# Arizona's Bioscience Roadmap: Progress Report

Q 1-2, 2012

Arizona's Bioscience Roadmap, commissioned and coordinated by the Flinn Foundation since 2002, calls on the state to focus on four strategies to develop a globally competitive bioscience hub. Here are those strategies and selected developments within each during the first half of 2012.

## **Build research infrastructure**

- Banner Alzheimer's Institute, under the leadership of Dr. Eric Reiman, launches a \$100 million clinical trial of an experimental drug that could help to delay or prevent the onset of Alzheimer's disease. The study focuses on members of an extended family of 5,000 in Colombia who are genetically predisposed to the disease. Funding includes \$65 million from biotech giant Genentech, \$16 million from the National Institutes of Health, and more from private donors.
- The City of Phoenix approves plans to work with Mayo Clinic and Arizona State University to develop a biomedical campus in north Phoenix. The move follows a proposal announced by Phoenix Mayor Greg Stanton on his first day in office to form the Desert Ridge BioScience and Technology Collaborative on vast acreage surrounding Mayo Clinic's north Phoenix campus.
- The U.S. Department of Veterans Affairs announces plans to open a 60,000-square-foot regional medical center in Gilbert in 2014.
- In two of the larger federal grants received this year, Arizona State University's Biodesign Institute receives a \$30 million contract from the U.S. Department of Defense to develop a proteomics-based health monitoring chip. Also, TGen will lead a \$4.5 million brain-tumor project funded by the National Institutes of Health.

### **Build critical mass of firms**

- Ultrasound device-maker Ulthera announces plans to establish its global headquarters and bring 100 new jobs to a new location in Mesa. The decision to remain in Arizona was aided by an award from the Arizona Competes Fund, a \$25 million pool administered by the Arizona Commerce Authority, designed to help companies stay in or move to the state.
- Kedem Pharmaceuticals, a Canadian firm, moves its headquarters to Mesa and announces plans to open a laboratory in Scottsdale.
- Several local companies announce plans to expand operations, including Scottsdale-based syringemaker West Pharmaceutical Services, adding 100 positions. Phoenix-based Insys Therapeutics will

more than double its staff of 10 after receiving approval from the Food and Drug Administration for its pain-relieving drug, Subsys. OptumRx, a pharmacy benefits manager, will open a Tucson facility expected to employ 400.

- Heliae, a Gilbert-based algae technology firm, receives \$15 million in funding from one of Asia's wealthiest men, Anthoni Salim. Heliae launched in 2008 as a spinout of ASU with support from Science Foundation Arizona.
- Boston Life Labs, a Phoenix company that specializes in remote monitoring of a patient's vital signs and other medical data, is acquired by billionaire biotech entrepreneur Patrick Soon-Shiong.
- The FDA gives expedited approval of Vismodegib, a new skin-cancer drug first tested at Scottsdale Healthcare through a partnership with TGen.

### Enhance business environment

- A newly passed Arizona law will enhance university research by protecting the intellectual property of companies that contract with universities for clinical trials. Also enacted are two measures to afford algae the same benefits as other agricultural products, positioning Arizona to be a leader in algae research and commercialization.
- The nation's largest privately funded brain-cancer foundation, the Ben and Catherine Ivy Foundation, moves to Scottsdale. Since 2005, the group has contributed more than \$50 million to brain cancer research in the United States and Canada.
- GateWay Community College in Phoenix opens the Center for Entrepreneurial Innovation, a business incubator offering wet-lab space. In Peoria, medical-device incubator BioInspire prepares to open, and in Chandler, the Innovations research and technology incubator announces plans to expand its space by 50 percent.
- BioAccel, a Phoenix-based nonprofit that works to commercialize life-science technologies, announces a \$1.2-million seed fund for biotech startup companies with individual awards up to \$300,000. Winners will be eligible for free or reduced space at the BioInspire incubator.
- The Arizona Commerce Authority launches a \$3 million innovation challenge to spur growth of startup companies. Tucson-based Cancer Prevention Pharmaceuticals is among the six recipients of first-round awards, landing \$229,875.
- Biltmore Angels, a new investor group, is formed by three ASU alumni to fund startup and earlystage high-tech companies in the Phoenix area.

#### Prepare workforce, educate citizens

- The first-annual Arizona SciTech Festival, featuring dozens of festivals, workshops, competitions, and presentations across the state, attracts 200,000 participants over six weeks in February and March, making it one of the largest such festivals in the nation. The event was organized by the Arizona Technology Council, ASU, and Arizona Science Center.
- Science Foundation Arizona launches the Arizona STEM Network to transform the state's educational system for science, technology, engineering and math. The program is bolstered by a \$2.1 million commitment from Phoenix-based Freeport-McMoRan Copper & Gold Foundation.
- Cancer Treatment Centers of America and Northern Arizona University sign a deal to enable nursing students to train at the company's cancer center in Goodyear.
- NAU prepares to join the Phoenix Biomedical Campus by opening physician-assistant and physicaltherapy programs to be housed in the new Health Sciences Education Building.