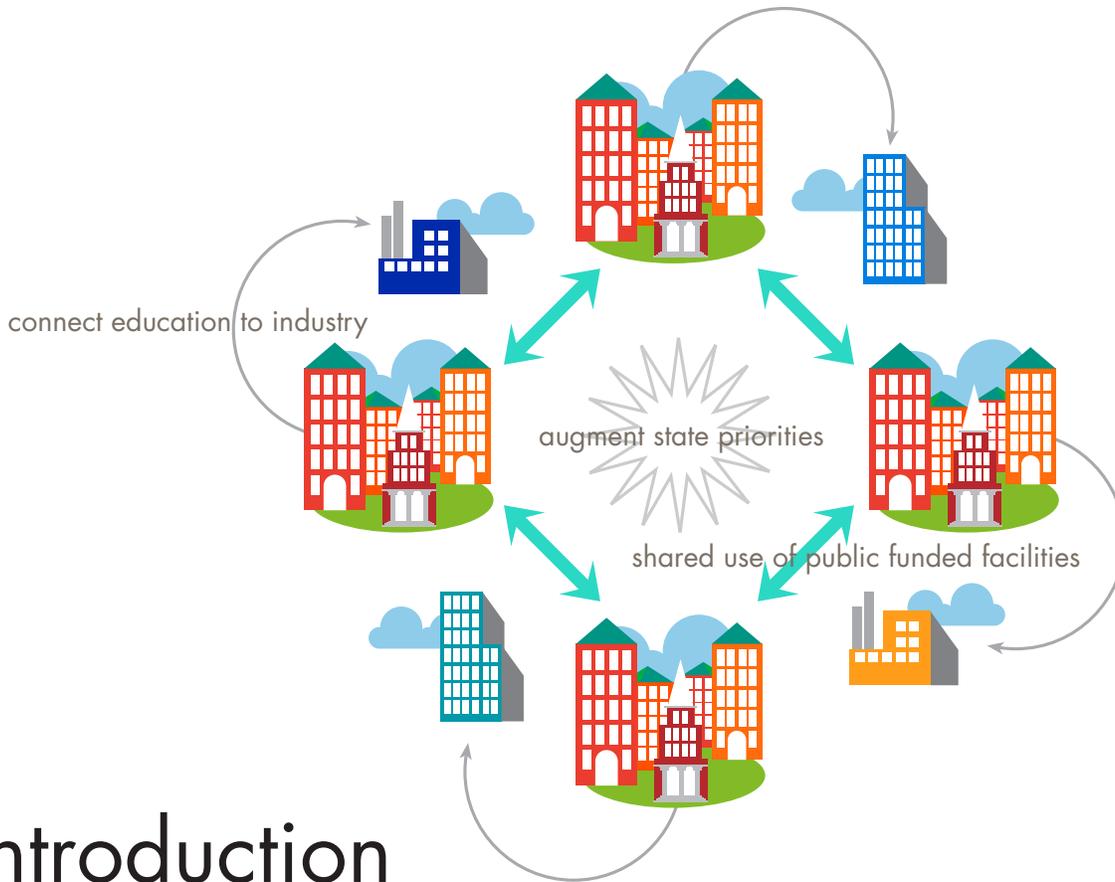


2016 Recommendations of the
Ohio Higher Education
Capital Funding
Commission





Introduction

In late 2011, Governor Kasich transformed the culture of Ohio’s higher education landscape by issuing this call-to-action: Campus leaders throughout Ohio must work together to rethink how the state allocates its investment in our public higher educational facilities.

That challenge resulted in higher education’s leaders abandoning Ohio’s traditional process of allocating capital funds in favor of a more collaborative budget process—one in which all higher education leaders agreed on a single list of capital projects that collectively meet the needs of all Ohioans, not simply the siloed needs of each institution.

Prior to the collaborative process, colleges and universities received state funds according to a formula based on the age of a college or university’s facilities, its enrollment numbers and the amount of infrastructure it must maintain. The formula ensured that there was a fair and predictable distribution of funds, but it was also viewed as being less responsive to the needs of the state. This newer process is equally fair and deliberative, but it is also more flexible, more accommodating and presents a more strategic vision for the State of Ohio’s investment.

The success of the FY 2012-FY 2013 and FY 2014-FY 2015 capital budget processes led Governor Kasich to repeat his challenge for the upcoming capital budget cycle. The Governor called on Lorain County

Community College President Roy Church and Miami University President David Hodge, to lead a commission that would examine capital construction requests from Ohio’s public higher education institutions, review those requests against an agreed-on list of principles and recommend a single list of projects that should be funded by the state.

The following report presents the commission’s recommendations. By all measures, Ohio’s colleges and universities have once again met the Governor’s challenge. Projects have been prioritized that strengthen student learning environments and connect them to careers, respond to the immediate workforce needs of Ohio businesses, and protect the state’s investments in the world-class programs offered throughout the state. Furthermore, the commission strongly supported the idea that the majority of the recommended projects should be aimed at renovating and protecting existing state facilities.

Commission Membership

Governor Kasich requested a collaborative group of 2-year college and 4-year university presidents to convene and create a recommendation of prioritized capital projects from public higher education institution submissions that best meet the overall needs of students and employers in Ohio.

The 2016 Higher Education Capital Funding Commission is comprised of:

President Roy Church

Lorain County Community College (Co-Chair)

President David Hodge

Miami University (Co-chair)

President Chad Brown

Zane State College

President Ron Berkman

Cleveland State University

President Dorey Diab

North Central State College

President Roderick McDavis

Ohio University

President Steve Johnson

Sinclair Community College

President Santa Ono

University of Cincinnati

The commission is staffed by:

Jack Hershey – Ohio Association of Community Colleges

Bruce Johnson – Inter-University Council of Ohio

David Cummins – Lorain County Community College

Brian Perera – The Ohio State University

Process

Rather than taking a formulaic approach, the HECFC started by establishing a set of principles to help guide the kinds of projects that the commission would ask campuses to submit for consideration.

Those principles were to:

- Help build world-class programs.
- Focus on maintaining the investment the state has already made in existing campus facilities.
- Stimulate creativity by advancing strategic collaborations through partnerships, both on campus and with others in the public and private sector.
- Reflect the needs of today's student by strengthening their learning environments, ensuring their safety and encouraging new degree and certificate completion opportunities.
- Increase Ohio's competitive advantage by capitalizing on our existing strengths.
- Strengthen our ability to respond to new or increased workforce development opportunities in the state.
- Encourage joint efforts to reduce construction costs and generate ongoing efficiencies.

In December 2015, the commission sent the guiding principles to campus leaders. While reviewing their own local capital master plans, the principles would help them prioritize which capital requests to submit to the commission on a project by project basis.

Throughout January 2016, the HECFC staff participated in conference calls and discussions with representatives of every public higher education institution. The staff and the institution's representatives reviewed each project requested and talked about how it aligned with the guiding principles and the overall need. Through this process, institutions prioritized projects that met the goals and, in many cases, altered their requests to meet the standards being set.

Results

The process once again produced a prioritized project listing that helps Ohio move forward.

After lengthy evaluation of projects requested pursuant to the guiding principles and state need, the HECFC recommends that the state's investment in college and university facilities be focused in the following areas:

- **Maintaining the investments** the state has already made in existing campus facilities.
- **Building world-class programs** and stimulating creativity by advancing strategic collaborations.
- Furthering Ohio's competitive advantage by capitalizing on existing strengths and responding to new or increased **workforce development and career opportunities**.
- **Modernizing learning environments** and encouraging completion opportunities linked to careers for today's students.

Capital Budget Study Recommendation

We appreciate the confidence that the Governor has placed in the Capital Funding Commission to identify the most critical capital priorities of all the campuses across the system. We note however that a comprehensive evaluation of the state capital investments will take more time. Such an evaluation is necessary to protect the investments that have been made, meet the significant talent development

needs of the economy, build competitive world class facilities and address compelling trends in the educational system delivery. Therefore, we recommend that the Commission be charged with conducting such a comprehensive evaluation, with other appropriate stakeholders, before the next biennial capital budget development process begins.



Highlights

The Higher Education Capital Funding Commission recommended the vast majority of the state’s money – nearly 90% - be used to maintain and preserve existing facilities.

The recommended projects are distributed within the four areas of focus listed above. Nearly one quarter of the projects address world class programs and strategic collaborations.

Miami University: Pearson Hall Renovation: Supporting STEM Students and the Healthcare Industry - \$23,900,000

Jobs Ohio’s 10-year outlook for Southwest Ohio projects significant growth in scientific research and development services (12.5%), nursing and residential care facilities (18.9%), and hospitals (23.8%). Ohio needs 21st-century STEM facilities to attract and train students for careers in life sciences and health fields for these rapidly growing industries.

Miami University already assists the state in meeting these workforce needs by awarding the second-highest percentage of STEM degrees among Ohio’s public universities. Annually, more than 2,000 Miami undergraduates work on externally funded research projects, and about 40% of Miami seniors collaborate on a research project with a faculty member. Since 2009, Miami University’s STEM enrollments have grown by 50%.

High-quality 21st-century STEM labs and teaching spaces are essential to sustaining and building on this positive and necessary enrollment trend. Miami University proposes to use the state’s capital investment to renovate Pearson Hall, an aging and

inefficient STEM facility, to better meet the needs of its growing STEM enrollments through flexible, state-of-the-art teaching, research, and instrumentation laboratories.

Columbus State Community College: Supporting the Hospitality Industry – \$10,000,000

Columbus State’s Hospitality Management and Culinary Arts program is ranked as one of the top 20 programs in the country. State funds and private philanthropy will allow Columbus State to ramp up its efforts to meet the needs of the industry, which Columbus 2020 names as one of the fastest growing industries in Central Ohio.

The project will allow the College to create a learning environment that is a unique combination of digital education and practical application. They will also be able to expand program and certificate offerings so that they are in much closer collaboration with large and small hospitality enterprises, allowing the college to provide more appropriately skilled graduates to the entire range of the industry.

The hospitality industry is expected to grow 13.5% in the central Ohio region, and is projected to need skilled workers to fill more than 2,000 projected job openings over the next five years. The industry represents 10% of the region’s employment, and more than half a million jobs statewide.

The Ohio State University: Koffolt/Fontana Laboratories Renovation – Modern Labs to Support Impressive Industry Collaborations - \$26,379,500

The biomedical industry is a rapidly growing sector of Ohio's economy, and biomedical engineers are at the heart of this industry. According to U.S. Department of Labor statistics, employment of biomedical engineers will grow 23% from 2014 to 2024, much faster than the average growth rate for all occupations. Ohio State's undergraduate Biomedical Engineering (BME) program is addressing this talent gap and has become a national model for how to efficiently provide students with the interdisciplinary skills required by the biomedical industry. Ohio State's undergraduate program has 100% placement for its graduates.

Advanced materials have been at the core of Ohio industry for decades, enabling competitive advantages in high-temperature materials for aerospace propulsion, new alloys for automotive light weighting, photovoltaics for clean energy production, corrosion-resistant materials, new methods of materials joining, materials for energy storage and conversion, and advanced biomaterials for the repair and regeneration of tissue and organs. Many graduates of Ohio State's Materials Science and Engineering (MSE) program pursue their careers in Ohio. According to U.S. Department of Labor statistics, Ohio has the second-highest ratio of materials engineers in the country.

Ohio State requests state investment to renovate the aging Koffolt/Fontana Labs into a state-of-the-art facility that will provide an important new home for the high-impact BME and MSE education and research programs, enabling them to realize their full potential. For MSE, the renovated facility will (a) enable efficient and effective classrooms and laboratories for the design, synthesis, processing, characterization, and modeling of advanced materials, and (b) create a collaborative environment connecting scientific advances in engineering, chemistry, physics, and mathematics to technological and industrial applications. For BME, the facility will create modern collaborative spaces to support interactions among engineers, entrepreneurs, and clinicians that drive 21st-century learning and innovation. These collaborations will catalyze research and facilitate translation to commercially viable, clinically useful medical devices and therapies.

University of Cincinnati: Health Professions Building Renovation – Encouraging New Pharmacists and their Related Health Care Industry Partners - \$11,000,000

The first such program established west of the Alleghenies, the University of Cincinnati's College of Pharmacy prepares students for careers as pharmacists and highly-skilled pharmaceutical science researchers in biomembrane and drug development sciences and health outcomes. Through its faculty and longstanding community health care and pharmaceutical science relationships, the College provides an extensive network of experiential, clinical, and scientific sites in the Cincinnati area, as well as valuable research partnerships. Fully 91% of the College's

2015 graduates are employed or enrolled in post-graduate training. Annual starting salary ranges from \$95,000 to \$120,000. Pharmacist is one of the professions in Ohio with a significant shortage of labor. The employment outlook for successful students is virtually assured.

The Health Professions Building renovation will provide the first new space for the College of Pharmacy since the 1950s. The renovation will allow the College to achieve workforce development goals in a purpose-built space, while also enabling the University to implement projects for cross-disciplinary training to achieve other area healthcare and research goals for the Academic Health Center. Currently in design, the project will replace the obsolete infrastructure of the 1916-era former hospital building, improving energy efficiency and providing fully-renovated skills labs and shared classrooms for the College and other health care programs.

Hocking College: Supporting the Equestrian and Veterinary Technician Industry - \$2,000,000

The American Horse Council estimates the economic impact of the horse industry in Ohio to be \$2.2 billion. The industry is large and economically diverse serving everything from professional racetracks to recreational riders. The industry supports more than 40,000 Ohio jobs and 300,000 horses in the state. Hocking College plays a unique role not only in Ohio, but nationally in supporting the workforce needs of the industry. Hocking College is widely recognized as one of the very best programs in the country for this training, particularly because of their unique focus on the backcountry industry and equine health.

Besides improving the facility to better support their existing equine certificate and degree programs, the renovated facility will also allow for the addition of a veterinary technician program, which is a field experiencing rapid growth and offering numerous job opportunities. According to the Bureau of Labor Statistics, the demand for veterinary technicians is expected to increase by 52 percent by 2020, with demand especially high in rural areas.

Cleveland State University: Fenn Hall Addition – Supporting Ohio's Manufacturing Partners and Engineering Students - \$14,600,000

Cleveland State University and its Washkewicz College of Engineering are committed to developing innovative approaches to curricula, rethinking traditional teaching modes, and providing students with a cross-disciplinary learning experience to elevate student success and prepare them for careers in the industry. According to Ohio Means Jobs, engineers and engineering managers are in very high demand, with managers making well over \$100,000 per year on average.

Having achieved a dramatic 10% growth in enrollment in 2014-15, the College is experiencing physical limitations in its 1920s-era building, Fenn Hall. With state capital appropriations supplementing generous support from the Parker Hannifin

Foundation and Don and Pamela Washkewicz's contribution of \$20 million, major physical improvements will transform the College with a new and innovative four-story, 100,000-gsf addition to Fenn Hall.

The new addition will provide the facilities necessary to train new engineers in flexible classrooms and labs to meet the demand of a 21st-century workforce. New spaces, such as a motion and control lab made possible through a longstanding relationship with the Parker Hannifin Corporation, and a "Maker Space" for hands-on fabrication, will drive innovation, increase the number of high-demand engineering graduates, and maintain CSU's well-known reputation for turning out "ready-to-go" engineers.

A number of recommended projects will address critical workforce development needs within in-demand jobs industries.

Lorain County Community College and Lakeland Community College – Supporting the Health Care Industry - \$7,600,000

The Northeast Ohio region is a national leader in healthcare/biomedical employment and innovation, and the sectors together represent the top regional employer according to Team NEO. OhioMeansJobs projects that hospitals, medical offices, laboratories, assisted living centers, and other medical employers in northeast Ohio will produce over 26,000 new healthcare jobs by 2020 that will require at least an associate degree. The need for registered nurses is by far the most pressing concern, as the demand for skilled nursing far outpaces the availability of qualified candidates in the region.

As health care technology has advanced at staggering paces in recent years, the facilities and equipment students utilize at Lakeland and Lorain County Community Colleges have become outdated. The recommended funding will not only bring the facilities and equipment students utilize on each campus up to modern standards, but will also increase the amount of space and number of programs offered in order to best serve the many needs of the regional health care industry

The Ohio State University: Postle Hall – Supporting Dental Students and the Health Care Industry – \$26,000,000

The building that houses Ohio State's College of Dentistry, Postle Hall, was constructed in 1950, with additions and upgrades made between 1959 and 1977 to keep pace with national standards for teaching, technology, and clinical operations. Its current condition requires \$1.2 million annually for unscheduled maintenance and repairs. It is widely acknowledged and recommended by external consultants that Postle Hall requires a partial replacement to support the future academic and clinical missions of the College.

As Ohio's only state-supported dental school, the college educates more than 60% of the state's dentists, sees more than 450 patients per day, and provides care to underserved citizens at 25 community-based clinics around the state. A statewide resource

for Medicaid-eligible dental patients, the College provided care for patients from 84 of Ohio's 88 counties in 2015 alone.

An updated facility will enable the College to use advanced technologies and proven operational systems to enhance efficiencies in patient care and student education. More effective use of space will support increased service capabilities for Ohio's vulnerable, at-risk patients, as well as growth in the number of students educated each year, with a focus on recruiting those from the state's dental workforce shortage areas.

Cincinnati State Technical and Community College and Lorain County Community College – Supporting the Advanced Manufacturing Industry - \$2,880,000

The manufacturing industry has become much more computerized over the years and the traditional machinist role has changed from one requiring a hands-on approach to one requiring computer programming and design skills. In particular, the additive manufacturing market is growing at a staggering annualized rate of 30% over the past five years. The Ohio Manufacturing Institute identified workforce training in the manufacturing sector as a serious bottleneck for continued growth in the industry.

In Northeast Ohio, OhioMeansJobs projects that the manufacturing industry will experience more than 5,000 projected job openings over the next five years. The \$1,000,000 allocation to Lorain County Community College's Manufacturing Innovation Center will upgrade instructional spaces to better support engineering and STEM related curriculum.

In Southwest Ohio, OhioMeansJobs projects that the manufacturing industry will experience more than 4,600 projected job openings over the next five years. The \$1,880,000 allocation to Cincinnati State Technical and Community College will update old and outdated equipment on two of their campuses as well as repurpose existing space to expand additive manufacturing workforce training.

Northwest State and Lakeland Community Colleges – Responding to the Need for More Welders Across Numerous Industries– \$2,785,000

Community colleges throughout the state continue to hear from a diverse array of local employers about the pressing need for more welders. In response, colleges are continually striving to add more welding bays to accommodate a program that has shown strong interest from students and incumbent workers. Continuing a trend seen in the last Commission report, projects are again recommended to expand welding operations at Ohio community colleges. OhioMeansJobs has identified welding as a top in-demand job in Ohio due in part to Ohio's economic recovery which has increased the demand for welders, but also because so many different industries need welders. The oil and gas, construction, telecommunications, and manufacturing industries all have immediate job openings for graduates from

welding programs. In addition to the demand for entry level welders, employers are now also asking community colleges to develop advanced welding programs given the many advances in technology and innovation occurring in the field.

In order to meet this overall workforce demand, \$2 million is recommended to Northwest State Community College and \$775,000 to Lakeland Community College to expand their facilities so that they can serve more students.

Bowling Green State University: Forensic Science Lab – Placing Ohio at the Forefront of Forensic Science - \$1,000,000

With the addition of the Ohio Bureau of Criminal Investigation laboratory and investigation facility on the Bowling Green State University campus, and the formal partnership established between the Ohio Attorney General and BGSU in the form of the Center for the Future of Forensic Science, the University is uniquely positioned to achieve program accreditation by the Forensic Science Education Programs Accreditation Commission and to provide BGSU students with the education and hands-on experience desired by today's forensic science employers.

This capital project proposal seeks to renovate portions of two buildings to further develop BGSU's signature academic program in Forensics. Space in the Life Sciences Building will be renovated for the establishment of (a) a trace/latent prints lab with a shared equipment room with Forensic Chemistry, and (b) a DNA analysis lab. Space in Hayes Hall will be renovated for the establishment of a digital evidence lab, co-located with BGSU's Computer Science Department. The project is a priority because BGSU's Forensics Program is one of the University's emerging areas of academic strength within the College of Arts and Sciences. Improved laboratory facilities will further strengthen this emerging program and bolster BGSU's STEM teaching and research programs.

The teaching and research efforts described above will place Ohio at the forefront of forensic science. Top-tier students will provide a higher level of capabilities to employers of forensic professionals, helping to conduct complex criminal investigations more cost-effectively while also reducing the economic and noneconomic costs of crime to society.

Cuyahoga Community College – Producing Better Prepared Peace Officers - \$575,000

Combined with a significant local investment of \$13 million, recommended state funds will allow for an expansion of the only public safety training center in Northeast Ohio. The project will allow Cuyahoga Community College to strengthen the preparedness of peace officers by adding various scenario-based training opportunities to their current facility. This type of training has been shown to help officers retain lessons at a greater level than classroom instruction alone. The project will create a full tactical village on-site for the use of police, fire and emergency responders. The tactical village will include a

motel, bank, gas station and homes of varying sizes and layouts. Students will enter the live-lab setting and be presented with controlled scenarios in order to bring realism to their training.

In light of recent tragedies, there is a national need to increase training for police and firefighters. This, along with a climate in K-12 and higher education that seeks to increase training for safety personnel, has significantly increased the demand for these services. Current gaps already exist in staffing public safety personnel in Northeast Ohio, and the region projects a 9% growth in workforce needs in these areas in coming years.

Several projects recommended for capital funding will provide more up-to-date learning environments.

Ohio University: Clippinger Laboratories Renovation – New labs to Support STEM Students and World Class Programs - \$10,000,000

Jobs Ohio projects significant job growth in research and development services, as well as several other STEM-focused job classifications. Ohio University has an internationally prominent program in nanoscience and condensed matter physics, with faculty participating from Physics and Astronomy, Chemistry and Biochemistry, and the Russ College of Engineering. Ohio University's experimental efforts have been challenged by building vibration, poor environmental control, and plumbing leaks in Clippinger Laboratories, which was constructed 50 years ago.

The Clippinger Labs renovation project is the first phase of a project to renew Ohio University's major science facility, which supports multiple colleges across the University. The strategy includes construction of a flexible, multipurpose class, lab, and research facility, as well as creation of additional lab space to meet capacity and modern teaching needs.

Several community college projects will enhance career counseling services.

Answering Governor Kasich's Call to Increase Career Counseling: \$14.4 Million between Cincinnati State, Columbus State, Eastern Gateway, Marion Tech, Owens, Sinclair, and Terra State

Connecting students to a career early and consistently throughout their academic career is a key strategy in producing more qualified, job-ready graduates. Several projects are recommended to renovate and prioritize space that will allow students to access a comprehensive continuum of career development services starting with career exploration, individual assessments to career pathways, coaching, co-op and internship placement and finishing with employer engagement and job placement. Without a doubt, improving the robustness of a career counseling program starts with process improvements, but many colleges are seeking capital projects to devote more space to this important activity or move career counseling services to a more visible location on campus to create a more streamlined advising experience for students.

2016 Recommendations

Maintaining Investments

Our state’s colleges and universities are the single most important economic development asset that Ohio enjoys, and they will only become more important as both current and future employers choose to expand or locate in areas with a highly trained and educated workforce. The growing costs of maintaining the physical structure of campuses and the need to modernize learning environments that are reflective of today’s highly technical workplaces is a pressing concern for institutions of higher education in Ohio. It is our shared responsibility to protect the citizens’ investment in our campuses by working together to ensure that rehabilitating our basic infrastructure remains our highest priority. Therefore, Ohio’s higher education leaders recommend that the majority of the state’s investment in this capital biennium be targeted towards rehabilitating or modernizing existing facilities.

Reducing the Costs of Operating Buildings

Within this priority, campus leaders were also asked to place a high priority on projects that would reduce the ongoing operating costs of the buildings on their campuses. Specifically, campuses

that advanced projects to replace existing roofs, improve electrical systems, or replace aging mechanical systems, were asked to confirm that significant costs savings could be realized in each of their individual projects. Most of the recommended funding in this category will support projects that generate operating savings

Safety and Security Concerns

From the beginning, college campuses have been designed as open, accessible, welcoming environments. Students that develop a strong connection to their campus, even in the years before they may ever enroll, end up being more successful academically. As campus leaders, we strive to maintain that open environment. However, given recent events at colleges and universities across the country, we also have an obligation to provide a safe environment for our students, faculty, and staff. Several projects are recommended that would allow our campuses to remain open, accessible and safe environments, while strengthening the safety and security backbone to help ensure timely and appropriate responses to potential campus threats. Nearly \$20 million in funding is recommended for projects that enhance campus safety and security.

Maintaining Investments

Institution	Project Description	Recommendation
Cuyahoga	Structural Concrete Renovations - Metropolitan Campus	10,000,000
Bowling Green	Campus wide HVAC Upgrades	8,418,500
Ohio State	HVAC Replacements	7,275,000
Bowling Green	Campus wide Electrical Upgrades	7,164,200
Cincinnati	Rieveschl Roof Replacement, and Rooftop Exhaust	6,800,000
Ohio	Ellis Hall Infrastructure Renewal	6,573,950
Cincinnati - Blue Ash	Muntz Hall Rehabilitation and Roof Restoration	5,242,871
Kent State	Bowman Hall Mechanical and Building Improvements	5,000,000
Ohio State	Roof Replacements	4,750,000
Cincinnati	Vontz Center Roof, Panel, and Window Replacements	4,427,129
Akron	Basic Renovations - Main Campus	4,100,000
Ohio State	Elevator Repairs	4,015,000
Ohio	Seigfred Programmatic Renovations and Mechanical	3,780,000
Ohio State	Building Envelope Repairs	3,259,000
Sinclair	Electrical Grid Replacements	2,900,000
Sinclair	Library Roof/Plaza Membrane and Concrete Replacement	2,850,000
Toledo	Campus Infrastructure Improvements	2,750,000
Ohio State	Plumbing Repairs	2,640,000
Cuyahoga	Deferred Maintenance - College-wide	2,500,000

2016 Recommendations of the Ohio Higher Education Funding Commission

Maintaining Investments

Institution	Project Description	Recommendation
Wright State	Campus wide Elevator Upgrades	2,500,000
Youngstown State	Ward Beecher Science Hall Renovations	2,500,000
Akron	Electrical Infrastructure Loop	2,400,000
Sinclair	Air and Temperature Control System Replacements	2,100,000
Clark State	Rhodes and Applied Science Center Renovations	2,000,000
Wright State	Envelope Repairs	2,000,000
Youngstown State	Jones Hall Student Success Facility Upgrades	2,000,000
Youngstown State	Meshel Hall Renovations	2,000,000
Akron	ASEC Exterior Façade	1,800,000
Akron	Polsky Exterior Façade and Renovations	1,775,000
Toledo	Building Envelope/Weatherproofing	1,750,000
Toledo	Elevator Safety Upgrades/Improvements/Replacements	1,750,000
Ohio	Building Envelopes	1,709,000
Ohio State	Electrical Repairs	1,685,000
Cincinnati State	Energy Efficiency and Savings Projects	1,675,000
Central State	Campus wide Chillers and HVAC Replacements	1,503,350
Kent State	Rockwell Hall Electric Chiller and Air Handling Replacement	1,500,000
Toledo	Snyder Memorial HVAC Systems Replacement	1,500,000
Wright State	Wellfield Remediation	1,500,000
Wright State	Electrical Infrastructure	1,500,000
Washington State	Main Building Door and Window Replacement/Drivivt Repairs	1,300,000
NEOMED	Replacement of Utility Infrastructure System	1,250,000
Toledo	Mechanical Systems Improvements	1,250,000
Wright State	IT Disaster Recovery Site in OU's Data Center	1,250,000
Belmont	Main Building Renovations	1,200,923
North Central	Kehoe Center Roof and Infrastructure Renovation	1,195,000
Kent - Trumbull	Main Classroom Building Roof and Fascia Replacement	1,150,000
NEOMED	Roadway, Parking, Storm Sewer, and Sidewalk	1,150,000
Ohio - Zanesville	Herrold Hall Renovations	1,050,000
Akron	Campus Hardscape	1,000,000
Kent - Tuscarawas	Founders Hall HVAC Upgrades	1,000,000
Owens	Administration Hall Water Infiltration	1,000,000
Toledo	UH Window Replacements	1,000,000
Toledo	North Engineering HVAC Systems Replacement	1,000,000
Wright - Lake	Campus Infrastructure - Shoreline Renovation/Stabilization	975,000
Ohio - Chillicothe	Bennett Hall Upgrades	950,000
Ohio State - Marion	Morrill Hall Office, Restrooms, ADA	950,000
Kent State	Liquid Crystal and Material Science Hood Control Re- placement	900,000
Akron	Roof Replacements	811,000
Akron - Wayne	Basic Renovations - Wayne Campus	800,000
Ohio State - Lima	Parking Lot Repairs	750,000
Ohio State - Lima	Reed Hall Roof	750,000
Youngstown State	Campus Development	750,000

2016 Recommendations of the Ohio Higher Education Funding Commission

Maintaining Investments

Institution	Project Description	Recommendation
Ohio - Lancaster	Brasee Hall Exterior and Roofs	700,000
Zane State	Campus Center Renovations	650,000
Ohio State	Road/Bridge Improvements	640,000
Ohio State - Marion	HVAC, Electrical, Lighting	624,000
Rhodes State	Basic Renovations	610,000
Ohio - Southern	MEP Upgrades	600,000
Marion Tech	Campus Asphalt Repair and Replacement	577,500
Ohio State - Marion	Asphalt Repairs	577,500
Stark State	Parking Lot and Roadway Repair/Resurfacing	550,000
Kent State	Satterfield Hall - HVAC	500,000
Northwest State	Safety/Security	500,000
Owens	Founders Hall Renovation	500,000
Owens	Heritage Hall Chillers and Boilers	500,000
Owens	South Campus High Voltage Switch Gear Upgrade	500,000
Toledo	Accessibility/ADA improvements/Enhancements	500,000
Zane State	Zanesville Campus Renovations	480,000
Central Ohio	LeFevre Roof Replacement - Newark-Adena	475,000
Ohio State - Newark	Adena/LeFevre Roof Replacement	475,000
Edison State	Computer Ctr/Edison Infrastructure Protection/Renovation	470,000
Kent - East Liverpool	Purinton Hall HVAC Upgrades	450,000
Ohio - Eastern	Shannon Hall HVAC Repairs	450,000
Central Ohio	Founders Hall Renovation Planning - Newark	450,000
Ohio State - Newark	Founders Renovation Planning	450,000
Marion Tech	HVAC, Electrical, Lighting Upgrades and Replacements	434,000
Owens	Pedestrian Bridges	400,000
Akron	Underground Vaults/Mechanical	350,000
Edison State	Parking Lot Resurfacing (Lot 1)	350,000
Rhodes State	Road and Parking Resurfacing	350,000
Kent - Geauga	Main Classroom Building Roof Replacement	325,000
Wright State	LAR Renovations	314,500
Central Ohio	Basic Renovations Newark	300,000
Ohio - Eastern	HPEC Parking Lot Reconstruction	300,000
Ohio State - Newark	Basic Renovations - Newark	300,000
Edison State	HVAC Repair and Replacement	280,000
Edison State	Roof Replacement - West Hall 2nd Floor	260,000
Central Ohio	Reese Center Roof Replacement - Newark	250,000
Ohio State - Newark	Reese Center Roof Replacement	250,000
Rhodes State	Reed Hall Renovations	225,000
Kent - Tuscarawas	Founders Hall Partial Roof Replacement	200,000
Ohio	Utility System Upgrades	200,000
Zane State	Cambridge Campus Renovations	200,000
Ohio - Lancaster	Brasee Hall Interior Upgrades	150,000
Owens	Findlay Campus Parking Lot	150,000

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Maintaining Investments

Institution	Project Description	Recommendation
Rhodes State	Boiler Replacement - Countryman	120,000
Kent - East Liverpool	Purinton Hall Sanitary Improvements	60,000
Owens	Health Tech HVAC System	20,000
Cincinnati	Rhodes Roof Replacement and Fire Suppression	7,000,000
Ohio State	Fire System Replacements	3,455,000

Safety Projects

Lorain County	Campus Threat Response Improvements	1,000,000
Kent State	Campus Fire Alarm System Replacements	900,000
Toledo	Enterprise Firewall	850,000
North Central	IT Data Infrastructure Upgrade	800,000
Shawnee State	Basic Renovations	800,000
Clark State	Safety and Security Upgrades	750,000
Ohio State - Lima	Standby Generators	750,000
Zane State	Parking/Walkway Improvements	670,000
Kent - Stark	Library Fire Protection System Installation	600,000
Toledo	Endpoint Security Improvements	450,000
Terra State	Lighting Efficiency Upgrades	425,000
Central Ohio	Hopewell/Reese Emergency Generators - Newark	375,000
Ohio State - Newark	Hopewell/Reese Emergency Generators	375,000
Ohio - Southern	Life Safety and Security Improvements	270,000
Central Ohio	Outdoor Lighting - Newark	250,000
Ohio State - Newark	Outdoor Lighting	250,000
Edison State	Security Cameras	200,000
Ohio State	Emergency Generators	200,000
Rhodes State	Campus and Classroom Safety Upgrades (with OSU Lima)	195,000
Zane State	Cambridge Willett-Pratt Training Center Exterior Lighting Upgrades	130,000

Subtotal Maintaining Investments

193,607,423

2016 Recommendations

World-Class Programs

World-class programs are built with outstanding faculty, close connections to industry, cutting edge research and laboratory equipment, exceptional and dedicated students, and an extremely close bond with the communities that they serve. Increasingly, modern capital facilities have become an extremely crucial piece of that puzzle. When colleges

and universities elevate their programs, they are building programs that will both generate the ideas that will fuel the future economy of Ohio, and produce graduates that will be prepared to excel in those new jobs. The HECFC recommends several facility improvement projects that will help build world-class programs housed within them.

World-Class Programs

Institution	Project Description	Recommendation
Ohio State	Koffolt/Fontana Lab Renovation	26,379,500
Miami	Pearson Hall Renovation (Oxford campus)	23,900,000
Cleveland State	Fenn Hall Addition	14,600,000
Cincinnati	HPB Renovation	11,000,000
Columbus State	School of Hospitality Management and Culinary Arts	10,000,000
Ohio State - Wooster	Thorne Replacement	5,000,000
Hocking	Equestrian and Veterinary Technician Workforce Facilities Renovation	2,000,000
Southern State	Adams County Workforce Development and Satellite Campus	2,000,000
Terra State	Campus Entrance Development	750,000
Rhodes State	Center of Health Sciences Education and Innovation	250,000

Subtotal World-Class Programs

95,879,500

2016 Recommendations

Workforce Development and Career Opportunities

The Ohio Department of Jobs and Family Services estimates that there are currently more than 125,000 openings for in-demand jobs in the state. Governor Kasich has placed an extremely high priority on meeting employer-driven needs, investing in the Ohio Means Jobs forecasting and real-jobs posting system, which is being integrated into the career counseling services offered to students on every college and university campus. Projects that advanced the

ability of Ohio to fill these available job openings were given the highest level of attention by the Commission. These project recommendations serve to both fill broad workforce needs because the individual college or university plays an especially important role in that industry statewide, and meet regional employment demands in an effort to spur local economic growth.

Workforce Development and Career Opportunities

Institution	Project Description	Recommendation
Ohio State	Postle Partial Replacement	26,000,000
Cleveland State	School of Film, Television and Interactive Media	7,500,000
Stark State	Akron Center for Education and Workforce	6,000,000
Lorain County	Health Sciences Talent Development Center Renovation	4,000,000
Lakeland	Health Technologies Building Renovation/Expansion	3,600,000
Northwest State	Welding Machine/Fabrication Shop Separation	2,010,000
Cincinnati State	GCMCA Additive Design and Materials Testing Innovations	1,880,000
Owens	Transportation Tech Building and Site Renovation	1,400,000
Rio Grande	Jackson Center Acquisition and Renovation	1,321,077
Bowling Green	Forensic Science Initiatives	1,000,000
Columbus State	School of Business Technologies	1,000,000
Hocking	Dental Hygiene Workforce Facilities Renovation	1,000,000
Lorain County	Manufacturing Innovation Center Renovation	1,000,000
Bowling Green - Firelands	Allied Health Sciences Building	847,500
Lakeland	Welding Lab Program Expansion	775,000
Cuyahoga	Public Safety Training Center	575,000

Subtotal Workforce Development and Career Opportunities

59,908,577

2016 Recommendations

Modernizing Learning Environments

The State of Ohio has now distributed more than \$10 billion to K-12 school districts to rebuild primary and secondary school buildings throughout the state. This has created a generation of high school students who have learned in cutting-edge science labs and classrooms. Yet, when these students arrive at our colleges and universities for more advanced study, they are often welcomed into outdated science labs and classrooms that are far from advanced.

Similarly, many academic disciplines require that students learn how to use and operate modern equipment such as top-of-the-line scientific instruments, advanced manufacturing machinery, and the latest in medical technology. As Ohio businesses continue to invest in cutting-edge equipment to maintain a competitive advantage, higher education must also pay for these costs as we upgrade our own learning environments in order to ensure that our students are ready to excel immediately after graduation.

The commission recommends the following projects that are aimed at improving the overall academic experience of students:

Modernizing Learning Environments

Institution	Project Description	Recommendation
Ohio	Clippinger Renovation	10,000,000
Cincinnati	CCM Infrastructure Replacements	7,000,000
Kent State	Taylor Hall Renovations - Visual Communications and Design	7,000,000
Akron	IT Cabling and Network Switches	6,564,000
Youngstown State	Academic Area Renovations and Upgrades	3,750,000
Columbus State	Academic Success Center	3,600,000
Central State	Information Technology Network and Infrastructure	3,447,000
Cincinnati State	Student Completion and Career Services One-Stop Center	3,100,000
Kent State	Terrace Hall Renovations - College of Public Health	3,000,000
Toledo	Academic Technology and Renovation Projects	3,000,000
Wright State	Campus-Wide Instructional Lab Modernization and Maintenance	3,000,000
Cuyahoga	Campus Center Renovations - Metropolitan Campus	2,500,000
Sinclair	Generation 4 Integrated Student Services - Advising/Completion	2,500,000
Owens	College Hall Renovation	2,250,000
Shawnee State	Advanced Technology Center/Tech and Industry Building	2,200,000
Toledo	Network Edge Distribution Replacement	2,050,000
Ohio State - Mansfield	Conard 2nd Floor Renovations	2,000,000
Eastern Gateway	Student Success Center	1,820,000
Shawnee State	Clark Memorial Library - Rehabilitation and Repurposing	1,800,000
Toledo	Research Laboratory Renovations	1,750,000
Ohio State - Marion	Morrill 3rd Floor Laboratory Renovations	900,000
Toledo	Fiber Optic Data Closet Upgrades	750,000
Toledo	Fiber Backbone Replacement – North Region Main Campus	750,000
Marion Tech	Academic Program and Career Counseling Expansion	688,500
Central Ohio	COTC Pataskala Campus Renovation Planning/Design	675,000

2016 Recommendations of the Ohio Higher Education Capital Funding Commission

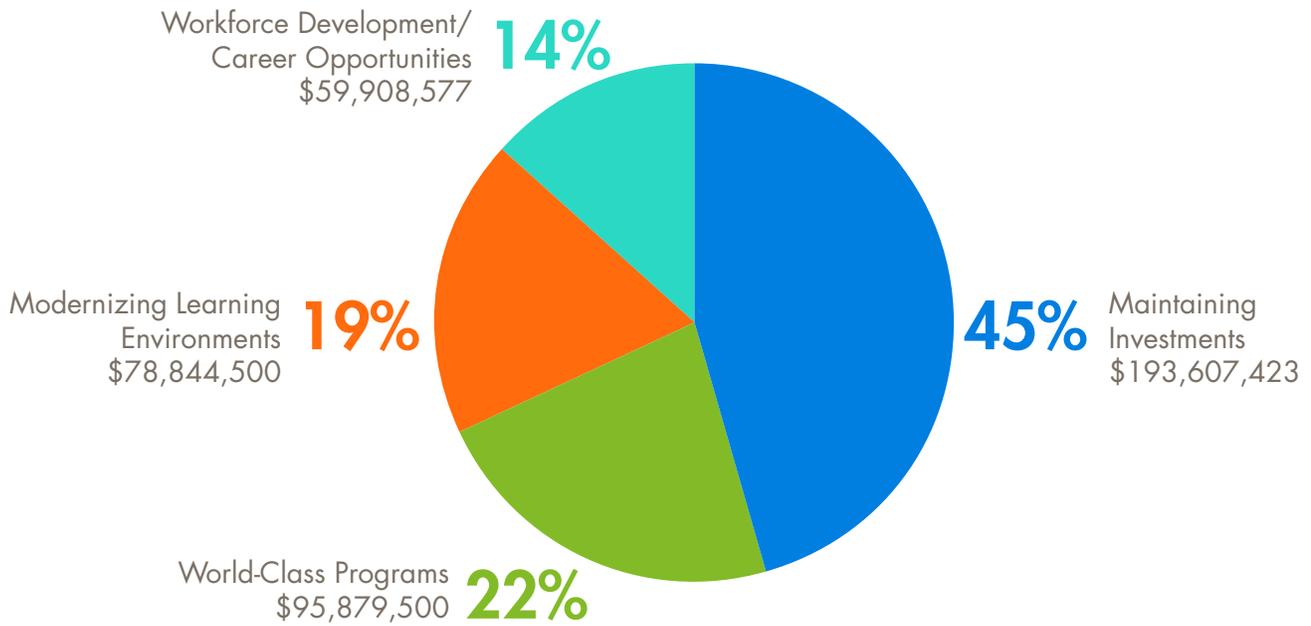
Modernizing Learning Environments

Institution	Project Description	Recommendation
Kent - Salem	Main Classroom Student Services Renovations	600,000
Rhodes State	IT Infrastructure	550,000
Owens	Kingsley Hall Renovation	500,000
Terra State	Student Success Center - Bldg. B	425,000
Kent - Ashtabula	Main Classroom Building Wing B	325,000
Edison State	Classroom and Lab Renovation	250,000
Rhodes State	Completion Plan Outcome - Toolbox	100,000
Subtotal Modernizing Learning Environments		78,844,500
Total		428,240,000

2016 Recommendations

Total Cost Breakdown
\$428,240,000

Strategic Investment Themes



By signature below, the OACC Presidents affirm their approval of the Higher Education Capital Funding Commission's final report and recommendations.



Dr. Paul Gasparro
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Dr. Dorey Diab
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Dr. Mike Bower
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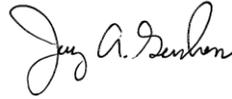


Dr. Chad Brown
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By signature below, the IUC Presidents affirm their approval of the Higher Education Capital Funding Commission's final report and recommendations.



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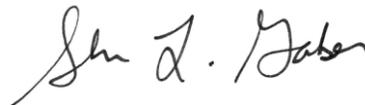
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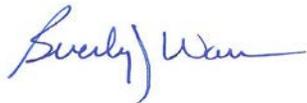
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