

The Eds, Meds and Industry: What's Next for this Critical Partnership?

MassEcon Annual Conference

June 17, 2011



The Massachusetts Innovation Ecosystem

• Key ingredients for the innovation ecosystem:

- Broad and deep knowledge-creating institutions (universities, medical centers, other research institutions)
- Global industry leaders in many technology sectors
- Entrepreneurs and start-up companies
- Investment capital (angel, VC and other) and related expertise (legal, finance, etc.)
- Incubators and institutions to accelerate growth (MIT's Deshpande Center, MA Tech Transfer Center)
- Supportive public sector (innovation focused centers, strategic investments, matching grants)

Productivity of the Commonwealth's Largest Research Institutions (2008)

Research Expenditures	New Licenses Executed	Total Active Licenses	Start-up Companies Created	Licensing Revenue
\$4.35 B	443	3,536	58	\$226 M

Includes:	Boston University	Beth Israel Deaconess Medical Center
	Harvard University	Brigham & Women's Hospital
	MIT	Children's Hospital Boston
	UMass	Dana-Farber Cancer Institute
		MGH



New Trends Emerging

- From centralized corporate R&D to new kinds of industry/ university collaborations
- From universities as independent actors to multi-institutional partnerships for building infrastructure and attracting research funding
- From a primary focus on a traditional, disciplinary-focused academic research agenda to one which also emphasizes multidisciplinary problems and translation through applied research, product development, and commercialization and use



Pfizer Global Centers for Therapeutic Collaboration

\$100M investment over five years

- New collaboration model for drug discovery and development
- Partners include Beth Israel Deaconess Medical Center, Boston University, Children's Hospital Boston, Harvard University, Partners HealthCare, Tufts Medical Center, Tufts University and the UMass Medical School
- Boston is third U.S. site (San Francisco and New York), with international sites to be added in 2012



Massachusetts Green High Performance Computing Center

- Joint venture between UMass, MIT, Harvard, Boston U. and Northeastern to build a shared high performance computing center in Holyoke, MA (\$95M construction cost)
- Financial partners include the Commonwealth, Cisco and EMC
- Center will expand computing infrastructure for universities, promote research collaborations and industry partnerships
- Will also catalyze regional economic growth and enable a range of education partnerships in K-12 and with Springfield Tech and Holyoke Community College



UMass Innovation Institute

- A new vehicle at UMass to create capabilities in applied research, and enable development of new and innovative products and services
- Increases opportunities for external support and more efficiently and effectively moves research to commercialization and societal use
- Multidisciplinary in focus and complementary to academic research programs – especially UMass core strengths such as materials science, information technology and clean energy
- Launched as a pilot project at UMass Amherst with intent of expanding across system over time



- David Bokoler, IBM Distinguished Engineer and Chief Technology Officer, Emerging Internet Technologies, IBM Software Group
- Mark Rice, Dean, School of Business, WPI
- Ira Rubenzahl, President, Springfield Technical Community College
- Susan Windham-Banister, President, Massachusetts Life Sciences Center
- Jack Wilson, President, UMass (moderator)

