

## The Real Thing

### Nashville at the crossroads of a truly “new economy”

During the mid-'90s, it became fashionable among economists and business people to refer to the Internet as creating a “new” economy. Well, if a new economy arrived in 1995, it was gone by 2000.

But actually, it was not a new economy at all. The Internet simply embodied the maturity of our traditional economy, a maturity stemming from acceleration as physical activity was replaced with electronic activity. As the embodiment of all electronic communication (voice, data, video, image, audio, etc.), the Internet signaled the culmination of a trend that began with the telegraph more than 150 years ago.

When technologies mature, they tend to speed up everything they touch. Thus the dot-coms were simply accelerated versions of the first telegraph companies. What was called the “new Internet economy” then was merely the old economy at hyperspeed.

But a true “new economy” does loom, and Nashville is at its crossroads.

This new economy, which I refer to as the “bioterials economy,” will be driven by cellular, atomic and subatomic research in a whole host of new materials, both organic and inorganic.

This emerging economy is driven by three groups of companies: pharmaceutical, life science and health care companies; established companies transforming themselves from old technologies, such as Monsanto, DuPont, IBM and Hewlett-Packard; and 4,000 or so startup biotech and new materials companies in the United States and around the world.

This new economy is creating an economic boom that will have a greater and more far-reaching impact on the world than did the combined wealth that flowed from industrial and information technologies. Bioterials will impact not just life sciences but most of the agriculture industry and a major portion of manufacturing, as well.

Already, the tiny biotechs (one-third of which have under 50 people and are not yet public) have a market cap that exceeds \$100 billion; revenues that are growing at 16% per year; and expenditures of \$10 billion a year on research and development. Unfortunately, most of these companies are not located in Middle Tennessee. They're generally found in the biotech corridors of Silicon Valley, Boston, Washington, D.C., and Texas.

So how can Nashville play a role in this new economy?

First, we must acknowledge our limits. Nashville is not Silicon Valley, nor is it likely to be. But this new economy is going to have huge implications for many industries in which Nashville does have a stake.

To begin, Nashville is the for-profit health care capital of the country. Life sciences will lead the bioterials revolution. We can build on that.

Next, we are home to some great universities, and this revolution is fueled by human capital. We've got the smarts.

Furthermore, we have a growing, increasingly diverse and entrepreneurial financial community chock-full of new venture capital firms and investment banks.

Nashville even has a budding group of biotech startups. Vanderbilt has created more than half-a-dozen companies, and others are forming in life sciences and bio-agriculture.

A biotech interest group was started recently to bring together biotech entrepreneurs with the necessary supporting cast of lawyers, accountants and managers.

Finally, one of Nashville's traditional assets will still come very much into play: Positioned close to the geographic center of the country, our city functions as a crossroads for much of the physical transportation of those goods that are the lifeblood of the “old” economy. Regardless of its technological advances, a bioterials economy will still rely at some point on the physical movement of goods and people.

Nashville has the opportunity to be at the crossroads of the next economic and technological era. It's already started. Let's not miss it.