

Productivity and the Job Market

December 3, 2008, 11:02 am

By [Bob McTeer](#)

Bob McTeer is a former president of the Federal Reserve Bank of Dallas.

As the recession deepens, unemployment will continue to rise. How far it will rise largely depends on how much spending by consumers, businesses and the government slows — since demand for products affects whether companies expand or shrink their payrolls — and on how many people join or leave the labor force.

Another factor affecting employment will be changes in [labor productivity](#), a quarterly measure that [came out today](#). Productivity had a significant influence on employment changes and monetary policy during the 2001 recession and the 2002-03 recovery, and may do so again this time around.

The term labor productivity refers to how much a worker can produce in a given hour. A worker who can make 10 shoes in an hour, for example, has a higher labor productivity level than a worker who can make only 4 shoes in the same period. Rising productivity over time means a higher standard of living since a labor force of a given size or growth rate produces more and more goods and services.

Higher productivity is a double-edged sword. On the one hand, it makes it cheaper for companies to make their products, which can translate to lower prices for consumers. On the other hand, it means fewer workers are needed to complete the same task, so it can reduce employment, absent other factors.

In other words, employment growth and productivity growth are complementary and potential substitutes for each other in driving a country's economy. Slower productivity growth allows employment to decline less during recessions and grow faster during recoveries. Faster productivity growth causes employment to decline more during recessions and rise less during recoveries.

Sometimes, though, both high productivity growth and high employment coincide. In the 1990s, rapid productivity growth and increasing employment co-existed, joining forces to create an economic boom while prices remained remarkably stable. This happened because faster productivity growth enabled employers to pay higher wages without a comparable increase in the cost of the products they sold. By boosting the real growth capacity of the economy, it also

meant that the Federal Reserve could permit interest rates to be lower and the money supply to grow more rapidly without triggering a rise in inflation.

Most measures of productivity growth during the late 1990s increased substantially compared to their levels over the previous two decades, and, remarkably, remained elevated through 2004. During the 2001 recession year, nonfarm business productivity increased a healthy 2.5 percent; in the recovery year of 2002, it grew 4.1 percent, the highest annual productivity growth rate since 1992. Productivity growth was even higher in the manufacturing sector, where recessions are typically concentrated.

Recovery began in November 2001, but, after a few months, unemployment started rising again even as real gross domestic product continued to expand. This anomaly came to be known as the “jobless recovery.”

(Aside: I referred to this in a limerick during a 2003 speech to the Forecasters Club of New York:

*The recovery is almost two years old
Maybe it was oversold
We made the discovery
It's a jobless recovery
It wins the silver but not the gold.)*

In recent years productivity growth has slowed somewhat, dipping to just 1 percent in 2006. According to the [government report released today](#), nonfarm business sector productivity grew at an annual rate of 1.3 percent in the third quarter of this year, down from the 3.6 percent growth rate in the second quarter.

By the way, it's important to realize that the relationship I've described is based not on the level or rate of productivity growth, but on the *change* in the rate of productivity growth (the “second derivative,” as the former Fed chairman Alan Greenspan emphasized repeatedly in Federal Open Market Committee meetings).

The implications for the current recession are obvious. If other things remain the same, the decline in employment will be larger if productivity growth rises and smaller if it declines.

Fortunately, other things need not remain the same. Policy makers can monitor productivity growth closely and calibrate their policies accordingly.

If productivity picks up, a desirable development for the economy's long-term health, the Fed could respond by leaving interest rates low for a longer period, for example, in its effort to sustain employment growth. On the contrary, if productivity growth slows and reduces the real growth capacity of the economy, the Fed would have to keep a tighter rein on interest rates and money growth to avoid the inflationary impact of too much demand relative to the diminished capacity of the economy.

So we should be rooting for higher productivity, despite its potential effects on employment. The Fed can take steps to mitigate those effects.