Innovation Provides the Path Forward for Recovery

The economy is ramping up — great news for everyone, especially those in industries that have been hit hard by the pandemic.

Still, as our recovery kicks into its next phase, the big questions remain: How do we bolster the resiliency of our economy and prepare for future uncertainty? How do we develop a workforce and build companies that have the potential to drive lasting, inclusive growth?

The answer is clear: by leaning into innovation.

For years, New York State has been investing in and building out its innovation infrastructure — a robust, statewide network that provides innovators, entrepreneurs, and business leaders with access to the support they need to solve challenges and keep growing, even during periods of downturn and recovery.

Empire State Development's Division of Science, Technology and Innovation, known as NYSTAR, connects and supports each of the assets within that network. NYSTAR oversees funding for university research centers and provides assistance to businesses. Every year, more than 70 NYSTAR-funded centers deploy more than $50 million in funding to generate technology-driven economic growth. The CNY Biotech Accelerator is an important part of this NYSTAR-backed network of centers.

Just as our state’s transportation-infrastructure network has various critical assets — highways, airports, and train stations — that each fulfill an important need, so too does our innovation infrastructure. Centers for Advanced Technology, New York Manufacturing Extension Partnership Centers, Centers of Excellence, Innovation Hotspots, and Certified Business Incubators are the assets that will provide the backbone of our economy during this rebound and into the future.

Finding solutions together

Collaboration fosters innovation. From Bishop and Varma’s discovery of oncogenes to Pfizer and BioNTech’s dash to produce a COVID-19 vaccine, some of society’s most important advancements have come from teamwork.

Organizations that find space for inventive, cooperative initiatives are laying the groundwork for sustained success — and are setting up their communities for a strong rebound. There are dozens of examples alone within the NYSTAR network, which forges partnerships with university researchers, innovation-support resources, and private industry.

At the CNY Biotech Accelerator, we are helping Quadrant Biosciences team up with top academic institutions, medical researchers and engineers to develop incredible advancements in medical diagnostics by integrating genetic and epigenetic sequencing with advanced AI technologies. Quadrant’s recent innovations include the world’s first molecular test to facilitate the early diagnosis of autism spectrum disorder. The test, Clarifi ASD, has received Breakthrough Device Designation, a special FDA program that will fast-track its development, assessment and review.

Quadrant Biosciences — and other companies supported by the NYSTAR network — are key to our state’s continued economic competitiveness. The CNY Biotech Accelerator is one of nearly two dozen NYSTAR-certified business incubators that support early-stage companies with a variety of critical resources to help them break through; these programs helped to create or retain almost 600 jobs in the latest data available.

Invention amid crisis

Even during the pandemic’s most challenging moments, centers within the NYSTAR network continued to push forward with new research and technology development — the type of work that generates innovation-led economic growth.

Several of our companies at the CNY Biotech Accelerator have been at the forefront of COVID-era breakthroughs. Having developed the most-sensitive, FDA-authorized COVID-19 saliva test available in the United States, Quadrant Biosciences played a pivotal role in detect-
tion and, by extension, helped keep our economy running.

Vita Innovations, one of the participants in our Medical Device Innovation Challenge, is creating a “smart mask” that will monitor vital signs for patients in waiting-room hospitals as a solution to emergency-room overcrowding. Vita is also working with the New York State Science & Technology Law Center (NYSTLC) at Syracuse University — another NYSTAR-backed organization — which helps entrepreneurs and high-tech companies identify potential challenges and devise strategies to bring technologies to market. Delivering “innovation through law,” NYSTLC provides legal research, education, and information to help commercialize new technologies — about 60 projects a year.

Somewhat counterintuitively, global economic crises often generate more innovation. Necessity is, after all, the mother of invention. The CNY Biotech Accelerator — and our colleagues at NYSTAR’s centers around the state — are doing our part to create products, jobs, and even some buzz around those ideas.

That work will be on display Oct. 28 at the CNY Biotech Accelerator event “Promoting Tech Innovation in Upstate New York,” featuring keynote speaker Dr. Robert Atkinson, one of the country’s foremost thinkers on innovation economics and lead author of the Brookings Institute report “The case for growth centers: How to spread tech innovation across America.” We’re excited to showcase how innovation truly is the path forward.

New York state’s recovery won’t be without its challenges. But it also provides unprecedented promise. If we’re willing to double down on innovation, we can build a stronger, more resilient economy that creates new opportunities for all.

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