



Agenda Item 4

UMBC – Strengthening the Entrepreneurial Ecosystem



BOARD OF REGENTS

SUMMARY OF ITEM FOR ACTION
INFORMATION OR DISCUSSION

TOPIC: UMBC – Strengthening the Entrepreneurial Ecosystem (information item)

COMMITTEE: Economic Development and Technology Commercialization

DATE OF COMMITTEE MEETING: June 9, 2016

SUMMARY: The Committee will be briefed on recent initiatives launched at UMBC to strengthen the continuum of support for its entrepreneurs. These initiatives will help to leverage UMBC’s research strengths; enhance partnerships between bwtech@UMBC Research & Technology Park, the Alex Brown Center for Entrepreneurship, and the Office of Technology Development; expedite licensing agreements; connect entrepreneurial faculty with students and promote cultural change; and improve access to entrepreneurs-in-residence, facilities, training programs and workshops.

Notably, with 50 cybersecurity companies, UMBC's business incubator, bwtech@UMBC, has the largest cybersecurity cluster in any university-affiliated research park in the US. UMBC's start-up production was significantly higher this past year. In calendar year 2015, UMBC facilitated the creation of 4 tier 1 companies and 4 tier 2 companies compared with no tier 1 companies and 3 tier 2 companies in the previous calendar year.

ALTERNATIVE(S): This item is for information purposes.

FISCAL IMPACT: This item is for information purposes.

CHANCELLOR’S RECOMMENDATION: This item is for information purposes.

COMMITTEE RECOMMENDATION:

DATE:

BOARD ACTION:

DATE:

SUBMITTED BY: Thomas Sadowski / Suresh Balakrishnan (301) 445-2783



Committee on Economic Development and Technology Commercialization

UMBC – Strengthening the Entrepreneurial Ecosystem

June 9, 2016

RESEARCH AT UMBC



UMBC50
GRIT & GREATNESS

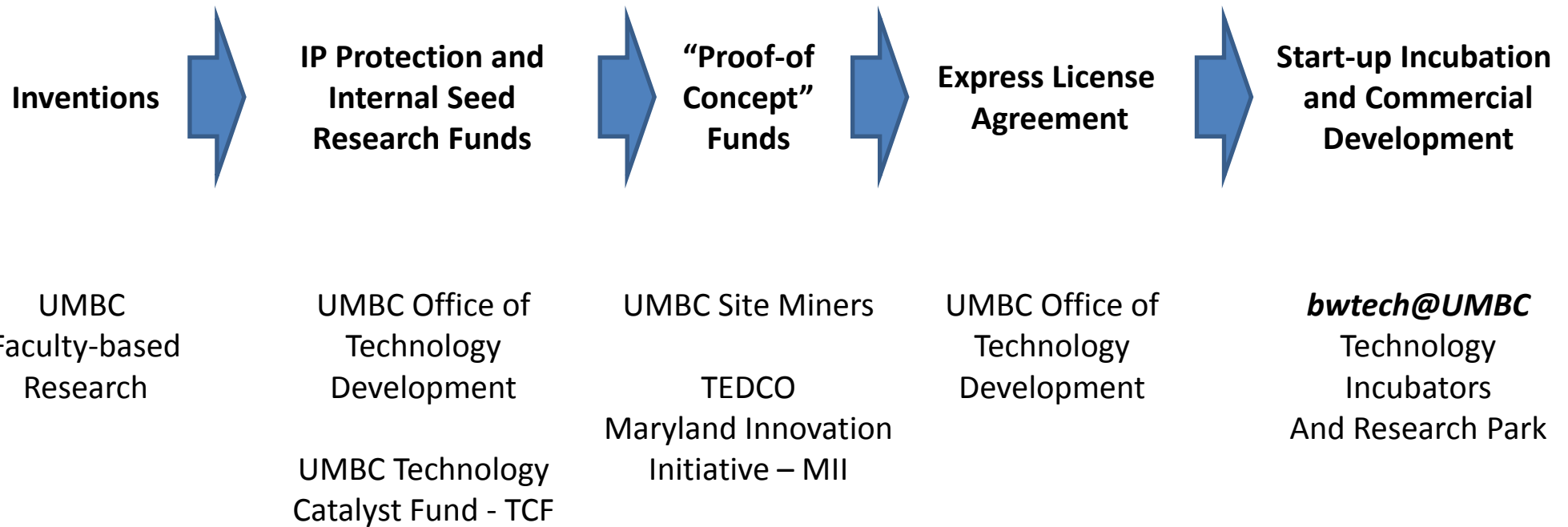
Innovation that Matters

Economic Development Initiatives

UMBC Invests in People, Processes & Ideas

- **People**
 - Technology Manager for the physical sciences
 - Entrepreneur in Residence/Site Miner
- **Processes**
 - Express License Agreement (EXLA) for faculty start-ups
 - University start-up round table meetings
- **Ideas**
 - Technology Catalyst Fund (TCF) to support internal projects to validate solutions and advance innovations towards commercialization.

Continuum of Support for UMBC Entrepreneurs



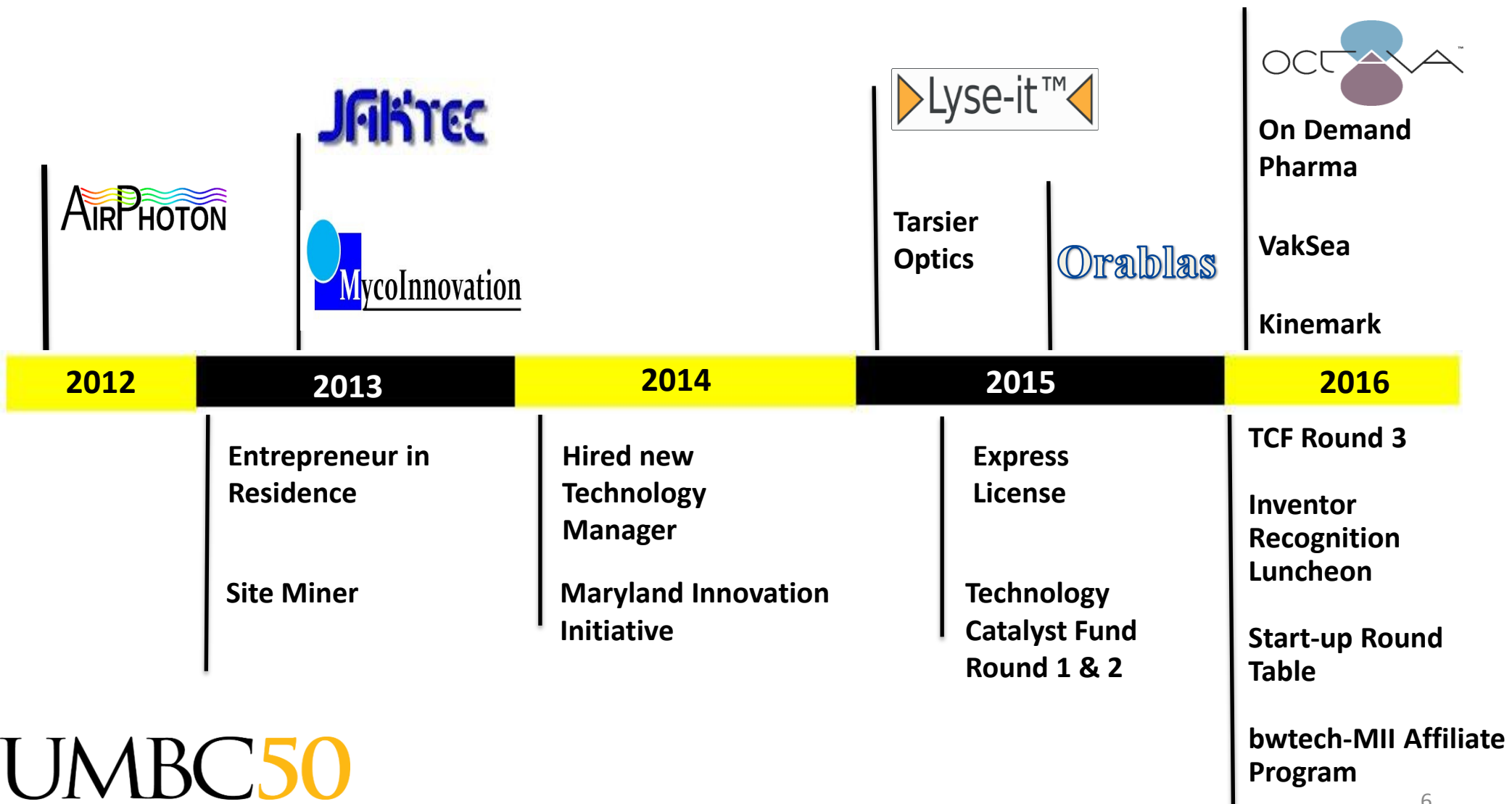
UMBC Technology Catalyst Fund Summary

- **Around \$300K invested in 15 TCF projects in FY15 & FY16**
- **4 of the 10 completed projects have secured additional support**
 - **\$2M from NIH**
 - **\$200k from NSF**
 - **\$100k Phase I MII (New company formation and Phase III in the future)**

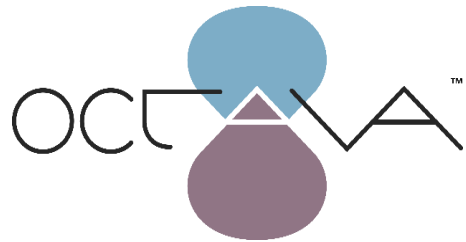
UMBC MII Summary

Projects Submitted (since Nov 2012)	23
Projects Funded	17
Projects with UMBC IP	15
Companies started – UMBC IP	8
MII Funding for UMBC Projects	\$2.28 Million

Results – Start-up Companies Formed (Shown by calendar year)



UMBC Start-ups



UMBC Start-ups Summary

- **Prior to 2012 – UMBC averaged one Start-up every other year**
- **Since 2012 UMBC has launched 10 Start-ups**
- **Five of those Start-ups were formed in FY 16:**
*Kinemark, Octava, Tarsier Optics, VakSea,
On-Demand Pharmaceuticals*
- **Several more are anticipated by the end of the calendar year**

Summary
BOR Committee Presentation
Tentative date June 2016 at UMBC

Overview of Proposed Presentation:

UMBC has established a model for how resource limited universities can create start-ups (as one measure of commercialization success) at rates equal to institutions 5 times larger.

Key aspects of our model:

- *Strong relationship between bwtech@umbc Research & Technology Park & the [Alex Brown Center for Entrepreneurship \(ABCE\)](#), and the [Office of Technology Development \(OTD\)](#), and some small strategic initiatives.*
- *Each (ABCE, OTD & bwtech) supports technology development across all disciplines establishing a continuum of support (see slide 1).*
- *bwtech programs mirror UMBC Research Strengths (Clean Energy, Cyber Security, Life Sciences, & Training)*
- *Site Miner for MII is also part of bwtech with strong relationship with OTD*
- *ABCE connects faculty with students and promotes cultural change*
- *Strategic Initiatives in OTD*

More detail on strategic initiatives of OTD:

UMBC Technology Catalyst Fund ([UMBC TCF](#))

The *Technology Catalyst Fund (TCF)* was established in FY 2014 to provide funding for UMBC faculty to advance their scholarly and research endeavors into commercially viable technologies. As a prep for additional external funding like MII, MIPS, and others, this opportunity, supported by the Office of the Vice President of Research, has the specific goal of advancing innovations originating from UMBC research to more commercially viable technologies. Additional proof-of-concept studies, extending data collection and prototype development are examples of the essential steps needed to demonstrate commercial potential. ([read more](#))

[bwtech@umbc](#) Maryland Innovation Initiative (MII) Affiliate Program

The *Maryland Innovation Initiative* was created as a partnership between the State of Maryland and five Maryland academic research institutions. The program is designed to promote commercialization of research conducted in the partnership universities and to leverage each institution's strengths. Specifically, it is the intent of the program to foster the commercialization of

such technologies through technology validation, market assessment, and the creation of start-up companies in Maryland based on a technology from a participating university.

A new program called the MII Affiliate Program was designed to provide follow-on support to these new start-ups at bwtech@UMBC. It is free for companies with faculty founders. The companies have access to EiRs, facilities, training programs, workshops and a community of over 120 companies at bwtech.

UMBC Express License Agreement (EXLA)

Starting a company based on technology licensed from UMBC has just become easier as a result of the UMBC Express License Agreement (EXLA). EXLA is a standard non-negotiable license agreement aimed exclusively at faculty and graduate student founded startups. Startups are not required to use the EXLA. If chosen otherwise, alternate licensing options may be negotiated. In the coming months, we will be offering a separate Express License Agreement for Software-based technologies.

University Start-up Round Table

UMBC introduced periodic round table meetings for faculty that have started companies, are in the process of starting companies, or who have expressed a desire to start a company. Members have the opportunity to share their best practices and to network with one another. For more information, please visit our [startup resource website](#).