

**Maryland Life Sciences Advisory Board**

**MEETING OF THE BOARD**

**Chair: Tom Watkins  
President & CEO  
Human Genome Sciences**


**January 8, 2009**

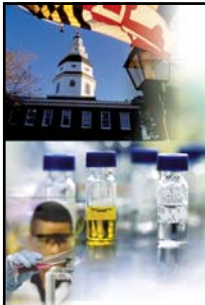
**World Trade Center Institute  
Baltimore, MD**



**Maryland Life Sciences Advisory Board**

**Call to Order/Roll Call  
Chairman's Welcome  
Agenda Review**


  
LSAB January 8, 2009




## LSAB MEETING AGENDA

Thursday, January 8, 2009

9:30 a.m. – 10:00 a.m.	<b>LSAB Call to Order/Roll Call</b> <b>Chairman’s Welcome</b> <b>Agenda Review</b> <b>Minutes/LSAB October 29</b>	Tom Watkins
10:00 a.m. – 10:30 a.m.	<b>LSAB Progress to Date</b>	Tom Watkins
10:30 a.m. – 11:00 a.m.	<b>FY 2010 Legislative/Fiscal Outlook</b>	David Edgerley
11:00 a.m. – 11:05 a.m.	<b>Proposed Executive Closed Session (Vote of LSAB)</b>	
11:05 a.m. – 11:15 a.m.	<b>Break</b>	
11:15 a.m. – 2:30 p.m.	<b>Executive Closed Session</b>	
2:30 p.m.	<b>Adjourn</b>	




LSAB January 8, 2009



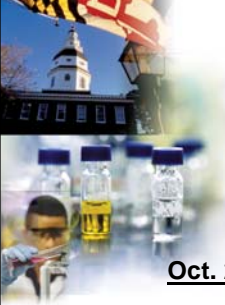
## Maryland Life Sciences Advisory Board

### LSAB Progress to Date

Tom Watkins



LSAB January 8, 2009




## LSAB Progress to Date

**May 2007:** Maryland LSAB created.

**Sept. 2007:** LSAB Board Members announced. Public information website created on [www.choosemaryland.org](http://www.choosemaryland.org)


**Oct. 2007 – Jan. 2009:**

- Seven public meetings of the LSAB to date
- Location reach: HGS, UMCP, UMB, UMBC, Montgomery College, BARC, USAMRIID
- Inputs: Seven focus working groups (>60 involved) and two public forums (> 100 attended)
- Battelle consultancy engagement
- MD competitive assessment/core competency scan
- LSAB strategic framework/recommendations for policy action
- 2007/2008 reports to Governor and General Assembly
- State Strategic Plan for Bioscience Development nearing final form
- FY 2010 prioritization process initiated



## Overview of Maryland's Competitive Position in the Biosciences

- **Strong by many measures:**
  - Overall bioscience industry employment growing robustly
  - One of the nation's largest bioscience research complexes
    - Notable for its large concentration of federal laboratories
    - Substantial growth in university bioscience research in recent years
    - A talent magnet in biosciences
- **Full potential of Maryland's biosciences base still untapped:**
  - Among the elite states in bioscience industry R&D – but less developed and concentrated in its bioscience industry than peers.
  - Maryland success in the R&D subsector of biosciences holds promise for the future – because the R&D subsector can be viewed as the pipeline for creation and early growth of innovative companies.
- **The biosciences development challenge:**
  - Foster an environment that sustains and leverages Maryland's large and well-established bioscience research complex
  - At the same time, more actively support the progress of product-oriented bioscience R&D companies as they develop and commercialize their products – and grow to become self-sustaining engines of creativity and job growth



## Success in Today's Global Knowledge Economy Requires Finding Your "Niche"

▶ **Similar to private industry, states and regions need to bring a strategic focus in understanding the opportunities that their university and industry base can sustain and leverage**

- The industry, university and federal labs base should be viewed as a portfolio of core competencies that can be linked to market opportunities.
- Recognize that not all regions are built alike ... **It is the differences that can best define how a region can succeed** in technology-based economic development.
- Efforts should primarily be focused in specific areas of technology development where a region has a comparative advantage
  - Plant and life sciences in St. Louis
  - Vaccines & global health for Georgia
  - Applied personalized medicine for Arizona

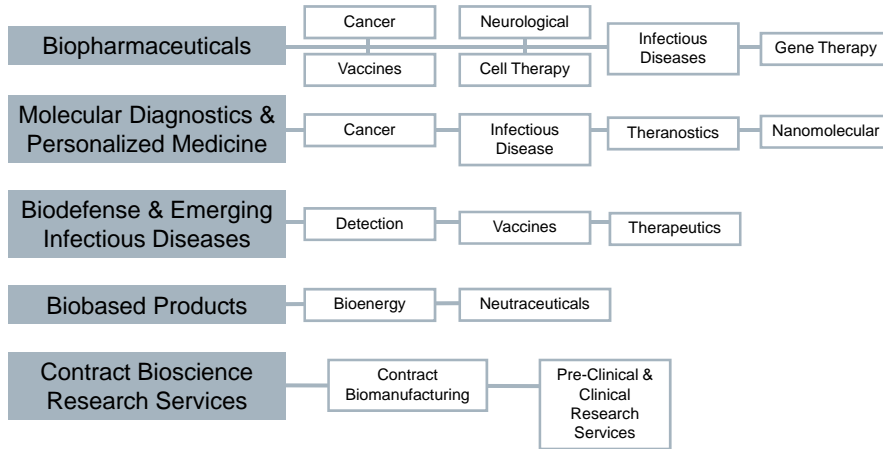


## 19 Specific Core Competency Areas Identified in Biosciences for Maryland

- **Eleven of the core competencies involve disease and bio-based product applications:**
  - Aging Research
  - Asthma & Respiratory Disorders
  - Cancer & Oncology
  - Cardiology & Cardiovascular Systems
  - Diabetes & Metabolic Disorders
  - Ecological Sustainability & Ecosystem Management
  - Food, Agricultural Sciences & Bioenergy
  - Infectious Diseases
  - Maternal & Infant Health
  - Neurosciences (including neurological disorders)
  - Stem Cell Biology/Regenerative Medicine
- **Eight of the core competencies are in more cross-cutting areas** representing broad areas of research that underpin or are supportive of multiple fields:
  - Bioengineering/Biomedical Engineering
  - Bioinformatics & Biostatistics
  - Genetics & Genomics
  - Immunology
  - Molecular & Cellular Biology
  - Pharmacology/Pharmaceutical Sciences
  - Structural Biology/Biochemistry
  - Systems Biology & Biophysics



# Technology Platforms



## LSAB Vision Statement

***By 2020, Maryland will be globally renowned for its ability to translate its world-class bioscience research complex into viable and highly regarded product-oriented bioscience companies that establish new industry strengths in therapeutics, diagnostics and innovative bio-based products.***

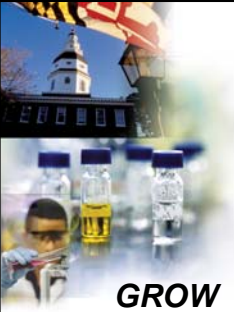
***Maryland will continue to sustain its leading bioscience research complex and, through strategic investments and innovative programs, leverage the discoveries and talent it generates to create a high quality environment for the accelerated growth and success of bioscience companies in Maryland.***

***Maryland will be clearly recognized as one of the top tier states highly specialized in overall biosciences development.***



## Strategic Priorities

1. Ensure the sustained growth and future competitiveness of Maryland's bioscience industry.
2. Support the creation and growth of innovative bioscience companies by ensuring access to capital.
3. Position Maryland for global leadership by building on established and emerging core competencies.
4. Advance bioscience talent generation and workforce development.



### MARYLAND BIO 2020 INITIATIVE

- Establish the Maryland Biotechnology Center
- Expand and Improve the Maryland Biotechnology Investment Tax Credit
- Grow Maryland's Technology Incubator Network
- Increase Intellectual Property Valuation and Protection Services (USM Law School/MBC)
- Increase Technology Transfer Funding
- Enhance Maryland's Venture Funds


**GROW**

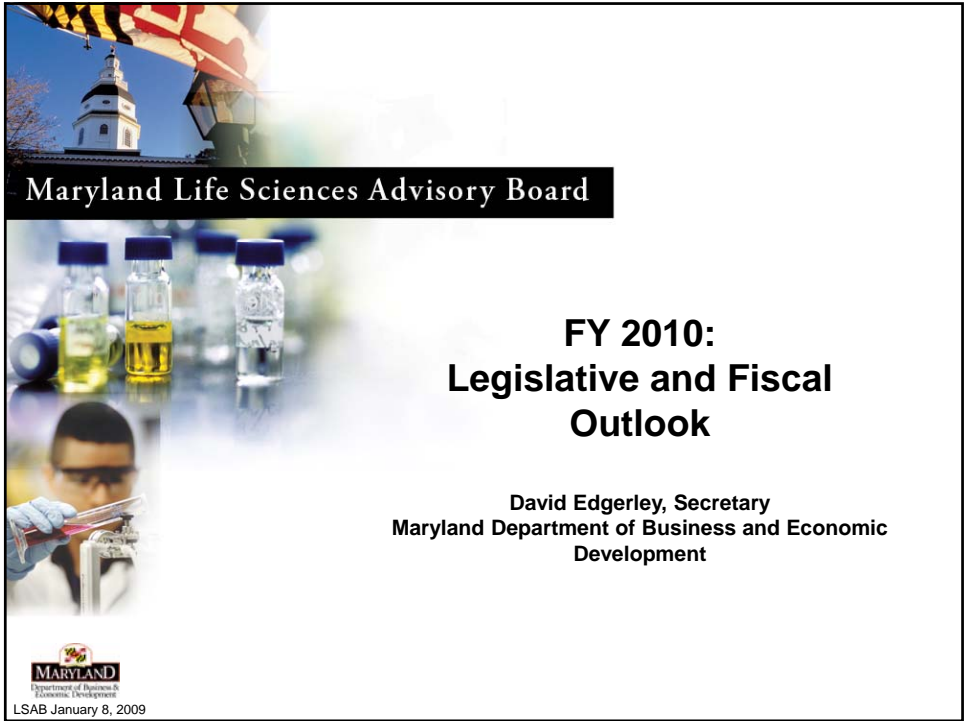
- Make New Investments in Science, Research and Technology Initiatives
- Increase Development Funds for Life Science Facilities

**SUSTAIN**

- Continue to Grow Maryland's Nation-Leading Stem Cell Research Fund
- Expand Nanotechnology Investments

**LEAD**






**Maryland Life Sciences Advisory Board**

**FY 2010:  
Legislative and Fiscal  
Outlook**

David Edgerley, Secretary  
Maryland Department of Business and Economic  
Development

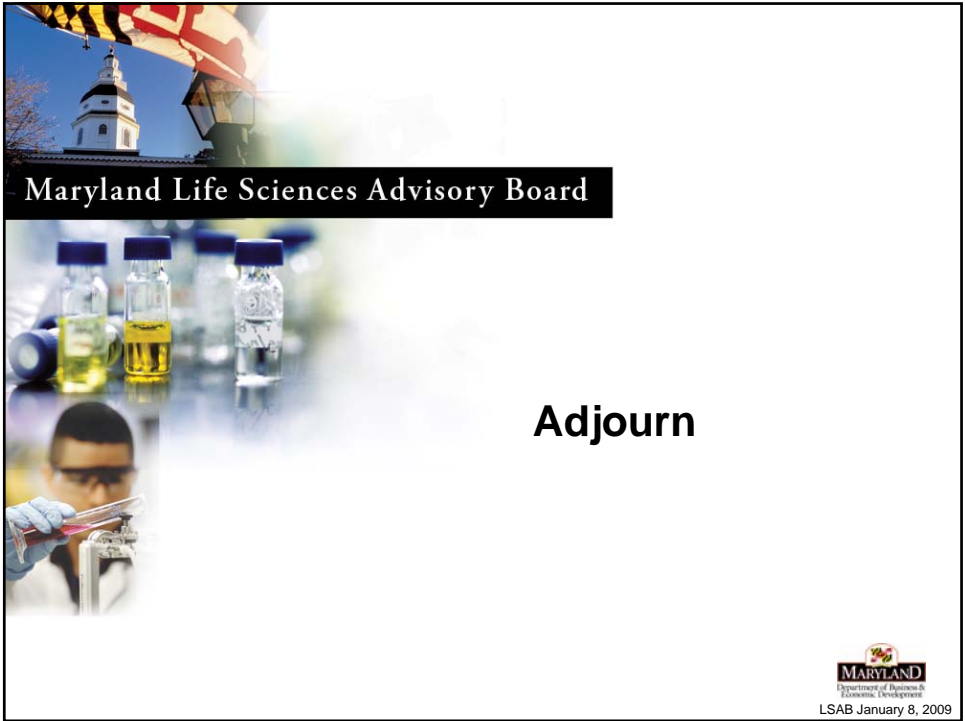
  
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**Proposed Executive  
Closed Session  
Vote of the Board**

  
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**Maryland Life Sciences Advisory Board**

**Adjourn**



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