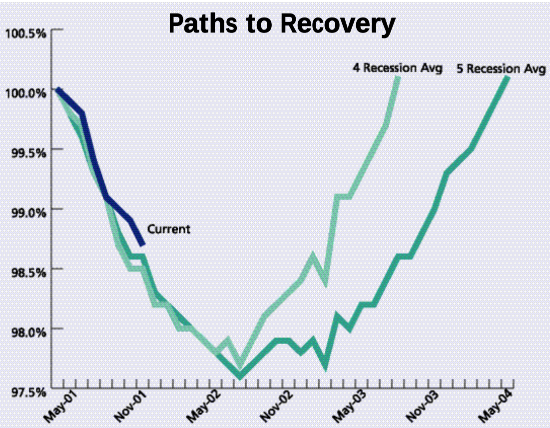
In Connecticut's Service Economy Recession, the Commodity Sector Have Got the Goods

By Steven P. Lanza

Connecticut, along with the rest of the nation, has slipped into recession. By historical standards this slump seems, well, average. But a little digging unearths some key anomalies. In the U.S., the recession didn't start like most others, with consumer spending grinding to a halt. This time, jittery business firms sent the economy into a nosedive. And in Connecticut, typically pro-cyclical sectors of the economy are holding up fairly well, while sectors that often show the greatest resilience are pulling the economy down. The services sector, the state's prime engine of growth in the 1990s, has taken a sharp hit early in this recession. Construction and manufacturing, by contrast, are clinging to above-trend activity levels. So, it seems that when it comes to helping prop up the state's economy, those two old-fashioned, tangible-commodity producing sectors have still got the goods.

What's Normal?

If the last five business cycles are any guide, Connecticut gets the flu when the U.S. catches a cold. Recessions typically last about 11 months for the nation as a whole but drag on 4 months longer in Connecticut. Perhaps the best, and certainly the most timely, measure of overall economic activity is employment. Peak to trough, employment usually drops by 2.4% in Connecticut recessions, versus only 1.2% nationally. Until the 1990s, Connecticut took about as long as the U.S. to fully recover the jobs lost during a recession—upwards of 13 months from when the economy finally bottoms out. But the slow recovery from its Great Recession early last decade pushed up the state's average recuperation time to 22 months (see chart).



The graph shows the path of the current recession, and the path the economy would be taking if this recession followed the average of the last five, or the four before Connecticut's Great Recession of the 1990s. Employment peaks are indexed to 100.

Because the present recession began in the first half of last year, history would tell us that Connecticut is about midway through the slump and should expect a turnaround to begin by 2002-Q3. But a full recovery takes time, so even with an early start, the economy could still be shaking off the effects of the downturn into the last half of 2003 or even the first half of 2004.

Sensitive Types

The effects of recession are never distributed evenly across sectors. Some industries are more sensitive to the business cycle than others. But the pattern may vary from slump to slump, and it may evolve over time as the structure of the economy changes. What light do previous business cycles shed on the current recession?

Historically, changes in goods-producing sectors like manufacturing and construction have been highly correlated with changes in employment across the entire economy. Moreover, these sectors have tended to lead the Connecticut and national economies in their ups and downs. Somewhat lower correlations exist for services, retail trade, and transportation-and-public-utilities (TPU). Some services, like education and health, have small positive or even negative correlations, indicating they hold up fairly well in a recession. That's because people hurt by hard times often return to school to pick up a new skill or see a doctor about their aches and pains. Also likely to scrape by tolerably well in a slump are low-correlation, lagging sectors like government, wholesale trade, and finance-insurance-and-real-estate (FIRE). The table below shows the actual correlations between economy-wide and sectoral employment changes for the period 1969-2000, based on Bureau of Economic Analysis data for both the U.S. and Connecticut.

How Industries Measure Up

Sector	Simple Correlation Coefficient	
	U.S.	CT
Manufacturing	0.94	0.81
Construction	0.92	0.75
Services	0.71	0.67
Health Services	-0.05	-0.09
Educational Services	0.14	0.14
Retail Trade	0.84	0.80
Transportation & Public Utilities	0.79	0.73
Government	0.22	0.44
Wholesale Trade	0.58	0.56
Finance, Insurance & Real Estate	0.62	0.48

These correlation coefficients measure the degree of association between changes in the overall level of employment and employment changes within industries and range between -1.0 and +1.0. Procyclical industries, where industry employment and the overall economy move up or down together, have correlations close to +1.0. Countercyclical industries, where industry jobs and the economy tend to move in opposite directions, have correlations close to -1.0. A correlation near 0.0 means the industry feels little effect from the business cycle.

Though these relationships have proved fairly steady, not all correlations have held constant over time. Take communications—jobs in television, radio, telephone, and cable. Until 1989, the correlation between communications and the rest of the U.S. economy was only 0.04 ; since then, it has soared to 0.71. In Connecticut, the comparable measure grew from 0.20 to 0.84. In both cases the difference is statistically significant and implies that the communications industry has become highly correlated with the business cycle—an understandable consequence of the structural shift to an information economy. Also signalling the changing times, the correlation coefficients for eating-and-drinking places, hotels, and securities-andcommodities brokers have flip-flopped from close to zero to nearly one—a reflection of an economy on the move both physically and financially.

Going Through A Phase?

That is the historical backdrop, but what is the temper of the current recession?

A check of recent employment patterns suggests that some key industries may be veering off in new directions. To show this requires looking at more than just positive and negative movements in jobs. It requires comparing actual job numbers to their long-term trends, so the cyclical employment paths for each industry can emerge. The actual cyclical index is formed by calculating the ratio of actual levels of seasonally-adjusted employment (that is, with effects like Christmas-season hiring removed) to long-term trend levels of employment. When industry activity is near a peak and job totals are above trend, the index will exceed 100. Conversely, when industry activity is near a trough and jobs are below trend, the index will register below 100.

Comparing cyclical indexes for the U.S. and Connecticut reveals a surprise or two. In 2001-Q4, the index for U.S. total employment stood at 99.2, so jobs nationally were below their trend levels—not bad for an economy officially in recession since March 2001, but definitely a recession. In contrast, the total cyclical index for Connecticut in 2001-Q4 was 101.8—still above trend though off a bit from its peak reading of 103.2 in 2001-Q2. The above-trend index value is picking up the fact that job totals in the state are 30,000 above trend, even though Connecticut has lost jobs steadily since May of last year.

What accounts for the resilience of employment in the Nutmeg State? Surprise: Much of the answer is that we are receiving a boost from two sectors that historically have suffered most from recession—construction and manufacturing. Both sectors have seen job declines in recent years, and they are continuing to lose jobs now, during the recession. But both are doing better than their long-term trends. The cyclical index for manufacturing in 2001-Q4 was 108.7, while that for construction was a robust 117.8. What's more, the only two Connecticut sectors below trend in 2000-Q4 were wholesale trade at 98.9 and—surprise again—services at 98.1. For the U.S., by contrast, every sector except construction and government has a cyclical index below 100.

This recession, anomalously, has dealt a debilitating blow to business services—advertising, direct mail, temporary help, and computer services. In the 1990s this industry was Connecticut's engine of job growth, adding as many as 1,000 jobs per month. Right now, though, service jobs are 10,700 below their long-term trend and dropping by 800 per month. For its part, wholesale trade, 1,000 below trend and 5,500 below a July peak is no doubt reeling from an exceptionally aggressive inventory adjustment process that may now be nearing an end.

Construction jobs, with a trend decline of 100 a month, are now falling by 600 per month—but they're still 9,600 above trend, reaping the residual benefits of the rally in retail construction, UConn 2000 building programs, and the ubiquitous casino expansion projects. (The gaming boom, incidentally, helps boost the state's government index because casino jobs are tallied under that sector's employment totals.) Manufacturing is also holding up comparatively well. Though its long-term job loss rate of 800 per month has accelerated to 1,200, manufacturing jobs are still 20,200 above trend. The sector added jobs in the late 1990s as precision manufacturing flourished. The state's concentration in transportation equipment, with its long production lead times, has helped steady this sector in recent days while fueling the state's exports besides. Also, manufacturers that serve the construction industry—making elevators, cooling systems, and the like—benefit from that industry's strength. And though the national weakness in civilian aviation will assuredly hurt Connecticut manufacturing down the road, defense-related manufacturers will likely receive a boost from the growing Federal military budget.

Prognosis

Neither construction nor manufacturing will emerge from this recession unscathed. But at current rates of decline, it would take until April of next year before construction job totals dropped below trend, and three years more for the same to happen to manufacturing, making it unlikely that either sector will plunge that far during the current slump. The relative strength of the goods-producing sectors perhaps says more about how weak they already were going into the downturn than it does about any potential renewed vitality. But it may also mean that the worst is finally over for two beleaguered industries. We don't need correlation coefficients to tell us that the economy has undergone a fundamental transformation from a goods producing economy to a services producing one. The evidence is all around us. But the consequence of that revolution is that when a cyclical downswing ultimately does arrive, it takes the form of a service-economy recession.

Compared to the Services, Manufacturing is Riding High