is compounded when there is only a meager increase in personal income. Per capita personal income for the county is more than \$13,000, which is less than the state's \$14,862 and the nation's \$16,183. The development of human capital is, therefore, extremely important to turn adversity into wealth-creating opportunity, which in turn will help reduce the social dependency ratio. Our work force, for example, is not well positioned to learn complex, technology-based job skills. Indiana ranks 47th in the nation in the percentage of the work force having a college degree; this does not augur well for our preparedness in a highly competitive global economy.

Overall, the "R" word for the local economy is not Recession, but Recovery, with cautious optimism.

South Bend/Mishawaka-Elkhart/Goshen

John E. Peck

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This year-end assessment of the economic condition of the South Bend/Mishawaka and Elkhart/Goshen communities is based on an analysis of the latest available economic indicators for the area tracked by Indiana University at South Bend's Bureau of Business and Economic Research (BBER). A look at the indicators—particularly those relating to local employment—suggests that through late summer the area economies of South Bend/Mishawaka and Elkhart/Goshen had performed about as expected in our midyear area forecast in the *IBR*, Summer 1991. There were definite signs, especially when looking at the job picture, that recovery from the recession of 1990-91 was under way. On the other hand, it was equally clear that the recovery is tentative and progressing slowly at best.

The accompanying **Table** summarizes the various indicators of local economic activity compiled by the BBER. These figures are seasonally adjusted and, with the exception of the unemployment rates and real estate data, are index numbers expressed as a percentage of base year 1986 values. It is noted that comparative indicators along with percentage changes are given for August and September 1991. To highlight longer-term trends, the same figures are also given for September 1990.

As noted, local employment conditions continued to improve in September. Both South Bend/Mishawaka and Elkhart/Goshen seasonally adjusted employment indices reached their lowest levels of the 1990-91 recession in April 1991 when they registered 113.2 and 110.4, respectively. The index has risen every month since that time in Elkhart County, and in every month but July in St. Joseph County. From a 1990 peak to an April 1991 trough, South Bend/Mishawaka had an overall employment drop of 4.6%. In Elkhart, the decline was 7.8%. By September 1991, both communities—again on a seasonally adjusted basis—had gained back about one-half of those losses.

South Bend/Mishawaka

Even though some jobs have been recovered, the South Bend/Mishawaka recovery to this point has been very uneven. Though the nonmanufacturing

Table
Economic Indicators: South Bend/Mishawaka-Elkhart/Goshen

	South Bend/Mishawaka					Elkhart Goshen				
	September 1991	August 1991	September 1990	% Change August 1991	From September 1990	September 1991	August 1991	September 1990	% Change August 1991	From September 1990
Employment Indicators										
Nonagricultural employment ¹	115.2	114.4	116.9	0.7%	-1.5%	114.7	114.2	117.4	0.4%	-2.3%
Manufacturing	87.4	87.1	94.5	0.3%	-7.5%	105.3	104.3	106.1	1.0%	-0.8%
Nonmanufacturing	123.2	122.5	123.2	0.6%	0.0%	125.6	126.0	130.3	-0.3%	-3.6%
Unemployment Rate	5.9%	5.2%	4.5%			6.0%	5.5%	5.0%		
Help Wanted Advertising ²	42.1	58.1	101.2	-27.5%	-58.4%	68.3	71.4	77.8	-4.3%	-12.2%
Utilities³										
Industrial Electricity Sales	98.6	97.4	101.2	1.2%	-2.6%	108.3	106.7	108.6	1.3%	-0.3%
Commercial Gas Sales	95.6	104.4	98.9	-8.4%	-3.3%	106.1	105.2	94.2	0.9%	12.6%
Industrial Gas Sales	70.9	83.2	71.8	-14.8%	-1.3%	48.6	43.5	47.1	11.7%	3.2%
Car and Truck Registrations⁴										
New Passenger Cars	54.7	52.8	55.4	3.6%	-1.3%	44.4	44.8	98.0	-0.9%	-54.7%
New Trucks	59.3	59.5	62.3	-0.3%	-4.8%	64.2	65.8	52.0	-2.4%	23.5%
Housing Construction Data⁴										
Estimated Value of Permits	11.9	110.2	98.5	-89.2%	-87.9%	61.6	89.2	94.0	-30.9%	-34.5%
Number of Permits Issued	101.5	90.0	81.4	12.8%	24.7%	56.9	65.5	68.8	-13.1%	-17.3%
Average Value per Permit	104.0	122.5	113.3	-15.1%	-8.2%	107.7	133.6	138.0	-19.4%	-22.0%
Residential Real Estate Data										
Number of Active Listings	1,557	1,590	1,427	-2.1%	9.1%	1,984	1,978	1,760	0.3%	12.7%
Average Days Listed	74	51	77	45.1%	-3.9%	107	111	84	-3.6%	27.4%
Average Market Price	\$73,576	\$71,338	\$71,027	3.1%	3.6%	\$72,207	\$74,423	\$69,098	-3.0%	4.5%
% of Sales to List Price	91.0	93.4	95.4	-2.6%	-4.6%	95.0	99.0	95.0	-4.0%	0.0%

All figures except for Unemployment Rate and Residential Real Estate Data are seasonally adjusted index numbers with base year 1986 = 100.

¹St. Joseph and Elkhart counties.

²South Bend Tribune and Elkhart Truth.

³Electricity sales are South Bend and Elkhart. Gas sales are St. Joseph and Elkhart counties.

⁴St. Joseph County, excluding cities of South Bend, Mishawaka, Oshtemo, Walkerton, and New Carlisle. Elkhart County, excluding cities of Elkhart, Goshen, Nappanee, and Milersburg.

employment index in September 1991 was unchanged from that of September 1990, manufacturing was off a full 7.5%, and the indicator was only four-tenths of an index point above its recession low. In the nonmanufacturing sector, services, government, and construction registered the largest year-to-year gains. Of these, the construction industry continues to be the strongest sector in terms of employment. September construction employment was up 11.2% over 1990—which was a good year in its own right.

Other South Bend/Mishawaka indicators, with the exception of new housing permits issued, provide evidence that the economy was slow in the early fall. Energy sales, car and truck registrations, and resale housing all indicated the slowness of activity on both the month-to-month and year-to-year comparisons. New housing permits, on the other hand, climbed above the 100 base year value for the fourth month out of the preceding six months.

Elkhart/Goshen

Elkhart employment gains in September 1991, unlike those in St. Joseph County, were strongest in the

manufacturing sector—up a full percentage point from August and down only 0.8% from September 1990. The Elkhart economy is greatly influenced by conditions in the transportation equipment sector, where one-third of the area's manufacturing jobs are found. Nine hundred more people were employed in the transportation equipment sector in September 1991 than in the same month a year ago.

Regardless of the improved job picture in Elkhart County, as in neighboring St. Joseph County, virtually all remaining indicators pointed to a slow economy, some resting at recession lows. Even September's new housing permits issued in Elkhart were significantly depressed relative to pre-recession levels.

Outlook

The area outlook continues to be muddled by the conflicting indicators found in the table. Employment is improving, while most other sectors look to be very slow at best. The prospect for a double-dip recession still remains fairly high, but the opinion here is that there is more than a 50% probability that the area is in recovery and will remain in that phase through the

summer months of 1992, albeit the recovery will advance at an unusually slow pace. As is so often the case, the greatest threat to the recovery scenario appears to be the psychological threat. There is little doubt that a large percentage of decision makers—consumers and businesses alike, and including those with available purchasing power—lack confidence in the recovery and are, as a result, conservative in making purchasing decisions. A good dose of optimism would go a long way toward reducing the odds for a second dip; but cautious buying, though easily understandable, leads to less optimistic prospects. Sometimes we block our own paths. We have met the enemy, and we are it!

Terre Haute

Marvin Fischbaum

Professor of Economics, Indiana State University

If the recession ended in second quarter 1991, and if the fourth quarter was a period of recovery, then Terre Haute could stand a bit more recession. On a year-to-year basis, regional payrolls rose 6 to 8% in each of the last five quarters for which information is available—all of 1990 and first quarter 1991. In the 1980s it would have been the exception rather than the rule for payrolls to grow more rapidly than inflation. Data available on a more current basis, though, presents a more ambiguous picture.

Recent developments in the unemployment rate estimates are disturbing. For most of the year, the unemployment rate had moved erratically, though with a slight upward bias. But the rate for the MSA rose 0.2% in September and jumped 0.9% in October. Between October 1990 and October 1991, the MSA unemployment rate spurted from 4.3% to 6.1%. Further, new claims for unemployment rose sharply during the last half of November, presaging a likely increase in the unemployment rate for December.

The unemployment rate rose primarily because of an increase in job seekers rather than a loss of jobs. The government provides two estimates of employment. Over the 12-month period, the household survey data underlying the unemployment rate estimate and the establishment-based census were in close agreement. Unemployment increased 1.8% because jobs grew at the healthy rate of 2.7%, but the labor force rose by 4%. Looking just at the month between September and October, the two estimates diverge. Household survey data has the labor force increasing by 320 and employment falling by 250.

Establishment data, which are believed to be more accurate, show employment rising by 300. Over the 12-month period, a net gain of 1,600 jobs can be accounted for largely by an increase of 600 in manufacturing employment, 400 in trade, and 600 in government. Although construction employment fell by 100 over the year, it remains at an historically high plateau.

The fact that construction remained strong was due in part to projects in process. Comparing the 12 months ending in October to the previous 12 months, the value of non-residential building permits in Vigo County declined 29%, and the value of residential construction declined 36%. The construction of single-family homes was essentially unchanged; apartment complexes fell from one to zero. Residential construction may well rebound in 1992, because of two sizable apartment complexes on the drawing boards.

The resale market for single homes maintained the pattern of the past several years with modest but cumulatively significant improvement. Unit sales have increased 6%, and the ratio of listings to sales has fallen 20%. But the average selling price is virtually unchanged, having risen \$200 to \$52,900.

New building permits were issued for a wide variety of commercial and institutional projects, but not for industry, where construction at Bemis and Columbia House was just about it. While the mall got a new food court, and the north end a very large home improvement store, much of the construction was related to sickness and death. Outpatient facilities and a new professional building are going up at Regional Hospital. Union Hospital is building a free-standing clinic and center for occupational therapy, and Roselawn Memorial Park is adding a funeral home and mausoleum.

Certainly the local economy has had its dark side. Commercial loans are soft, and the city seems to be participating in the general weakness in sales of new cars and general merchandise. Terre Haute lost its bid to get back the U.S. Postal Service express mail hub, and may well lose its last commuter airline service. The Peabody Coal Mine at Universal is closing, with a loss of 200 well-paying jobs, and prospects for the on-again, off-again Plasma Fusion specialty steel mill are currently off again. In terms of business sentiment, both the survey by the Indiana State University Center for Research and Management Services and the survey by Manpower, Inc. show expectations essentially unchanged from last year.

Still, there is life in the old girl yet. A number of announcements over the past few months bode well for construction activity over the next year or so, and for industrial employment and general economic conditions in the longer run: Ivy Hill Packaging Cor-

poration considered leaving town; instead, it will expand, adding 125 jobs. Tri-Industries added a second site and divided itself into Tri-Manufacturing (jet turbine parts) and Tri-Remanufacturing (jet engines). It plans to add 300 jobs over the next three years. DADC has at least contingency plans to expand yet again. The new building would cost at least \$12 million and employ 100 additional workers, as compact disc technology expands from audio and video to computer storage applications. The State of Indiana will consolidate services and perhaps add some new ones in a regional office center in a soon-to-be-renovated warehouse on the eastern edge of downtown. The state will also speed up highway construction and build a bypass to connect points east and south of Terre Haute.

The Federal Government will be chipping in \$240 million with its largest clean-coal grant to date. The grant will be used by a joint venture of PSI and Destec to build a coal gasification facility to power the Wabash River Generating Station. Total costs, including the first three years of operation, will be \$590 million. Fifty workers will be added to the permanent work force, and, more important, strict sulphur dioxide standards can be met while using local high-sulphur

coal. PSI and Destec believe the technology promises to be commercially viable.

Over the past few months the near-term economic outlook has become more guarded as unemployment approaches troublesome levels. But beyond the winter, the outlook brightens. It has been a long time since the region had so many favorable long-term prospects.

Evansville

Maurice Tsai

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As the national economy slipped into a recession in fourth quarter 1990, so did the Evansville economy. In terms of the Evansville Area Business Index (see the **Table**), the composite index registered a fall of 0.3% in fourth quarter 1990 and another drop of 2.2% in first quarter 1991. The index rose in the second and

Table
Evansville Area Business Index (1977 = 100)

Period	Industrial Production	Trade & Business	Construction	Transportation*	Finance*	Employment	Composite* Index
<i>Quarterly Index</i>							
3Q 1990	126.17	127.15	112.48	112.08	120.98	118.62	123.31
4Q 1990	123.52	130.87	103.16	109.19	121.56	120.60	122.92
1Q 1991	117.18	132.77	91.44	107.21	125.06	119.06	129.26
2Q 1991	122.05	131.94	93.53	107.39	124.77	117.86	121.73
3Q 1991	127.34	129.75	92.73	109.78	122.46	119.47	122.88
4Q 1991 (estimated)	123.00	133.20	91.00	107.50	123.50	120.50	122.59
<i>Annual Index</i>							
1988	123.76	119.71	115.54	110.82	121.39	112.67	119.38
1989	123.64	121.78	118.76	113.86	122.85	116.55	121.11
1990	123.97	128.82	112.62	112.25	121.64	118.35	123.55
1991 (estimated)	122.39	131.92	92.18	107.97	123.95	119.22	121.87
1992 (projected)	124.75	134.00	104.50	110.40	125.50	121.80	125.00
<i>Annual Growth Rate (%)</i>							
1988	2.6	3.9	-12.1	0.4	0.8	2.9	1.4
1989	0.0	1.7	2.8	2.7	1.2	3.4	1.4
1990	0.3	5.8	-5.2	-1.4	-1.0	1.5	2.0
1991 (estimated)	-1.3	2.4	-18.1	-3.8	1.9	0.7	-1.4
1992 (projected)	2.7	1.6	13.4	2.3	1.3	2.2	2.6

Source: School of Business, University of Evansville
*Revised

third quarters by 1.2% and 0.9%, respectively. Fourth quarter 1991 is expected to have no growth from the third quarter. For the year of 1991, the index declined 1.4%. The declines of regional economic activities were seen in industrial production (-1.3%), construction (-18.1%), and transportation (-3.8%). Trade and services managed to grow by 2.4%. The financial factor also grew by 1.9%. The regional employment grew at 0.7%—much lower than in the previous four years.

The 1992 economy is expected to be one of moderate recovery. The first half will recover slowly, reflecting weak consumer confidence and low purchasing power. Should the federal government provide any stimulus to the economy, such as tax cuts for middle income group, the recovery process would be swifter. With the assumption of some government action, the Evansville economy is expected to grow at 2.6%. If the timely stimulus is lacking, the growth rate would be cut back to the 1-2% level. The growth will spread to all sectors in the regional economy.

Industrial production would lead the recovery with an estimated growth rate of 2.7% in 1992. Increases in production at Whirlpool and the New Allison gas turbine facility support this outlook. The trade sector will grow at 1.6%, a rate lower than in the last few years because of the closing of a major department store and weak consumer purchasing power. The service sector will continue to grow steadily, especially in medical services.

The construction sector reached a trough in 1990, as the major highway system and a new airport terminal were completed in 1989. Residential production was weak during 1990-91, except for March-June 1991. With lower interest rates, residential construction should resume its growth moderately, while business construction would hold steady. Overall, the construction index is expected to grow at the 13% level in 1992. The transportation sector declined in 1990-91 due to the recession and the inability to capitalize the recently improved transportation system. However, with a recovery in the economy, transportation activities should grow at about 2%.

The Evansville regional financial center was healthy during the 1991 recession. The sector is characterized by its sound financial management and the expansion in assets by merging with other financial institutions. Regional employment will improve by about 2% for 1991.

In summary, the year of 1992 will be a year of prolonged recovery. The growth rate will be over 2% in the Evansville Area Business Index if consumer confidence shows its upswing in the first half of the year. It would be below 2% growth if consumer confidence remains low.

Anderson

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Understanding the economy of the Anderson area begins with an identification of some distinct demographic changes that have occurred during the decade of the 1980s. The county has lost approximately 9,000 in population in the past ten years. The mix of population in the county has also changed dramatically, as the average age of Madison County residents has increased. The county gained more than 3,000 people in the 60-and-older age bracket. This gain was offset by an almost equal loss in the 18-60 age bracket. The county's net loss in population is equal to the loss of population in the under-18 bracket. On balance, the number of adults remains roughly the same, while the number of children is substantially lower (22% lower).

In the 1970s, per capita personal income in Madison County was nearly equal to the state average (99.2%). With a higher percentage of the population in the income earning age range, we might expect to see some improvement in the county's relative position. This was not the case. Per capita personal income in Madison County was only 97.7% of the state average. This decline is not likely attributable to a loss of labor income, as average wages in the county remained 111.5% of the state average for the decade. Also, total employment and labor force participation remained strong in the county. It is more likely that the loss in per capita personal income is due to losses in non-earned income.

At the beginning of the 1970s, two out of every three jobs in Madison County were in manufacturing. At the end of the 1980s, two out of every three jobs in the county were outside of manufacturing. This loss of employment in manufacturing (10% decrease in the decade) was offset by gains in other areas, primarily in the service and public sectors. The influence of manufacturing upon the area is still quite strong as the percentage of wage earnings has not fallen as drastically. By 1990, 54% of the total wage bill in Madison County was comprised of manufacturing wages. This represents less than a 3% decrease from the end of the 1970s. This result may reveal something about the quality of the nonmanufacturing jobs created locally during the decade. There are relatively fewer manufacturing jobs, but manufacturing wages are still more than 50% of the total county wage bill. Those new jobs do not appear to offer the same

income possibilities that county residents have enjoyed in the past. We might suspect that the income distribution is now becoming more unequal than in past decades.

During previous recessions, Madison County has gone through some severe economic fluctuations reflecting our recession-prone manufacturing base. This nature appears to be changing somewhat. During the first three years of the decade, Madison County unemployment averaged over 8,600. From 1988 to 1990, unemployment in the county averaged slightly over 3,600. Whereas we would expect lower numbers because of the relative mildness of the current recession, these numbers were actually the smallest unemployment numbers of the entire decade. This is an indication that the county has begun to move significantly toward a more recession-proof composition.

Clearly the economic face of the Anderson area has changed. The area is still tied to the largest employer in the area, General Motors. However, there are now many more jobs apart from GM and its related ancillary activity. The higher average age of the population translates into a greater dependence upon transfer payments as a fraction of personal income (this fraction has remained fairly constant at about 22% throughout the decade). Despite the loss of

manufacturing jobs, purchasing power has not eroded proportionately. This is due in part to a greater reliance upon transfer payments and a higher labor force participation rate.

Despite the fact that we now have 9,000 fewer citizens, the size of the public sector has increased. More than 900 jobs were added during the 1980s. In 1981, there was one public sector job for every 28 residents. By 1991, this ratio fell to 1:22. There may be some implications for tax burdens in the county (and disposable income), if this trend continues unchanged.

Jeffersonville/New Albany (Louisville Area)

Fay Ross Greckel

Professor of Economics, Indiana University Southeast

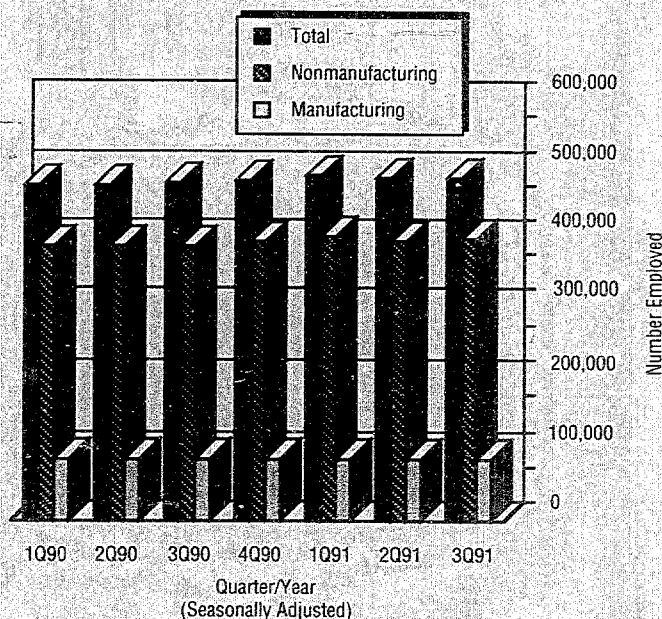
The Louisville metropolitan area succumbed to the forces of recession early in 1991. Although some sectors were seriously affected by the national downturn, the overall effect does not appear to be very severe so far.

Employment in the seven-county metropolitan area (Clark, Floyd, and Harrison counties in Indiana, and Jefferson, Oldham, Bullitt, and Shelby counties in Kentucky) declined by about 1% in second quarter 1991, after growing steadily for several years. Employment remained virtually flat during the third quarter, as Figure 1 shows. Although employment in first quarter 1991 averaged a healthy 14,000 jobs ahead of first quarter 1990, the gap between 1991 employment and employment in the same month of 1990 narrowed each month thereafter. Preliminary October statistics showed only 1,400 more jobs than 12 months earlier.

Manufacturing employment, which had inched upward for the past three years, declined throughout the year. By October it was running about 2,400 jobs behind the year-earlier total, with nearly all the net job losses concentrated in the electronic equipment and transportation equipment sectors.

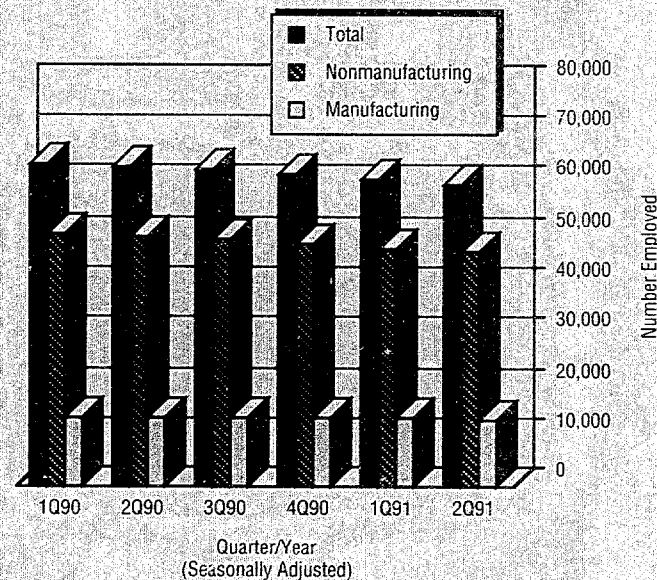
Although nonmanufacturing employment also dipped in the second quarter, there were still net gains over the year. Comparing October 1991 with October 1990, there were 2,100 more retailing jobs, 2,200 more health service jobs, and 1,400 more jobs in local government (including education) than 12 months earlier.

Figure 1
Louisville Metropolitan Area Employment



Source: Kentucky Cabinet for Human Resources

Figure 2
Southern Indiana Employment:
Clark/Floyd/Harrison Counties Establishment Data



When we narrow our focus to the metro area's Indiana counties—Clark, Floyd, and Harrison—we get a somewhat different picture (**Figure 2**). The Indiana Department of Employment and Training Services reported a small but steady decline in the jobs located in these counties throughout 1990 and 1991. By the third quarter of this year there were nearly 2,500 fewer jobs than a year earlier. Surprisingly, most of the net job loss was in nonmanufacturing, particularly in retail trade, federal employment (primarily at the Census Bureau), and local schools.

Some sectors are clearly experiencing the national downturn. As elsewhere in the nation, sales of new cars and light trucks are off sharply this year. Dealerships in the southern Indiana counties fared worse than those in Jefferson County.

Sales of existing homes have also declined. On both sides of the Ohio River, multiple listing home sales were about 10% lower than in 1990. However, the dollar volume of sales fell much less, as the average home price rose during the year.

Residential construction fell sharply about a year ago, but quickly turned around. **Figure 3** shows the dramatic decline in building permits issued in Jefferson County (KY) during fourth quarter 1990, particularly for multi-family dwellings. Although permits increased in each successive quarter thereafter, they remained below 1990 levels throughout the first half

of this year. However, during third quarter 1991, permits were issued for more units than in any quarter since winter 1990. The rebound occurred in both single-family and multi-family dwellings. Because permits are usually a leading indicator, this portends a healthy level of residential construction activity ahead.

In Floyd, Clark, and Harrison counties (IN), the decline in residential building permits was less sharp, and it did not occur until first quarter 1991 (see **Figure 4**). In fact, because the winter quarter is often

Figure 3
Residential Building Permits: Jefferson Co., KY

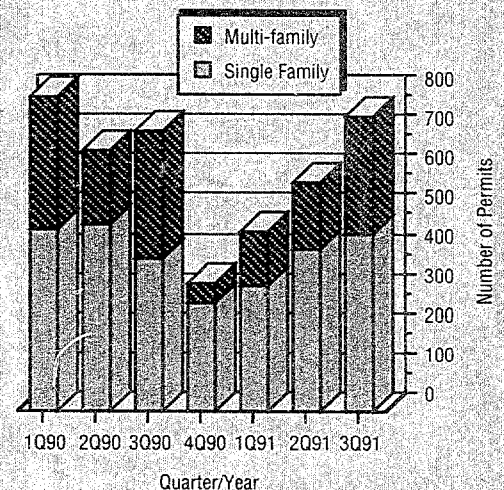
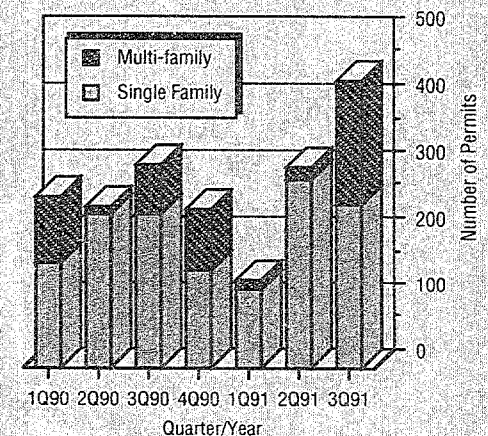


Figure 4
Residential Building Permits:
Clark/Floyd/Harrison Counties, Indiana



a slow period for permit issuance, there may not have been any real decline in the Indiana counties. The rebound in the second and third quarters was very strong, with the result that the total permits issued in these counties during the first nine months of 1991 exceeded the total for the same period a year ago.

One reason for the stronger performance in residential construction in the Indiana counties appears to be a growing willingness of Kentucky residents to include Indiana homes and sites, especially in Floyd and Harrison counties, in their search for a new residence. The recent decision by the largest Louisville realty firm to open an office in southern Indiana will certainly reinforce this trend.

Nonresidential construction continues at a decent pace, though by no means a record level. Work is under way on several projects in downtown Louisville, on a classroom building at Indiana University Southeast, and along the riverfront in Jeffersonville, to name just a few examples.

Both the current and the future status of the local economy are difficult to read clearly at this time. There is no doubt that employment growth is lagging, that unemployment is up, and that many residents are suffering hardships. Yet there are many bright spots, some indicated above—and these are generally given less attention by the popular media than is the news of layoffs. A quick survey of the front page of some recent issues of *Business First*, the Louisville area's weekly business newspaper, turned up the following expansion announcements for Clark and Floyd counties alone:

- Rhodes, Inc., Charlestown (commercial printer), to build an \$8.25 million addition and add 25 employees;

- FireKing, New Albany (the leading fireproof file cabinet manufacturer) to add a new product line and 25 workers;

- PQ Corp., Clarksville (manufactures zeolite, a phosphate substitute), to construct a \$2.5 million plant addition and add 40 jobs;

- Jeffboat, Jeffersonville, recalls 200 workers;

- Graphic Sciences (Oregon-based ink manufacturer) to open a plant in Charlestown and employ 10 to 30 workers.

Many other expansions are under way throughout the metropolitan area.

New items like these illustrate some of the underlying strengths of the local area: the greater diversity of the economy than in previous decades, the ability of many firms to establish themselves in expanding niche areas, and the growing importance of relatively recession-proof sectors, like detergents and health services. Nevertheless, the outlook for the next few months still depends to a considerable extent on the national economy. If it continues to be weak, as seems likely, many local employers will feel the pinch, and the negative effects in those areas will offset some of the positive developments, leaving the overall economy with little or no net growth. However, I expect the positives to outweigh the negatives more and more as 1992 progresses. By midyear, then, we should be back to what has become our normal pattern of slow but reasonably steady growth.

POPULATION
Current Changes in Population
(by County)

SOCIAL WELFARE
Indiana's Security Income Payments
As a Percent of State Population
(1977)

GOVERNMENT
Federal Funds in Obligations
To Indiana
1977

**THE INDIANA
FACTBOOK**

1992

Prepared by the Indiana Department of Statistics & Planning
in cooperation with the Indiana Legislative Service Bureau

Did you know that:

- ✓ Nearly 50,000 couples get married in Indiana each year?
- ✓ Over 70 percent of the homes in Indiana in 1990 were owner-occupied?
- ✓ More than 10 percent of all Hoosiers were born before 1925?
- ✓ Half the homes in Indiana in 1990 were valued below \$53,900?
- ✓ Fayette County is number one among the ninety-two counties in dependence on manufacturing?

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