Duke professor's new model to gauge GNP draws attention

Financial Briefs

A 31-year-old professor at Duke University's Fuqua School of Business has developed a simple economic forecast model that has been found to be as accurate as some of the more popular commercial forecasting services used by the federal government and large investment firms.

Dr. Campbell Harvey's model, which predicted the past four recessions, is simple when compared with Data Resources Inc.'s model, a popular method that uses hundreds of formulas and variables to estimate the nation's Gross National Product. But Harvey's model is no less accurate. Using data from 1976 to 1985, the model had an absolute error of 1.7 percentage points, which was equal to or better than five of the most widely followed econometric services.

Harvey's model, which is predicting a growth rate of 1.7 percent from the third quarter 1989 to the third quarter 1990, has attracted the attention of economists and media. Business writer Leonard Silk mentioned Harvey and his model in two of his columns in *The New York Times*, and Harvey said that during a recent trip to Europe he learned that many of the major papers there had published articles about the model.

"People are really drawn to it because it works off of intuition and is so simple," he said.

In short, Harvey uses the difference between the yields of short-term and long-term government bills and bonds to forecast changes in the GNP. His model is based on the assumption that people tend to sell short-term government bills to buy longer term bonds if they believe a recession is imminent, and vice versa. The buy-sell exchange causes the yield on short-term bills to increase as demand drops. The yield for long-term bonds begins to decrease as demand for those securities rises.

Harvey measures the spread between the yields and then multiplies the difference with a risk factor. The subsequent number is scaled to smooth out aberrations. A detailed article on the method appears in the September issue of *Financial Analysts Journal*.

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Unexpected losses: Slower sales growth has caused PuriDyne Inc., a Raleigh-based manufacturer of air purifiers, to post a larger than expected loss in the company's second quarter.

For the quarter ended June 30, PuriDyne reported a loss of almost $317,000, or 7 cents a share, compared with a loss of almost $209,000, or 8 cents a share, a year earlier. (In the first two quarters, convertible bonds were exchanged for about 687,000 shares of common stock, increasing the number of shares outstanding and creating the difference between the per-share results in the second quarters of 1988 and 1989.)

Company officials had estimated second-quarter earnings to improve from last year, but sales in May and June, while up 11 percent from the first quarter, were lower than expected. Revenues totaled $1.94 million vs. $1.73 million in the first quarter. "We had expected sales to continue a stronger growth rate," said Bob Strong, director of operations at PuriDyne.

PuriDyne's air purifiers, which use a grapefruit derivative to remove mildew, molds, bacteria and yeast from the air, are sold mostly by word of mouth through a network of the distributors using a strategy called multi-level marketing, and Strong said that these types of sales typically drop off during the summer.

In reaction to the second quarter's larger loss, PuriDyne's stock was cut in half, dropping from a bid price of $1½ three weeks ago to 75 cents last week. □

— *Allan Holmes*

CCB makes a point in Southern banking

Central Carolina Bank and Trust Company is attracting some notoriety for never having attracted any notoriety.

The Durham-based bank is one of the "five best banks you've never heard of," according to the editors of *Southpoint* magazine, a new monthly publication covering the South. In the October issue, the magazine listed five small Southern banks that have shown better than average growth and stability. Besides CCB, the list includes National Commerce Bancorp in Memphis, Tenn.; Hibernia Corporation in New Orleans; SouthTrust Corporation in Birmingham, Ala. (where *Southpoint* is based); and First Virginia Banks Inc. in Falls Church, Va.

The magazine's business editor, John Helyar, who is a former deputy bureau chief for *The Wall Street Journal*, said CCB's growth rate in earnings — which he placed at 20 percent — over the past five years and its "local knowledge and local contacts that super-regional competitors just can't import" make CCB "a reliable bet."

It doesn't matter that CCB's five-year growth rate is really 15 percent, says CCB Controller W. Harold Parker Jr. "We're still glad and flattered to be singled out like that." □

— *Allan Holmes*