Audit and Compliance Committee Update

Joe Maleszewski, Inspector General and Director of Compliance
October 8, 2014

www.flbog.edu
• Developed by board office staff to monitor corrective actions taken in response to the Auditor General, Inspector General, and other reviews and reports

• Accountability partnership to ensure transparency

• High-level tracking and monitoring

• FAMU corrective action plans are more comprehensive and granular

• Audit Briefing - President Mangum
### Corrective Action Plan Status Summary

<table>
<thead>
<tr>
<th>Area</th>
<th>Issues</th>
<th>Completed</th>
<th>Good Progress</th>
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<tbody>
<tr>
<td>Audit &amp; Compliance</td>
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<td>Finance</td>
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<td>Hazing &amp; Student Code of Conduct</td>
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<tr>
<td><strong>TOTAL</strong></td>
<td>30</td>
<td>29</td>
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Board of Governors
Florida A&M University – CAP Follow-up

- Significant Progress Made
- Follow-up Recommended:
  - Intercollegiate Athletics Program Cash Deficits
  - Permanent and Stable Leadership Team
  - Facilities and Construction – Review Results
- Six-month Reports to the AACC
PBF – 2014 Data Integrity Activities

• **January** – Board Direction to AACC
• **March** – AACC 2-Year Plan
• **March** – Board Processes – University Data Submissions
• **May** – State University Audit Council
• **June** – Data Committee Work Shop
• **June 27th** – Chair’s Letter: Certification and Audit
PBF Data Integrity Certification:

- 11 Representations based on Board Regulations
- Executed by each University President
- Approved by each BOT Chair
- Submitted to the Board by March 1, 2015
University Data Integrity Audit:

• Support Certification

• Scope and Objectives

• Mapping Submission to PBF Metrics

• Deadline - March 1, 2015

• Corrective Action Plans – within 30 days
OIGC Update

- 2013-2014 Annual Report
- Audit Committee Workshop
- Investigations and Audit Specialist – Melanie Yopp
- Other:
  - Certified Inspector General Auditor (CIGA) – Lori Clark
  - Certified Inspector General Investigator (CIGI) – Joe Maleszewski
  - Pursuing Certified Government Audit Professional (CGAP)
  - Pursuing Certified Compliance and Ethics Professional (CCEP)
Performance-Based Funding for Higher Education
A National Trend

In place at two-year institutions
In place at four-year institutions
In place at two-year and four-year institutions
In transition

Source: National Conference of State Legislatures
(http://www.ncsl.org/research/education/performance-funding.aspx)
## Performance Funding Model - Metrics

<table>
<thead>
<tr>
<th>Points</th>
<th>EXCELLENCE (Achieving System Goals)</th>
<th>IMPROVEMENT (Recognizing Annual Improvement)</th>
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<tr>
<td></td>
<td>5</td>
<td>4</td>
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<tr>
<td>1</td>
<td>Percent of Bachelor's Graduates Employed and/or Continuing their Education Further 1 Yr after Graduation</td>
<td>75%</td>
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<td>2</td>
<td>Median Average Full-time Wages of Undergraduates Employed in Florida 1 Yr after Graduation</td>
<td>$40,000</td>
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<td>3</td>
<td>Average Cost per Undergraduate Degree to the Institution</td>
<td>$20,000</td>
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<td>4</td>
<td>Six Year Graduation Rate Full-time and Part-time FTIC</td>
<td>70%</td>
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<td>Academic Progress Rate 2nd Year Retention with GPA Above 2.0</td>
<td>90%</td>
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<td>Bachelor's Degrees Awarded in Areas of Strategic Emphasis (includes STEM)</td>
<td>50%</td>
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<tr>
<td>7</td>
<td>University Access Rate Percent of Undergraduates with a Pell-grant</td>
<td>30%</td>
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<td>8</td>
<td>Graduate Degrees Awarded in Areas of Strategic Emphasis (includes STEM)</td>
<td>50%</td>
</tr>
<tr>
<td>9</td>
<td>Institution-Specific Metrics</td>
<td>Varies by metric</td>
</tr>
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<td>10</td>
<td>Board of Governors choice</td>
<td>Varies by metric</td>
</tr>
<tr>
<td>11</td>
<td>Board of Trustees choice</td>
<td>Varies by metric</td>
</tr>
</tbody>
</table>

[www.flbog.edu](http://www.flbog.edu)
Metric 1: Percent of Bachelor’s Graduates Employed and/or Continuing their Education

WRIS2 Data Sharing Agreement Status

Updated May 2014

Source: US Dept of Labor
Metric 1: Percent of Bachelor’s Graduates Employed and/or Continuing their Education

Suggestion:
- Include graduates that are in the military, federal government, and employed outside of Florida.
- Exclude graduates who have invalid SSNs.

Adjustment:
- *Data is now available from the Department of Economic Opportunity and FETPIP to include military & federal government graduates and graduates employed outside Florida. Benchmarks will be adjusted to reflect new system average.*

<table>
<thead>
<tr>
<th>EXCELLENCE BENCHMARKS</th>
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<th>3pts</th>
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<td>65%</td>
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<td>75%</td>
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<tr>
<td>REVISED</td>
<td>60%</td>
<td>65%</td>
<td>70%</td>
<td>75%</td>
<td>80%</td>
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</table>
Metric 3: Average Cost per Undergraduate Degree

**Suggestion:**

- Modify the benchmark to account for increased costs as additional funds are received.

**Adjustment:**

- Adjust the benchmark based on the new system average after reviewing 2013-14 expenditure data. Expenditure data will be available the end of November.

<table>
<thead>
<tr>
<th>EXCELLENCE BENCHMARKS</th>
<th>1pt</th>
<th>2pts</th>
<th>3pts</th>
<th>4pts</th>
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<tbody>
<tr>
<td>PREVIOUS</td>
<td>$30,000</td>
<td>$27,500</td>
<td>$25,000</td>
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<td>REVISED</td>
<td>TBD</td>
<td>TBD</td>
<td>TBD</td>
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</table>
Suggestion:

- Modify the benchmarks to reflect the inclusion of other degrees in Areas of Strategic Emphasis as approved by the Board of Governors November 2013.

Adjustment:

- This aligns the metric to the new categories for degrees. The revised list included the following disciplines; 113 STEM, 46 Health, 34 Education, 24 Global Competitiveness, and 10 identified in the GAP Analysis (ie. finance, accounting, H.R.).
- The benchmarks reflect the Board’s Strategic Plan and do not need adjusting.
Metric 7: University Access Rate

Suggestion:

• Exclude non-US students since they are not eligible for Pell Grants.

Adjustment:

• Non-US students will be removed from both the numerator and denominator because they typically are not eligible for Pell grants. The benchmarks will not be adjusted.
  • Note: A small percentage of non-US students do receive a Pell grant but these are for special circumstances as detailed by the US Dept. of Education.
Metric 8a: Graduate Degrees Awarded in Areas of Strategic Emphasis (Includes STEM)

Suggestion:

- Modify the definition and benchmarks to reflect the inclusion of other degrees in Areas of Strategic Emphasis as approved by the Board of Governors November 2013.

Adjustment:

- This aligns the metric to the new categories for degrees. The revised list includes the following disciplines; 113 STEM, 46 Health, 34 Education, and 24 Global Competitiveness. The Board is considering changing the 2025 goal, thus the benchmark would need to be adjusted.

<table>
<thead>
<tr>
<th>EXCELLENCE BENCHMARKS</th>
<th>1pt</th>
<th>2pts</th>
<th>3pts</th>
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<tr>
<td>PREVIOUS</td>
<td>30%</td>
<td>35%</td>
<td>40%</td>
<td>45%</td>
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<tr>
<td>REVISED</td>
<td>40%</td>
<td>45%</td>
<td>50%</td>
<td>55%</td>
<td>60%</td>
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Metric 9: National Ranking for NCF

Suggestion:

• Adjust the definition of this metric to add another national ranking.

Adjustment:

• Add Fiske Guide.
• Benchmarks will not need adjusting.
Metric 9: National Ranking for NCF

List:
1. QS World University Ranking
2. Times Higher Education World University Ranking
3. Academic Ranking of World University
4. Center for Measuring University Performance
5. Princeton Review
6. Kiplinger Best College Value
10. Washington Monthly: Liberal Arts Colleges
12. Forbes
13. Fiske Guide to Colleges
USF – Morsani College of Medicine - $17.0M

Building Specifications:
- 142,000 gsf
- 94,000 nsf
  - 79,000 nsf Teaching Space
  - 15,000 nsf Offices and Student Support
State Supported in the Current Fiscal Year

We are very grateful to have received a $5 million appropriation to begin this project from the 2014 Legislature with Governor Scott’s approval.

This facility will help accommodate growing programmatic needs in order to address healthcare workforce shortages in the state.

Total State Funds Received by USF to Date = $5M

**FY 15/16 Requested Amount = $17M**

Total Project Construction Cost = $62M

Privately Supported

USF is extremely grateful to have received a gift of $20 million from Carol and Frank Morsani to support this project.
Existing College of Medicine Facilities at USF

- **Aging plant:**
  - A dated 40-year-old facility complex.
  - The building’s Facility Condition Index (FCI) value, which is a ratio of facility discrepancies and plant replacement value, is > 0.10. This value is considered poor by the National Association of College and University Business Officers.
  - Teaching in a 1970’s facility is not conducive to the newer modes of team-based learning and evolving 21st Century-medicine that today’s workforce demands.

- **Enrollment Growth:**
  - The construction of this new facility would not only provide a better space to train new physicians, but also free up existing College of Medicine space to allow USF Health to expand enrollment and offerings in other key healthcare workforce shortage areas, such as Nursing.
Enrollment Growth

- Due to significant enrollment growth to date, new space is needed for program expansion.
- With this new facility, USF Health can grow enrollment by nearly 2,500 additional students per year by 2019, an increase of nearly 1,500 students more than would be possible without new space.
DEMAND METRICS

➢ To support Critical Workforce Development in Florida, the number of science and health professional graduates needs to increase:
  ▪ Nursing – Current enrollment exceeds 2,000 students and will not be able to accommodate further growth without additional space.
  ▪ PharmD – 400 new students (AY17)
  ▪ Occupational Therapy – 100+ new students (planning stages)
  ▪ Athletic Training - 15.0 new FTE
  ▪ Physician Assistant – 98 new students (pending ARC-PA approval)

➢ Student demand has been tremendous in the healthcare fields:
  ▪ Nursing had 431 qualified applicants to the pre-licensure nursing program; 331 qualified applicants were denied entrance or 77% turned away (fall 2014)
  ▪ DPT has experienced an exponential growth in their applicant pool since implementation of the DPT degree in AY 2006.
    – More than 1,100 applicants for 48 slots in the 2017 DPT class
    – Currently more than 1,000 applicants in process for the 48 slots of 2018’s DPT class

The PharmD program currently has an application ratio of 8:1
Return on Investment

- Supports student success and economic growth:
  - Provides a modern learning space for rapidly changing health education fields
  - Improves access to various health careers for more students
  - Expands training facilities to support learning outcomes
  - Increases graduation of trained professionals

- Maintains and Improves National Rankings:
  - DPT - currently ranked 63rd on the USN&WR Ranking of more than 215 accredited Physical Therapy Programs in the United States
  - PharmD - just entered the top 50 nationally (out of 133 schools) in research funding
  - Nursing - has been ranked in the top 30 nationwide for the last five years in NIH research

- Philanthropy
  - A gift of $20M was made by Carol and Frank Morsani to the project with additional gifts projected if the state support continues.
REQUEST
Total project budget: $62.0 M
Appropriated and Approved by Gov. Scott in FY 2014-15 $5.0M
Amount Requested for FY 2015-16 $17.0M

Plant Operations and Maintenance (Annual Estimate): $2,107,413
USFSP – Kate Tiedemann College of Business $12.3 M
State Supported for the Past Two Fiscal Years

We are very grateful to have received appropriations to construct this project from the Legislature—approved by Governor Scott—in each of the past two fiscal years.

This year’s request of $12.3 million, if appropriated, will provide the final funds necessary to complete construction of the building.

Total State Funds Received by USF to Date = $15M
Total Private Funds Received by USF to Date = $2M
**FY 15/16 Requested Amount to Complete Construction = $12.3M**
Total Project Construction Cost = $29.3M

Private Support

We are also very grateful to have received a gift of $10 million from Ms. Kate Tiedemann last month to support the programs of the USFSP College of Business. This gift is restricted to program support and may **not** be used for construction; however, USFSP is raising $2M in additional private funding to contribute towards construction/equip. of the facility.
REQUEST

Total project budget: $29.3M

- Appropriated and Approved by Gov. Scott in FY 2013-14: $5.0M
- Appropriated and Approved by Gov. Scott in FY 2014-15: $10.0M
- Private Funding for Facility Construction/Equip.: $2.0M
- **Requested in FY 2015-16 to Complete Construction**: $12.3M

Plant Operations and Maintenance (Annual Estimate): $755,614

- Anticipated construction start date: March 2015
- Estimated completion date: August 2016
Information About USFSP’s Existing College of Business

✔ USFSP already has an established and well-respected College of Business (est. 2003)
  • This project is designed to provide a facility to house the existing college, expand its current student capacity improve upon its national stature.

✔ USFSP CoB has dual accreditation in Business and Accounting by AACSB International
  • Achieved by only 1 percent of business schools worldwide
  • Awarded 1,814 degrees in last five years

✔ Seven undergraduate majors to meet needs of local and regional economy
  • Accounting, Finance, and Information Systems are areas of strategic importance for Florida
  • Entrepreneurship, Marketing, Management, and Global Business meet local workforce needs
  • 978 students in Fall 2014; Average starting salary of $37,000

✔ MBA degree program
  • Online MBA program currently ranked 91st out of 239 reviewed programs in USN&WR
  • 216 students in Fall 2014; Average starting salary of $68,000

✔ 40 full-time faculty (36 with terminal degrees in their fields)
  • Reside in offices throughout five buildings
Demand Metrics:

- Enhance national standing of the KTCOB and its degree programs
  - Improve ranking of online MBA program from 91 to 60 *US News and World Reports*

- Accelerate annual growth of 5% in undergraduate programs and 9% in the MBA program

- Ensure success of new, distinctive Master’s Degree in Accountancy serving well-paid, undersupplied fields, according to the BOG’s 2013 Access and Attainment Report

- Increase enrollment in areas of strategic importance for Florida
  - Enhance work of TEAm grant for Accounting and Information Systems

- Support emerging Entrepreneurship program and achieve ranking in Princeton Review

- Respond to demands of business community;
  - KTCOB building is the top legislative priority of St. Petersburg Chamber of Commerce

- One of few SUS Business Colleges without a building
Return on Investment:

- Increase the number of graduates in high-paying, strategic areas for the State of Florida by 50% over the next five years
  - Increase undergraduate degrees from 299 per year to 449
  - Increase graduate degrees from 67 per year to 101

- Improve starting salaries of graduates with new facilities such as Accelerator Lab for Entrepreneurship and Trading Center for Finance

- Enhance responsiveness to needs of business community and expand partnerships, e.g., C1 Bank
  - Improve employment opportunities for students

- Encourage fundraising
  - Recent gifts, $10 Million for academic excellence and $100K for cafe, as a direct result of the excitement surrounding this new building
USF – USF Heart Health Institute - $15.8M
State Supported for Three Consecutive Years

We are very grateful to have received appropriations to construct this project from the Legislature—approved by Governor Scott—in each of the past three fiscal years.

This year’s request of $15.8 million, if appropriated, will provide the final funds necessary to complete construction of the building.

Total State Funds Received by USF to Date = $34.4M
FY 15/16 Requested Amount to Complete Construction = $15.8M
Total Project Construction Cost = $50.1M

Local Government Support
We are also very grateful to Hillsborough County for providing a $2M operating grant for cardiovascular research.
Demand Metrics

- There were 787,000 heart disease-related deaths in U.S. in 2010
- Heart disease is the most common cause of death in the U.S., Florida and Tampa Bay
- Diseases have annual direct and indirect costs of $313 billion (compared to $216 billion for cancer and $134 billion for diabetes)
- The new drug and diagnostic pipeline from industry is diminishing;

Return on Investment

- At least $28M/year in research expenditures is anticipated when facility is at full capacity
- Local Economic Growth estimated at $72.8M/year ($2.60 per $1.00 research grants)
- Biotech and health-related companies in close proximity to the facility will promote the public-private model of technology development
- Clinical income growth from physician-scientists - $1M/yr
  - Morsani College of Medicine has already recruited six new cardiologists and five new cardiovascular scientists
Facility Information

- Total planned size of the facility is 100,000 GSF with a PO&M of an estimated $1.9M

- This is a new clinical and research facility which will concentrate on basic and translational research in cardiac disease

- The facility will be in close proximity to USF clinical facilities and will include a blood sample repository for genetic testing, laboratories and office space designed for interdisciplinary collaboration, and spaces to support clinical trial procedures
REQUEST
Total project budget: $50.1 M
- Appropriated and Approved by Gov. Scott in FY 2012-13: $6.9M
- Appropriated and Approved by Gov. Scott in FY 2013-14: $12.5M
- Appropriated and Approved by Gov. Scott in FY 2014-15: $15.0M
- Requested in FY 2015-16 to Complete Construction: $15.8M
Who are we?

- Academic Infrastructure Support Organization (AISO) established by the Florida Board of Governors (BOG) and hosted by the University of South Florida (USF)
- 27 member institution comprised of: SUS, state agencies, public and private educational/research institutions
- **Support** and **provide** underlying technology, equipment, facilities, services, and resources for academic programs and research
**Why are we asking?**

- **Safety:** Survey performed (Jan. 2012) by Redshaw Marine Consulting & Surveys of Seminole, Florida described the R/V Bellows, a *45 year old* vessel as having structural deterioration of steel, essentially *“dying from the inside out”*

- Strengthen the SUS’s competitive position in securing higher levels of R&D investment.

- Impact STEM-focused programs of 23 different universities and institutions and over 5,000 undergraduate and graduate that have utilized *the R/V Bellows* since 2009.

- Floating laboratory that connect SUS students first-hand experience with scientific research and oceanographic equipment, to prepare for the workforce.
Florida Institute of Oceanography (FIO)
Request for New Research Vessel $6M

View: R/V Bellows Forepeak Bulkhead looking aft

Interior of Bellows, Web and Dry lab as well as access to the galley area

Corrosion

View: R/V Bellows Forepeak Bulkhead looking aft std
Return on Florida’s investment?

- Replacement of the R/V Bellows represents a $150,000 per year investment over the 40 year lifespan of a new vessel.

- Approximately $800,000 to $1M/year in revenue. *R/V Bellows* enables members to apply and secure for coastal and ocean based research and monitoring funds through federal (RESTORE Act) and private grants (GoMRI). Estimated $2-3M per year for research, teaching and more.

- Enables the SUS researchers, faculty and students the opportunity to study the ocean and coastal ecosystems to determine the future of Florida’s various industries (i.e. recreational and commercial fisheries, recreational boating and diving, beach-related recreation, tourism, and etc...) collectively over 500,000 jobs and over $13 billion in wages are directly related to the Florida marine industry.

- Increases Florida’s status as a global hub of world-class oceanographic education, research and support.
Florida Institute of Oceanography (FIO)
Request for New Research Vessel $6M

There are significant sources for research funds available to FIO members but we **CANNOT** use these funds to build or purchase a Research Vessel.

Gulf of Mexico Research Initiative Research Board (GoMRI) Commitment of up to $500M over 10 years to fund research programs.

- Florida has 3 of the 8 GoMRI Consortia, who are all FIO members
  1. Florida State University: DEEP-C
     PI: Dr. Eric Chassignet
  2. University South Florida-CMS: C-IMAGE
     • PI: Dr. Steve Murawski
  3. University of Miami: CARTHE
     • PI: Dr. Tamay Özgökmen
- The 3 Consortia received ~$46M from GoMRI Aug. 2011-2014.
- Another 3 years and Approx. ~$110M as consortia compete during the GoMRI grants process
- Additional ~$30M for individual grants will be available through GoMRI in Jan 2015.

**Under the RESTORE Act:**

*Millions* of dollars to flow into the Gulf Coast States providing additional opportunities for SUS faculty and researchers.

**Gulf Coast Restoration Trust Fund**

Directs 80% of Clean Water Act civil fines to:
- Direct Component
- Comprehensive Plan Component
- Spill Impact Component
- NOAA RESTORE Act Science Program
- Centers of Excellence Research Grants Program

**Additional funds are also available from:**
- National Wildlife Federation Trust Fund (NWFTF)
- National Science Academy (NAS)
Summary

- The BOG recommended this project for funding at $6 million during the 2014 Session.

- **Safety concerns:** *R/V Bellows*—45 year old vessel is described as having *structural deterioration of steel*, essentially “dying from the inside out” with combustible materials (i.e. wood & fiberglass) on board which presents a higher fire risk.

- Replacement of the *R/V Bellows* represents a $150,000 per year investment over the 40 year life span of a new vessel. **ROI is over $3M/year.**

- **Platform is needed to strengthen** SUS’s members ability to secure competitive R&D funding.

- Vessel design and construction in Florida, providing *continued employment and revenue flow within Florida’s economy* and shipbuilding industry.

- With the current condition and more frequent hull evaluations and corrective actions, *R/V Bellows* can operate **safely until July 2016**; however hull evaluations will dictate if an earlier decommission will occur.
Facilities Renovation/Upgrade Priorities
University of Florida

Charlie Lane
UF Senior Vice President and Chief Operating Officer
BOG Facilities Committee
October 8, 2014

www.ufl.edu
www.flbog.edu
• Nuclear Sciences Building (Engineering)
• Norman Hall (Education)
• Academic Building (IFAS)
• P.K. Yonge Developmental Research School Phase 2
• SUS High-Density Library Storage Facility
UF Engineering Innovation NEXUS Renovation & Addition to Nuclear Sciences Building $25 M
RETURN ON INVESTMENT (ROI)

✓ Will double engineering startup companies from 5 to 10 per year
✓ Five-year forecast of $4 million increase in industry research funding
✓ $10 million increase in multidisciplinary research funding
✓ Will provide necessary infrastructure and focus to recruit and support high-tech companies in Florida (Engineering Experiment Station)
✓ Will improve state economic competitiveness
✓ Renovations to 50-year old facility and new utility infrastructure core will increase efficiencies and reduce costs
DEMAND METRICS

✓ Projected five-year increase of 300 engineering degrees through retention and recruiting
✓ Will increase STEM research in Biotechnology and Advanced Manufacturing
✓ Facilities to transform engineering education, involving Global Innovation Network of alumni, experts and student/faculty teams in pursuing real-world team approach to innovation
✓ Updating the university’s 50-year old facility will re-purpose existing space, providing for cutting-edge education and research opportunities and increasing the number of students earning engineering degrees
REQUEST
Total project budget: $45M
  Request for 2015-16 $25M
  Request for 2016-17 $20M

✓ Anticipated construction start date: August 2015
✓ Estimated completion date: December 2016
NORMAN HALL REMODELING/CONFERENCE CENTER ADDITION $24.4 M
RETURN ON INVESTMENT (ROI)

- UF COE currently ranked #1 among COEs in Florida; #1 among public institutions in the SEC; UF’s highest-ranked graduate college; #21 among public universities in the nation (top 2% nationally); 5 academic programs ranked in the top 20
- College has $74.4M in active externally-funded research projects
- Reprogramed space will boost capacity for externally-funded research and training
- Renovation to support college in improving national ranking and impact
- Facility would enhance ability to host speakers for research and training seminars/workshops
- Listed on the National Historic Registry, Norman Hall is a cornerstone of UF, and restoration and upgrades will continue legacy and usefulness
RETURN ON INVESTMENT (ROI) CONTINUED

✓ Cost savings from renovation rather than new construction, with existing facility transformed into modern, efficient teaching space
✓ Significant critical deferred maintenance backlog for 82-year-old facility to be eliminated, with renovated facility to comply with all fire code and ADA standards
✓ By virtue of upgraded building envelope – roof, windows, brick repairs, etc. – and mechanical systems, facility will gain significant energy efficiencies and reduced operational costs
DEMAND METRICS

- Constructed as K-12 school in 1934, facility is outdated and hazardous – unsuitable for preparing educators, innovators, and leaders to meet Florida’s educational needs
- The College of Education develops innovations in STEM education and advances technology-assisted instruction to address the needs of all learners across the state
- Current enrollment: 2,800 across 28 undergraduate and graduate academic programs
- Projected enrollment growth: 20% in five years
- Continued growth in externally-funded research measuring 50% increase over past 5 years
- Home to national centers including: Lastinger Center for Learning, Center for Excellence in Early Childhood Studies, Online Learning Institute, Center for Disability Studies & Outreach, Institute for Higher Education, Center for Community Outreach
REQUEST

Total project budget: $24.4M
Request for 2015-16 $8M

- Anticipated construction start date: April 2016
- Estimated completion date: August 2017
RETURN ON INVESTMENT (ROI)

✓ Recovery of more than 3,200 credit hours lost each year due to teaching lab and classroom deficiencies
✓ Creation of quality and efficient research space will greatly enhance competitive recruitment of preeminence faculty
✓ Projected 5-year increase of 200 degrees through increased credit hours, faculty retention, and recruiting
✓ Re-purpose of existing space will provide for cutting-edge education and research opportunities, increasing the number of successful degree-earning students
DEMAND METRICS

✓ Space quality issues – including a need for larger lecture-style classrooms and modern teaching laboratories – limit the type and number of classes now offered
✓ UF departments of horticulture, plant pathology, and environmental horticulture have outgrown space, restricting class selection options, reducing class curriculums, and limiting available class times
✓ Competitive recruitment of preeminence research faculty is severely limited due to lack of quality laboratory space
REQUEST
Total project budget: $15.8M
Request for 2015-16 $8M

✓ Anticipated construction start date: November 2015
✓ Estimated completion date: February 2017
P.K. Yonge Developmental Research School – Phase 2- Middle/High School Facility-$18.7 M
P.K. Yonge Developmental Research School
– Current Problems Caused by Erosion
RETURN ON INVESTMENT (ROI)

✓ 21st Century classroom design concepts combine teaching and collaboration spaces with building circulation, movable walls and furniture, creating optimum space utilization, thereby reducing total building GSF requirements and project cost

✓ A 3-story building which will reduce circulation area by 50%, thus saving construction costs

✓ Contemporary design reduces square footage per student by 34% (from 150 to 99) and also reduces cost per student station by an estimated 28% (from $26,500 average cost to $19,000)

✓ Major fire code, ADA, and space quality issues will be remedied by construction of the new facility

✓ 56 inefficient individual HVAC units will be replaced with one chiller, decreasing operations/maintenance costs by approximately 25%
RETURN ON INVESTMENT (ROI)

✓ Phase 2 design similar to Phase 1 (K-5 facility) completed 1½ years ago which has become a model for the future, receiving statewide and national recognition (Florida counties, Harvard University, George Lucas Foundation Edutopia.org)

✓ New technology-based, integrated, and collaborative learning environment provides opportunities to document, measure, and analyze how changes in architecture and instructional models shift how students think, what they know, and what they can do

✓ Demonstration/training site for Florida educators from over 35 school districts; quickly becoming a national/international destination for those interested in new approaches

✓ Multi-purpose first floor circulation space will host workshops for 500+ educators annually (now held in 15 year old portable)
DEMAND METRICS

✓ The campus provides education opportunities for approximately 1,200 students
✓ Located on 31 acres; 19 buildings/11 portables; site elevations range from 120 – 90 feet above sea level from one end to the other; Tumblin Creek runs west to east through the campus causing erosion issues
✓ October 2007, Department of Education concurred in the need to replace 13 buildings on the campus; Phase 1 addressed some of those facilities; Phase 2 will address other facilities approved by DOE
✓ As the world changes, the pervasive K-12 educational model is outdated and fails to meet the needs of today’s students
DEMAND METRICS:

- P.K. Yonge @ UF is designing and testing *transformative* approaches to K-12 education
- 21st century design concept utilizes flexible neighborhoods each anchored by a highly visible Science, Technology, Engineering and Mathematics (STEM) lab allowing for exploratory learning experiences
- Will facilitate technology-enabled academic learning opportunities
- Sustainable outdoor learning opportunities by incorporating environmental classrooms with “Tumblin Creek” wetlands throughout the site
- PK Yonge is becoming one of Florida’s 1st nationally-ranked high schools with 100% of students graduating STEM college and career ready
REQUEST

Total project budget: $18.7M
Current request $18.7M

✓ Anticipated construction start date: November 2015

✓ Project design scope is currently limited to Design Development; CM has not been selected

✓ Estimated completion date: April 2017
SUS Joint Use Library Storage Facility - Managed by UF
$26.7 M
SUS Joint Use Library Storage Facility - Managed by UF
$26.7 M
RETURN ON INVESTMENT (ROI)

✓ One of the greatest efficiencies the SUS could achieve is the construction of a Joint-Use Library Storage Facility to provide for the de-duplication of certain library holdings across the SUS while freeing up much-needed space on campus for other purposes.

  • Example: UF’s Marston Science Library emptied one floor of low-use materials, with 26,000 square feet of valuable space converted to student-study space that serves over 700 students. This has been a top priority for students.

  • Example: FAU is currently weeding its print journals based on volumes in the shared collection to provide for additional seating space for students.

  • Example: As additional materials are moved to the storage facility, and as renovation funds become available, UF plans to repurpose space in other library facilities for student study space, as will other SUS libraries.

✓ This project is a high-density “Shared Services” facility which will provide archival storage for 5.2M volumes of library materials for benefit of all state universities (12) and state colleges (28).

✓ This project creates opportunities for removal of low circulation books and journals from all SUS libraries while ensuring continued access through the Statewide Library Ground Delivery Service.

✓ Savings are realized because the SUS would need to retain only one hard copy of an item to ensure availability to users throughout the SUS and State College system.
RETURN ON INVESTMENT (ROI)

✓ Operational efficiency is realized per volume due to moving from open stacks to HDF storage (an 80% cost reduction from a national average of $4.26 per volume to $.86 per volume).

✓ Ten years ago, UF spent $30.5M to renovate/increase square footage for Library West, using traditional compact shelving to house a total of 1.7M volumes at a cost of $18 per volume.

✓ By comparison, $26M is requested for the High-Density Joint-Use Library Facility to house 5.2M volumes at a cost of $5 per volume; a 72% improved efficiency in the expenditure of state dollars for facilities.

✓ FSU is currently leasing offsite storage. Once the high-density facility is completed, FSU could transfer some material to the shared collection, resulting in a cost savings for the university.

✓ UCF already eliminated offsite storage at Iron Mountain and it has begun to transfer on campus library materials to the interim storage facility at UF.

✓ USF recently invested in additional compact library shelving which is now completely filled. USF will benefit from the high density storage offered by the new facility.

✓ Over 5.8 million books in SUS campus libraries could be relocated to storage or discarded based on volumes already in storage, allowing an estimated 230,000 square feet to be repurposed for other high demand library services.

✓ Efficiencies result from operating a single shared storage facility versus multiple individual facilities.
DEMAND METRICS

- The SUS shared collection is officially created as the FLorida Academic REpository (FLARE).

- For some books, federal copyright law requires that one print copy must be maintained in order for an electronic copy to be shared across the SUS; this facility would store those print copies.

- Managing relatively low-use, but valuable, print items centrally is consistent with Best Practices developing regionally and nationally.

- An important benefit is that FLARE is an active participant in a regional print archiving initiative with the Association of Southeastern Research Libraries (ASERL) whereby procedures have been implemented to ensure members access to titles retained by other libraries in the Southeast, thus eliminating the need for the SUS to retain every journal.

- The Joint-Use Facility consists of 2 parts: 42,000 GSF of renovated space and 40,000 GSF of new space.

- Originally funded in 2010, design is complete through 100% Construction Documents and all internal and external (GRU, SFM) reviews are complete.

- Anticipated construction start date: August 2015.

- Estimated completion: 18 to 24 months after construction begins.
REQUEST
Total project budget: $26.7M
Prior funding: $2M
Current Request: $18M
Remaining Need: $6.7M

✓ This project is “Shovel Ready.”
New College
58th Street Land Acquisition and Heiser Natural Sciences Addition
State University System of Florida
Board of Governors Facilities Committee Workshop
October 8, 2014
58th Street Land Acquisition

6 Privately-Owned Properties

New College of Florida

FSU

New College of Florida

FSU

New College of Florida

New College of Florida
DEMAND METRICS

- Acquisition recommended in New College Campus Master Plan and Educational Plant Survey to accommodate future student housing growth.

- These six lots are located in the center of and completely surrounded by 161 acres of SUS property. Access to these lots is via 58th Street. This street is owned and maintained by New College.

- Acquisition of all six privately-owned properties will add 2.43 acres. All properties are at or above the 500 year flood zone, an important benefit given the close proximity to Sarasota Bay.
REQUEST

Total Project Budget: $2,190,000
Request for 2015-2016: $320,000
Request for 2016-2017: $320,000
Request for 2017-2018: $400,000
Request for 2018-2019: $350,000
Request for 2019-2020: $800,000
• BOG Strategic Priority: to increase the number of STEM degrees
  No. of STEM Bachelor’s degrees awarded in 2011-12: **45 (20% of total)**
  No. of STEM Bachelor’s degrees awarded in 2012-13: **59 (23% of total)**
  NCF ranks on par with percentages at top SUS Research One universities.

• This project will increase access and success in NCF science and math programs, for STEM and all majors.

• **472 (57%)** of all NCF enrolled students (Fall 2014) are enrolled in at least one STEM course.

• The project is consistent with goals in NCF’s Campus Master Plan, Strategic Plan, Academic Master Plan and Educational Plant Survey.
• This project will create:
  7 New College jobs (estimate)
  63 construction jobs (estimate)

• Fundraising efforts, including building and room naming opportunities are underway.

• Funds raised will be especially helpful in addressing specialized scientific and computational equipment.
Current space lacks research and teaching labs for bioinformatics, molecular biology, earth science, bioorganic chemistry and biology/environmental studies.

Data science and analytics initiative will likely be housed here.

Current space lacks faculty office and lab areas needed to meet increasing student enrollment in STEM laboratory courses.

This new space will be able to accommodate growth for up to:

- **40** students taking **biology courses**
- **60** students taking **chemistry** and
- **60** students in other math and science disciplines.
New Space:
• 21,975 gross/14,650 net square feet.
• 3 large modules, each including: teaching lab, research lab, faculty offices, support space.
• 3 small modules, each including: teaching lab, research lab, faculty offices.
• Support space including: lobby, restrooms, elevator, mechanical, custodial, electrical, IT, data, circulation.
• Anticipated construction start date: April 2016
• Estimated completion date: May 2017
CURRENT REQUEST: $7.4 M

Total Project Budget: $8,100,000

- Prior funding: $655,000
- Current Request: $7,400,000
- Remaining Need: $0

Plant Operations & Maintenance Budget: $346,000
PRESENTATION ON
STUDENT AFFAIRS BUILDING
PRESENTED BY

Dr. William Hudson Jr.
Florida Agricultural and Mechanical University
Photos & Renderings

Current Foote-Hilyer Building
Photos & Renderings

Student Affairs Building
Number of Construction and Permanent Jobs

Student Affairs Building

- **Projected Budget:** $36M
- **Construction Jobs:** 632* (direct, indirect, and induced)
- **Permanent Jobs:** 11
- **Annual Operating Cost:** $869K**

*IMPLAN Software, ARRA & APTA average
**FACILITY “B” - FACILITY CLASSIFICATION FOR ENERGY CONSUMPTION
Specific Goals in Strategic Plan

Student Affairs Building

• Strategic Plan’s “Physical Profile”
• The campus facilities are technologically equipped, environmentally responsible, sustainable, and energy efficient
• The campus facilities have multi-purpose functions that enhance teaching and learning
• The campus facilities are maintained and will promote wellness and safety
Specific Goals in Strategic Plan

Student Affairs Building

*Strategic Plan’s Strategic Initiative 2*

- Strategy 2.3.3: Improve customer relations in serving students.

*Strategic Plan’s Strategic Initiative 3:*

- Goal 3.5: Maintain and enhance functional, culturally relevant, sustainable, environmentally friendly and aesthetically pleasing campus facilities, infrastructure, and resources.

*Work Plan’s Key Initiatives & Investments:*

- Increase the persistence/retention rate of undergraduate students, leading to increased graduation rates.
Dyson Renovation

PRESENTED BY

Dr. Maurice Edington, Dean
College of Science and Technology
Florida Agricultural and Mechanical University
Dyson Renovation - $22.6M
Dyson Renovation - $22.6M

ROI

✓ BOG Strategic Priority to Increase the Number of Degrees Awarded in STEM Disciplines
  • Consistent with the FAMU Work Plan and Strategic Plan
  • Will facilitate increased access and student success in STEM disciplines
  • Will improve FAMU’s position as one of the nation’s top institutions for black science and engineering doctorate recipients

✓ Research and Financial Impact
  • Will increase science and engineering research grants and expenditures and the number of research doctoral degrees awarded
  • Will enhance employment opportunities for graduates

✓ Job Creation
  • An estimate of 391 construction jobs (direct, indirect, and induced) will be created

✓ Fundraising
  • Facilitates increased alignment of FAMU’s research efforts with priorities of industry partners
  • Naming opportunities for classroom and laboratory spaces
Dyson Renovation - $22.6M

DEMAND METRICS

• Building is 42 years old (constructed in 1972)
• 57,500 gross square feet
• CST does not have sufficient office and research laboratory space to support recent and anticipated faculty hires
• The project will create a minimum of 4 Smart Classrooms, 2 teaching laboratories, 8 research laboratories and 15 faculty offices for CST
• The renovated space will house two desperately-needed core research instrumentation facilities in biology and chemistry
• Will house needed CST advisement and academic support offices
• Anticipated construction start date: July 2017
• Estimated completion date: January 2019
Dyson Renovation - $22.6M

**REQUEST**

<table>
<thead>
<tr>
<th>Total project budget:</th>
<th>$22.6 M</th>
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<tr>
<td>Request for 2015-16</td>
<td>$ 1.7 M (Planning/Design)</td>
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<tr>
<td>Request for 2016-17</td>
<td>$18.4 M (Construction)</td>
</tr>
<tr>
<td>Request for 2017-18</td>
<td>$ 2.5 M (Furniture and Equipment)</td>
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</table>
Pharmacy Building Phase II

PRESENTED BY

Kendall Jones, Interim Associate Vice President Construction and Facilities Management

Florida Agricultural and Mechanical University
Number of Construction Jobs

Pharmacy Phase II Building

- **Projected Budget:** $37.5 million
- **Construction Jobs:** 648* (direct, indirect, and induced)

*IMPLAN Software, ARRA & APTA average*
Pharmacy Building Phase II

Current Project Status

- Project funded for planning and construction
- Requested $1.48 million is for furniture and equipment
- Completed offsite and early site phase
- Currently working on foundation/vertical construction phase
- Project substantial completion Spring 2016
“At FAMU, Great Things Are Happening Every Day.”

established 1887
“At FAMU, Great Things Are Happening Every Day.”

established 1887
Laboratory Sciences Annex
**Laboratory Sciences Annex, Ph.I & II, Link Bldgs. 58 & 58A**

<table>
<thead>
<tr>
<th>Description</th>
<th>Details</th>
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<tbody>
<tr>
<td>New Gross Square Feet</td>
<td>37,295</td>
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<tr>
<td>Project Budget</td>
<td>$19,500,000</td>
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<td>Annual P.O.M. Budget</td>
<td>$438,000</td>
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<td>Occupy</td>
<td>January, 2018</td>
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</table>

- Center Atrium – Link Two Current Bldgs.
- Research labs = 10,200 GSF
- Study areas = 1,850 GSF
- Demolish Building 6, Mobile Unit
Laboratory Sciences Annex

**Current Plan for Renovations of Laboratory Science Building 58**

- Received Renovation Phase I funds $11 M in 2014-15 budget

**Contracts and Design phase:**
  - Fall 2014: Design Services Selection
  - Spring 2015: Negotiate Contracts & Program

**Portable Lab installation and Relocation of Labs Phase:**
  - Spring 2015: Tree removal & Utility installation for portable labs
  - Spring 2015: Relocate Faculty/Students to portable labs
  - May 2015: Phase II Renovations funded $13.7 M
  - Estimated cost to install and relocate to portable labs: $3M
    (Portables cost increases without funding for Phase II)

**Renovation Phase:**
  - Fall 2015: Renovation begins
  - Fall 2016: Renovations complete, Faculty and Staff move back in

**Reversion:**
  - January 31, 2017 – Phase I funds subject to reversion
  - January 31, 2018 – Phase II funds subject to reversion

---

**Proposed Alternative Plan to Construct Laboratory Sciences Annex First**

**Funding Re-appropriation**
- Legislative Session 2015: Re-appropriate Phase I Renovation funds from FY 2014-2015 ($11M) to Annex Project FY 2015-2016
- Legislative Session 2015 : Request Funds for Annex Phase II of $8.5 M

**Contracts and Design Phase**
- Fall 2015: Annex Design Services Selection
- Fall 2015: Contract Manager and firm selection
- Winter 2016: Complete Negotiations with Design & Contract firm
- Summer 2016: Completion of the Design for the Annex and Utility Plant Modifications

**Construction Phase**
- Fall 2016: Begin Annex Construction
- Late Fall 2017: Complete Utility Plant Modifications & Annex Construction
- January 2018: Relocate Faculty/Staff to Annex

**Reversion:**
- January 31, 2018: Annex, and Phase II funds subject to reversion
ROI

✓ 1,837 Students Enrolled in Degree Programs (Biology, Chemistry, Marine Biology, Health Sciences, Medical Technology, and Clinical Sciences) that Utilize this Building.

✓ 8% of all UWF Degrees, in 2011-2012, Awarded in Fields Housed in this Building.

✓ Average Starting Salaries:
  ✓ Marine Biologist - $41,400
  ✓ Chemist – $50,500
  ✓ Physical Therapist - $79,900

✓ $5.5 Million in Research Grant Funding in Recent Years for Programs Housed in the Building.
  ✓ Department of Chemistry just received $930,000 NIH grant for 5 year program to support underrepresented students in STEM

✓ More than 4,500 Undergraduate and Graduate Students enrolled in Classes Utilizing Labs in this Building.

DEMAND METRICS

• Constructed in 1972, the building’s HVAC, HVAC controls, plumbing supply piping, electrical infrastructure, and lighting is in poor condition requiring “deck-to-deck” rehabilitation.

• UWF has seen a 77% increase in five years in the number of students taking courses which require the laboratories in the building. (Biology 30%, Chemistry 38%, Health Sciences 612% and Clinical Sciences 91%) These four programs alone total 13.3% of UWF’s student population.

• As these programs grow, additional laboratory space is required to accommodate the increase in STEM students and to provide practical research experience and allow them to progress towards graduation.

• 30% of UWF students are already FULLY ONLINE. These laboratories are necessary for hands on, real-world experiential learning.
This project meets the following BOG Strategic Priorities, Key Performance Indicators and UWF Strategic Plan Goals:

- Increase the number of STEM degrees
- Increase research activity and external support
- Strengthen quality and reputation of research
- Reduction in Average time to degree
- Increase % of undergraduate seniors participating in a research course
- Enhance student access, progression, and learning and development
- Distinctive teaching, scholarship, research and professional contributions
Strategic Land Acquisition
Modesto A. Maidique Campus
Why is the Land Acquisition Needed?

- To meet the needs of the ever-growing South Florida community, FIU is looking at ways to expand its physical space and grow strategically.

- FIU’s main campus is the second smallest in size and has the highest FTE and Headcount per acre.

<table>
<thead>
<tr>
<th>Institution</th>
<th>Acres</th>
<th>Headcount/Acre</th>
<th>FTE/Acre</th>
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<tbody>
<tr>
<td>FIU</td>
<td>342</td>
<td>104</td>
<td>59</td>
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<tr>
<td>UF</td>
<td>2050</td>
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<td>13</td>
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<td>FSU</td>
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<td>92</td>
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<td>FAMU</td>
<td>423</td>
<td>29</td>
<td>18</td>
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<tr>
<td>NCF</td>
<td>119</td>
<td>7</td>
<td>6</td>
</tr>
</tbody>
</table>

- FIU has the highest space utilization rate in the SUS, achieving 160 percent of statutory requirements; has the largest percentage of classes with 30+ students; the smallest percentage of classes with less than 30 students; and has the second highest percentage of classes with 100+ students.
How Will the Funds Be Used?

- Land acquisition funding of $50 million is for 64 acres located contiguous to campus, currently used by the Miami Dade County Fair and Expo; $10 million was appropriated in 2014-15; $40 million remaining

- FIU, Miami-Dade County, and the Fair have been working together since 2010 to develop FIU acquisition and Fair relocation plans

- On September 3, the County Commission approved a MOU establishing a framework for FIU acquisition of the site as well as a resolution for voter approval of the acquisition

- Miami-Dade County voters will consider FIU’s acquisition of the site on the November 4 General Election
What is the Vision for the Land?

- **ACADEMIC AND RESEARCH SPACE**
  - Classrooms; teaching, research and technology labs; faculty and staff offices
  - Emphasis on facilities that support and expand programs in science, technology, engineering and mathematics (STEM)
  - Expansion of research capacity for Medicine, Nursing, Public Health and Social Work

- **INCUBATOR, ENTREPRENEURSHIP AND DATA CENTER**
  - Innovation and entrepreneurship space to focus on community economic development
  - University research incubator
  - Data center to support university research and teaching technology

- **LOWER DIVISION STUDENT HOUSING FACILITIES**
  - 2,000 additional beds with meeting rooms and study space

- **SUPPORT SPACE**
  - Exercise, health, wellness, and recreational facilities for students
  - Food service facilities, student services, and pedestrian pathways and green space
How Will Students and the Community Benefit

- Increase bachelors degrees in STEM
- Increase graduate degrees in STEM
- Increase number of STEM graduates employed in Florida
- Improve student retention and graduate rates through expanded industry partnerships and internships
- Increase research expenditures and jobs
- Increase patents, licenses and start-up companies
Rendering of Fair and Adjacent County Park

FIU is proposing a no-cost-to-the-county relocation of the Miami-Dade County Fair & Expo that will not affect Tamiami Park nor its activities.

Current: Tamiami Park and fairgrounds map

A. 64 acres for FIU potential development
B. 22 acres remaining with Tamiami Park/fairgrounds
C. 26 acres returned to the park for development
D. improvements to Tamiami Park

SW 24 Street (Coral Way)
Site Plan / Map
Satellite Chiller Plant Continuation Funding
Why is the Satellite Chiller Plant Needed?

• The Satellite Chiller Plant on the Modesto A. Maidique Campus (MMC) has been a priority LBR request since first partially funded in 2007-08 because chilled water that is used to cool buildings is at full capacity with zero redundancy and no emergency generator back-up

• From 2009-10 to 2014-15, Gross Square Feet of buildings has increased from 5.4 million to 8.2 million, an increase of 52 percent

• High cooling need buildings added to MMC from 2009-10 include the College of Nursing (AHC 3), the Science Classroom Building (AHC 4), and the Stempel College of Public Health and Social Work (AHC 5), all focusing on STEM instruction and research labs
How Will the Funds Be Used?

- Continuation funding request of $7 million will allow the build-out of the remaining three chillers and two generators to provide emergency back-up chilled water to essential/critically needed facilities, such as vivarium and labs, in the event of a power outage.

- Upon completion of the project, chilling capacity will be sufficient to support new facilities underway and provide some redundancy in the event of a chiller failure.
# Current and Historical Funding Requests/Vetoes

<table>
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<th>Description</th>
<th>Amount</th>
<th>Year</th>
<th>Status</th>
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<tr>
<td>Total Project Cost:</td>
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<td>Funding Received:</td>
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<td>2007-08</td>
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<td>$6,000,000</td>
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<td>Funding Requested/Vetoed:</td>
<td>$7,000,000</td>
<td>2009-10</td>
<td>BOG 3-Year PECO List</td>
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<td>Appropriated/Vetoed</td>
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<td></td>
<td>$7,000,000</td>
<td>2013-14</td>
<td>BOG 3-Year PECO List</td>
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<td>Current Request:</td>
<td>$7,000,000</td>
<td>2015-16</td>
<td>BOG LBR</td>
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</table>
Project Description

• Project Size: 13,200 Gross Square Feet Concrete Facility

• Architect/Engineer: SMG Engineering

• Construction Manager: Poole and Kent

• Facility Completion: February 2013 – Structure

• Chillers Installed: 2-1500 Ton Chillers and Cooling Towers

• Chillers Needed: 3-1500 Ton Chillers and Cooling Towers

• Generators Needed: 2—allows 3000 ton capacity during power outages and emergencies
Photographs / Renderings

Satellite Chiller Plant Facility Partially Completed February 2013
Photographs / Renderings

Additional Need for 3 Chillers and 2 Generators
School of International and Public Affairs Phase II
Why is the SIPA Phase II Building Needed?

• The FIU School of International and Public Affairs (SIPA) aspires to be a globally recognized, top five school of international and public affairs, committed to innovative education with professional programs in global governance, human security, disaster preparedness, and risk management and corporate citizenship.

• SIPA alone serves over 6,000 students with nearly 200 faculty members. Its eight departments and 17 interdisciplinary centers, institutes, and programs are scattered throughout campus.

• Currently the SIPA I, completed in 2011, cannot house 14 academic centers, institutes and programs, scattering students and faculty across four buildings around campus.

• Funding of $20,000,000 is requested to complete Phase II of the School of International and Public Affairs.
How Will Students Benefit?

• Expansion would give SIPA the critically needed square footage to unite its students and faculty in an innovative teaching-learning environment.

• Research has shown that collaborative spaces result in better learning outcomes and increased graduation and retention rates.

• Collaborative space at SIPA will create an environment most conducive to critical investigation of the biggest challenges facing our community and the world and will allow our students to solve problems in our state.

• The facility will serve as a think tank to foster synergies among faculty, students, visiting diplomats, policy makers or world leaders to come up with innovative solutions.
How Will the Funding Be Used?

• Greatly enhance SIPA’s goal is to achieve full membership in the Association of Professional Schools of International and Public Affairs (APSIA). APSIA represents the best schools of international and public affairs in the world, combining multidisciplinary and policy orientated studies with career development.

• SIPA graduates will be better prepared to not only enter the workforce but obtain mid-level and leadership positions in NGOs, government agencies, non-profit and for profit organizations specializing in international and public affairs.

• Many students also contribute to the economic development of the community as they start their own companies while still in school and forge strategic partnerships, growing their companies or starting new ones.

• Finally, completion of the SIPA II building would greatly enhance the ability to attract private dollars through partnerships and philanthropy to SIPA.
Project Funding Overview

- Project Cost: $30,000,000
- Funding Received from Private Source: $10,000,000
- Funding Requested: $20,000,000
- Project Details:
  - Project Size: 77,000 Gross Square Feet
  - Architect/Engineer: To Be Determined
  - Construction Manager: To Be Determined
  - Facility Completion: 2017
  - Features:
    - Faculty Offices
    - Classrooms
    - Language Labs
    - Technology Labs
    - Conference Facilities
    - Negotiation & Mediation Facilities
    - Experiential Teaching Space
Photographs / Renderings

Phase I (Existing)

Phase II

SIPA Phase II
Photographs / Renderings

SIPA Phase II – Site Plan
This diagram depicts developable land on current UNF Campus based on the following criteria:

- Wetland Limits
- 25’ Wetland Buffer
- Conservation Areas
- Drainage Easements
- UNF Conservation Line (from 2005 Master Plan)

- Potential Development Area
- 25’ Wetland Buffer
- Restricted Area
Increase community and business workforce

**Current land on campus** 1,126 acres
- Restricted areas (wetlands) 506 acres

**Total size of the proposed land purchase** 237 acres
- Previously acquired 48 acres
- Remaining to acquire 189 acres

**First parcel purchased: Summer, 2015**
**Second parcel purchased: Summer 2016**

**DEMAND**
- August 2013 student headcount 16,258 students
- Fall 2025 estimated headcount 25,000 students

**ROI**
- 2013-2014 degrees produced 3,727 new graduates
- 2024-2025 degrees produced 8,750 new graduates

**REQUEST**
- Total project budget: $18 M
- Current Request $9
- Remaining Need $9 M
Schultz Hall Renovations $3 million (2015-2016)
Future request: Honors Hall/Coggin College of Business $13M (2016-2018)
Schultz Hall Renovations $3 million (2015-2016)
Future request: Honors Hall/Coggin College of Business $13M (2016-2018)
Schultz Hall Renovations $3 million (2015-2016)
Future request: Honors Hall/Coggin College of Business $13M (2016-2018)

Increase the number of degrees awarded in Areas of Strategic Emphasis

DEMAND
A large portion of Schultz Hall was recently renovated, but part of its first and second floor remains in need of a renovation for repurposing this space and space in Honors Hall.

ROI
• 12,300 sq. ft. of classrooms and offices will be added as a result of completing these renovations.
• Move Global Studies programs (International Studies 220 majors and World Languages 135 majors/minors from Honors Hall, concentrating Global Studies initiatives.

• Honors Hall space be reconfigured to build big-data analytics programs in:
  • Healthcare
  • Transportation and logistics
  • Financial services
  • Statistics
  • K-12 and higher education metrics
• Serving 400+ students yearly.

Current REQUEST
Total project budget: $3 M
Current Request $3 M
Remaining Need $0

Future REQUEST $13M

Anticipated construction start date: January 16, 2016
Estimated completion date: June 15, 2016
Estimated Completion Honors/Coggin College: January 2020
Skinner Jones North and South Renovations/Expansion $15 M (2015-2016)
Skinner Jones North and South Renovations/Expansion $15 M (2015-2016)
Skinner Jones North and South Renovations/Expansion $15 M (2015-2016)

Increase the number of Degrees Awarded in STEM and Other Areas of Strategic Emphasis

**ROI**
- Almost 9,000 students will utilize the Physics, Chemistry, Psychology Computing and Engineering teaching labs and classrooms
- Producing 380 STEM degrees per year
- Average salary for graduates in
  - Physics: $60,000
  - Chemistry: $44,700
  - Computing Sciences: $55,400
  - Engineering: $62,000

**DEMAND METRICS**
Renovations and the addition will provide for 66,000-100,000 net assignable square footage. The Departments to move into the building are Chemistry, Physics, Computing Science and Engineering. The project includes larger classrooms, simulation labs, Geotech and material sciences lab, teaching and research labs.

Anticipated construction start date: July, 2015
Estimated completion date: January, 2017

**REQUEST**
Total project budget: $30.8 M
- Prior funding: 15.8 M
- Current Request: 15.0 M
- Remaining Need: 0.0 M
ROI

- Supports programs with $26M in external funding and increases research funding by $20M per year
- Increases number of Florida STEM graduates 41% (1,000 additional per year over 2,429 in 2013/14)
- Provides economic impact to local economy
  - **Year 1:** $10,800,274  46 construction jobs, 35 other sectors
  - **Year 2:** $61,715,839  262 construction jobs, 202 other sectors
  - **Year 3:** $10,800,274  46 construction jobs, 35 other sectors
  - Business incubator impact to the region of more than $2.5 billion in first 15 years
  - Creates thousands of jobs from incubator program, with salaries averaging $67,541

- Enables UCF to continue to excel in patent production (ranked 9th in nation for new patents produced in 2012). Each $1M in research funding produces approximately one new patent per year
- Supports UCF’s ranking as a “very high research activity” University by the Carnegie Foundation
- Over 150 current incubator clients and more than 100 companies have graduated
- Incubator companies currently account for 3,698 jobs in Central Florida
DEMAND METRICS

✓ Supports programs in nano-science technology, advanced materials processing and analysis, optics and lasers, energy research, and the incubator program

✓ Creates 27 research labs, 19 material characterization rooms, 21 incubator labs, lecture halls, conference rooms, offices, and ancillary spaces

✓ Positions UCF for large research projects and partnerships

✓ Provides critically needed space to support research activities; UCF’s 407,000 net assignable research square feet is one-half the space needed, as calculated by the state’s formula

✓ Building size: 118,014 gsf – new space will compensate for 20% of the space deficit

✓ Anticipated construction start date: April 2016
✓ Anticipated completion date: October 2017
**REQUEST**

<table>
<thead>
<tr>
<th>Description</th>
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<td>Request for 2017-2018</td>
<td>$6,042,667</td>
</tr>
</tbody>
</table>

Plant Operations and Maintenance (Annual Estimate): $1,632,900
UCF – Partnership IV $46.9 M

UCF Main Campus

Research Park
UCF – Partnership IV $46.9 M

ROI

✓ Supports UCF’s state charter as the Center of Excellence in Simulation and Training
✓ Enhances UCF - DOD partnership for Simulation and Training
✓ Lessens the likelihood of Base Realignment and Closure (BRAC) action
✓ Increases economic impact to local economy

- **Year 1:** $83,861,787  355 construction jobs, 276 other sectors
- **Year 2:** $10,938,494  46 construction jobs, 36 other sectors
ROI

✓ Modeling, Simulation and Training (MS&T) economic impact:
  • More than $4.8B to Florida’s Gross State Product
  • Nearly $8.0B in state sales (economic output) activity
  • 1,000+ Florida companies and organizations involved
  • Direct employment in the sector of more than 27,000 Floridians
  • Approximate average annual salary of $69,797

✓ Research Park economic impact:
  • Average salary $82,000+
  • 2,800 military and civilian personnel in MS&T

✓ Florida employment impact: 60,700 jobs (direct, indirect, induced)
DEMAND METRICS

✓ Creates classified labs for both the Military and UCF

✓ Satisfies the demand from local MS&T employers for UCF students trained in advanced technologies

✓ Eliminates costly leases that could drive BRAC decisions

✓ Provides space in Research Park to support Army and Air Force presence and potential growth

✓ Avoids potential loss of strategic national programs and dollars to the region and to the state

✓ Building sizes:
  • Technology 1 – 31,520 gsf (existing building to be acquired)
  • Technology 2 – 30,828 gsf (existing building to be acquired)
  • New Development – 167,000 gsf

✓ Anticipated construction start date: December 2015
✓ Anticipated completion date: June 2017
REQUEST

Total project budget: $53,040,000

Prior Funding

Request for 2015-2016 $46,920,000
Request for 2016-2017 $6,120,000

Plant Operations and Maintenance (Annual Estimate): $2,505,000
University of Central Florida

UCF – Downtown Presence $57.8 M
CREATIVE VILLAGE

✓ Approximately 65 acres, comprising the old Amway Arena site, Bob Carr Theater, and the UCF Center for Emerging Media

✓ City Task Force calls for a “Work, Learn, Play” development, with Education as a key anchor

✓ A high-energy visualization arts, communications, and service learning hub that will serve UCF and the community
ROI

✓ Changes the complexion and vibrancy of the downtown area, with a large University presence; increases economic activity for the City of Orlando

✓ Further strengthens Orlando as a high tech digital media destination; the City’s existing digital media companies already make up one of the top ten digital media clusters in the United States

✓ Embeds UCF into the Orlando community, as thousands of students will live and study in the district

✓ Enriches our successful partnership with Valencia College, as they will bring complimentary programs to the downtown site

✓ Creates opportunities for small business development in support of the new student population

✓ Compares to the University of Buffalo Gates Vascular Institute, which generated $68.5M per year in economic impact and 700 new permanent jobs
ROI

✓ Promotes “next generation” industries other than tourism to create a more diverse and dynamic economy to ensure the City of Orlando’s long-term health

✓ Supports an economically depressed, low-income neighborhood through targeted redevelopment activities

✓ Creative Village’s economic impact to local economy
  • Generates more than $10M in annual property tax revenue to support City services
  • Creates more than 8,000 permanent and related jobs
  • Represents $800M - $1B in full build-out of new development
  • Produces $296M annually in post-construction local economy earnings

✓ UCF’s economic impact to local economy
  • **Year 1:** $103,218,631  437 construction jobs, 340 other sectors
  • **Year 2:** $138,906,943  589 construction jobs, 456 other sectors
  • **Year 3:** $51,890,821  220 construction jobs, 171 other sectors
  • **Year 4:** $75,362,738  319 construction jobs, 248 other sectors
DEMAND METRICS

- Full-service campus for UCF, comprising 22 of 65 total acres (1/3 of development)
- Five year projection: 7,000 to 10,000 UCF students and 2,000 Valencia students
- Academic departments near the businesses that students want to join after graduation
- Tuition waivers for low-income, local Community School students
- Public affairs embedded in the community
- Enhancement of existing downtown Orlando electronic arts and media industry and education
REQUEST

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</table>

Plant Operations and Maintenance (Annual Estimate): $4,098,150
UCF – Colbourn Hall Renovation $2.0 M
ROI

✓ Prevents costly, stop-gap repair measures to antiquated building systems

✓ Prevents the need to demolish the building and displace hundreds of building occupants

✓ Provides long-term energy efficiency

✓ Increases economic impact to local economy

- **Year 1**: $3,489,692  
  15 construction jobs, 11 other sectors

- **Year 2**: $27,917,544  
  118 construction jobs, 92 other sectors

- **Year 3**: $3,489,692  
  15 construction jobs, 11 other sectors
DEMAND METRICS

✓ Extends the useful life of an iconic, 40 year old, 84,000 gsf, structure

✓ Independent study identified:
  • Structural defects
  • Water intrusion issues
  • Mechanical systems past life-span
  • Life Safety deficiencies
  • Building needs to be gutted to structure and rebuilt to current building codes

✓ Remediates structural concerns and failing building systems, which are forcing the relocation of existing faculty

✓ Allows housing new faculty lines that are being hired from performance funding, resulting in an improved faculty to staff ratio, from 32:1 to 28:1

✓ Anticipated construction start date: May 2016
✓ Anticipated completion date: August 2017
EXISTING MECHANICAL SYSTEMS
### REQUEST

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<td>Request for 2017-2018</td>
<td>$1,952,455</td>
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</table>
University of Central Florida
UCF – Engineering Building I $13.9M
UCF – Engineering Building I  $13.9M

ROI

✓ Prevents costly, stop-gap repair measures to antiquated building systems

✓ Provides long-term energy efficiency

✓ Allows UCF to continue producing 1,535 Florida STEM graduates per year in Engineering

✓ Increases annual research expenditures by $700,000 (13% increase over current amounts)

✓ Increases economic impact to local economy
  
  • Year 1: $24,940,976  106 construction jobs, 82 other sectors
  • Year 2: $1,653,285  7 construction jobs, 5 other sectors
DEMAND METRICS

✓ Extends the life of a 29 year old building to support world-class engineering programs

✓ Houses the preeminent College of Engineering and Computer Science, with 7,554 undergraduate students and 1,327 graduate students: the largest in Florida and the 9th largest in the nation

✓ Independent study identified:
  • Mechanical systems past life-span
  • Building needs to be upgraded to meet current building codes

✓ Creates and upgrades classrooms, instructional and research labs, clean rooms, and ancillary spaces

✓ Building size: 130,885 gsf

✓ Anticipated construction start date: December 2015
✓ Anticipated completion date: August 2017
University of Central Florida
UCF – Engineering Building I $13.9M
<table>
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<td>Request for 2016-2017</td>
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</table>
ROI

✓ Prevents costly, stop-gap repair measures to antiquated building systems

✓ Provides long-term energy efficiency

✓ Allows UCF to continue producing over 7,500 Florida STEM graduates per year in Mathematical Sciences

✓ Increases economic impact to local economy
  Year 1: $16,840,464  71 construction jobs, 56 other sectors
  Year 2: $1,251,135  5 construction jobs, 4 other sectors
DEMAND METRICS

✔ Extends the useful life of this 44 year old building

✔ Provides classroom and labs for 15,787 students annually for Mathematics and Sciences

✔ Independent study identified:
  • Mechanical systems past life-span
  • Building needs to be upgraded to meet current building codes

✔ Creates and upgrades classrooms, teaching labs, research labs, study rooms, and ancillary spaces

✔ Building size: 106,523 gsf

✔ Anticipated construction start date: December 2015
✔ Anticipated completion date: August 2017
<table>
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<td>$700,000</td>
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</table>
Florida Gulf Coast University – South Access Road $4 M
Florida Gulf Coast University – South Access Road  $4 M
DEMAND METRICS

- Additional campus evacuation route & emergency first-responder access for high concentration of on-campus student housing
- Student housing population in South Village: 2271 students
- Provides additional infrastructure redundancy for power (FPL), water and sewer (Lee County Utilities), fire protection (Estero Fire Rescue), and data connectivity
- Multi-modal campus access
- Length of access road: 0.53 mile

- Anticipated construction start date: December 2015
- Estimated completion date: August 2016
ROI

- Added safety for FGCU students, faculty, and staff
- Provides additional utility services for more stable University operation
- Supports Public/Private partnerships (P³)
- Supports local businesses
- Directly connects FGCU students to employment opportunities
- Directly connects FGCU faculty, staff, and students to affordable housing
### REQUEST

<table>
<thead>
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<th>Total project budget:</th>
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<tr>
<td>Request for 2015-16</td>
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</table>

Plant Operations and Maintenance (Annual Estimate): $16,000
Florida Gulf Coast University –
Central Energy Plant Expansion Phase 3  $9 M
Florida Gulf Coast University –
Central Energy Plant Expansion Phase 3  $9 M
DEMAND METRICS

- Due to the existing plant being at currently capacity, this allows for Academic Building 9 and potential additional buildings
- Increase ice storage capacity by 86 tanks and 17,200 ton hours
- Install chilled water lines from existing plant to Academic Building 9 site at an estimated cost between $1.5 and $2 M
- Remainder of facility at an estimated cost of $7 M
- Anticipated construction start date: August 2015
- Estimated completion date: March 2016
ROI

- Utilizes a **chilled water system** for efficient cooling and reduced energy costs

- Save energy costs: off-peak energy usage rates with **ice storage tanks**

- Support Academic Building 9

- Efficient and sustainable design
REQUEST

Total project budget: $9 M

| Appropriated  | 2013-14 | 0 M |
| Appropriated  | 2014-15 | 0 M |
| Request for   | 2015-16 | 9 M |

Plant Operations and Maintenance (Annual Estimate): $0.6 M
DEMAND METRICS

- 116,505 gross/77,670 net square feet

- **Reduce FGCU current deficit of STEM labs and classroom space**

- Promote STEM, critical emphasis area enrollments, and degree production

- Maintain ABET accreditation in engineering

- Obtain ACS accreditation in chemistry

- Anticipated construction start date: November 2016
- Estimated completion date: January 2018
Florida Gulf Coast University – Academic Building 9 - $44.7 M

Florida Gulf Coast University
Current Form B Need

Percent of Space Needs
- Classroom
- Teaching Lab

70%

75%

80%

85%

90%

95%

100%
DEMAND METRICS

• 116,505 gross/77,670 net square feet

• Reduce FGCU current deficit of STEM labs and classroom space

• Promote STEM, critical emphasis area enrollments, and degree production

• Maintain ABET accreditation in engineering

• Obtain ACS accreditation in chemistry

• Anticipated construction start date: November 2016
• Estimated completion date: January 2018
ROI

✓ The STEM building is essential because it will house “bench” courses and research in the lab sciences which demand hands-on components for learning and scholarly attainment.

✓ Over the last several years, we have increased our percentage of baccalaureate degrees in programs of strategic emphasis from 31% to 44% as compared to all baccalaureate degrees to provide an educated workforce that drives economic development.

✓ A new co-op education/internship office will create stronger connections between the world of work and our STEM disciplines, while equipping students with the general and technical skills in greatest demand by corporate and business leaders.

✓ Academic Building 9 is integral to FGCU maintaining its number one ranking in the state for employment and/or continuing education of our graduates.
REQUEST

<table>
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<th>Year</th>
<th>Project Budget</th>
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</table>

Plant Operations and Maintenance (Annual Estimate): $1.5 M
Florida Polytechnic – Applied Research Center $10 M
ROI

☑ Essential to successfully implementing the University’s mission to focus on applied research

☑ **2,669** students are projected to be enrolled by Fall 2018, anticipated completion of the facility

☑ Teaching Laboratories
  - All students are required to conduct research beginning in the freshman year
  - Hands on learning is essential to retaining students
  - Industry indicated that students must be prepared for complex, real-world problems
  - Research – **23** companies have already indicated a desire to partner in research

☑ Research Laboratories
  - **23** companies have already signed on as industry partners interested in joint research
  - Companies have identified real projects to be addressed by Poly faculty and students

☑ 100% STEM programs address BOG programs of strategic emphasis

☑ Faculty offices are needed to house sufficient faculty to meet planned student enrollment
DEMAND METRICS

• Needed to provide adequate research facilities for planned enrollment growth

• Essential to providing the undergraduate research opportunities for all students

• Will house University research research related programs
  • Healthcare Informatics
  • Context Based Decision Support
  • Applied Economic Analysis
  • Entrepreneurship Center
  • Role of CORE STEM in Catalyzing Economic Development

• Essential to retention rate and annual growth toward statutorily mandated 2016 enrollment goal
**REQUEST**

<table>
<thead>
<tr>
<th>Project Year</th>
<th>Requested Amount</th>
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<td>$16 M</td>
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<td>2017-18</td>
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</table>

Total Project Budget: $33 M
Board of Governors
Facilities Workshop

Earth, Ocean and Atmospheric Science Building (EOAS)

STEM Teaching Lab Building

Interdisciplinary Research and Commercialization Building (IRCB)

October 2014
Proposed EOAS Site
140,000 GSF
6 Story Facility
June 2017

Proposed STEM Site
72,750 GSF
3 Story Facility
June 2018
FSU - EOAS $36.1 M

Earth, Ocean and Atmospheric Science Building
FSU - EOAS $36.1 M

DEMAND METRICS

• Increase the # of STEM degrees and increase external funding
• Redevelop and renovate an aging 1.2 million square feet of science and research buildings.
• Merged 3 departments to save money, provide innovation in teaching, and increase research potential by enhancing synergisms
• The # of undergraduate majors in EOAS has increased by 250% since 2010, making it the fastest growing program in Arts and Sciences
• Investing Preeminence funding to attract high quality faculty
  a) Seven new, junior EOAS faculty hired for the 14-15 academic year
  b) Three of the above are part of the Coastal & Marine Strategic Faculty Hiring Initiative; up to five additional EOAS faculty will be recruited this year in the initiative
  c) New hires housed in sub-standard labs or surge space
• Huge research opportunities – Challenging scientific problems which impact the State and Nation (climate variability, extreme weather events, water quality and use, coastal fisheries, hydrocarbon exploration in the Gulf…..)
Significant growth in contract & grant activity

a) Over the past five years EOAS with its COAPS and GFDI partners has averaged $13.5M per year in grant awards (approx. $390,000 per faculty member)
b) Recent and projected hiring of faculty will grow the cadre of researchers leading to projected increase of nearly $6M in grant awards based on per capita productivity.
c) New funding opportunities (BP GOMRI, Restoration Act) and synergisms could potentially lead to a doubling of awards to $27M in five years

Graduated 147 students last year

Bureau of Labor Statistics – job growth in EOAS fields will increase “faster than average” – 14-19% in geosciences and meteorology; 18% geosciences and hydrologists, more than 20% in environmental science

Considerable demand within Florida (climate and weather forecasting)

BOG Economic Impact Study – 1,451 jobs

Raises the stature of a very strong program to the position of an elite program in the nation
FSU - EOAS $36.1 M

Total Project Budget: $64.95 Million

- Appropriated 2012-13: 3.85 M (P)
- Appropriated 2014-15: 20.00 M (CE)
- Requested 2015-16: 36.10 M (CE)
- Requested 2016-17: 5.00 M (E)

Project Size:

- Floors: 6
- Footprint: 23,000 gsf
- Total Area: 140,000 gsf

Projected PO&M Costs: $1,400,000

Project Schedule:

- Anticipated Construction Start Date: June 2015
- Anticipated Completion Date: June 2017
FSU - STEM Teaching Lab  $2.2 M

DEMAND METRICS

• Increase the # of STEM degrees by producing a significant shift in the fraction of students majoring in STEM disciplines, particularly in high job growth areas
• Goal to be a Top 25 public university is tied to significant investment in STEM fields.
• $2.5 million in 2014 STEM funding plus $3 million investment in last year’s Preeminence funding focused on the hiring of STEM faculty; this is in addition to significant investments over the last couple of years
• The STEM Teaching Lab Building is designed to pull a large fraction of the teaching activities out of old, deficient science buildings
• Will provide centralized resources for state-of-the-art and shared platforms for laboratory experiences for students with emphasis on Chemistry and Physics (the foundation disciplines for most undergraduate STEM majors)
• Leverages opportunities for using the innovative “studio” lab approaches wherein discussions are integrated with hands-on experiences
FSU - STEM Teaching Lab  $2.2 M

ROI

• BOG Economic Impact study indicates generation of 785 jobs

• Addresses a critical shortage of teaching lab space (underbuilt compared to growth over last 10-15 years)

• Significant amount of instructional space inventory is over 25 years of age – doesn’t match up with innovative teaching methods

• Critical to address workforce needs

• Lessens need for teaching labs in every new building
The picture is of one of our studio Physics teaching labs which illustrates a facility that accommodates a research-based pedagogy.

FSU - STEM Teaching Lab  $2.2 M

Total Project Budget:  $36.9 Million

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<th>Requested</th>
<th>2015-16</th>
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<td>5.00 M (CE)</td>
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</table>

Project Size:
- Floors: 3
- Footprint: 24,250 gsf
- Total Area: 72,750 gsf

Projected PO&M Costs: $875,000

Project Schedule:
- Anticipated Construction Start Date: December 2016
- Anticipated Construction Completion Date: June 2018
FSU - IRCB  $5 M

Interdisciplinary Research and Commercialization Building

FSU Southwest Campus
The solutions to complex scientific and technical problems require expertise and tools from a variety of disciplines.

- Disciplinary boundaries are becoming very blurry.
- Interdisciplinary collaborations are very common and, in fact, Federal funding agencies strongly encourage and support such efforts.
- Students are very interested in solving complex, real world problems.
- Most science and engineering buildings are built for academic departments or centers/institutes. These buildings are typically “boutiqued” to meet the immediate needs of these units.
- Interdisciplinary research requires highly flexible space where collaborative groups from different units can coalesce.
- Space must be highly adaptable to accommodate the dynamic nature of the R&D world.
FSU - IRCB $5 M

ROI

• Supports FSU’s Path to the Top 25 Initiative by achieving significant growth in contract & grant activity, IP development and commercialization, and opportunities for research training of students

• Provides needed space for STEM hires in the physical sciences and engineering
  a) Preeminence funding based Energy & Materials Strategic Faculty Hiring Initiative will be recruiting around 20 new faculty (11 distributed in Chemistry, Physics and Engineering hired thus far)
  b) Significant new faculty hires in the physical sciences and engineering will take place to accommodate growth of STEM majors

• Provides needed space for shared core facilities (clean room [nanofabrication] and materials characterization and imaging)

• Provides needed space for interdisciplinary research labs (facilitating collaborations across departments and colleges)

• Provides a new model for research lab space that is open, flexible, and has the ability to grow and change over the anticipated lifespan of the building (“research condominium” model)

• Provides incubator space for commercialization of IP and to foster the development of start-up companies based University inventions and discoveries

• Leverages $45 M investment by the FSU Research Foundation
FSU - IRCB $5 M

• Provide state-of-the-art research space
• Provide tools and technology to support research
• Serve as a training ground for the next generation of researchers
• Leverages adjacencies of the NHMFL, Applied Superconductivity Center, High Performance Materials Institute and Center for Advanced Power Systems.
People accommodated:
24 groups (PIs)
26 post-doctoral fellows
120 graduate students
undergraduate students
12 technical staff
6-12 support & other staff

Research space provided:
12 wet lab modules
24 damp lab modules
12 dry lab modules
2 computational lab modules
FSU - IRCB  $5 M

Clean room (nano-fabrication facility)

Imaging suite

Characterization suite
FSU - IRCB  $5 M

Total Project Budget:
$85 M = $40 M State + $45 M FSU Research Foundation

Funding Request:
Total Project Request:  $40 M
Request for 2015-2016  $ 5 M (P)
Request for 2016-2017  $30 M (C)
Request for 2017-2018  $ 5 M (E)

Projected PO&M Costs:  $1,800,000

Projected Schedule:
Anticipated Construction Start Date:  May 2016
Anticipated Construction Completion Date:  May 2018
Jupiter Research Building Renovation & Addition

STEM / LIFE SCIENCE BUILDING

FLORIDA ATLANTIC UNIVERSITY.
FAU STEM / LIFE SCIENCE BUILDING - $29 M

STEM / LIFE SCIENCES BUILDING

HONORS COLLEGE

MAX PLANCK FLORIDA INSTITUTE

SCRIPPS FLORIDA
ROI

- Create a Life Science focused STEM campus by “re-purposing” FAU’s MacArthur Campus in Jupiter to leverage the State and County investment (~$1 billion) in Scripps Florida and the Max Planck Florida Institute for Neuroscience located on this campus of FAU. The MacArthur Campus houses FAU’s Wilkes Honors College and prior to the economic turndown was developing as a “full service” campus to meet the needs of projected population growth in northern Palm Beach, Martin and Indian River Counties.

- Meet BOG Strategic Plan goals to increase undergraduate and graduate degrees awarded in STEM and other strategic emphasis areas. Create new world class science and technology programs, e.g., Bachelor of Science Honors Degree specifically targeted to high achieving students with aspirations to pursue medical school or graduate school in the life sciences. Faculty from Scripps and Max Planck will participate in these STEM programs providing students with access to world-class scientists. Indeed, a new joint program has already been established – the PhD program in Integrative Biology and Neuroscience that will be developed to be a nationally top-ten program in neuroscience.

- FAU’s Strategic Plan 2012-17 sets goals to increase undergraduate STEM degrees from 20% in 2012 to 28% in 2017, and graduate degrees from 16% to 19% in 2017. A revision of FAU’s Strategic Plan is currently underway with plans to increase these goals to 40% undergraduate, STEM-related degrees by 2025, and increase STEM-related graduate degrees by 30% by 2025. Transitioning the MacArthur Campus to a STEM-focused campus will be critical to the success of these institutional goals.
The STEM/LS Building will provide increased enrollment of students in the STEM fields of Biology, Bioengineering, Bioinformatics, Chemistry, Computational Biology, Engineering, and Neuroscience. Currently, undergraduate enrollment in the STEM areas on the Jupiter Campus represents an undergraduate headcount of ~75, and a graduate headcount of 20 students. By 2025, we expect STEM enrollment to increase to 1500 undergraduates and ~100 graduate students. Enrollment in the Wilkes Honors college will increase from the current 332 students to a 650 students.

Meet BOG Strategic Plan goals to increase Federal and other research funding. The STEM/LS building will allow for expansion of collaborative research in the STEM areas, especially in specific targeted areas such as neuroscience, biotechnology, bioengineering, bioinformatics/data science, chemistry. The additional research infrastructure will also allow greater collaboration and cooperative grant funding between FAU faculty and Scripps and Max Planck faculty. Currently, the average annual funding for STEM faculty on the MacArthur campus is ~$60,000 per faculty member and total STEM research funding is ~$750,000 per year. By 2025, we expect annual faculty research funding to be greater than $100-150,000 per faculty, and a total of ~$5-8 million annually.

Increase licensing activity of intellectual property and “spinout” companies based on FAU IP. Currently, four patents have been awarded to STEM faculty who recently moved from the Boca Raton Campus to the MacArthur Campus in Jupiter. These patents have been licensed to two Biotech startups in the Jupiter area. With expansion of STEM activity on the MacArthur Campus a significant increase in technology licensing activity by FAU will be expected.

Job creation
- 45 regular and research faculty positions
- 35+ postdocs and 75+ graduate students
- 500+ construction jobs
DEMAND METRICS

- **72,000 gross / 45,000 net square feet**

- Provides additional teaching and instructional space, needed to support projected enrollment of STEM honors students on the Jupiter campus. The Wilkes Honors College will increase enrollment from 332 to 650 by 2025. Increased enrollment will also come from additional STEM students completing Honors-in-the-Major programs, such as in Biology or Chemistry, with overall enrollment increasing to ~3000 students

- Reallocating current instructional space will rebuild capacity (to 2003-04 levels) in other programs through increases in the number of students majoring in related disciplines such as Education, Psychology and Business. Such a model exists on FAU’s Davie Campus in Broward County where the headcount is about 4000 students majoring in multiple disciplines, including STEM

- Provides for new teaching laboratories and support space in core STEM areas. Biology, chemistry, engineering and computer science and mathematics

- Provides for new classroom/instructional space. Includes distance learning classrooms and computer instructional labs

- Provides additional research and office space needed to support new STEM faculty. Anticipated 45 additional regular and research faculty.

- Provides for new faculty research laboratories, research support space and research staff offices. Anticipated ~75 graduate students and ~35 postdoctoral fellows

- Anticipated construction start date: **October 2016**

- Estimated completion date: **February 2018**
### PECO REQUEST

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<thead>
<tr>
<th>Year</th>
<th>Description</th>
<th>Cost</th>
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<tbody>
<tr>
<td>2015/16</td>
<td>(Planning &amp; Construction*)</td>
<td>$14,650,000</td>
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<tr>
<td>2016/17</td>
<td>(Construction)</td>
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<tr>
<td>2017/18</td>
<td>(Furnishings &amp; Equipment)</td>
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<td><strong>TOTAL PROJECT COST</strong></td>
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* $2.5 M planning

### PO&M - PLANT OPERATIONS & MAINTENANCE

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<tr>
<th>Description</th>
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<tbody>
<tr>
<td>Building Classification – Research/Advanced Technology</td>
<td>Facility Class F</td>
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<tr>
<td>2014-15 PO&amp;M Rate / Sq. Ft. – Class F</td>
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<tr>
<td>Building Gross Square Footage</td>
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<tr>
<td><strong>Total Projected Annual PO&amp;M</strong></td>
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Boca Raton Campus

Colleges of Science and Engineering Buildings Renovation (36, 43 & 55)
COLLEGES OF SCIENCE AND ENGINEERING BUILDINGS RENOVATION - $10M

Science – bldg. 43
128,000 GSF

Physical Science – bldg. 55
97,000 GSF

Engineering West – bldg. 36
59,000 GSF
ROI

- Average age of the Science and Engineering buildings exceeds 25 years
- Due to their age, these buildings need major attention to upgrading of existing building systems, including: electrical, HVAC, lighting, controls, chilled water system, fire alarms systems, elevators, roofs, and overall building envelope.
- These buildings house classrooms, teaching labs, research labs and other space critical to supporting STEM programs
- This project is an investment in the University’s and the State’s facilities assets to ensure that these buildings remain open and operational to serve existing programs
- Job creation
  - Same faculty and staff jobs as currently exists
  - 180+ construction jobs
DEMAND METRICS

- The renovated facilities will enhance the quality of academic programs and research in the STEM disciplines
- Upgraded systems and modernized facilities will help attract top rated students and faculty to existing programs
- State-of-the-art facilities are needed to expand research activities
- Anticipated construction start date: March 2016
- Estimated completion date: August 2017

PECO REQUEST

2015/16 – (Planning, Construction & FF&E) $ 10,000,000

PO&M - PLANT OPERATIONS & MAINTENANCE

No increase in current state funding to support PO&M; however, the renovated facilities will be more energy efficient and require less maintenance