UNIVERSITY OF MICHIGAN

Five-Year Capital Outlay Plan and Project Request

University of Michigan – Ann Arbor

FY2024

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Facilities and Operations
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Contents

I. Mission and Overview

While some aspects of the higher education landscape are different, many remain the same. What guides us is our mission:

The mission of the University of Michigan is to serve the people of Michigan and the world through preeminence in creating, communicating, preserving and applying knowledge, art, and academic values, and in developing leaders and citizens who will challenge the present and enrich the future.

U-M delivers on its mission through excellence in academics, research, healthcare, student life, athletics, and community service. Our various schools and colleges are educating the next generation of leaders and thinkers, while a wide array of services enrich the academic experience and foster an environment where students can thrive. Interwoven through all of the core academic and administrative units that make up U-M is our common mission to serve the public good, lead, and enrich the future through the education of our students and the creation and application of new knowledge.

Our community is addressing some of society's most complex problems through research, creativity, and innovation. Michigan Medicine is dedicated to providing high-quality health care. U-M's rich athletics tradition builds community and provides life-changing opportunities to student-athletes. And our commitment to the public good includes nurturing community partnerships throughout the state to address issues ranging from education and justice to economic development and natural resources.

Various initiatives complement the university's mission, including diversity, equity and inclusion, sustainability, the arts, and innovation.

U-M's academic programs and initiatives, staffing, and enrollment build on our mission and university-level initiatives to drive priorities related to the physical campus. All influence the need for space, utilities, transportation, and other facilities and services.

U-M prides itself on creating and maintaining high-quality facilities that enable world-class education, research, and healthcare. Sustainability and stewardship are key to delivering on our mission.

Sustainability

For more than a decade, the university has been committed to integrating sustainability into our mission. The Ann Arbor campus began pursuing a set of challenging sustainability goals – in the areas of climate action, waste reduction, healthy environments, and community engagement – in 2011, and expanded upon this commitment in 2021 by establishing university-wide carbon

neutrality goals. Since U-M announced university-wide carbon neutrality commitments more than a year ago, we have accelerated meaningful climate action across all campuses.

Facility-related sustainability initiatives have led to lasting operational and cultural shifts. For example:

- An ongoing energy management program has contributed to a 22% reduction in energy use in academic buildings since 2006, accommodating growth in space without increasing emissions
- Sustainable grounds practices and storm water management improve local water quality
- Building standards factor sustainability into the design and construction of buildings
- Water bottle filling stations, composting, and other programs support waste reduction

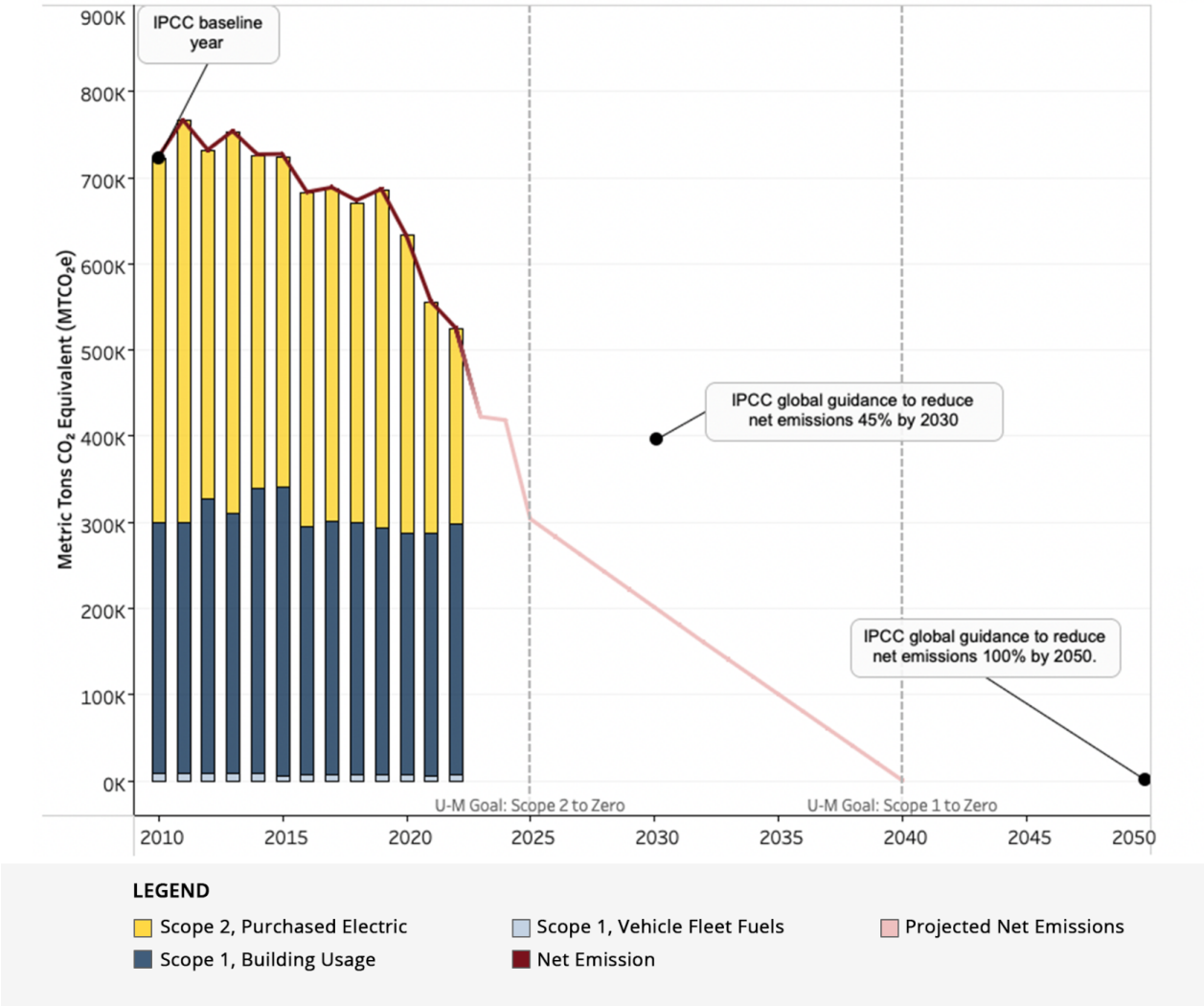
These highlights are part of the foundation on which U-M is expanding our sustainability efforts.

Carbon Neutrality

U-M committed to achieving carbon neutrality and launched a renewed master planning process that includes carbon neutrality as a central component (described further in section V). In addition, we are developing a utility master plan for North Campus, focused on decarbonizing heating and cooling infrastructure. These planning processes will provide guidance to expand upon projects that are currently underway.

U-M is committed to achieving net-zero greenhouse gas emissions from purchased power by 2025, eliminating emissions from direct, on-campus sources by 2040, identifying net-zero goals by 2025 for indirect emissions sources such as campus food, commuting, and university travel, and fostering a culture of sustainability with justice as a core principle. The goals span the Ann Arbor, Dearborn, and Flint campuses, Michigan Medicine and Athletics.

U-M Greenhouse Gas Emissions Levels and Reduction Trajectory



The university is pursuing an initial set of transformative projects to advance our carbon neutrality commitments, with steps including:

- Geo-exchange heating and cooling systems for several new construction projects, beginning with the Leinweber Computer Science and Engineering Building and a new North Campus residence hall
- Ramping up energy conservation projects, beginning with $15 million in FY22 out of an initial $25 million allocated to a new revolving energy fund. The projects include substantial LED lighting installations and heating, ventilation and air conditioning improvements.
- Applying newly-developed carbon-based building standards that require greater energy efficiency in new construction and major renovation projects.
- Purchasing four electric buses and 30 battery electric vehicles for the Ann Arbor campus, as a first step toward decarbonizing U-M's entire vehicle fleet.

Mobility
Mobility is key to a well-functioning campus and has a strong nexus with sustainability. Our high-level transportation strategy is to provide and encourage a variety of forms of transportation in alignment with the university's priorities.

As part of the university's ongoing master planning, the university has focused on a high-capacity transit corridor plan to connect Central, Medical Center and North Campuses. An automated guideway continues to be a high priority and was recommended by the President's Commission on Carbon Neutrality as an important strategy to improve connectivity and interdisciplinary collaboration between campuses and support our carbon neutrality goals.

The opening of a new transportation facility in winter 2022-23 will also support the university's emissions reduction and mobility goals. Since the current transportation building was built in 1974, the bus fleet has grown by 45 percent and transports over 7 million riders annually. The new facility meets current safety guidelines and will accommodate larger, articulated buses and electric vehicle charging infrastructure. The university has ordered four electric buses, including one that is articulated, to improve transportation capacity and advance toward fleet electrification.

As part of the university's overall transportation system – which includes strategies such as shuttles, vanpool, e-scooters, and planning for a high-capacity transit corridor – the parking system provides approximately 28,000 total parking spaces serving members of the university community as well as patients and visitors.

Over a five-year cycle, a parking engineering consultant is engaged to assess the condition of U-M's 17 parking structures. The assessments are used to develop a system-wide maintenance program to guide future repairs and budget planning. An update to this Capital Improvement and Protection Plan (CIPP) was completed in fall 2021. A similar assessment of surface parking lots is used to establish repair and construction priorities.

Utilities
U-M proactively and routinely reviews utility infrastructure to ensure the necessary production, distribution and collection systems for steam, natural gas, compressed air, potable water, electricity, chilled water and sanitary and storm sewer systems are in place to provide safe and reliable utilities. Projects are prioritized and implemented from these assessments. Recent and upcoming projects include:

- The commissioning of a new 15-megawatt gas turbine at the Central Power Plant in January 2022. Generation from this unit will reduce university-generated greenhouse gas emissions by 400,000 metric tons over 10 years and provide capacity for future load growth.
- Replacement of aging electrical switchgear is underway in the East Campus Switching Station and others are planned across campus over the next few years. These projects will ensure the continued reliability of the university's electrical distribution system and

allow for further electrification of campus, including the installation of electric vehicle charging infrastructure.

The President's Commission on Carbon Neutrality recommended a comprehensive geothermal system to support the future heating and cooling needs of campus buildings. To determine future requirements for energy infrastructure systems, a comprehensive North Campus Utility Master Plan is underway to study the collective system needs to support current and future facility requirements that best meet our long-term goals for carbon neutrality.

Stewardship

U-M prioritizes careful stewardship of campus facilities through planning, coordination, and maintenance of existing assets. Our policies support inclusion of maintenance and renewal in capital projects and major renovations. We monitor major building components and systems, including architectural, structural, civil, mechanical, electrical, life safety and fire protection, environmental health and occupational safety, and building accessibility.

Maintenance protects the functionality and extends the lifespan of existing assets, and typically takes place behind the scenes. These activities often go unrecognized, but are important for students, faculty, and staff to experience a safe and welcoming campus. See section IV for details on the university's facility assessment process, which provides strategic direction for maintenance activities.

Space Utilization

The university optimizes space use through campus-wide policies, processes, and reporting tools that support space management, more efficient utilization, and coordinated planning. The policies and tools address all types of space, including instructional, research, office, and food operations, and reinforce an institutional resource that is to be shared and managed effectively for the good of the institution.

An area of emerging focus is the rise in remote and hybrid work precipitated by the pandemic. Many departments with staff who can work remotely have found themselves needing less space or different types of space. Where possible, some departments have reduced their footprint and freed up space for higher priority needs or created more flexible and multipurpose spaces to support the new way of working and learning. We will continue to evolve to meet mission-driven needs and priorities and take in lessons from the pandemic to be as efficient as possible in existing and new spaces.

Our campus uses existing academic space by renovating and repurposing space to meet campus needs before considering building expansion. Examples of creative repurposing include:

- The historic Alexander G. Ruthven Building into flexible administrative, academic/research, student service, and meeting spaces. This nearly 100-year-old Albert Kahn building previously housed the university's biological sciences departments

and natural history museum. When those functions moved to nearby buildings in 2018, the outdated spaces were renewed and renovated into flexible spaces that will support U-M core work for decades to come. This in turn allowed for the demolition of the outdated Fleming Administration Building, eliminating a significant amount of deferred maintenance.

- The Edward Henry Kraus Natural Sciences Building into the new School of Kinesiology Building. This Albert Kahn-designed building is over 100 years old and previously housed part of the university's biological sciences departments. When those functions moved in 2018, the outdated spaces were renovated into modern research, teaching, and administrative spaces for the School of Kinesiology.
- The Dental W.K. Kellogg Institute Building, creating modern clinics for improved patient care, flexible research space, and meeting/collaboration space. This project received support from the state via the capital outlay process.
- A decommissioned research facility at the North Campus Research Complex into a facility that now houses library, art, and other historical collections.
- Weiser Hall, an aging and outdated 1960s classroom building, into modern and flexible administrative, teaching, and meeting/collaboration spaces for international programs and other centers and institutes.
- A number of lesser-used classrooms in the Modern Languages Building into a testing center for students with special test-taking needs.
- A previously vacant university-owned warehouse, the Varsity Drive Building, into a multi-use facility that houses research labs and specimen collections for the College of Literature, Science, and the Arts.
- The former Ford Nuclear Reactor into the Nuclear Engineering Laboratory building, a project that increased overall space utilization, resulting in a 20 percent increase in the total building square footage.

II. Instructional Programming

The University of Michigan, founded in 1817, has a history of over 200 years of leadership in education, innovative research, stewardship and service to the State of Michigan. The university consistently ranks in the top ten of public universities in the U.S., according to the U.S. News and World Report, and receives high marks for retention and graduation rates and for the reputation and excellence of many of the undergraduate, graduate, and professional degree programs offered by the university's 19 schools and colleges. As a public institution, the university strives to achieve its mission through teaching, research, and service, set within the framework of various schools, colleges, institutes and centers and through strategic partnerships with public and private institutions in Michigan and beyond. The following information describes various programs that support these core missions of the university and activities that may impact facility needs in the next five years.

A. Alfred Taubman College of Architecture and Urban Planning

The University of Michigan offered its first courses in architecture in 1876, and today the Taubman college offers bachelor's, master's, and doctoral degrees in various fields, including architecture, urban and regional planning, and urban design. The college shares the 1970s Art and Architecture Building on North Campus with the Penny W. Stamps School of Art and Design and leases an off-campus facility as faculty and graduate student studio space. Thanks to a gift from A. Alfred Taubman, the college added a new wing in 2017 that provides modern instructional space, expanded student studios, and more spaces for student and faculty interaction, critiquing, and exhibitions. Much of the original 1970s building has aging classrooms, administrative and faculty spaces, and other support spaces that will eventually need to be renovated.

Penny W. Stamps School of Art & Design

The Penny W. Stamps School of Art & Design shares the Art and Architecture Building with the A. Alfred Taubman College of Architecture and Urban Planning, where it offers a comprehensive range of bachelor's and graduate degree programs in art, design, and inter-arts performance. The school operates out of three facilities (the Art and Architecture Building, a campus warehouse used for faculty and graduate student studios one mile away, and a leased space that is used as a gallery to display student work nearly three miles away) because they are constrained in their main building. The school operates with space constraints that limit some students from having access to studios. The university has worked to expand studio space within the current footprint but the ratio of space per student remains low relative to peers.

Stephen M. Ross School of Business

The Ross School of Business educates leaders, researchers, and lifelong learners who create innovative solutions to the world's most complex business challenges and is consistently ranked high nationally and internationally. They offer all levels of action-based instruction from bachelor's, master's, and doctoral degree programs in business, accounting, management, supply chain management, and business analytics to executive education programs in leadership and management and the impact of the school's graduates extends across the globe.

The school occupies multiple buildings on Central Campus, many of which have been recently constructed and renovated with support from its donor and namesake, Stephen M. Ross. The school also leases nearby off-campus space for some core academic functions and continues to express the need for an on-campus solution for these functions. Additionally, some of the school's older buildings, including Wyly Hall and the Executive Residence, have aging infrastructure that will need to be addressed at some point in the future.

School of Dentistry

Established in 1875, the School of Dentistry is one of only two schools of dentistry in the State of Michigan and continues to be a top-ranked program nationally. It offers bachelor's, master's, and doctoral degrees, as well as certification and continuing education, in a variety of dental fields including dental hygiene, pediatric dentistry, orthodontics, periodontics, oral and maxillofacial pathology, and surgery. The school's dedication to health and wellness extends well beyond the research lab and classroom. The school provides clinical services to patients on campus and around the State of Michigan and is particularly dedicated to providing care to underserved, at risk, and special needs patients. In 2017, the State authorized capital outlay funds to renovate and expand the Dental W.K. Kellogg Institute Building. Construction began in 2018 and concluded this year. The project improves the building's infrastructure, creates modern clinics for improved patient care (including a new special needs clinic), creates open, flexible research space to support the school's world-class research, and offers space to foster collaboration. This project addresses the school's most pressing needs; however, due to size of the overall complex, some areas (remaining research labs, classrooms, and vivaria) were not included in the project scope and will require investment in the future.

School of Education

The School of Education was formally founded in 1921; however, teacher diplomas were first offered at the university in 1874 with master's and doctoral degrees added in the decades following. The school prepares students for professional careers in teaching and administration and offers advanced training and certification for researchers and practitioners at all levels of education. The school is housed in a 1920s building (a former elementary and high school) that has had modest renovations over the past several years. The school has identified additional needs for renovations to better support its mission and improve accessibility.

College of Engineering

The College of Engineering, established in 1895 is renowned, both nationally and internationally, for delivering high-quality education and cutting-edge research to help solve the world's problems. Today, nearly all of the college's undergraduate and graduate programs rank in the top 10 nationally, enabling its students to experience academic excellence at its best. The college occupies over 30 buildings on the university's North Campus, many of which were built over 40 years ago when engineering program requirements were much different than they are today. As a result, the university continues to renovate and modernize instructional and research facilities as priorities dictate and funds allow. Examples in the past decade include the following: renovation and addition to the G. G. Brown Memorial Laboratories (with support from the State), repurposing the former Ford Nuclear Reactor into the Nuclear Engineering Laboratory Building

(with support from donor gifts), and constructing the new Ford Motor Company Robotics Building that included a naming gift and a lease of one floor to Ford. While the projects noted above address many of the college's needs for modern teaching and research space, the college still has a number of departments and programs in aging spaces. The college will soon be updating its strategic facilities master plan to identify its capital project needs and priorities across its many departments. An earlier version of the study helped prioritize the needs of the Computer Science Engineering (CSE) department, currently housed in the Bob and Betty Beyster Building. With recent State capital outlay support, U-M just broke ground on a project to expand with the construction of the Leinweber Computer Science and Information Building. The Leinweber building will address CSE's and the School of Information's needs and is expected to open in 2025. In partnership with the state, the college and U-M are poised to be on the cutting edge of the electric vehicle (EV) transformation, with a recently announced initiative to create an EV training center. Planning is just beginning, and we are thankful for the support from the State to leverage our existing EV and mobility expertise on campus and to create this transformative center.

School for Environment and Sustainability

The University of Michigan began offering classes in forestry in 1881 and was the first university in the United States to do so. In 1903, the university created the Department of Forestry that, over time, transitioned to today's School for Environment and Sustainability (SEAS). Since the late 1880s, SEAS has been a pioneer in developing a scientific understanding of ecosystems, including their conservation, management, and restoration; and trains leaders, assists in policy-making, and teaches the skills necessary to manage and conserve the earth's resources. The school offers degrees at the master's and doctoral levels, as well as certification in fields like conservation ecology, environmental informatics, geographic information system (GIS) and modeling, environmental policy and planning, and sustainable systems. The school's historic home, the Samuel Trask Dana Building, underwent a series of renovations in the early 2000s, thanks in large part to capital outlay funds from the State. At the time of completion in 2004, it was the first major academic renovation to receive a LEED Gold certification rating for sustainable design and construction in the state of Michigan and among the first in the country. Since this renovation, the school has undergone a significant transformation and strengthened its mission to address real world climate issues through research and partnerships across campus, the state, and beyond. The school has also experienced significant growth in its enrollment, and it is beginning to look at ways to better meet its mission in a space that it has outgrown.

School of Information

A formal program in library and information studies began in 1926 when the Department of Library Science was created within the College of Literature, Science, and the Arts. The department became a fully independent school of library science in 1969. In response to rapid changes brought on by technology, the school broadened its teaching and research significantly in the 1990s and was renamed the School of Information. Its focus is offering a highly interdisciplinary and collaborative approach to education to those who will serve as leaders in the information professions. The School of Information occupies space in the North Quadrangle

Residential and Academic Complex (North Quad) and in three off-campus leased spaces, all needed to support their tremendous growth over the past several years. Since 2010, the school has added several new masters programs and an entirely new undergraduate program. To address this growth, the university is constructing the Leinweber Computer Science and Information Building, which is expected to be completed in 2025. We are thankful to the State for their partnership through the capital outlay process to make this project possible.

School of Kinesiology

Kinesiology has been part of the University of Michigan curriculum since the turn of the twentieth century, but the school became an independent unit in 1984. Today, it offers bachelor's, master's and doctoral degrees in a variety of subject areas, including athletic training, health and fitness, movement science, and sport management, and it is a top-ranked program in the nation. Due to the school's tremendous growth, the university recently renovated and transformed the 1915 Edward Henry Kraus Natural Sciences Building (designed by Albert Kahn) for the school and renamed the building the School of Kinesiology Building. This project enabled the school to consolidate its programs into one facility and will accommodate the school's needs for years to come.

Law School

Since its founding in 1859, the Law School has been a national and international leader in the field of law and educational access—in 1870, the school was the nation's second university to award a law degree to an African American and, in 1871, the first in the nation to award a law degree to a woman. The school's graduates work in every state and all over the world in business, as practitioners and professors, as legislators and members of Congress, and as distinguished civil servants and members of the judiciary. In recent years, the Law School was able to significantly improve and expand upon its historic but aging facilities through a series of renovations and construction projects. Many of these projects were only possible by support from donors, like Lisa and Christopher Jeffries and Charles T. Munger, for whom two Law buildings are now named. The school still has some aging facilities that will require attention in the future.

University Library System

The University Library system can trace its history to 1838, one year after the university's relocation to Ann Arbor, with the purchase of John James Audubon's Birds of America books that are still on display. Much has changed since the library's founding, but its central role in advancing the university's research and teaching missions continues. Today, the University Library is one of the largest university library systems in the United States, with over 14 million volumes stored in various buildings around the Ann Arbor campus. The library is also leading the university's efforts in materials digitization, online, distance, and digital education, looking at ways to enhance the effectiveness and efficiency of on-campus teaching and educational technology and at ways to expand the university's outreach to new audiences. Such technological advancements and a general shift in how students and the community interact with collection materials have significantly changed the responsibilities and operations of the library, and as a result, the library has begun to transform the way its buildings are used to

provide new ways for the university community to interact with its materials. The University Library's main operations are housed in the Harlan Hatcher Graduate Library (Hatcher) and Shapiro Undergraduate Library (Shapiro)--two interconnected buildings that form one complex in the heart of Central Campus. Hatcher, one of our iconic Albert Kahn-designed campus buildings, is over 100 years old and Shapiro is over 65 years old. Although these buildings are heavily used (with over 2 million visitors each year), they no longer adequately meet campus needs. Both buildings were designed and built at times when libraries' missions were primarily to house stacks of books and to provide places for quiet study and research. Given the building's central location on campus, the buildings would be ideally transformed into modern facilities that offer information, services, and spaces that better support modern teaching, learning, and research, and improves access to digital and print collections. However, in order to pursue such a revisioning of the library spaces, a large number of their collections would need to be housed elsewhere and away from campus.

College of Literature, Science, and the Arts

The College of Literature, Science, and the Arts (LSA) is the largest college on the Ann Arbor campus serving the greatest number of undergraduates, and it houses its departments and centers in over 25 different buildings on campus. Due to its large size and diverse curriculum and research, the college is continually making space improvements and conducting modest renovations to meet their academic and research needs and update aging buildings. LSA has identified the Chemistry Building as their highest priority for a more comprehensive solution. The building was built in three phases (1908, 1948, and 1988) and is a total of 545,000 gross square feet. It is used for chemistry research and foundational chemistry and natural science classes that are required by several schools and colleges on campus; however, its research and teaching labs are antiquated, costly to renovate individually, and no longer reflect modern science needs. Addressing the Chemistry Building is a high priority to the university, but will take time to address due to the building's size, complexity, and labs that are essential to so many science-related programs on campus, and a study is underway to determine how to best approach this major project. The university will need to invest in the renovation of the nearby 428 S. Church St building (currently occupied by the College of Pharmacy) for use by the Department of Chemistry to enable a phased renovation of the Chemistry buildings. Following the Department of Chemistry's use, the university plans to use the building for core student-facing and academic programs that will benefit from the building's prime campus location for decades to come.

Medical School

Since opening its doors in 1850, the Medical School has been a leader in medical education, biomedical research, and patient care. In addition to its professional Doctor of Medicine program, the school offers master's and doctoral degrees in the basic medical sciences. The school is renowned for its many firsts in medicine, including establishing the nation's first university-owned and operated teaching hospital and creating the first departments of pharmacology and human genetics in the United States. The Medical School was also among the first major American medical schools to admit and graduate women and minorities. As science and clinical care models continually change in the healthcare industry, it is important

that our top-ranked Medical School be nimble to position itself for the future of medical education, and the Medical School continues to renovate and modernize instructional and research facilities as priorities dictate and funds allow. The school is evaluating its existing facilities to determine how they can best support the needs of the learning community, including replacing traditional lecture halls with a variety of flexible, reconfigurable classrooms; an expansion of simulation spaces and labs that support immersive and active learning; and providing spaces that support student well-being.

School of Music, Theatre & Dance

As one of the oldest and largest schools of music in the United States, the School of Music, Theatre & Dance ranks among the top schools of music and conservatories in the country. Degrees are offered at the bachelor's, master's, and doctoral levels in nearly all fields of music, dance, and theater. The school includes five buildings on the university's North Campus and Central Campus. In recent years, the university has worked to improve and modernize the school's facilities. In 2021, the school opened its new Dance building on North Campus. This 24,000 gross square foot building provides dance studios, a large performance studio theater, physical training and student support spaces, and the department's administrative space, and it replaces a small outdated campus building and a leased facility several miles away from the school. The school still has aging facilities on North Campus that will need some attention at some point in the future.

School of Nursing

The School of Nursing has maintained a reputation of excellence for more than 100 years and has been a national leader in the advancement of nursing knowledge and the promotion of trends in health care since its founding. The school offers bachelor's, master's, doctoral, and certification programs in a wide variety of nursing fields, such as pediatrics, gerontology and midwifery. In 2015, the school opened a new 78,000 gross square foot building adjacent to the original building. The building provides active-learning classrooms, a technology rich clinical learning center with simulation and skills labs and simulated patient suites, offices for student services and a few faculty offices. The original Nursing Building, which is over 100 years old, still houses a number of Nursing's core functions, and as funds allow the university will update spaces to support Nursing's mission.

College of Pharmacy

Established first as a department in 1868, the College of Pharmacy became an independent college in 1876, the first at any university in the United States. Today, Pharmacy is the oldest college of pharmacy in the country and is a top three ranked program nationally, offering a number of bachelor's, master's, and doctoral degrees in fields such as pharmaceutical sciences, pharmaceutical engineering, and medicinal chemistry. The college currently occupies space in six buildings on campus, excluding clinical space, five of which were built prior to 1960, so they have aging infrastructure and science research labs and classrooms that reflect a bygone era. For a small college like Pharmacy, being physically distributed across so many locations in aging facilities significantly challenges its ability to meet its core academic, research, and clinical mission, to operate efficiently, and to maintain its high ranking. In May 2019, the U-M Board of

Regents approved a project to design a new 130,000 gross square foot building that will co-locate and modernize Pharmacy's core functions, including research, administration, and instructional spaces. After the College of Pharmacy relocates, the university plans to renovate their existing building for use for the Department of Chemistry to enable a phased renovation to the Chemistry Building. (See "College of Literature, Science and the Arts," earlier in this section, for information on this capital project need.) Following the Department of Chemistry's use, the university plans to use the building for core student-facing and academic programs that will benefit from the building's prime campus location for decades to come.

School of Public Health
Though formally established in 1941, the School of Public Health can trace its beginning to 1887 when the first professor of hygiene was appointed, and to 1897 when the university awarded its first degree in that field. Today, the school offers undergraduate, master's, and doctoral degrees in fields such as biostatistics, environmental health sciences, epidemiology, health behavior and health education, nutritional sciences, and health management and policy, and health informatics. Over the past decade, the university made a series of renovations and an expansion to the school's existing buildings to provide higher quality research, classroom, and administrative space, and invested in significant infrastructure improvements to its research-heavy facilities.

Gerald R. Ford School of Public Policy
The Gerald R. Ford School of Public Policy traces its history to the founding of the Institute of Public Administration in 1914, the first university program in the United States to provide a systematic course of study in municipal administration. Today, named in honor of Gerald R. Ford, the 38th President of the United States and an alumnus of the University of Michigan, the school prepares graduates for distinguished careers in policy analysis and management and promotes improved public policy through research. Its graduates work in government and in the private and nonprofit sectors all over Michigan, the United States, and throughout the world. Thanks to a generous gift from Joan and Sanford Weill, the school was able to consolidate into a single building, named Weill Hall, in 2006. Since the building opening, the school has experienced changes in its research and pedagogy, including adding an entirely new undergraduate program (beyond its traditional graduate-level focus). To address this growth, the school continually seeks ways to accommodate its changing needs within its building.

Horace H. Rackham School of Graduate Studies
The Horace H. Rackham School of Graduate Studies oversees and coordinates graduate education, bringing together graduate students and faculty from across the institution to experience and take full advantage of the university as a scholarly community. In 2003, a major renovation of the historic Horace H. Rackham Building, originally constructed in 1938, was completed. Additional infrastructure improvements to the facility were completed in 2015. Given the iconic building's age, historic significance, and its prime location as an event and study facility on Central Campus, it is a building that will require on-going upkeep.

School of Social Work

The program in Social Work began in 1921 and was granted the status of a school in 1951. The School of Social Work consistently ranks as one of the top programs in the nation and offers master's and doctoral level degrees and continuing education that prepare practitioners, researchers, and academics in the fields of interpersonal therapy, community organization, management of human services, and social policy and evaluation. Its graduates work throughout Michigan, the U.S., and the globe, with individuals, children and their families, organizations, and communities in such fields as substance abuse, aging, mental health, education, child and public welfare, and public policy. In 2018, the school completed a minor renovation of spaces in the School of Social Work Building that were previously occupied by a number of non-social work functions. This project was able to address some of Social Work's most pressing needs for administrative, faculty, instructional, and student service spaces.

III. Staffing and Enrollment

The University of Michigan – Ann Arbor enrollment surpassed 50,000 this fall for the second year running and increased by nearly 1,000 students compared to fall 2021. Over the last two decades, enrollment has grown modestly at 1.4% per year. In the next several years, enrollment growth is expected to continue at a similar pace, with growth in online course and program offerings and undergraduate summer class enrollment being pursued. Detailed fall enrollment data by school and college for the most recent five years is in Appendix A.

Average class size varies by discipline. In fall 2021, 54 percent of the primary sections taught to undergraduate students had fewer than 20 students. Some sections are taught to large groups where appropriate; 18.5 percent of the total undergraduate sections had 50 or more students in fall 2021.

The full-time equivalents (FTEs) of faculty and staff supported by the General Fund displayed a compound annual growth rate of 2.2 percent from fall 2012 through fall 2021. The volume of research expenditures, the total from grant and university sources, has increased 2.5 percent per year since FY2011.

In-person instruction has returned to being the norm after pandemic-induced remote instruction, although the university remains aware of the possibility that evolving pandemic conditions may call for adjustments to the mode of instruction.

Several schools and colleges – including the College of Engineering, Medical School, School of Nursing, School of Public Health, Stephen M. Ross School of Business, School of Information, and School of Social Work – offer distance learning to reach non-residential students. The Center for Academic Innovation provides support for the development of new online offerings, some of which are degree-granting while others lead to other credentials or support lifelong learning.

IV. Facility Assessment

Physical Properties

The university owns approximately 3,200 acres of property within the Ann Arbor area and approximately 21,000 acres overall (most within the State of Michigan). The approximate replacement value of the Ann Arbor area campus facilities is $9.2 billion. A summary of the university's land holdings is included in this section. See Appendix B for a list of buildings including building type, gross square feet, and (where available) the deferred maintenance backlog for the building.

University of Michigan Land Holdings

(Expressed as Acreage)

	2018	2019	2020	2021	2022
Ann Arbor Area:					
Properties Supported by General Fund	1,705	1,711	1,711	1,711	1,711
Auxiliary Activities:					
Student Residences	32	32	32	32	32
University Hospitals Group	448	430	427	427	452
Other	1,018	1,018	1,018	1,018	1,018
Total Ann Arbor Area	**3,202**	**3,191**	**3,188**	**3,188**	**3,213**
Outside the Ann Arbor Area:					
Dearborn Campus	228	228	228	228	228
Flint Campus	51	51	51	51	50
Other Michigan Properties:					
Biological Station	10,329	10,329	10,329	10,329	10,329
Osborn Preserve	3,188	3,188	3,188	3,188	3,188
Willow Run	156	156	156	156	156
Other	3,649	3,649	3,649	3,649	3,649
Out-State Land	**17,600**	**17,601**	**17,601**	**17,601**	**17,600**
Camp Davis - Wyoming	120	120	120	120	120
Grand Total	**20,922**	**20,911**	**20,909**	**20,909**	**20,933**

Facility Condition Assessment

Buildings across the university are regularly evaluated to identify and prioritize infrastructure needs, which vary by building type, use, and occupants. For instance, U-M Health facilities have regulatory and accreditation requirements. Student Life manages priorities related to residence halls and student living accommodations.

Academic buildings, as a more detailed example, are managed under the Facility Condition Assessment (FCA) Program. The FCA Program evaluates buildings to identify infrastructure

deficiencies and establish a priority for funding renovations and repairs. The objective of the program is to develop and maintain a 5-year model showing facility-related needs and track the status of each project through completion. The model considers the highest priority needs and spreads such needs over a 5-year period.

The FCA Program maintains a comprehensive database on the physical condition of the academic building portfolio. The database is regularly updated and stores facility condition data on most major building components and systems, including architectural, structural, civil, mechanical, electrical, life safety and fire protection, environmental health and occupational safety, and building accessibility.

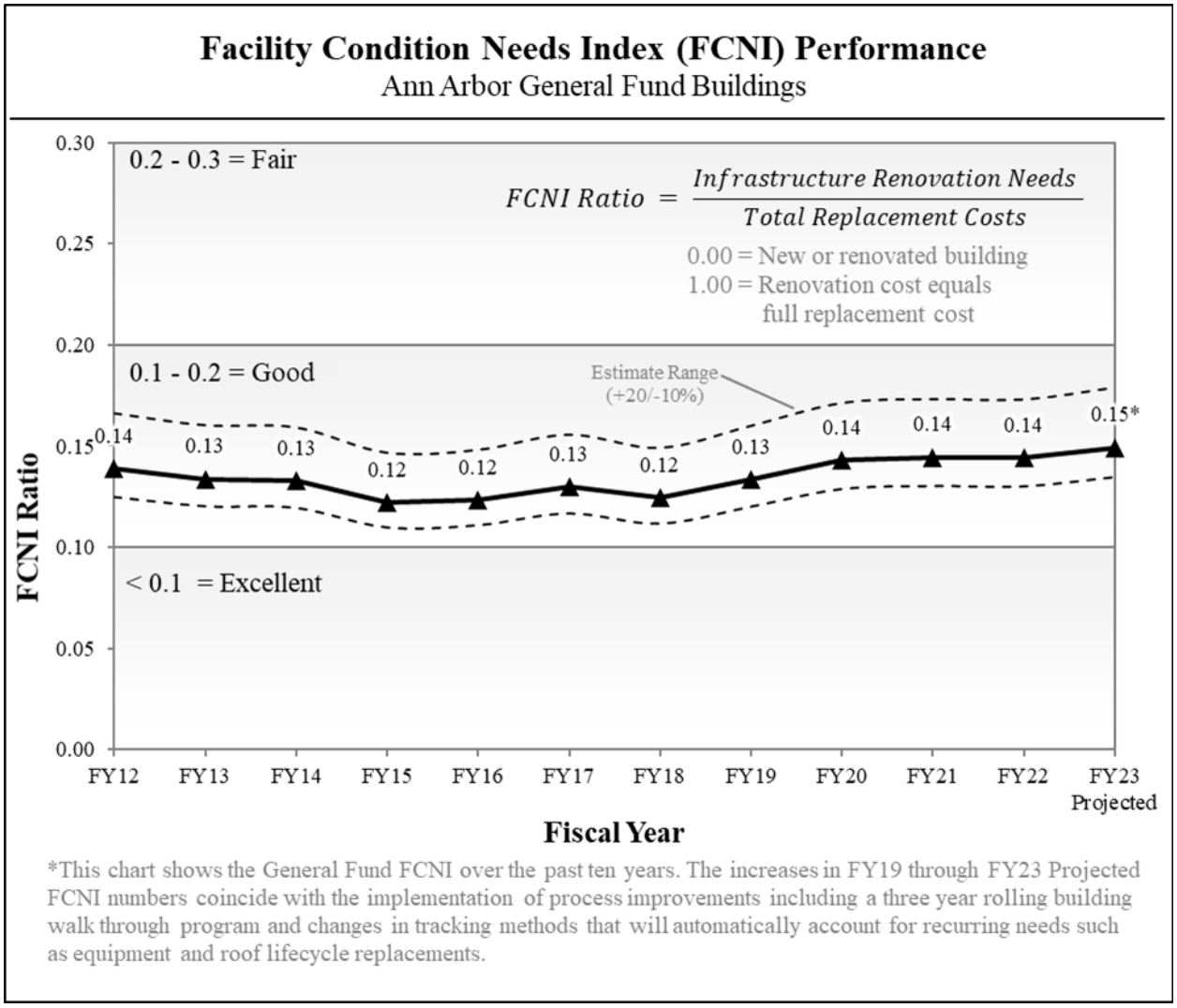
FCA Priority Classification System
The following system was developed to help clarify priorities and support consistency in planning and decision-making:

Priority Level		**Definitions**
Necessary	**Priority #1** **Critical**	Needed work that requires near-term action to accomplish one or more of the following: (1) restore building occupancy due to natural disaster or catastrophic failure (2) address cited or known life-threatening safety hazard
	Priority #2 **High Priority**	Needed work that requires near-term action to accomplish one or more of the following: (1) avoid situation from becoming a priority #1 (2) prevent accelerated deterioration of building component or system (3) replace component that has worn out or is no longer in service (4) avoid loss of critical system that would significantly affect services, impact occupancy, or create a safety hazard (5) address existing non-life-threatening safety hazard (6) maintain, restore, or upgrade conditions to minimum acceptable university standards (7) reduce unacceptably high maintenance, energy and/or other operating costs (economically justified via payback) (8) meet program requirements
Deferrable	**Priority #3** **Necessary**	Needed work that is expected to become a priority #1 or #2 within the next 10 years.

	Priority #4 **Deferrable until Building Renewal**	Needed work that can probably wait more than 10 years. This work will be completed during a building renewal.

Facility Condition Needs Index

The facility condition needs index (FCNI) is the cost required to correct all deficiencies in a building divided by the total replacement cost of that building. A lower ratio is more favorable. This indicator is useful in determining which buildings should be considered for major renovations or upgrades and used for trend analysis.



V. Implementation Plan

Major Projects by Campus

Master planning guides the near-term and long-term strategic development of campus. The President's Commission on Carbon Neutrality recommended incorporating carbon neutrality into our master planning process. In preparation, faculty, staff and students provided input to develop these value statements:

- Create a diverse, equitable, accessible, affordable and inclusive environment to ensure all individuals have "full opportunity to thrive."
- Enhance campus spaces to foster engaging, safe and vibrant experiences for all students, faculty, staff, patients, alumni and visitors.
- Achieve carbon neutrality and foster environmental stewardship through the responsible and productive use of the natural and built environments.
- Foster a thriving environment that enriches the overall health and well-being of U-M's diverse campus community.
- Strengthen the programmatic, functional and physical connectivity within and between each campus and the respective communities of Ann Arbor, Flint and Dearborn.
- Promote innovation, cultivate creativity and maintain flexibility to achieve future programmatic aspirations.
- Advance the university's mission-driven priorities with stewardship that optimizes and protects the use of physical and financial resources for future generations.

Instruction and research aspirations and mission-related requirements – including continued emphasis on active learning, preservation of knowledge, interdisciplinary and collaborative research and instruction, increased flexibility and adaptability, and improved synergies among faculty and students – drive renovations and additions planned within the next five years. Other considerations include deferred maintenance requirements, our carbon reduction goals, and continuing to densify the campus core. For Michigan Medicine, a strategic need to recruit and retain staff has spurred exploration of opportunities to provide childcare.

The university has also been focused on improving housing to support students over the last 15 years. After initially addressing important life safety needs, the university invested in major renovations and continues to plan new and replacement housing for its aging housing stock. On Central Campus, planning continues in the South Fifth neighborhood. On North Campus, planning and design for new and replacement beds are underway. Demolition of the Northwoods III housing units is now complete to make way for redevelopment of this area with new housing that meets the more contemporary needs of our students and includes a geothermal facility to support our emissions reduction goals.

Each campus has a unique set of facility requirements, associated land uses, operational requirements and degree of activity that require tailored approaches to facility planning as described in the following section. This section also lists major projects (over $5 million) in

various stages of consideration, planning, design or construction. These projects support student life, modern learning and collaboration, patient care, sustainability, and the university's commitment to nourish the arts and advance the public good. Over the next five years, a wide variety of infrastructure projects or programmatic changes will emerge that will initiate the development of projects not on the lists.

Central Campus and Medical Center Campus

The development of Central Campus remains consistent with university planning principles that promote renovating and re-purposing existing facilities while maintaining the character of the historic core. Medical Center Campus planning continues to focus on renovations and redevelopment opportunities as well as addressing infrastructure, transportation and site improvements to support existing facilities. Construction continues on the new adult inpatient tower – the Pavilion at University of Michigan Health – needed to improve inpatient clinical care. In addition, Michigan Medicine's ongoing strategic facilities master planning effort may impact planning for the future of the Medical Center Campus core area as well as the Wall Street district, the North Ingalls area, and East Medical Campus.

A significant number of projects, some highlighted below, respond to growth pressures by academic and research initiatives as well as patient care needs.

- Construction has been completed on a new 100,000-square-foot classroom building on Central Campus that serves as many as 10,000 students each day. The classroom building includes 1,400 classroom seats in a variety of learning spaces and all designed to support active and team-based learning. The project's design accommodates the university's evolving academic needs, as more courses and instructors require large, modern, team-based and active-learning classrooms. The project also included a renovation and reuse of the adjacent historic Alexander G. Ruthven Museums building to house space for academic and research initiatives as well as administrative functions.
- Construction has been completed on the School of Dentistry's major renovation and addition project. This project received $30 million in state funding from the FY17 Capital Outlay Request. The renovation and expansion creates a more welcoming, accessible facility with an improved patient entrance, modern teaching clinics and open, flexible research space. A new special needs and inter-professional care clinic treats patients with complex medical conditions and disabilities.
- Construction continues for the new adult clinical inpatient tower (The Pavilion at University of Michigan Health) on the Medical Center Campus in response to high demand for patient rooms and surgical suites. The 690,000-square-foot project will be completed in 2025 and will accommodate an inpatient care program with single-occupancy patient rooms and surgical/interventional radiology suites. Specifically, the patient program emphasizes improved access to clinical neurosciences and cardiac care services. Relocation of existing clinical services from University Hospital will allow for future redesign and growth for patient programs remaining in that facility.
- Design is nearing completion for a new teaching and research facility to address the College of Pharmacy's need to consolidate and modernize its space. The new building

will house active learning-style classrooms, teaching and research wet laboratories, and associated support spaces.

- Construction will begin later this year on a new recreational sports facility to replace the university's largest recreational sports center, the Central Campus Recreation Building. The new 200,000-square-foot facility will enable greater access and opportunity for students, faculty and staff to improve their health and well-being. The project follows recent extensive renovations to the North Campus Recreation Building and the Intramural Sports Building. To provide Central Campus with indoor recreation space during the construction of the new facility, construction of a 23,000-square-foot temporary recreation facility on Palmer Field estimated is underway. The facility will provide nearly 90 percent of the most popular workout space for students, including strength and cardio equipment and small indoor track.
- Construction will begin later this year for a 60,000-square-foot renovation of the B and D Wings of the Medical Science Unit I Building to address deferred maintenance and convert obsolete wet lab research space into an efficient and collaborative dry and computational research space for the Medical School's Computational Medicine and Bioinformatics department.
- The design of a replacement building is nearing completion for the Ginsberg Center. The new facility will support the Ginsberg Center's mission to enhance community and civic engagement and plans include a geo-exchange heating and cooling system to support the university's carbon neutrality goals.
- Construction is planned to replace the electrical substation serving University Hospital, which is nearing the capacity limit to support facility upgrade projects. The new substation will provide greater reliability and efficiency.
- We have a unique opportunity to perform major renovations of the President's Residence while the house is unoccupied during the transition between university presidents. The university's investments into this oldest building on campus (original house built in 1840) over the past two decades have been underfunded resulting in a significant accumulation of deferred maintenance and necessary updates. The project will address essential ADA and accessibility upgrades for the public ground floor, enhance functionality of the private residence space, and complete updates that support safety and security. The upgrades will preserve historical features of the house, which is listed on the National and State Registers of Historic Places.

Current and Planned Major Projects (>$5M) Central and Medical Center Campuses FY22-FY26			
PROJECT/BUILDING & STATUS	PROJECT TYPE	GROSS SQUARE FEET	ESTIMATED $ (MILLIONS)
U-M Health Clinical Inpatient Tower (The Pavilion at University of Michigan Health) [in construction]	New Construction	690,000	$920
College of Pharmacy – New Building [in design]	New Construction	130,000	$121

Central Campus Recreation Building Replacement [in design]	New Construction	200,000	$150
Palmer Field Temporary Recreation Facility [in construction]	New Construction	23,000	$9.5
Medical Science Building 1	Renovation	60,000	$42
Edward and Rosalie Ginsberg Building [in design]	New Construction	11,000	$10.5
U-M Health University Hospital Electrical Substation Replacement [in construction]			$11.7
President's Residence [in construction]	Renovation	5,100	$15
A. Alfred Taubman Biomedical Science Research Building Vivarium Expansion [in construction]	Renovation	20,000	$19
U-M Health Clinical Pathology Relocation and Renovations [in construction]	Renovation	186,000	$160
Harold T. and Vivian B. Shapiro Library [in construction]	Renovation	31,000	$6
Observatory Hall	Renovation	TBD	TBD
Residential	Replacement/ Demolition	TBD	TBD

North Campus

With the greatest capacity for future growth and development, North Campus continues to be a high priority planning focus. Efforts to strengthen and reinforce connections internally on North Campus, as well as between campuses, and strategies to further enliven and enrich student life remain a primary focus of ongoing planning activities. Currently, about 30 percent of students who live in U-M housing reside on North Campus. A future residential development is being considered for the southeast corner of Murfin Avenue and Plymouth Road, where the Northwoods Apartments are located.

Construction is underway for the Leinweber Computer Science and Information Building. This project will address projected growth over the next 10-15 years. The space and enrollment growth challenges faced by the College of Engineering and the School of Information are similar, and both units will benefit from this project.

Design was recently completed for the adjacent Hayward Street Geothermal Facility, which will supply heating and cooling to the Leinweber Building and make it the first large-scale university building to not rely on natural gas for heating. The Hayward Street Geothermal Facility will have the capability to integrate with district geothermal systems as recommended by the President's Commission on Carbon Neutrality.

Current and Planned Major Projects (>$5M) North Campus FY22–FY26			
PROJECT/BUILDING & STATUS	PROJECT TYPE	GROSS SQUARE FEET	ESTIMATED $ (MILLIONS)
Residential [in construction]	Replacement/ Demolition	380,000	$190
Leinweber Computer Science and Engineering and School of Information Building - FY20 Capital Outlay request [in design]	Renovation/ Addition	TBD Renovation 163,000 Addition	$145
Hayward Street Geothermal Facility	New Construction	N/A	$20
Dean Road Transportation Facility [in construction]	New Construction	70,000	$39
Naval Architecture and Marine Engineering	Renovation/ Addition	TBD	TBD
George Grainger Brown Memorial Laboratories			$5.15

Stephen M. Ross Athletic Campus

The Ross Athletic Campus is primarily a venue for the Athletics Department, with numerous athletic fields and facilities. Recent facility improvements by the Athletics Department have resulted in a number of projects that improved student recreation and enriched the experience for student athletes. The obsolete Michigan Stadium scoreboards will be replaced with more reliable and more energy efficient equipment. The Athletics Department is reviewing potential future uses for the Ferry Field area as facility needs within the historic core of the Ross Athletic Campus are being re-evaluated in response to the shift of indoor and outdoor track to their new venues.

Current and Planned Major Projects (>$5M) Ross Athletic Campus FY22–FY26			
PROJECT/BUILDING & STATUS	PROJECT TYPE	GROSS SQUARE FEET	ESTIMATED $ (MILLIONS)
Michigan Stadium Scoreboard Replacement [in construction]	Renovation	N/A	$41M
Ferry Field Improvements	TBD	TBD	TBD

East Medical Campus

East Medical Campus is primarily an outpatient clinical care complex that includes associated research and medical education activities. Projects for this location might include elements such as water supply, storm water management, transit and non-motorized transportation strategies, parking, and infrastructure.

Michigan Medicine Off-Campus

The volume of ambulatory care and specialty care visits continue to grow and the need for strategically located outpatient facilities is core to Michigan Medicine's plan to improve access to patient care. The Northville Health Center opened in 2014 and is being used near capacity. Construction was completed on two additional off-campus facilities, the West Ann Arbor Health Center in 2017 and Brighton Health Center South in 2018. These new outpatient facilities are part of Michigan Medicine's overall strategy to deliver enhanced and comprehensive services in the communities where patients are located. As a result, outpatient clinical space on the Medical Center Campus can be repurposed for increased acuity care.

Michigan Medicine continues to evaluate potential affiliations and initiatives to expand access, quality, and level of care to patients. The Specialty Pharmacy project is one such initiative. Expansion of the Specialty Pharmacy will double the number of prescriptions filled in-house per year to provide high-quality, convenient care for patients.

Current and Planned Major Projects (>$5M) Michigan Medicine Off-Campus FY22–FY26			
PROJECT/BUILDING & STATUS	PROJECT TYPE	GROSS SQUARE FEET	ESTIMATED $ (MILLIONS)
U-M Health Specialty Pharmacy Expansion [in construction]	Renovation	48,000	$52

Detroit Academic Off-Campus

The university continues to identify ways to support and strengthen engagement efforts and partnerships within the City of Detroit. The university is conducting a study of a phased renovation to the Rackham Detroit building to create a central hub for U-M engagement in Detroit and co-locate programs currently in multiple leased properties in the Midtown Detroit area. The university also continues to explore potential academic initiatives through the construction of the Detroit Center for Innovation.

The university is part of a consortium that is creating a new, innovative educational partnership and neighborhood revitalization efforts on the campus of the former Marygrove College in northwest Detroit. When fully realized, Marygrove will be a P-20 "Cradle-to-Career" campus with educational opportunities from prenatal to Pre-K, K-12 to post-secondary graduate, as well as community services and engagement programs. To date, Marygrove has seen $75 million in philanthropic investment, creation of the early education program, K-2 grades (with more added each year), and a high school. U-M's School of Education operates a first-in-the-nation teaching residency program at Marygrove and is working closely with community and philanthropic partners to expand and formalize more higher education opportunities on site in the years to come.

Facility Updates and Adaptation

Each year a significant number of infrastructure projects are prioritized through the Facility Condition Assessment Program as described in Section IV. A planning priority is to adapt existing facilities to meet current and future program needs by updating building infrastructure and re-programming/reconfiguring existing buildings. Over the next five years, the university will implement various projects in this category.

Status of State Building Authority Projects (Ann Arbor)

Completed Projects	**Lease Start Date**	**Lease Termination Date**
School of Dentistry Renovation and Addition	August 1, 2022	August 1, 2057
G.G. Brown Memorial Laboratories Renovation	September 1, 2017	September 1, 2052
Student Activities Building Renovation	December 1, 2009	December 1, 2044
Michigan Memorial Phoenix Laboratory Renovation	December 1, 2009	December 1, 2044
Observatory Lodge Renovation	November 1, 2008	November 1, 2043
Literature, Science and the Arts Building Renovation	August 1, 2007	August 1, 2042
West Hall Renovation	January 1, 2005	January 1, 2040
Mason Haven and Haven Hall Renovations and Addition	November 1, 2005	November 1, 2040
S.T. Dana Building Renovation	November 1, 2003	November 1, 2038
Perry Building Renovation	November 1, 2003	November 1, 2038

VI. Capital Outlay Project Request FY24

Institution Name:	University of Michigan – Ann Arbor
Project Title:	428 Church Street Building Renovation Project
Project Focus:	Academic, research, and administrative support
Type of Project:	Renovation to the 428 Church Street Building (formally referred to as the “College of Pharmacy Building”)
Project Focus of Occupants:	Chemistry web lab, classroom and administrative space for teaching and research
Approximate Square Footage:	Current building is 56,772 gross square feet. Proposed project renovates the majority of the existing building, updates building infrastructure, includes accessibility improvements, and corrects life and safety deficiencies.
Total Estimated Cost:	$50,000,000
Estimated Start/ Completion Dates:	Start: Programming and conceptual design study to be completed Spring 2025, to align with timing of building being vacated. Construction estimated to start Fall 2025 and be complete by Fall 2027.

Is the Five-Year-Plan posted on the institution’s public internet site?	Yes
Is the requested project the top priority in the Five-Year Capital Outlay Plan?	Yes
Is the requested project focused on a single, stand-alone facility?	Yes

Project Purpose

The intent of the 428 Church Street Building renovation project is to extend the life of this existing, structurally sound building for multiple uses over the next 50 years:

1. Initially, the building will provide critical space for the Department of Chemistry over the next 10-15 years while the phased Chemistry Building renovation is under construction. (Note: We are currently developing a phased renovation project for our Chemistry Building that will proceed pending approval by the U-M Board of Regents.)
2. As the Department of Chemistry transitions back to their renovated Chemistry Building, the 428 Church Street Building will provide a long-term home for various academic programs and student service needs.

About the 428 Church Street Building Renovation Project

The 428 Church Street Building is located at the east gateway entrance to our Central Campus in a prime, highly visible location. It is currently used by our College of Pharmacy (Pharmacy) but will be vacated in spring 2025 when Pharmacy moves to a new building. Originally constructed for Pharmacy in 1960 and expanded in 1992, this 57,000 gross square feet (gsf) building ranges in age from 30 to 60 years old. Fifty-four percent (54%) of the building is research lab space, and the remaining space is administrative (43%) and vivarium space (3%). Although the building's structure is in reasonable condition, its infrastructure systems (HVAC, windows, etc.) are decades old and fail repeatedly.

This project will replace the building's infrastructure, bring it up to current fire, life safety, ADA, State Bureau of Fire Services (BFS), and other code requirements, and extend the life of this building for decades to come. The project will also design the infrastructure for future flexibility, enabling us to repurpose and reuse this building to serve multiple needs, first as a 10-15 year transition space for our Department of Chemistry, and then as the long-term home for various academic programs and student services. Our plan is to renovate the 428 Church Street Building first, and then renovate the Chemistry Building, as described below.

Chemistry Building Transition Need

One of the university's highest priority capital project needs is to renovate our aging Willard H. Dow Chemistry & Laboratory Building (Chemistry Building) for the Department of Chemistry. The Chemistry Building is a 545,000 gsf building constructed in 1908 and expanded in 1948 and 1988, so its sections range from 34 to 114 years old. Sixty-seven percent (67%) of the building is teaching and research lab space and the remaining 33% is classroom and administrative space.

The aging Chemistry Building no longer meets modern science teaching and research needs and is hindering the Department of Chemistry's ability to meet its core mission. Its labs also pose a challenge to conducting modern research safely and efficiently. Lack of space resulting from enrollment growth over the past decade[1] makes it challenging to accommodate the over 13,300 students[2] who take Chemistry classes each year and for Department of Chemistry faculty to expand their research.

Numerous outdated fume hoods, aging infrastructure and significant deferred maintenance make the building the most energy inefficient facility of all U-M Ann Arbor campus buildings.

Overall, the Chemistry Building is in serious need of a major renovation. However, due to the building's sheer size, complexity, and cost to renovate, we anticipate this will take multiple

[1] The number of undergraduate Chemistry majors grew from 70 in 1999 to 500 in 2019, representing a 614% increase. During this same timeframe, the number of students enrolled in 100- and 200-level Chemistry courses grew from 6,500 (1999) to 13,300 (2022), representing a 105% increase. The building's square footage, however, has remained constant since 1988.

[2] Over 13,300 students (representing academic programs from across the U-M Ann Arbor campus) are enrolled in introductory 100- and 200-level Chemistry courses each year. The Department of Chemistry also has approximately 500 undergraduate majors and approximately 280 PhD students.

phased projects over approximately 10-15 years to complete. Before we can start the first phase, we need transition space to support the Department of Chemistry, particularly their lab needs, during construction.

Note: Given the size of the Chemistry Building, it is more cost effective for us to renovate than to construct a new building. In addition, if we had to construct a new building, we would need to do so nearly two miles away on North Campus, which is where we have land available to support a building of this size. Having a chemistry building on North Campus would pose additional transportation and logistical challenges for the thousands of students who take chemistry classes each year.

Our Vision for the 428 Church Street Building
We have identified the 428 Church Street Building as a solution to support some of the Department of Chemistry's needs during their lengthy renovation project mentioned earlier. When the Department of Chemistry's needs end, we will keep all administrative space intact (approximately half the building) and repurpose labs to administrative space. The current labs are adequate to use as transition space for the Department of Chemistry, but their low floor-to-ceiling heights are not ideal for modern science teaching or research in the long term. With future repurposing in mind, we anticipate the cost to renovate this space will be minimal and is something we will self-fund when the time comes.

After the Department of Chemistry vacates the 428 Church Street Building, we will use it to house broader academic programs and student services currently located in off-campus leases. Relocating some of these programs and services to this building will not only bring them back to campus, but also save the university hundreds of thousands of dollars in annual lease costs. Examples of current programs that would be good candidates for this building and location include The Program on Intergroup Relations, Center for Educational Outreach, ADVANCE, Student Legal Services, and the Graham Sustainability Institute. It is hard to predict exactly what our academic program and student service space needs will be in 10-15 years (when the Chemistry project is complete), but this is our intention at this time.

Scope of the Project

This project will renovate the four-story, approximately 57,000 GSF 428 Church Street Building to address the backlog of deferred maintenance needs and address all building code requirements necessary for State of Michigan Bureau of Fire Services (BFS) certification in order to prepare its labs for transition space use by the Department of Chemistry. Based on prior infrastructure studies of the building, we know that the majority of the proposed project budget will need to be allocated to replacing infrastructure systems (HVAC, electrical, plumbing, fire alarm and fire suppression, elevators, etc), addressing the exterior envelope (masonry repairs, window replacement, adding insulation where feasible), and bringing the building up to current building code requirements (including some interior wall relocation to address egress corridors and egress stair code issues, ADA issues, and bathroom renovations to address required fixture counts). This basic infrastructure investment will extend the life of the building by another 50+ years.

We anticipate re-using as much furniture as feasible in the administrative and public spaces, and therefore plan to carry a minimal FFE budget within the project for very limited furniture replacement. The FFE budget will not include purchase of any laboratory fixed or moveable equipment.

We also anticipate relocating existing movable equipment from the Chemistry Building to the 428 Church Street Building for use during the transition period to minimize the need for n. Existing movable equipment that is not yet at the end of its useful life will then return to the Chemistry Building after it is renovated. We will purchase, install, and fund all new equipment needs, both movable and fixed, through a separate project and budget distinct from the State project and budget.

Program Focus of Occupants

The occupants who will benefit from the 428 Church Street Building renovation project have programs focused in fundamental chemical science as well as specializations in several core areas of chemistry (analytical, chemical biology, chemical education, inorganic, materials, organic, and physical). The fundamental and foundational programs are essential to students pursuing careers in the sciences, engineering, or health science fields. The research conducted in specialized areas contributes to our understanding of life sciences, materials, energy, environment and climate. It also contributes to solving pressing global problems and has enormous impacts on the industrial sector.

Additional Information

1. **How does the project enhance Michigan's job creation, talent enhancement and economic growth initiatives on a local, regional, and/or statewide basis?**

The 428 Church Street Building renovation project provides a clear path to renovating our Chemistry Building, which is critical to supporting our STEM teaching, learning, and research needs.

In turn, the renovated Chemistry Building will contribute to talent enhancement and economic growth as described below.

<u>Contribution to talent enhancement</u>
Chemical knowledge is essential for many technical and medical careers. Nearly every undergraduate who majors in science and engineering at the university takes at least one chemistry course. This includes all students who enter graduate schools in the sciences or engineering and those who go directly to the workforce in technically oriented companies, such as Dow, BASF, PPG, GM, Ford, and Chrysler. It also includes all students who enter health-related professional schools (Medical School, School of Dentistry, and College of Pharmacy) and contribute vital services and research to support the State's healthcare industry.[3]

[3] Over 50% of State of Michigan dentists are University of Michigan alumni.

This breadth is reflected in the ~35,000 student credit hours taught by the Department of Chemistry in 2022. The ~500 undergraduate students who major in Department of Chemistry disciplines are mostly pre-med, pre-dental, pre-pharmacy, and other pre-professional students, many of whom further their training or ultimately practice in Michigan. The PhD program has produced 220 graduates over the past 5 years. Of these, 14% have entered the Michigan workforce in a variety of companies and colleges. Another 70-100 post-doctoral fellows further their training in the Department of Chemistry each year. In addition, Department of Chemistry faculty mentor and graduate PhD students from other programs including the Program in Chemical Biology, Macromolecular Science and Engineering, and Chemical Engineering. Thirty companies have recruited specifically in the U-M Department of Chemistry in recent years. A variety of other companies, such as Dow, PPG, AbbVie, BASF, Bristol Myers Squibb (BMS), some of which have facilities in Michigan, also support U-M graduate students with fellowships to maintain relationships with the Department of Chemistry as a pipeline for future hiring.

Contributions to economic growth

Attracting people. As a prominent and highly respected program, the Department of Chemistry attracts students, faculty, and staff from the state and around the world to U-M interested in being part of its academic and research programs. Our Department of Chemistry also attracts students and faculty in related disciplines, such as life sciences, chemical and materials engineering, and environmental science because it offers opportunities for interdisciplinary collaborations and shared expertise. These individuals contribute to and strengthen our U-M community and the local communities in which they live.

Generating research dollars. In fiscal year 2022, the Department of Chemistry accounted for more than $23.5 million in research expenditures. For the past 5 years, research expenditures exceeded $111 million. This funding was spent mostly on salaries of local employees who contribute to the local economy through spending. Other expenditures were for supplies and services needed for research that directly or indirectly benefitted the state and local economy.

Synergy with industry. Research-intensive academic institutions with successful chemistry programs can attract and develop mutually beneficial relationships with chemical and biotech companies in the region. Examples of this type of synergy include the chemical/biotech industry in the vicinity of Harvard/MIT (Vertex, Novartis, Millenium Pharmaceuticals) and University of North Carolina/Duke (bioMerieux, Biogen, Novo Nordisk). A similar ecosystem of local small chemical/biotech companies, including Cayman Chemicals, LynxDx, Arbor Assays, BoroPharm, Enzo Life Sciences, and Kaiser Optical, as well as international chemical companies (e.g., Dow, BASF, PPG, Sartorius), exists in Michigan. These companies thrive on hiring students who received training through the Department of Chemistry as well as interactions with U-M. For example, in 2021 Sartorius announced a $57 million investment in Ann Arbor with the creation of 160 high wage jobs and emphasized their interest in local talent for their company. The Department of Chemistry receives substantial funding from companies such as Dow, BASF, Merck, P&G, and Agilent. These interactions contribute to the local economy through research grants and gifts to the university. Non-federal research support (which is primarily from companies) to the Department of Chemistry totals $13.75 million over the past 5 years.

Maintaining the Department of Chemistry operation at the highest possible level is necessary to keep these interactions vital.

Innovation. The university has averaged approximately 400 patents and 20 start-up companies per year. The Department of Chemistry accounted for 48 patents and 6 start-ups over the past five years. Further, much of the other science-related entrepreneurial activity relies on the underlying chemistry expertise and facility infrastructure housed in the department. Maintaining the Department of Chemistry in its highest functional state is necessary to continue this work.

2. **How does the project enhance the core academic and/or research mission of the institution?**

The 428 Church Street Building renovation will have a direct impact on the academic and research mission of the Department of Chemistry and on other academic units later. The investment in the 428 Church Street Building will enable the Department of Chemistry to continue offering classes, conducting research, and operating while the Chemistry Building is under construction. Once the Department of Chemistry no longer needs transition space, the 428 Church Street Building will enhance the academic mission by providing a home for student-facing and other academic programs that will benefit from its prime Central Campus/gateway location.

The 428 Church Street Building renovation project on its own will not enhance the core academic or research mission of the university. It will, however, enable us to begin a deep renovation of our Chemistry Building, a project that will greatly enhance science and engineering-based teaching and learning and our overall academic and research mission.

Enhancing the academic mission

The Department of Chemistry teaches foundational courses required for engineering, medical, pharmacy, and natural science students. Over 1500 students are enrolled in the introductory CHEM 130 (General Chemistry: Macroscopic Investigations and Reaction Principles) class this fall representing approximately 20% of the incoming first-year undergraduates enrolled at U-M. Another 1300 undergraduate students are enrolled in CHEM 210 (Structure and Reactivity I). These large classes are taught in the Chemistry Building, which houses the largest lecture hall on campus as well as numerous class labs for accompanying chemistry lab classes.

The Department of Chemistry also participates in numerous outreach activities that promote science to youth in the surrounding area. A few examples are listed below.

- Females Excelling More in Mathematics Engineering and Sciences (FEMMES) is a program that aims to promote science as a career to young high school women. The Chemistry Building traditionally hosts one of the main activities that involves bringing girls to the building for a day of science demonstrations.
- DRISE provides summer internships to high school students through a partnership between the U-M Department of Chemistry and Cass Tech High School in Detroit. Students perform full-time research for seven weeks in a chemistry lab, all while living on

campus as U-M students would. The program aims to increase underrepresented, minority participation in the sciences and motivates students to consider attending college and pursuing STEM fields.
- Michigan Chemistry Opportunities for Research and Education (MCORE) is a preview program for graduate school directed at students from underprivileged backgrounds.

Enhancing the research mission

The Department of Chemistry maintains the largest research footprint, measured as research funding and graduate program size, in the largest college at U-M. It plays an essential role as a central science to many U-M science and engineering-based programs and collaborates on a variety of research projects with schools and colleges across the university, particularly in the health sciences and engineering. As a central science, Department of Chemistry research contributes to our understanding of life sciences, materials, energy, environment and climate. It also contributes to solving pressing global problems and has enormous impacts on the industrial sector. For example, the Department of Chemistry houses active research programs in recycling plastics and new battery technology. The department also has exceptional expertise in developing catalysts, which are substances, like enzymes, that increase the rate of a chemical reaction (without the catalyst being consumed itself) and is at the heart of the chemical industry. Catalysts have broad impact to the world of chemical processing and can save vast amounts of energy and chemical waste and enable chemical processing to occur in ways that would not otherwise be possible. Approximately 80% of all manufactured products use catalysts, so catalyst development is critical to the world's economic success and yields an economic impact equivalent to 30% of the global gross domestic product (GDP).[4]

By renovating the Chemistry Building and constructing state of the art class labs and research labs, we enable our Department of Chemistry faculty to teach in new and innovative ways, improve the student learning experience, and continue a large volume of innovative and leading research that supports the mission of the university and the university's role in serving society. Renovating the 428 Church Street Building is the first step to making this critical need come to fruition.

3. **Is the requested project focused on a single, stand-alone facility? If no, please explain.**

Yes.

4. **How does the project support investment in or adaptive re-purposing of existing facilities and infrastructure?**

The 428 Church Street Building project renews and extends the life of this building for another 50 years, providing a more cost-effective, convenient, and sustainable solution to meeting the

[4] Philosophical Transactions of the Royal Society A, 'Catalysis making the world a better place', *National Center for Biotechnology Information*, Catlow, C. Richard. Davidson, Matthew. Hardacre, Christopher. Hutchings, Graham J., 2016 February 28, https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4707691/, (accessed 7 October 2021).

Department of Chemistry's transition needs rather than constructing transition lab space elsewhere on campus or leasing off-campus lab space.

The building structure is in good condition, considering its age; however, the building's exterior envelope is in need of renovation to address leaks and needed improvements to the building's energy efficiency. The aging mechanical, electrical, and plumbing infrastructure has outlived its useful life and needs replacement. Investments in new infrastructure will focus on achieving the highest levels of energy efficiency within the target budget to support the institution's commitment to sustainability and to keep operating costs to a minimum.

As mentioned previously, the 428 Church Street Building will serve the U-M campus well beyond the needs of Chemistry and be flexible enough to support other academic needs in the future. Our long-term vision is to use the building for decades to come as the home for student-facing programs that will benefit from being in the heart of Central Campus.

5. **Does the project address or mitigate any current health/safety deficiencies relative to existing facilities? If yes, please explain.**

The university maintains an on-going list of infrastructure deficiencies within U-M buildings. This project would address nearly all identified infrastructure deficiencies within the 428 Church Street Building and would include the following:

- Improvements to create a facility that is barrier-free as defined by the Americans with Disabilities Act (ADA) and the Michigan Building Code
- Repair and/or replacement of mechanical equipment to ensure adequate ventilation, temperature control, and safety in chemical laboratories
- Installation of an emergency power and distribution network
- Life safety improvements including fire rating repairs and upgrading the fire detection and alarm system
- Replacement of both electrical substations (aged 50 years and 25 years) to improve electrical system safety

6. **How does the institution measure utilization of its existing facilities, and how does it compare relative to established benchmarks for educational facilities? How does the project help to improve the utilization of existing space and infrastructure, or conversely how does the current utilization support the need for additional space and infrastructure?**

<u>How we measure and compare utilization of existing facilities</u>
We recognize that physical space is a valuable resource needed to fulfill our core mission and take a holistic approach to ensuring good stewardship of campus space. We have space management policies, processes, and reporting tools in place to support a culture of agile space management, more efficient utilization, and coordinated planning, and have been a leader in helping other institutions implement similar approaches on their campuses for years.

The key elements of our space utilization model include:

- *Space utilization data, policies, and processes* – Our campus-wide policies, processes, and reporting tools (available at provost.umich.edu/space) have been in place for over a decade and address all types of space, including instructional, research, office, and food operations, and reinforce a culture where space is considered more an institutional resource that is to be shared and managed effectively for the good of the institution. Examples of tools we use to monitor and encourage effective classroom utilization include:
    - *Classroom time utilization report* – measures # of hours a classroom is scheduled / # of hours a classroom is available for use (Mon-Fri, 8-5)
    - *Classroom seat utilization report* – measures # of enrolled students in a class / # of seats available in the classroom (Mon-Fri, 8-5)
    - *Scheduling distribution report* - measures how well schools and colleges are distributing their classes and events throughout the day (8-5) and throughout the week (Mon-Fri)
- *Budget model that includes charging units for space* – The university's activity-based budget model (in place for over 20 years) includes assigning space operating costs (utilities and plant operating costs) directly to units our schools, colleges, and units with revenue streams for the space they occupy. This internal space-charging model offers financial incentives for using space more efficiently and effectively. For example, units that need more space must demonstrate that they can afford to fund the space operating costs associated with the additional square footage before exploring the possibility of increasing their physical footprints. Conversely, units that reduce their physical square footage reduce their space operating costs proportionally, which enables them to apply the savings to other higher priority and mission-focused needs. This space-charging model influences how units think about their space, its financial budget implications, and how to use space more effectively.
- *Capital projects process* – General Fund units with major capital project needs (for new buildings, additions, or renovations) have the opportunity to submit their needs (business case) for consideration annually. A cross-functional committee of executive leaders and deans reviews the unit needs, tours their spaces to understand how the capital project needs of each unit compare to each other, and recommends priorities to the provost. This process allows for different perspectives in determining academic capital project priorities.
- *Informal benchmarking* – We share space utilization data and policy information as a method of informal benchmarking with institutional colleagues in the Big 10 as needed.

<u>How the current utilization supports the need for improved / modern space and infrastructure</u>
We considered the items listed above along with programmatic needs and facility condition in assessing the Department of Chemistry / Chemistry Building renovation need, which is, in turn, driving the need to renovate the 428 Church Street Building as a transition home for the Department of Chemistry and this state capital outlay request.

The Department of Chemistry has experienced tremendous growth and research activity has more than doubled over the years as indicated in the table below; however, the building's physical footprint hasn't changed since 1988.

	Fall 1999	Fall 2022	% Difference
# of Dept. of Chemistry undergraduate majors	70	500	614%
# of Dept. of Chemistry PhD students	175	280	60%
# of U-M students enrolled in introductory 100- and 200-level Chemistry courses	6,500	13,300	105%
Research funding *(actual dollars, not including inflation)*	$7M	$23.5M	235%
Building gross footage	545,000	545,000	0%

This growth has strained the Department of Chemistry's class labs, research labs, general classrooms, and administrative spaces, as well as the building's infrastructure, all of which were designed and built decades ago for a lower demand use.

Classroom and Class Lab Time and Seat Utilization[5] (M-F, 8am – 5pm)	Higher Ed Norm	Chemistry Bldg Fall 2022	% Difference
Classroom *time* utilization	65 to 70%	86%	Exceeds norm
Class lab *time* utilization	~50 to 60%	58%	Within norm
Classroom *seat* utilization	65%	62%	Slightly below norm
Class lab *seat* utilization	Assume 65%	82%	Exceeds norm

The Chemistry Building renovation project will position the Department of Chemistry to better fulfill its academic and research mission for decades to come. But first, we need to renovate the 428 Church Street Building, which is the linchpin to a subsequent Chemistry Building project.

7. How does the institution intend to integrate sustainable design principles to enhance the efficiency and operations of the facility?

[5] Time utilization measures the number of classes scheduled versus the number of hours a room is available Monday-Friday, 8am-5pm. Classroom time utilization in the ~65-70 percent range is considered the industry norm in higher education. It acknowledges that a perfect match between available classroom seating capacities and course enrollments is not always possible in every time period. It also acknowledges that classroom seating capacity, course enrollment, room configuration, instructional technology, and other room features impact demand and availability. Utilization in this range also enables rooms to be taken off line for maintenance, construction, equipment replacement, and other ad hoc needs, without negatively impacting class scheduling needs. Class labs have a lower time utilization norm of ~50-60% because they are specialized spaces and need to align with corresponding discussion sections, so they are more challenging to schedule back-to-back.

The university has had a long history of environmental stewardship in its approach to facility design and construction, and in 2021 we formally and publicly committed to placing carbon neutrality at the center of the university's mission.[6] As a public research university, we are compelled to apply and share our knowledge, expertise, and resources to address the global climate crisis and be a leader and model for others. Part of this commitment relates directly to capital projects, so we now have the following project requirements in place that will apply to the 428 Church Street Building renovation project:

- Designing the renovation to reuse the existing building structure and envelope as appropriate to meet program needs while reducing demolition waste and the environmental impact of producing and transporting new materials.
- Designing the renovation to incorporate water conservation measures that in aggregate use a minimum of 20% less water than a baseline water based on the Michigan Plumbing Code.
- Designing the renovation to exceed building code requirements for energy efficiency by a minimum of 20% and to meet the university's target for operational carbon reduction. The university follows a rigorous energy efficiency evaluation process that requires the incorporation of numerous mandatory energy efficiency measures on projects, comprehensive evaluation of additional energy efficiency measures, and comprehensive modeling of energy usage and development of energy impact statements at each phase of design. Projects are required to complete a life cycle analysis of the building's estimated carbon consumption in order to demonstrate that the project meets the university's established target for maximum GHG emissions per square foot.
- Designing the mechanical system components for conversion in the future to low-to-medium hot water heating, as the university anticipates moving toward implementing regional geothermal plants as part of an overall carbon reduction master plan.
- All major projects (new construction and renovation) follow the "integrative design process" and are subject to a sustainability review process to help guide the design from a sustainable practices standpoint. At the conclusion of schematic design, the architect is required to develop a preliminary Leadership in Energy and Environmental Design (LEED) scorecard for the project, using accredited personnel, as a measure of the project's overall sustainability performance and the scorecards are updated at the end of design development and construction documents. The LEED scorecards serve as a measurement and reporting tool for the project's overall sustainability features.

8. Are match resources currently available for the project? If <u>yes</u>, what is the source of the match resources? If <u>no</u>, identify the intended source and the estimated timeline for securing said resources.

The university has identified matching funds from investment proceeds to support the 428 Church Street Building renovation project.

[6] "U-M commits to university wide carbon neutrality," Michigan News, Vice President for Communications, University of Michigan, last updated on May 20, 2021, https://news.umich.edu/u-m-commits-to-universitywide-carbon-neutrality/

9. **If authorized for construction, the state typically provides a maximum of 75% of the total cost of university projects and 50% of the total cost for community college projects. Does the institution intend to commit additional resources that would reduce the state share from the amounts indicated? If so, by what amount?**

Although the current state authorization anticipates a maximum state contribution of 75 percent toward the total cost of a project, we are very open to funding more than 25 percent, if required, as we did with our most recent state supplemental appropriation and project authorization from fiscal year 2020-21 (Public Act 257 of 2020) for the Computer Science and Engineering and School of Information Addition project, currently in construction.

10. **Will the completed project increase operating costs to the institution? If yes, please provide an estimated cost (annually, and over a five-year period) and indicate whether the institution has identified available funds to support the additional cost.**

We estimate that the 428 Church Street Building renovation project will not increase our annual operating costs. It is an existing building, so we will not increase our physical footprint or operating costs. By improving the building's infrastructure, it is possible that we may see slight reductions in operating costs with more efficient systems.

11. **What impact, if any, will the project have on tuition costs?**

This project will have no impact on future tuition costs.

12. **If this project is not authorized, what are the impacts to the institution and its students?**

If the 428 Church Street Building project is not authorized, we will continue to pursue this project because it is so critical to addressing the bigger need of renovating our Chemistry Building. It may take longer for us to identify other funding sources for the 428 Church Street Building project, which will delay the subsequent Chemistry Building renovation, but it will eventually be addressed. In the meantime, the Department of Chemistry will continue to operate as best they can in their aging building and will continue to be challenged in its ability to:

- Teach classes in innovative ways or conduct innovative research due to outdated class and research labs
- Recruit and retain the best students and faculty, who will continue to be pursued by other institutions with better and more modern chemistry class lab and research lab facilities
- Maintain or increase research productivity and pursue new research funding opportunities
- Meet modern lab safety requirements
- Reduce its energy consumption and carbon footprint

All of these challenges negatively impact our student experience and student success and the university's ability to fulfill its academic and research mission.

13. **What alternatives to this project were considered? Why is the requested project preferable to those alternatives?**

The Department of Chemistry has over 100 wet labs that will require transition space at various points in a phased Chemistry Building project. These lab needs will be challenging to accommodate because they are so specialized, but we anticipated being able to accommodate many of them in the 428 Church Street Building, which currently has nearly 15,000 assignable square feet (ASF) of research space (including 20 wet labs) and nearly 9,000 ASF of office space.

The alternatives to renovating the 428 Church Street Building for the Department of Chemistry's transition space needs are to: 1) use class labs and wet labs in other schools and colleges on campus, 2) look for lab space to rent or use off-campus, and 3) construct a new transition lab facility on or near campus. All these alternatives are costly to pursue, not practical or convenient for students, faculty, or staff to use or manage, and none are as well-suited or as cost-effective as renovating the 428 Church Street Building for Chemistry's transition needs. We also anticipate that these alternatives would result in fewer courses and availability in Chemistry classes offered to students.

Appendix A: Staffing and Enrollment Data

University of Michigan – Ann Arbor

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	30,318	31,266	31,329	32,282	32,695
Graduate	13,492	13,861	13,862	15,219	15,759
Professional	2,906	2,963	2,716	2,777	2,771
Total	46,716	48,090	47,907	50,278	51,225

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	29,414	30,031	31,177	31,422	31,710
Graduate	14,531	14,745	14,932	14,999	16,258
Professional	2,948	3,046	3,145	3,169	3,305
Total	46,893	47,822	49,254	49,590	51,272

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts (Includes non-School/College units and Hospital)

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	5,346.1	5,545.5	5,620.9	5,673.9	5,682.7
Primary Faculty *	947.9	944.3	939.7	891.4	910.4
Supplemental *	4,288.9	4,377.7	4,482.3	4,388.2	4,425.3
Staff	32,291.4	33,360.3	34,363.8	33,592.0	33,995.4
Total	42,874.3	44,227.8	45,406.7	44,545.6	45,013.8

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts ($000)

	2017-18	2018-19	2019-20	2020-21	2021-22
Schools & Colleges	1,023,514	1,068,336	1,086,151	1,096,419	1,194,298
Hospital, Acad., & Resrch. Units	178,397	171,701	283,873	338,768	214,669
Total	1,201,911	1,240,037	1,370,024	1,435,187	1,408,967

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Student to Faculty Ratio

2018	2019	2020	2021	2022
15:1	15:1	14:1	15:1	*Avail. Jan 2023*

Source: Common Data Set

Totals may not appeat to equal sum of components due to rounding.

A. Alfred Taubman College of Architecture and Urban Planning

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	184	184	177	208	232
Graduate	479	479	403	436	454
Professional	--	--	--	--	--
Total	663	663	580	644	686

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	186	212	203	190	217
Graduate	633	617	566	507	582
Professional	--	--	--	--	--
Total	819	829	769	697	798

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	89.5	90.3	85.1	73.6	78.5
Primary Faculty *	0.1	0.0	0.0	0.0	0.0
Supplemental *	14.7	13.8	15.7	13.5	17.7
Staff	47.4	46.8	45.4	47.9	50.8
Total	151.7	150.9	146.2	135.0	147.0

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
758	1,654	1,500	1,371	71

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
17	18	17	18	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Penny W. Stamps School of Art and Design

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	582	603	616	686	682
Undergraduate Joint Program	12	9	17	14	12
Graduate	19	20	7	24	19
Professional	--	--	--	--	--
Total	613	632	640	724	713

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Note: Art/Music Joint Program count is reported here and with Music/Theater/Dance, but unduplicated in the Summary.

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	456	468	511	485	545
Graduate	21	24	23	18	26
Professional	--	--	--	--	--
Total	477	492	534	503	571

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	57.8	62.5	62.0	59.8	64.8
Primary Faculty *	0.0	0.0	0.0	0.0	0.0
Supplemental *	3.9	4.6	4.6	3.7	5.2
Staff	35.3	37.7	40.6	43.3	46.5
Total	97.0	104.8	107.1	106.7	116.5

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
-2	232	252	364	283

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
13	14	14	13	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

0

Stephen M. Ross School of Business

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	2,385	2,404	2,377	2,421	2,440
Graduate	1,838	1,902	1,788	1,905	1,992
Professional	--	--	--	--	--
Total	4,223	4,306	4,165	4,326	4,432

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	1,653	1,698	1,755	1,681	1,676
Graduate	2,213	2,251	2,211	2,072	2,251
Professional	--		--	--	--
Total	3,866	3,949	3,966	3,754	3,927

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	161.3	170.2	169.4	165.4	163.0
Primary Faculty *	10.0	9.0	9.0	8.0	8.0
Supplemental *	23.9	24.7	24.9	22.6	17.6
Staff	383.8	379.6	394.6	377.1	354.2
Total	579.0	583.5	597.9	573.1	542.7

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
2,750	2,180	2,185	2,027	1,822

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
49	54	49	50	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Dentistry

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	102	102	83	74	77
Graduate	121	121	115	110	113
Professional	469	469	471	472	475
Total	692	692	669	656	665

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	84	84	92	102	95
Graduate	148	166	163	159	153
Professional	695	688	695	689	692
Total	926	938	950	949	940

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	132.8	136.7	141.1	134.9	129.1
Primary Faculty *	9.8	11.5	11.9	8.0	8.4
Supplemental *	23.6	29.0	33.7	23.6	25.6
Staff	339.7	335.6	349.4	328.3	308.6
Total	505.9	512.9	536.1	494.9	471.7

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
19,369	21,292	22,683	24,259	28,224

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
n/a	n/a	n/a	n/a	n/a

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School for Environment and Sustainability

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	--	--	1	--	--
Graduate	283	358	473	551	553
Professional	--	--	--	--	--
Total	283	358	474	551	553

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	6	226	263	256	267
Graduate	238	281	357	440	492
Professional	--	--	--	--	--
Total	245	507	620	696	759

Source: Dashboard 04. Student Enrollment | Enrollment Trends

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	41.0	52.7	57.7	62.5	59.6
Primary Faculty *	7.3	6.9	10.0	7.9	8.8
Supplemental *	38.8	42.8	55.6	56.5	61.0
Staff	78.5	95.1	99.3	102.5	96.2
Total	165.7	197.5	222.5	229.4	225.6

Source: Dashboard 04. Student Enrollment | Enrollment Trends

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
14,704	15,543	17,328	13,488	18,149

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
20	23	22	22	*Avail. Jan 2023*

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Totals may not appeat to equal sum of components due to rounding.

Note: starting in FY2018-19, students enrolled in Program in the Environment are assigned to SEAS rather than LSA.

Appendix A: Staffing and Enrollment Data

School of Education

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	130	130	126	114	88
Graduate	383	383	310	377	300
Professional	--	--	--	--	--
Total	513	513	436	491	388

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	170	161	188	181	180
Graduate	447	452	387	402	453
Professional	--	--	--	--	--
Total	617	613	575	583	633

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	60.5	59.4	60.7	59.8	58.7
Primary Faculty *	2.9	3.0	5.1	5.7	4.8
Supplemental *	43.7	35.4	41.5	41.3	35.0
Staff	87.9	92.3	91.2	89.5	100.4
Total	195.0	190.1	198.5	196.3	198.9

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
11,036	8,892	7,767	12,040	9,336

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
11	11	12	12	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

College of Engineering

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	6,648	6,648	6,841	6,931	6,962
Graduate	3,537	3,537	3,368	3,724	4,089
Professional	--	--	--	--	--
Total	10,185	10,185	10,209	10,655	11,051

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	5,091	5,427	5,692	5,842	5,927
Graduate	3,126	3,130	3,115	3,099	3,434
Professional	--	--	--	--	--
Total	8,217	8,557	8,807	8,942	9,360

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	447.1	471.1	470.1	479.7	479.4
Primary Faculty *	101.7	113.0	112.4	102.9	103.4
Supplemental *	855.5	858.9	877.2	869.5	866.4
Staff	666.4	735.9	771.9	786.2	816.2
Total	2,070.7	2,178.8	2,231.6	2,238.2	2,265.4

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
230,663	231,389	236,904	232,883	241,387

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
36	36	36	36	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Information

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	313	322	295	353	380
Graduate	507	725	986	1,263	1,347
Graduate Joint Program	71	86	74	75	76
Professional	--	--	--	--	--
Total	891	1,133	1,355	1,691	1,803

Source: Dashboard 04. Student Enrollment | Enrollment Trends
Note: Information/Public Health Joint Program count is reported here and with Public Health, but unduplicated in the Summa

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	343	415	447	447	430
Graduate	460	494	658	950	1073
Professional	--	--	--	--	--
Total	803	909	1,105	1,397	1,504

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	47.3	50.6	55.2	63.8	66.2
Primary Faculty *	1.8	2.2	1.5	0.9	0.1
Supplemental *	49.3	66.6	80.4	67.8	80.7
Staff	67.3	66.6	76.9	80.9	86.2
Total	165.6	185.9	213.9	213.4	233.2

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
4,385	5,819	6,498	5,339	7,097

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
40	30	31	36	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Kinesiology

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	965	997	1,003	1,066	1,098
Graduate	108	118	93	120	130
Professional	--	--	--	--	--
Total	1,073	1,115	1,096	1,186	1,228

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	602	597	618	605	625
Graduate	64	80	92	69	115
Professional	--	--	--	--	--
Total	666	677	710	674	740

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	45.6	44.9	47.1	47.9	48.8
Primary Faculty *	0.8	0.8	0.0	0.0	0.0
Supplemental *	11.8	20.1	16.7	15.5	15.3
Staff	45.6	50.3	52.8	52.4	55.8
Total	103.7	116.1	116.6	115.9	119.9

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
7,391	8,612	9,089	7,581	6,235

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
22	22	23	22	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

Law School

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	--	--	--	--	--
Graduate	--	--	--	--	--
Professional	1,051	1,051	1,027	998	1,007
Total	1,051	1,051	1,027	998	1,007

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	--	--	--	--	--
Graduate	10	15	22	16	12
Professional	955	1,015	1,012	1,022	994
Total	965	1,030	1,034	1,038	1,006

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	90.1	85.3	89.3	86.8	87.8
Primary Faculty *	11.0	10.0	10.0	9.0	10.0
Supplemental *	8.0	10.3	10.3	9.0	10.0
Staff	150.8	151.6	149.9	148.6	140.3
Total	259.9	257.2	259.5	253.3	248.1

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
594	406	331	861	1,065

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Weighted Average Class Size

2018	2019	2020	2021	2022
24	23	23	23	*Avail. Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

College of Literature, Science, and the Arts

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	17,149	17,837	17,796	18,322	18,656
Graduate	2,524	2,751	2,656	2,697	2,728
Professional	--	--	--	--	--
Total	19,673	20,588	20,452	21,019	21,384

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	18,825	18,691	19,208	19,470	19,457
Graduate	3,128	3,118	3,199	3,109	3,151
Professional	--	--	--	--	--
Total	21,954	21,809	22,407	22,579	22,607

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	1,343.8	1,319.2	1,332.5	1,352.5	1,366.7
Primary Faculty *	44.8	40.7	44.0	44.9	37.1
Supplemental *	986.2	1,017.8	1,023.7	1,040.4	1,020.9
Staff	1,072.5	1,148.3	1,201.4	1,180.1	1,180.0
Total	3,447.3	3,526.0	3,601.6	3,617.9	3,604.7

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
91,052	91,978	89,225	101,112	106,393

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
27	28	28	29	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Medical School

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	28	25	34	36	26
Graduate	521	713	732	796	778
Professional	923	923	732	805	808
Total	1,472	1,661	1,498	1,637	1,612

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	249	250	251	280	285
Graduate	755	841	878	935	995
Professional	805	801	870	879	1,017
Total	1,809	1,892	1,999	2,095	2,298

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	2,198.7	2,334.9	2,383.8	2,393.2	2,391.3
Primary Faculty *	364.4	373.3	359.4	341.6	349.6
Supplemental *	678.8	684.0	700.7	653.5	646.6
Staff	3,649.6	3,855.2	4,023.1	3,862.9	3,952.2
Total	6,891.5	7,247.4	7,467.0	7,251.1	7,339.8

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
517,539	559,833	560,916	563,681	635,905

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
n/a	n/a	n/a	n/a	n/a

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Music, Theatre and Dance

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	808	834	837	869	851
Undergraduate Joint Program	12	9	7	14	294
Graduate	316	292	266	294	12
Professional	--	--	--	--	--
Total	1,136	1,135	1,110	1,177	1,157

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Note: Art/Music Joint Program count is reported here and with Art, but unduplicated in the Summary.

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	870	884	949	850	933
Graduate	389	407	391	339	381
Professional	--	--	--	--	--
Total	1,259	1,291	1,340	1,190	1,314

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	168.0	170.5	169.7	174.1	169.9
Primary Faculty *	0.0	0.0	0.0	0.0	0.1
Supplemental *	30.8	32.4	33.5	34.4	34.3
Staff	98.5	97.4	94.4	87.8	103.7
Total	297.3	300.3	297.6	296.2	308.0

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
285	156	115	176	456

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
17	16	14	16	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Nursing

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	630	642	678	713	714
Graduate	249	251	295	334	316
Professional	122	146	154	171	159
Total	1,001	1,039	1,127	1,218	1,189

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	530	523	576	597	610
Graduate	215	197	195	232	263
Professional	118	157	187	204	231
Total	864	877	958	1032	1103

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	103.3	105.8	104.5	106.9	102.6
Primary Faculty *	3.2	5.3	4.4	5.4	4.1
Supplemental *	2.0	2.3	5.3	3.5	5.3
Staff	117.9	125.1	139.5	133.3	117.2
Total	226.4	238.5	253.6	249.1	229.1

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
11,550	11,864	11,413	10,867	10,245

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
11	12	12	12	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

College of Pharmacy

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	56	74	91	104	102
Graduate	90	85	93	111	124
Professional	341	340	332	331	322
Total	487	499	516	546	548

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	24	29	37	37	42
Graduate	107	120	100	125	138
Professional	375	385	381	376	371
Total	506	534	518	538	551

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	42.2	46.4	43.1	41.4	42.8
Primary Faculty *	24.4	20.1	23.1	16.8	15.0
Supplemental *	65.5	66.8	67.1	52.6	48.4
Staff	67.0	75.0	74.7	78.1	81.6
Total	199.1	208.4	208.0	188.8	187.8

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
16,353	16,718	15,288	16,332	18,569

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
43	40	45	41	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Public Health

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	172	170	204	207	213
Graduate	998	960	903	1,072	1,067
Graduate Joint Program	71	86	74	75	76
Professional	--	--	--	--	--
Total	1,241	1,216	1,181	1,354	1,356

Source: Dashboard 04. Student Enrollment | Enrollment Trends
Note: Information/Public Health Joint Program count is reported here and with Information, but unduplicated in the Summary.

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	178	204	214	219	224
Graduate	1,228	1,181	1,148	1,089	1,241
Professional	--	--	--	--	--
Total	1,405	1,385	1,362	1,308	1,464

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	130.8	137.3	139.5	135.9	130.5
Primary Faculty *	33.8	35.4	33.4	27.1	30.1
Supplemental *	110.2	112.7	124.4	113.4	136.1
Staff	338.9	338.0	371.6	373.8	401.0
Total	613.8	623.3	668.9	650.2	697.6

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
84,999	82,064	95,982	95,271	101,165

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
36	34	28	35	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

Gerald R. Ford School of Public Policy

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	154	161	163	164	162
Graduate	192	215	206	219	230
Professional	--	--	--	--	--
Total	346	376	369	383	392

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	97	110	119	126	141
Graduate	231	244	267	247	257
Professional	--	--	--	--	--
Total	328	354	386	372	398

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	35.2	39.1	40.5	40.7	40.4
Primary Faculty *	0.2	0.0	0.0	0.0	0.1
Supplemental *	12.6	9.5	9.1	11.2	14.6
Staff	45.0	55.1	68.4	72.1	69.3
Total	92.9	103.7	117.9	124.0	124.4

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
4,979	5,411	3,981	4,114	2,500

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
32	32	31	33	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

Horace H. Rackham School of Graduate Studies

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	--	--	--	--	--
Graduate	545	303	333	328	327
Professional	--	--	--	--	--
Total	545	303	333	328	327

Source: Dashboard 04. Student Enrollment | Enrollment Trends
Note: In 2019, several programs previously listed under Rackham were assigned to other schools.

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	0	0	0	0	0
Graduate	95	99	94	78	86
Professional	--	--	--	--	--
Total	96	99	94	78	86

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	0.5	0.5	0.5	0.5	0.5
Primary Faculty *	0.2	0.0	0.0	0.0	0.0
Supplemental *	16.9	17.1	20.3	17.3	26.3
Staff	97.9	100.4	105.2	98.7	100.3
Total	115.5	118.0	125.9	116.4	127.1

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source
* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
539	98	161	142	211

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
19	11	8	17	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

School of Social Work

Fall Term Headcount Enrollment by Level

	2018	2019	2020	2021	2022
Undergraduate	--	--	--	--	--
Graduate	711	726	751	783	892
Professional	--	--	--	--	--
Total	711	726	751	783	892

Source: Dashboard 04. Student Enrollment | Enrollment Trends

Fiscal Year Equated Students

	2017-18	2018-19	2019-20	2020-21	2021-22
Undergraduate	28	30	31	35	38
Graduate	1,022	1,026	1,065	1,081	1,119
Professional	--	--	--	--	--
Total	1,050	1,056	1,096	1,115	1,157

Source: Dashboard 05. Student Credit Hours | Student Credit Hours and FYES Crosstabs

FTE Faculty and Staff Counts

	2017-18	2018-19	2019-20	2020-21	2021-22
Instructional Faculty	66.3	73.2	75.7	78.0	78.2
Primary Faculty *	1.1	2.9	2.5	1.6	1.8
Supplemental *	18.7	17.3	20.8	13.8	12.0
Staff	69.2	78.6	78.0	80.6	84.7
Total	155.3	172.0	176.9	173.9	176.7

Source: Dashboard 02. Faculty and Staff | FTE Distribution by Funding Source

* Primary includes Regular and Supplemental Primary; Supplemental includes Research Fellows, House Officers, Graduate Student employees, and other Supplemental

Research Grants and Contracts

($000)

2017-18	2018-19	2019-20	2020-21	2021-22
4,571	4,195	4,533	4,510	5,187

Source: U-M Financial Data Warehouse (totals as of October following fiscal year)

Fall Term Weighted Average Class Size

2018	2019	2020	2021	2022
19	20	21	20	*Avail Jan 2023*

Source: Dashboard 06. Student Class Size | Class Size - Weighted Average

Totals may not appeat to equal sum of components due to rounding.

Appendix A: Staffing and Enrollment Data

Appendix B: Deferred Maintenance Data

The university maintains a database of all buildings, including size and use. Deferred maintenance estimates are included here when the information is available. This information allows comparisons of buildings and trends over time with respect to overall condition. Deferred maintenance information is continually updated and where possible includes detailed needs and specific cost estimates to implement projects. The summary information provided here is a planning tool. It is not intended to accurately reflect all costs listed and should not be used for cost estimates.

*Denotes building is in planning or under construction.

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1005200	1009 CORNWELL PLACE	3,340	1886	Income Properties	
1008039	1011 CORNWELL PLACE	2,879	1951	Income Properties	
1000327	1018 FULLER BUILDING	8,349	1965	Clinical Delivery System	
1000205	1027 EAST HURON BUILDING	6,066	1896	Administration & Support	$93,077.38
1000816	1032 GREENE BUILDING	5,903	1975	Administration & Support	$1,426,014.72
1000188	1100 NORTH UNIVERSITY BUILDING	187,416	1925	Teach, Research, Support	$12,176,302.43
1000225	1310 NORTH UNIVERSITY COURT BUILDING	12,042	1977	Teach, Research, Support	$1,380,323.33
1000886	1443 WASHTENAW AVENUE BUILDING	13,799	1943	Student Services	$449,706.68
1000891	1736 BROADWAY GARAGE	480	1965	Income Properties	
1000885	1736 BROADWAY HOUSE	2,970	1965	Income Properties	
1005179	202 SOUTH THAYER BUILDING	59,825	2006	Teach, Research, Support	$579,069.18
1000335	300 400 N INGALLS BOILER HSE	9,908	1955	Administration & Support	$2,124,417.87
1000332	300 N INGALLS BUILDING	325,677	1955	TeachResSupport/CDS	$60,591,301.87
1005327	439 S DIVISION STREET	3,210	1900	Income Properties	
1005287	523 SOUTH DIVISION BUILDING	9,315	2010	Administration & Support	
1000815	ADMINISTRATIVE SERVICES	91,653	1963	Administration & Support	$11,138,328.73
1000423	AERO ENG LAB PUMPING STATION	2,456	1955	Teach, Research, Support	$77,402.03
1000426	AERO ENG POWER PLANT	697	1955	Teach, Research, Support	$1,542.29
1000425	AEROSPACE ENGINEERING LAB PLASMA RESEARCH	25,941	1961	Teach, Research, Support	$1,097,373.01
1000422	AEROSPACE ENGINEERING LAB PROPULSION LAB	8,067	1955	Teach, Research, Support	$4,361,183.99
1000421	AEROSPACE ENGINEERING LAB WIND TUNNEL LAB	14,171	1955	Teach, Research, Support	$3,020,197.19
1000192	ALUMNI CENTER	35,315	1983	Administration & Support	$1,750,830.73
1005123	ALUMNI FIELD	12,209	2008	Intercollegiate Athletics Bldg	
1000151	ALUMNI MEMORIAL HALL	99,304	1910	Teach, Research, Support	$4,138,767.26
1000206	ANGELL HALL AUDITORIUMS	29,293	1952	Teach, Research, Support	$2,406,475.83
1000152	ANGELL JAMES B HALL AND TISCH HALL	209,256	1924	Teach, Research, Support	$6,955,239.34
1000168	ANIMAL RESEARCH FACILITY	15,591	1963	Teach, Research, Support	$3,615,414.51
1005132	ANN STREET PARKING STRUCTURE	189,202	2009	Parking Structure	
1008079	ARBOR LAKES 1	39,867	1976	AdminSupport/CDS	$4,541,322.51
1008080	ARBOR LAKES 2	89,277	1979	AdminSupport/CDS	$11,473,037.67

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1008081	ARBOR LAKES 3	84,893	1981	AdminSupport/CDS	$12,439,842.88
1000831	ARGUS BUILDING II	69,214	1941	Teach, Research, Support	$9,694,415.95
1000432	ART ARCHITECTURE BUILDING	264,419	1974	Teach, Research, Support	$7,408,545.05
1000803	ATHLETIC CAMPUS SWITCH STATION	2,467	1973	Switching Stations	
1005371	ATHLETIC DEPARTMENT OPERATIONS CENTER	18,674	2015	Intercollegiate Athletics Bldg	
1005402	ATHLETICS FACILITY SUPPORT BUILDING	2,976	2015	Intercollegiate Athletics Bldg	
1005195	ATHLETICS MAINTENANCE BUILDING	1,473	1985	Intercollegiate Athletics Bldg	
1005168	AUTO LAB FUEL STORAGE BUILDING	427	2005	Teach, Research, Support	$31,617.00
1002501	AUXILIARY SERVICES BUILDING 1	80,622	1968	Administration & Support	$12,659,514.81
1000395	BAGNOUD FRANCOIS-XAVIER BUILDING	101,812	1991	Teach, Research, Support	$8,273,597.39
1005236	BAHNA WRESTLING CENTER	22,072	2009	Intercollegiate Athletics Bldg	
1000510	BAITS VERA I EATON HOUSE	36,148	1966	Resident Hall	$66,721,015.41
1000511	BAITS VERA I LEE HOUSE	33,017	1966	Resident Hall	
1000512	BAITS VERA I PARKER HOUSE	34,411	1966	Resident Hall	
1000513	BAITS VERA I SMITH HOUSE	29,190	1966	Resident Hall	
1000514	BAITS VERA I STANLEY HOUSE	32,600	1966	Resident Hall	
1000515	BAITS VERA II COMAN HOUSE	48,603	1967	Resident Hall	$31,903,444.85
1000516	BAITS VERA II CONGER HOUSE	26,929	1967	Resident Hall	
1000517	BAITS VERA II CROSS HOUSE	35,118	1967	Resident Hall	
1000518	BAITS VERA II THIEME HOUSE	25,219	1967	Resident Hall	
1000519	BAITS VERA II ZIWET HOUSE	33,931	1967	Resident Hall	
1000051	BARBOUR BETSY HOUSE	33,925	1920	Resident Hall	$12,666,791.44
1005290	BAXTER ROAD MONITORING SHED	49	2010	Administration & Support	
1000439	BENTLEY ALVIN M & ARVELLA D HISTORICAL LIBRARY	66,537	1973	Library Building	$5,877,062.95
1005092	BEYSTER BOB AND BETTY BUILDING	104,132	2006	Teach, Research, Support	$1,294,987.31
1005169	BIOLOGICAL SCIENCES BUILDING	312,211	2018	Teach, Research, Support	$0.00
1005370	BLAU JEFF T HALL	106,172	2016	Teach, Research, Support	$2,290,922.40
1000402	BONISTEEL INTERDISCIPLINARY RESEARCH BUILDING	21,993	1954	Teach, Research, Support	$2,792,462.40
1000880	BOYER BUILDING	15,472	1969	Administration & Support	$1,249,920.16
1005102	BREHM TOWER	252,234	2009	TeachResSupport/CDS	$17,967.70
1008076	BRIARWOOD 1	17,857	1993	Clinical Delivery System	$2,441,066.75
1008130	BRIARWOOD 10	17,299	1996	Clinical Delivery System	$234,424.10
1008030	BRIARWOOD 2	15,924	1988	Clinical Delivery System	$464,211.55
1008065	BRIARWOOD 3	10,262	1991	Clinical Delivery System	$330,009.41
1008042	BRIARWOOD 4	14,063	1991	Clinical Delivery System	
1008016	BRIARWOOD 5	9,378	1986	Clinical Delivery System	$120,349.76
1008142	BRIARWOOD 9	5,324	1998	Clinical Delivery System	$507,933.16

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000407	BROWN GEORGE GRANGER MEMORIAL LABORATORIES	290,501	1957	Teach, Research, Support	$1,853,628.76
1000210	BUHL LAWRENCE D RESEARCH CEN FOR HUMAN GENETICS	18,971	1964	Teach, Research, Support	$427,147.30
1000799	BUHR BUILDING	187,245	1952	Administration & Support	$7,423,499.78
1000010	BURNHAM HOUSE	3,482	1837	Teach, Research, Support	$804,194.04
1000555	BURSLEY JOSEPH A & MARGUERITE K HALL	341,587	1967	Resident Hall	$71,852,297.05
1000155	BURTON MEMORIAL TOWER	20,103	1936	Teach, Research, Support	$4,792,975.17
1000139	BUSINESS ADMIN EXECUTIVE DORM	50,734	1985	Teach, Research, Support	$5,203,490.12
1000742	CAMPUS SAFETY SERVICES BUILDING	108,241	1978	Administration & Support	$6,048,729.82
1000718	CANHAM DONALD B NATATORIUM	77,639	1988	Intercollegiate Athletics Bldg	$56,185.72
1005146	CARDIOVASCULAR CENTER PARKING STRUCTURE	168,596	2009	Parking Structure	
1000258	CATHERINE ST PARKING STRUCTURE	140,168	1959	Parking Structure	
1005126	CENTRAL CAMPUS AND UM HOSPITAL LOAD CENTER	3,884	2006	Switching Stations	
1005451	CENTRAL CAMPUS CLASSROOM BUILDING	108,758	2022	Teach, Research, Support	$0.00
1000226	CENTRAL CAMPUS REC BLD BELL MARGARET POOL	194,261	1954	Recreational Sports Building	$21,270,552.80
1005042	CENTRAL CAMPUS REC BLD STORAGE FACILITY	739	2000	Recreational Sports Building	$1,542.29
1005379	CENTRAL CAMPUS SUPPORT FACILITY	88	2014	Administration & Support	
1005421	CENTRAL CAMPUS SWITCHING STATION	1,002	1984	Switching Stations	
1000260	CENTRAL POWER PLANT	123,112	1914	Administration & Support	$54,871,871.30
1000158	CHEMISTRY & DOW WILLARD H LABORATORY	544,628	1909	Teach, Research, Support	$28,916,708.93
1000443	CHRYSLER CENTER CONTINUING ENGINEERING EDUCATION	45,310	1968	Teach, Research, Support	$2,843,937.01
1000257	CHURCH ST PARKING STRUCTURE	228,214	1957	Parking Structure	$4,152,242.58
1000159	CLEMENTS WILLIAM L LIBRARY	27,257	1923	Library Building	$302,950.36
1000441	CLIMATE AND SPACE RESEARCH BUILDING	105,521	1965	Teach, Research, Support	$14,573,870.03
1005440	CLINICAL INPATIENT TOWER		*	Clinical Delivery System	
1005036	COLEMAN MARY SUE HALL	298,399	2003	Teach, Research, Support	$3,912,210.16
1000710	COLISEUM	38,404	1926	Recreational Sports Building	$2,206,104.90
1000230	COLLEGE OF PHARMACY BUILDING	56,772	1960	Teach, Research, Support	$5,391,709.58
1000109	COOK JOHN P BUILDING	63,906	1930	Resident Hall	
1000052	COOK MARTHA BUILDING	71,925	1915	Resident Hall	$19,336,107.41
1000184	COOK WILLIAM W LEGAL RESEARCH LIBRARY	212,255	1931	Library Building	$14,286,464.03
1000403	COOLEY MORTIMER E BUILDING	46,129	1953	Teach, Research, Support	$6,603,685.65
1000053	COUZENS HALL	185,523	1925	Resident Hall	$773,431.77
1000498	CRAM PLACE COMMUNITY CENTER	7,298	1958	Residence	$37,699,679.35
1000700	CRISLER CENTER	265,276	1968	Intercollegiate Athletics Bldg	$5,081,972.86
1000189	DANA SAMUEL TRASK BUILDING	117,139	1904	Teach, Research, Support	$1,082,109.56
1005439	DANCE BUILDING	30,426	2020	Teach, Research, Support	$0.00
1005289	DAVIDSON WILLIAM PLAYER DEVELOPMENT CENTER	70,705	2011	Intercollegiate Athletics Bldg	

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1005491	DEAN ROAD TRANSPORTATION FACILITY		*	Administration & Support	
1000162	DENTAL BLDG AND W K KELLOGG FOUNDATION INSTITUTE	425,888	1940	Teach, Research, Support	$28,811,214.65
1000447	DOW HERBERT H BUILDING	154,419	1983	Teach, Research, Support	$12,239,946.63
1000396	DUDERSTADT JAMES AND ANNE CENTER	240,256	1996	Teach, Research, Support	$12,489,290.40
1005038	EAST ANN ARBOR AMBULATORY SURGICAL CENTER	49,906	2006	Clinical Delivery System	
1000350	EAST ANN ARBOR HEALTH AND GERIATRICS CENTER	97,393	1996	Clinical Delivery System	$4,669,801.01
1000166	EAST HALL	338,897	1923	Teach, Research, Support	$15,632,106.63
1000306	EAST HOSPITAL MECHANICAL BLDG	8,182	1964	Clinical Delivery System	$7,320,873.31
1000054	EAST QUADRANGLE	333,036	1940	Resident Hall	$10,695,053.62
1000221	EDUCATION SCHOOL OF	215,010	1923	Teach, Research, Support	$13,735,837.36
1008072	EISENHOWER CORPORATE PARK WEST	76,726	1990	Clinical Delivery System	$2,854,786.10
1000728	ELBEL FIELD LOCKER BUILDING	5,943	1951	Recreational Sports Building	$1,154,499.66
1000448	ELECTRICAL ENGINEERING AND COMPUTER SCIENCE BLD	305,021	1986	Teach, Research, Support	$19,016,058.85
1000435	ENGINEERING RESEARCH BUILDING 1	36,033	1964	Teach, Research, Support	$10,865,007.48
1000436	ENGINEERING RESEARCH BUILDING 2	28,332	1964	Teach, Research, Support	$7,104,151.95
1002505	ENGINEERING RESEARCH SUPPORT BLD	1,432	1997	Teach, Research, Support	
1000414	ENVIRONMENTAL AND WATER RESOURCES ENGINEERING	37,129	1975	Teach, Research, Support	$5,293,988.82
1000269	EQUIPMENT MAINTENANCE SHOP	2,151	1914	Administration & Support	$74,115.04
1000800	FACILITIES SERVICES BUILDING A	92,981	1929	Administration & Support	$18,761,552.63
1000801	FACILITIES SERVICES BUILDING B	44,682	1929	Administration & Support	$10,023,069.95
1000802	FACILITIES SERVICES BUILDING C	37,309	1929	Administration & Support	$6,429,971.87
1000706	FERRY FIELD PUMP HOUSE	216	1968	Intercollegiate Athletics Bldg	
1005452	FGRL BLDG 1	9,785	Unknown	Administration & Support	
1005457	FGRL BLDG 20	1,700	1968	Income Properties	
1005454	FGRL BLDG 5	4,886	1965	Administration & Support	
1005358	FIELD HOCKEY STADIUM	2,247	2014	Intercollegiate Athletics Bldg	
1005357	FIELD HOCKEY TEAM CENTER	14,683	2014	Intercollegiate Athletics Bldg	
1005359	FIELD HOCKEY TICKET OFFICE	1,977	2014	Intercollegiate Athletics Bldg	
1005387	FIELD HOCKEY TICKET OFFICE WEST	142	2014	Intercollegiate Athletics Bldg	
1000409	FIRE SERV INSTR RES CENTER	21,528	1959	Teach, Research, Support	$1,978,961.32
1000733	FISHER RAY BASEBALL STADIUM	30,275	1950	Intercollegiate Athletics Bldg	
1000055	FLETCHER HALL	17,985	1923	Resident Hall	$10,068,457.35
1000254	FLETCHER ST PARKING STRUCTURE	387,276	1968	Parking Structure	
1005418	FORD MOTOR COMPANY ROBOTICS BUILDING	144,117	2020	Teach, Research, Support	$0.00
1000252	FOREST SWITCHING STATION	6,089	1988	Switching Stations	
1000234	FRANCIS THOMAS JR PUBLIC HEALTH	171,437	1971	Teach, Research, Support	$18,448,974.06
1000198	FRANKEL JUDY AND STANLEY DETROIT OBSERVATORY	12,785	1854	Teach, Research, Support	$1,047,875.16

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1005109	FRANKEL SAMUEL AND JEAN CARDIOVASCULAR CENTER	414,392	2007	Clinical Delivery System	
1000810	GAS PAD STORAGE BUILDING	1,442	1990	Administration & Support	
1000437	GERSTACKER CARL A BUILDING	61,380	1964	Teach, Research, Support	$7,413,553.15
1005507	GINSBERG EDWARD AND ROSALIE BUILDING		*	Teach, Research, Support	
1000331	GLEN AVE PARKING STRUCTURE	332,918	1987	Parking Structure	$306,682.96
1005121	GLICK AL FIELD HOUSE	107,253	2009	Intercollegiate Athletics Bldg	
1000747	GOLF COURSE COMFORT STATION A	533	1994	Intercollegiate Athletics Bldg	
1000748	GOLF COURSE COMFORT STATION B	467	1994	Intercollegiate Athletics Bldg	
1000741	GOLF COURSE GARAGE	3,585	1956	Intercollegiate Athletics Bldg	
1005100	GOLF COURSE MAINTENANCE BUILDING	5,555	2007	Intercollegiate Athletics Bldg	
1000749	GOLF COURSE PRACTICE RANGE BLDG	720	1994	Intercollegiate Athletics Bldg	
1000739	GOLF COURSE PUMP HOUSE II	336	1992	Intercollegiate Athletics Bldg	
1000424	GORGUZE FAMILY LABORATORY	29,155	1972	Teach, Research, Support	$1,827,482.32
1000201	HARTWIG MARIE DOROTHY ADMINISTRATION BUILDING	14,649	1912	Intercollegiate Athletics Bldg	$1,300,081.16
1000185	HATCHER H NORTH GRADUATE LIBRARY	194,942	1920	Library Building	$12,811,612.76
1000181	HATCHER HARLAN H SOUTH GRADUATE LIBRARY	147,674	1970	Library Building	$14,007,678.94
1000175	HAVEN HALL	123,488	1952	Teach, Research, Support	$1,289,460.80
1005511	HAYWARD STREET GEOTHERMAL FACILITY		*	Administration & Support	
1000897	HEALTH MANAGEMENT RESEARCH	12,792	1906	Teach, Research, Support	
1000176	HEALTH SERVICE	79,177	1940	Student Services	$6,200,699.46
1000057	HENDERSON MARY BARTRON HOUSE	9,329	1892	Resident Hall	$2,891,169.07
1000177	HILL AUDITORIUM	105,813	1913	Recreational Sports Building	$9,234,269.00
1000253	HILL ST PARKING STRUCTURE	151,175	1970	Parking Structure	
1000804	HOOVER ANNEX	1,905	1929	Administration & Support	$106,208.29
1000805	HOOVER AVE HEATING PLANT	7,121	1929	Administration & Support	
1000179	HUTCHINS HALL	119,856	1933	Teach, Research, Support	$11,518,939.87
1005398	INDOOR TRACK BUILDING	123,539	2018	Intercollegiate Athletics Bldg	
1000703	INDOOR TRAINING CENTER	69,183	1974	Intercollegiate Athletics Bldg	$3,297,748.57
1000429	INDUSTRIAL AND OPERATIONS ENGINEERING BUILDING	50,214	1963	Teach, Research, Support	$3,316,997.40
1000145	INSTITUTE FOR SOCIAL RESEARCH	226,082	1965	Teach, Research, Support	$21,140,737.44
1000814	INSTITUTE OF CONTINUING LEGAL ED	12,592	1987	Teach, Research, Support	$1,077,564.99
1005247	INTERCOLLEGIATE SOCCER STADIUM	17,382	2009	Intercollegiate Athletics Bldg	
1000719	INTRAMURAL SPORTS BUILDING	108,676	1928	Recreational Sports Building	$3,835,572.24
1000434	IST GAS STORAGE BUILDING	200	1964	Teach, Research, Support	$12,338.34
1005235	JEFFRIES HALL	103,128	2011	Teach, Research, Support	$768,975.61
1005160	JUNGE FAMILY CHAMPIONS CENTER	11,638	2006	Intercollegiate Athletics Bldg	
1000732	KEEN CLIFFORD P ARENA	37,261	1956	Intercollegiate Athletics Bldg	$3,858,130.37

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000324	KELLOGG W K EYE CENTER	81,670	1985	TeachResSupport/CDS	$7,250,448.33
1000137	KRESGE HALL	76,731	1985	Teach, Research, Support	$4,821,004.21
1005395	LACROSSE STADIUM	26,467	2018	Intercollegiate Athletics Bldg	
1005396	LACROSSE TICKET BUILDING	238	2018	Intercollegiate Athletics Bldg	
1000183	LANE HALL	39,993	1917	Teach, Research, Support	$783,709.95
1000108	LAWYERS CLUB AND MUNGER CHARLES T RESIDENCES	93,805	1924	Resident Hall	$18,051,384.96
1000400	LAY WALTER E AUTOMOTIVE ENGINEERING LABORATORY	63,295	1955	Teach, Research, Support	$10,307,735.15
1005504	LEINWEBER COMPUTER SCIENCE AND INFORMATION BLDG		*	Teach, Research, Support	
1000105	LIPSEY STANFORD STUDENT PUBLICATIONS BUILDING	14,829	1932	Recreational Sports Building	$0.00
1000150	LITERATURE SCIENCE AND THE ARTS	156,119	1948	Teach, Research, Support	$1,900,133.27
1000059	LLOYD ALICE CROCKER HALL	176,615	1949	Resident Hall	$1,027,656.00
1000154	LORCH HALL	89,808	1928	Teach, Research, Support	$10,698,637.32
1000214	LSA ADMINISTRATION ANNEX	10,907	1891	Teach, Research, Support	$28,871.73
1000406	LURIE ANN AND ROBERT H BIOMEDICAL ENGINEERING BLD	65,028	1957	Teach, Research, Support	$2,085,681.90
1000394	LURIE ANN AND ROBERT H TOWER	11,452	1996	Teach, Research, Support	$1,167,371.67
1000397	LURIE ROBERT H ENGINEERING CTR	53,878	1996	Teach, Research, Support	$1,390,565.44
1000858	MADISON BUILDING	22,318	1883	Administration & Support	$630,845.14
1005419	M-AIR	11,235	2018	Teach, Research, Support	
1000060	MARKLEY MARY BUTLER HALL	285,877	1959	Resident Hall	$58,736,391.26
1000197	MASON HALL	136,012	1952	Teach, Research, Support	$5,549,042.50
1000976	MATT BOT GNDS HOUSE	3,650	1825	Income Properties	$14,021.97
1000986	MATTHAEI BOT GDNS ENVIRONMENT	2,762	1962	Teach, Research, Support	$89,919.06
1000991	MATTHAEI BOT GDNS EXHIB GRN HSE	18,747	1966	Teach, Research, Support	$9,778,613.95
1000983	MATTHAEI BOT GDNS GREENHOUSE #1	6,197	1962	Teach, Research, Support	$1,459,387.62
1000984	MATTHAEI BOT GDNS GREENHOUSE #2	6,344	1960	Teach, Research, Support	$1,358,814.72
1000988	MATTHAEI BOT GDNS GREENHOUSE #3	6,195	1960	Teach, Research, Support	$1,405,075.70
1000989	MATTHAEI BOT GDNS GREENHOUSE #4	2,819	1962	Teach, Research, Support	$823,625.02
1000990	MATTHAEI BOT GDNS GREENHOUSE #5	2,817	1962	Teach, Research, Support	$823,573.99
1000994	MATTHAEI BOT GDNS INSTR SHELTER	168	1978	Teach, Research, Support	
1000979	MATTHAEI BOT GDNS NORTH BARN #1	4,241	1880	Teach, Research, Support	$24,359.52
1000978	MATTHAEI BOT GDNS NORTH BARN #2	1,212	1870	Teach, Research, Support	$19,610.44
1000992	MATTHAEI BOT GDNS REPTILE HSE	3,205	1969	Teach, Research, Support	$63,000.88
1000982	MATTHAEI BOT GDNS RESEARCH-ADMIN	21,811	1960	Teach, Research, Support	$833,278.13
1000987	MATTHAEI BOT GDNS SCREENHOUSE #1	399	1962	Teach, Research, Support	$39,821.27
1000980	MATTHAEI BOT GDNS STORAGE BLDG	1,920	1975	Teach, Research, Support	$53,394.45
1000985	MATTHAEI BOT GDNS SUPT RESIDENCE	2,928	1961	Administration & Support	$1,033.84
1000981	MATTHAEI BOT GDNS UTILITY-BOILER	12,248	1960	Teach, Research, Support	$590,594.48

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1005381	MCITY	4,463	2015	Teach, Research, Support	
1002502	MCITY AUXILIARY BUILDING	2,893	1983	Administration & Support	
1005442	MCITY STORAGE	3,305	2020	Teach, Research, Support	
1000300	MED CTR N ENTRANCE PARKING STRUCTURE	340,052	1994	Parking Structure	
1000323	MEDICAL CAMPUS SWITCH STATION SE	2,746	1983	Switching Stations	
1000315	MEDICAL CENTER DR PARKING STRUCT	684,123	1984	Parking Structure	
1000319	MEDICAL PROFESSIONAL BUILDING	37,298	1977	Clinical Delivery System	$8,015,886.23
1000190	MEDICAL SCIENCE UNIT I	298,913	1958	Teach, Research, Support	$48,043,907.00
1000200	MEDICAL SCIENCE UNIT II	333,207	1969	Teach, Research, Support	$29,826,051.97
1000223	MEDICAL SCIENCES RESEARCH BLDG I	144,646	1985	Teach, Research, Support	$11,169,564.45
1000213	MEDICAL SCIENCES RESEARCH BLDG II	163,757	1989	Teach, Research, Support	$14,443,085.42
1000229	MEDICAL SCIENCES RESEARCH BLDG III	217,894	1994	Teach, Research, Support	$14,860,935.15
1000308	MED-INN	119,437	1952	Clinical Delivery System	$16,528,212.21
1000191	MICHIGAN LEAGUE	130,518	1929	Teach, Research, Support	$24,702,820.26
1000404	MICHIGAN MEMORIAL PHOENIX PROJECT LABORATORY	46,653	1955	Teach, Research, Support	$992,767.99
1000222	MICHIGAN NEWS BUILDING	7,811	1955	Administration & Support	$2,608,758.94
1000711	MICHIGAN STADIUM	570,378	1927	Intercollegiate Athletics Bldg	$0.00
1005242	MICHIGAN STADIUM NORTH PLAZA BUILDING A	9,029	2009	Intercollegiate Athletics Bldg	
1005243	MICHIGAN STADIUM NORTH PLAZA BUILDING B	9,337	2009	Intercollegiate Athletics Bldg	
1000120	MICHIGAN UNION	262,717	1919	Recreational Sports Building	$488,906.36
1002500	MITCHELL FIELD BUILDING	1,440	1981	Recreational Sports Building	$3,084.58
1005380	MITCHELL FIELD RECREATION BUILDING	3,661	2014	Recreational Sports Building	$1,542.30
1000207	MODERN LANGUAGES BUILDING	135,332	1972	Teach, Research, Support	$10,518,610.79
1005348	MODULAR MRI BUILDING	824	2012	Teach, Research, Support	
1000100	MOLECULAR & BEHAVIORAL NEUROSCIENCE INSTITUTE	49,956	1960	Teach, Research, Support	$10,094,234.46
1000440	MOORE EARL V BLDG	172,639	1964	Teach, Research, Support	$13,198,496.65
1000061	MOSHER ELIZA M HALL & JORDAN MYRA B HALL	191,152	1930	Resident Hall	$3,967,045.20
1005173	MOTT CHILDRENS VON VOIGTLANDER WOMENS HOSPITALS	1,126,305	2011	Clinical Delivery System	
1005369	MUNGER GRADUATE RESIDENCES	390,215	2015	Resident Hall	$1,858,306.51
1000415	NAVAL ARCHITECTURE AND MARINE ENGINEERING	28,207	1962	Teach, Research, Support	$4,936,272.70
1002518	NC BEAL-CRAM SWITCH GEAR	1,804	1995	Switching Stations	
1005205	NC GROUNDS GARAGE 1	1,692	2007	Administration & Support	$3,238.82
1000220	NC GROUNDS STORAGE BUILDING # 1	3,373	1953	Administration & Support	$348,032.67
1005111	NC GROUNDS STORAGE BUILDING # 2	2,008	1987	Administration & Support	$5,398.02
1005116	NC GROUNDS STORAGE BUILDING # 3	2,008	1987	Administration & Support	$10,024.90
1005131	NC STORAGE BUILDING #4	4,792	2003	Administration & Support	$4,626.87
1005445	NEW CENTRAL CAMPUS RECREATION BUILDING		*	Recreational Sports Building	

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1005492	NEW PHARMACY BUILDING		*	Teach, Research, Support	
1000178	NEWBERRY HALL	40,574	1891	Teach, Research, Support	$3,049,228.17
1000062	NEWBERRY HELEN H RESIDENCE	31,304	1915	Resident Hall	$11,813,506.53
1000007	NICHOLS ARBORETUM GAR WORKSHOP	1,354	1963	Teach, Research, Support	$20,061.07
1000005	NICHOLS ARBORETUM RESIDENCE	2,259	1908	Teach, Research, Support	$310,237.68
1000006	NICHOLS ARBORETUM STORAGE SHED	308	1908	Teach, Research, Support	$64,356.38
1000399	NORTH CAMPUS ADMINISTRATIVE COMPLEX	129,114	1987	Clinical Delivery System	$3,657,907.73
1005223	NORTH CAMPUS AUXILIARY SUPPORT BUILDING	54,428	2009	AdminSupport/CDS	$1,734,000.00
1005018	NORTH CAMPUS CHILDRENS CENTER	14,426	1999	Teach, Research, Support	$574,198.11
1005139	NORTH CAMPUS CHILLER PLANT	17,758	2005	Administration & Support	$3,539,440.80
1002506	NORTH CAMPUS FACILITIES SERVICES BUILDING	48,588	1999	Administration & Support	$26,990.12
1002514	NORTH CAMPUS GROUND SVC FACILITY	28,246	1990	Administration & Support	$1,257,159.70
1005140	NORTH CAMPUS GROUND SVC FACILITY ANNEX	112	2003	Administration & Support	$4,626.88
1005297	NORTH CAMPUS GROUNDS STORAGE SHED	256	2009	Administration & Support	
1000449	NORTH CAMPUS HOUSING SERVICE BLD	31,855	1978	Administration & Support	$1,261,587.39
1002517	NORTH CAMPUS MICROWAVE TOWER	279	1991	Administration & Support	
1000427	NORTH CAMPUS RECREATION BUILDING	67,512	1976	Recreational Sports Building	$0.00
1005253	NORTH CAMPUS RESEARCH COMPLEX BUILDING 10	66,940	1959	Teach, Research, Support	$10,499,462.05
1005276	NORTH CAMPUS RESEARCH COMPLEX BUILDING 100	10,492	1964	Teach, Research, Support	$1,746,400.39
1005254	NORTH CAMPUS RESEARCH COMPLEX BUILDING 14	53,718	1987	Teach, Research, Support	$7,410,387.73
1005255	NORTH CAMPUS RESEARCH COMPLEX BUILDING 15	4,623	1959	Administration & Support	$371,912.71
1005256	NORTH CAMPUS RESEARCH COMPLEX BUILDING 16	121,832	1991	Teach, Research, Support	$6,642,220.19
1005258	NORTH CAMPUS RESEARCH COMPLEX BUILDING 18	92,400	2000	Teach, Research, Support	$3,177,261.17
1005259	NORTH CAMPUS RESEARCH COMPLEX BUILDING 20	182,996	1959	Teach, Research, Support	$36,238,111.36
1005277	NORTH CAMPUS RESEARCH COMPLEX BUILDING 200	26,648	1964	Teach, Research, Support	$2,578,266.71
1005260	NORTH CAMPUS RESEARCH COMPLEX BUILDING 22	21,270	1999	Teach, Research, Support	$3,042,822.14
1005261	NORTH CAMPUS RESEARCH COMPLEX BUILDING 23	10,517	2002	Teach, Research, Support	$123,757.34
1005262	NORTH CAMPUS RESEARCH COMPLEX BUILDING 25	103,912	1984	Teach, Research, Support	$39,079,532.03
1005263	NORTH CAMPUS RESEARCH COMPLEX BUILDING 26	192,689	2000	Teach, Research, Support	$6,685,883.83
1005264	NORTH CAMPUS RESEARCH COMPLEX BUILDING 28	131,407	1992	Teach, Research, Support	$28,122,769.14
1005265	NORTH CAMPUS RESEARCH COMPLEX BUILDING 30	34,632	1965	Teach, Research, Support	$9,015,918.93
1005278	NORTH CAMPUS RESEARCH COMPLEX BUILDING 300	39,513	1964	Teach, Research, Support	$3,667,325.94
1005432	NORTH CAMPUS RESEARCH COMPLEX BUILDING 32	6,958	1992	Teach, Research, Support	$24,090.62
1005266	NORTH CAMPUS RESEARCH COMPLEX BUILDING 35	93,162	1985	Teach, Research, Support	$53,980,044.79
1005267	NORTH CAMPUS RESEARCH COMPLEX BUILDING 36	116,857	2006	Teach, Research, Support	$3,802,231.17
1005279	NORTH CAMPUS RESEARCH COMPLEX BUILDING 400	27,571	1982	Teach, Research, Support	$2,755,630.66
1005280	NORTH CAMPUS RESEARCH COMPLEX BUILDING 500	14,775	1998	Administration & Support	$0.00

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1005281	NORTH CAMPUS RESEARCH COMPLEX BUILDING 520	199,850	1998	Teach, Research, Support	$8,990,671.68
1005282	NORTH CAMPUS RESEARCH COMPLEX BUILDING 550	236,634	1998	Teach, Research, Support	$4,258,095.61
1005270	NORTH CAMPUS RESEARCH COMPLEX BUILDING 60	25,380	1983	Teach, Research, Support	$4,631,928.02
1005271	NORTH CAMPUS RESEARCH COMPLEX BUILDING 70	773	1959	Teach, Research, Support	$51,494.04
1005272	NORTH CAMPUS RESEARCH COMPLEX BUILDING 73	231,655	1991	Parking Structure	$579,822.84
1005273	NORTH CAMPUS RESEARCH COMPLEX BUILDING 80	52,404	1959	Administration & Support	$14,766,455.83
1005283	NORTH CAMPUS RESEARCH COMPLEX BUILDING 800	20,250	2001	Administration & Support	$1,079,790.29
1005274	NORTH CAMPUS RESEARCH COMPLEX BUILDING 85	5,132	2005	Administration & Support	$348,971.13
1005335	NORTH CAMPUS RESEARCH COMPLEX BUILDING 86	1,034	2006	Switching Stations	
1005275	NORTH CAMPUS RESEARCH COMPLEX BUILDING 90	35,767	1999	Teach, Research, Support	$2,205,251.85
1000418	NORTH CAMPUS SERVICE BLDG #1	23,191	1965	Administration & Support	$1,046,300.46
1000430	NORTH CAMPUS STORAGE BUILDING	45,750	1967	Administration & Support	$2,142,136.30
1005334	NORTH CAMPUS SUPPORT FACILITY	2,529	2011	Administration & Support	
1000408	NORTH CAMPUS SWITCH STATION	10,161	1957	Switching Stations	$90,624.04
1005177	NORTH QUADRANGLE RESIDENTIAL AND ACADEMIC COMPLEX	388,357	2010	Resident Hall	$6,735,987.57
1000600	NORTHWOOD COMMUNITY CENTER	13,744	1991	Recreational Sports Building	$991,320.73
1000451	NORTHWOOD I APTS 451	11,744	1955	Residence	included in above
1000452	NORTHWOOD I APTS 452	5,312	1955	Residence	included in above
1000453	NORTHWOOD I APTS 453	14,412	1955	Residence	included in above
1000454	NORTHWOOD I APTS 454	14,412	1955	Residence	included in above
1000455	NORTHWOOD I APTS 455	5,312	1955	Residence	included in above
1000456	NORTHWOOD I APTS 456	11,744	1955	Residence	included in above
1000450	NORTHWOOD I SVC BUILDING 450	3,168	1955	Residence	$20,056,591.02
1000462	NORTHWOOD II APTS 462	4,246	1957	Residence	included in above
1000464	NORTHWOOD II APTS 464	5,645	1957	Residence	included in above
1000465	NORTHWOOD II APTS 465	5,645	1957	Residence	included in above
1000466	NORTHWOOD II APTS 466	4,246	1957	Residence	included in above
1000467	NORTHWOOD II APTS 467	4,246	1957	Residence	included in above
1000468	NORTHWOOD II APTS 468	4,246	1957	Residence	included in above
1000469	NORTHWOOD II APTS 469	12,405	1957	Residence	included in above
1000470	NORTHWOOD II APTS 470	5,645	1957	Residence	included in above
1000471	NORTHWOOD II APTS 471	5,645	1957	Residence	included in above
1000472	NORTHWOOD II APTS 472	5,645	1957	Residence	included in above
1000473	NORTHWOOD II APTS 473	12,405	1957	Residence	included in above
1000474	NORTHWOOD II APTS 474	3,738	1957	Residence	included in above
1000475	NORTHWOOD II APTS 475	3,738	1957	Residence	included in above

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000476	NORTHWOOD II APTS 476	3,738	1957	Residence	included in above
1000477	NORTHWOOD II APTS 477	3,738	1957	Residence	included in above
1000478	NORTHWOOD II APTS 478	3,738	1957	Residence	included in above
1000479	NORTHWOOD II APTS 479	5,645	1957	Residence	included in above
1000480	NORTHWOOD II APTS 480	5,645	1957	Residence	included in above
1000481	NORTHWOOD II APTS 481	5,645	1957	Residence	included in above
1000482	NORTHWOOD II APTS 482	3,738	1957	Residence	included in above
1000483	NORTHWOOD II APTS 483	3,738	1957	Residence	included in above
1000484	NORTHWOOD II APTS 484	3,738	1957	Residence	included in above
1000485	NORTHWOOD II APTS 485	3,738	1957	Residence	included in above
1000486	NORTHWOOD II APTS 486	3,738	1957	Residence	included in above
1000487	NORTHWOOD II APTS 487	3,738	1957	Residence	included in above
1000488	NORTHWOOD II APTS 488	3,738	1957	Residence	included in above
1000489	NORTHWOOD II APTS 489	3,738	1957	Residence	included in above
1000490	NORTHWOOD II APTS 490	3,738	1957	Residence	included in above
1000491	NORTHWOOD II APTS 491	3,738	1957	Residence	included in above
1000492	NORTHWOOD II APTS 492	3,738	1957	Residence	included in above
1000493	NORTHWOOD II APTS 493	3,738	1957	Residence	included in above
1000494	NORTHWOOD II APTS 494	3,738	1957	Residence	included in above
1000495	NORTHWOOD II APTS 495	3,738	1957	Residence	included in above
1000496	NORTHWOOD II APTS 496	3,738	1957	Residence	included in above
1000497	NORTHWOOD II APTS 497	3,738	1957	Residence	included in above
1000457	NORTHWOOD II SVC BUILDING 457	5,400	1957	Residence	$43,570,929.25
1000458	NORTHWOOD II SVC BUILDING 458	2,760	1957	Residence	included in above
1000459	NORTHWOOD II SVC BUILDING 459	2,879	1957	Residence	included in above
1000460	NORTHWOOD II SVC BUILDING 460	5,270	1957	Residence	included in above
1000461	NORTHWOOD II SVC BUILDING 461	2,879	1957	Residence	included in above
1000499	NORTHWOOD III SVC BUILDING 499	2,471	1958	Residence	
1000500	NORTHWOOD III SVC BUILDING 500	2,471	1958	Residence	
1000601	NORTHWOOD IV APTS 601	8,029	1969	Residence	$78,956,316.79
1000602	NORTHWOOD IV APTS 602	4,061	1969	Residence	included in above
1000603	NORTHWOOD IV APTS 603	3,066	1969	Residence	included in above
1000604	NORTHWOOD IV APTS 604	4,899	1969	Residence	included in above
1000605	NORTHWOOD IV APTS 605	10,708	1969	Residence	included in above
1000606	NORTHWOOD IV APTS 606	3,117	1969	Residence	included in above

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000607	NORTHWOOD IV APTS 607	6,763	1969	Residence	included in above
1000608	NORTHWOOD IV APTS 608	5,425	1969	Residence	included in above
1000609	NORTHWOOD IV APTS 609	5,425	1969	Residence	included in above
1000610	NORTHWOOD IV APTS 610	4,123	1969	Residence	included in above
1000611	NORTHWOOD IV APTS 611	7,181	1969	Residence	included in above
1000612	NORTHWOOD IV APTS 612	6,726	1969	Residence	included in above
1000613	NORTHWOOD IV APTS 613	4,442	1969	Residence	included in above
1000614	NORTHWOOD IV APTS 614	5,399	1969	Residence	included in above
1000615	NORTHWOOD IV APTS 615	3,159	1969	Residence	included in above
1000616	NORTHWOOD IV APTS 616	10,707	1969	Residence	included in above
1000617	NORTHWOOD IV APTS 617	7,967	1969	Residence	included in above
1000618	NORTHWOOD IV APTS 618	7,082	1969	Residence	included in above
1000619	NORTHWOOD IV APTS 619	6,727	1969	Residence	included in above
1000620	NORTHWOOD IV APTS 620	6,727	1969	Residence	included in above
1000621	NORTHWOOD IV APTS 621	3,117	1969	Residence	included in above
1000622	NORTHWOOD IV APTS 622	5,876	1969	Residence	included in above
1000623	NORTHWOOD IV APTS 623	8,065	1969	Residence	included in above
1000624	NORTHWOOD IV APTS 624	6,727	1969	Residence	included in above
1000625	NORTHWOOD IV APTS 625	4,061	1969	Residence	included in above
1000626	NORTHWOOD IV APTS 626	5,741	1969	Residence	included in above
1000627	NORTHWOOD IV APTS 627	3,117	1969	Residence	included in above
1000628	NORTHWOOD IV APTS 628	5,425	1969	Residence	included in above
1000629	NORTHWOOD IV APTS 629	5,425	1969	Residence	included in above
1000630	NORTHWOOD IV APTS 630	11,534	1969	Residence	included in above
1000631	NORTHWOOD IV APTS 631	4,442	1969	Residence	included in above
1000632	NORTHWOOD IV APTS 632	2,821	1969	Residence	included in above
1000633	NORTHWOOD IV APTS 633	6,727	1969	Residence	included in above
1000634	NORTHWOOD IV APTS 634	4,123	1969	Residence	included in above
1000635	NORTHWOOD IV APTS 635	4,123	1969	Residence	included in above
1000636	NORTHWOOD IV APTS 636	3,159	1969	Residence	included in above
1000637	NORTHWOOD IV APTS 637	7,034	1969	Residence	included in above
1000638	NORTHWOOD IV APTS 638	5,775	1969	Residence	included in above
1000639	NORTHWOOD IV APTS 639	8,029	1969	Residence	included in above
1000640	NORTHWOOD IV APTS 640	5,425	1969	Residence	included in above
1000641	NORTHWOOD IV APTS 641	4,478	1969	Residence	included in above

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000642	NORTHWOOD IV APTS 642	4,061	1969	Residence	included in above
1000643	NORTHWOOD IV APTS 643	5,363	1969	Residence	included in above
1000644	NORTHWOOD IV APTS 644	8,348	1969	Residence	included in above
1000645	NORTHWOOD IV APTS 645	6,279	1969	Residence	included in above
1000646	NORTHWOOD IV APTS 646	5,425	1969	Residence	included in above
1000647	NORTHWOOD IV APTS 647	4,123	1969	Residence	included in above
1000648	NORTHWOOD IV APTS 648	3,159	1969	Residence	included in above
1000649	NORTHWOOD IV APTS 649	4,442	1969	Residence	included in above
1000650	NORTHWOOD IV APTS 650	4,123	1969	Residence	included in above
1000651	NORTHWOOD IV APTS 651	5,425	1969	Residence	included in above
1000652	NORTHWOOD IV APTS 652	6,701	1969	Residence	included in above
1000653	NORTHWOOD IV APTS 653	4,442	1969	Residence	included in above
1000654	NORTHWOOD IV APTS 654	5,425	1969	Residence	included in above
1000655	NORTHWOOD IV APTS 655	11,099	1969	Residence	included in above
1000656	NORTHWOOD IV APTS 656	10,080	1969	Residence	included in above
1000657	NORTHWOOD IV APTS 657	6,727	1969	Residence	included in above
1000658	NORTHWOOD IV APTS 658	8,480	1969	Residence	included in above
1000659	NORTHWOOD IV APTS 659	9,269	1969	Residence	included in above
1000660	NORTHWOOD IV APTS 660	8,348	1969	Residence	included in above
1000661	NORTHWOOD IV APTS 661	5,744	1969	Residence	included in above
1000662	NORTHWOOD IV APTS 662	3,159	1969	Residence	included in above
1000663	NORTHWOOD IV APTS 663	9,650	1969	Residence	included in above
1000664	NORTHWOOD IV APTS 664	8,348	1969	Residence	included in above
1000665	NORTHWOOD IV APTS 665	3,159	1969	Residence	included in above
1000666	NORTHWOOD IV APTS 666	4,442	1969	Residence	included in above
1000667	NORTHWOOD IV APTS 667	6,665	1969	Residence	included in above
1000668	NORTHWOOD IV APTS 668	9,331	1969	Residence	included in above
1000669	NORTHWOOD IV APTS 669	8,348	1969	Residence	included in above
1000670	NORTHWOOD IV APTS 670	7,095	1969	Residence	included in above
1000671	NORTHWOOD IV APTS 671	10,858	1969	Residence	included in above
1000672	NORTHWOOD IV APTS 672	5,425	1969	Residence	included in above
1000673	NORTHWOOD IV APTS 673	9,779	1969	Residence	included in above
1000674	NORTHWOOD IV APTS 674	8,029	1969	Residence	included in above
1000675	NORTHWOOD IV APTS 675	10,679	1969	Residence	included in above
1000676	NORTHWOOD IV APTS 676	6,727	1969	Residence	included in above

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000677	NORTHWOOD IV APTS 677	8,104	1969	Residence	included in above
1000678	NORTHWOOD IV APTS 678	7,046	1969	Residence	included in above
1000679	NORTHWOOD IV APTS 679	3,159	1969	Residence	included in above
1000680	NORTHWOOD IV APTS 680	7,967	1969	Residence	included in above
1000681	NORTHWOOD IV APTS 681	8,348	1969	Residence	included in above
1000682	NORTHWOOD IV APTS 682	11,045	1969	Residence	included in above
1000683	NORTHWOOD IV APTS 683	6,727	1969	Residence	included in above
1000684	NORTHWOOD IV APTS 684	1,479	1996	Residence	included in above
1002701	NORTHWOOD V APTS 2701	5,603	1972	Residence	$69,986,213.07
1002702	NORTHWOOD V APTS 2702	10,695	1972	Residence	included in above
1002703	NORTHWOOD V APTS 2703	9,393	1972	Residence	included in above
1002704	NORTHWOOD V APTS 2704	5,603	1972	Residence	included in above
1002705	NORTHWOOD V APTS 2705	9,393	1972	Residence	included in above
1002706	NORTHWOOD V APTS 2706	9,393	1972	Residence	included in above
1002707	NORTHWOOD V APTS 2707	5,603	1972	Residence	included in above
1002708	NORTHWOOD V APTS 2708	8,091	1972	Residence	included in above
1002709	NORTHWOOD V APTS 2709	6,218	1972	Residence	included in above
1002710	NORTHWOOD V APTS 2710	9,393	1972	Residence	included in above
1002711	NORTHWOOD V APTS 2711	8,091	1972	Residence	included in above
1002712	NORTHWOOD V APTS 2712	6,789	1972	Residence	included in above
1002713	NORTHWOOD V APTS 2713	5,603	1972	Residence	included in above
1002714	NORTHWOOD V APTS 2714	6,789	1972	Residence	included in above
1002715	NORTHWOOD V APTS 2715	5,603	1972	Residence	included in above
1002716	NORTHWOOD V APTS 2716	8,091	1972	Residence	included in above
1002717	NORTHWOOD V APTS 2717	6,218	1972	Residence	included in above
1002718	NORTHWOOD V APTS 2718	6,218	1972	Residence	included in above
1002719	NORTHWOOD V APTS 2719	5,603	1972	Residence	included in above
1002720	NORTHWOOD V APTS 2720	5,603	1972	Residence	included in above
1002721	NORTHWOOD V APTS 2721	5,603	1972	Residence	included in above
1002722	NORTHWOOD V APTS 2722	9,393	1972	Residence	included in above
1002723	NORTHWOOD V APTS 2723	5,603	1972	Residence	included in above
1002724	NORTHWOOD V APTS 2724	6,789	1972	Residence	included in above
1002725	NORTHWOOD V APTS 2725	6,789	1972	Residence	included in above
1002726	NORTHWOOD V APTS 2726	6,218	1972	Residence	included in above
1002727	NORTHWOOD V APTS 2727	6,218	1972	Residence	included in above

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1002728	NORTHWOOD V APTS 2728	5,603	1972	Residence	included in above
1002729	NORTHWOOD V APTS 2729	6,789	1972	Residence	included in above
1002730	NORTHWOOD V APTS 2730	5,603	1972	Residence	included in above
1002731	NORTHWOOD V APTS 2731	6,789	1972	Residence	included in above
1002732	NORTHWOOD V APTS 2732	8,091	1972	Residence	included in above
1002733	NORTHWOOD V APTS 2733	9,393	1972	Residence	included in above
1002734	NORTHWOOD V APTS 2734	8,091	1972	Residence	included in above
1002735	NORTHWOOD V APTS 2735	5,603	1972	Residence	included in above
1002736	NORTHWOOD V APTS 2736	5,603	1972	Residence	included in above
1002737	NORTHWOOD V APTS 2737	6,218	1972	Residence	included in above
1002738	NORTHWOOD V APTS 2738	5,603	1972	Residence	included in above
1002739	NORTHWOOD V APTS 2739	6,789	1972	Residence	included in above
1002740	NORTHWOOD V APTS 2740	8,091	1972	Residence	included in above
1002741	NORTHWOOD V APTS 2741	8,091	1972	Residence	included in above
1002742	NORTHWOOD V APTS 2742	9,393	1972	Residence	included in above
1002743	NORTHWOOD V APTS 2743	5,603	1972	Residence	included in above
1002744	NORTHWOOD V APTS 2744	8,091	1972	Residence	included in above
1002745	NORTHWOOD V APTS 2745	9,393	1972	Residence	included in above
1002746	NORTHWOOD V APTS 2746	5,603	1972	Residence	included in above
1002747	NORTHWOOD V APTS 2747	5,603	1972	Residence	included in above
1002748	NORTHWOOD V APTS 2748	5,603	1972	Residence	included in above
1002749	NORTHWOOD V APTS 2749	6,789	1972	Residence	included in above
1002750	NORTHWOOD V APTS 2750	6,789	1972	Residence	included in above
1002751	NORTHWOOD V APTS 2751	5,603	1972	Residence	included in above
1002752	NORTHWOOD V APTS 2752	8,091	1972	Residence	included in above
1002753	NORTHWOOD V APTS 2753	5,603	1972	Residence	included in above
1002754	NORTHWOOD V APTS 2754	6,789	1972	Residence	included in above
1002755	NORTHWOOD V APTS 2755	5,603	1972	Residence	included in above
1002756	NORTHWOOD V APTS 2756	9,393	1972	Residence	included in above
1002757	NORTHWOOD V APTS 2757	5,603	1972	Residence	included in above
1002758	NORTHWOOD V APTS 2758	9,393	1972	Residence	included in above
1002759	NORTHWOOD V APTS 2759	9,393	1972	Residence	included in above
1002760	NORTHWOOD V APTS 2760	5,603	1972	Residence	included in above
1002761	NORTHWOOD V APTS 2761	5,603	1972	Residence	included in above
1002762	NORTHWOOD V APTS 2762	9,393	1972	Residence	included in above

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1002763	NORTHWOOD V APTS 2763	5,603	1972	Residence	included in above
1002764	NORTHWOOD V APTS 2764	6,789	1972	Residence	included in above
1002765	NORTHWOOD V APTS 2765	6,789	1972	Residence	included in above
1002766	NORTHWOOD V APTS 2766	6,218	1972	Residence	included in above
1002767	NORTHWOOD V APTS 2767	5,603	1972	Residence	included in above
1002768	NORTHWOOD V APTS 2768	6,789	1972	Residence	included in above
1002769	NORTHWOOD V APTS 2769	6,789	1972	Residence	included in above
1002770	NORTHWOOD V APTS 2770	8,091	1972	Residence	included in above
1002771	NORTHWOOD V APTS 2771	6,218	1972	Residence	included in above
1002772	NORTHWOOD V APTS 2772	9,279	1972	Residence	included in above
1002773	NORTHWOOD V APTS 2773	9,279	1972	Residence	included in above
1002774	NORTHWOOD V APTS 2774	9,279	1972	Residence	included in above
1002775	NORTHWOOD V APTS 2775	6,218	1972	Residence	included in above
1002776	NORTHWOOD V APTS 2776	9,279	1972	Residence	included in above
1002777	NORTHWOOD V APTS 2777	6,218	1972	Residence	included in above
1002778	NORTHWOOD V APTS 2778	6,218	1972	Residence	included in above
1002779	NORTHWOOD V APTS 2779	9,279	1972	Residence	included in above
1000405	NUCLEAR ENGINEERING LABORATORIES	20,565	1955	Teach, Research, Support	$572,730.60
1000851	OBSERVATORY HALL	30,964	1930	Teach, Research, Support	$5,552.27
1000042	OH ADELIA CHEEVER RESIDENCE	9,413	1964	Resident Hall	included in below
1000041	OH ARTHUR AND HAZEL VANDENBERG HALL	20,117	1964	Resident Hall	included in below
1000043	OH GEDDES RESIDENCE	11,204	1964	Resident Hall	included in below
1000044	OH JULIA ESTHER EMANUEL RESIDENCE	8,984	1964	Resident Hall	included in below
1000046	OH LAUREL HARPER SEELEY HALL	36,375	1964	Resident Hall	included in below
1000040	OH MARY ALICE AND LILLIAN GODDARD HALL	21,995	1964	Resident Hall	$29,257,941.59
1000045	OH PAMELA NOBLE RESIDENCE	9,413	1964	Resident Hall	included in above
1000047	OH PLANT SERVICE	3,341	1964	Administration & Support	included in above
1000704	OOSTERBAAN BENNIE FIELD HOUSE	89,001	1981	Intercollegiate Athletics Bldg	$778,652.94
1005047	PALMER COMMONS	106,471	2005	Teach, Research, Support	$3,872,103.51
1000263	PALMER DRIVE PARKING STRUCTURE	391,303	2004	Parking Structure	$589,007.51
1005510	PALMER FIELD TEMPORARY RECREATION FACILITY		*	Recreational Sports Building	
1005399	PERFORMANCE CENTER	147,863	2018	Intercollegiate Athletics Bldg	
1000890	PERRY BUILDING	117,904	1902	Teach, Research, Support	$731,954.95
1000807	PHYSICAL PROPERTIES BUILDING	7,183	1920	Administration & Support	$633,566.11
1000442	PIERPONT WILBUR K COMMONS	90,488	1965	Recreational Sports Building	$8,972,246.66

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1008050	PLANT STORAGE BUILDING #1	3,087	1987	Administration & Support	
1008051	PLANT STORAGE BUILDING #2	2,577	1987	Administration & Support	
1008052	PLANT STORAGE BUILDING #3	2,577	1987	Administration & Support	
1005385	POSTMA RICHARD L FAMILY CLUBHOUSE	25,268	2017	Intercollegiate Athletics Bldg	
1000186	POUND MADELON HOUSE	7,571	1898	Teach, Research, Support	$1,983,517.05
1000187	POUND MADELON HOUSE GARAGE	527	1951	Teach, Research, Support	
1000180	POWER CENTER FOR PERFORMING ARTS	73,088	1971	Teach, Research, Support	$4,599,912.30
1000203	PRESIDENTS RESIDENCE	13,781	1840	Administration & Support	$1,017,257.31
1000172	RACKHAM HORACE H SCHOOL OF GRADUATE STUDIES	157,957	1938	Teach, Research, Support	$4,801,921.89
1000416	RADIATION SCIENCES LABORATORY 1	7,708	1962	Teach, Research, Support	$506,187.94
1000417	RADIATION SCIENCES LABORATORY 2	10,660	1962	Teach, Research, Support	$420,593.53
1000972	RADRICK FARMS BARN #1	4,902	1962	Administration & Support	
1000955	RADRICK FARMS CARETAKERS HOUSE	2,874	1962	Administration & Support	
1000958	RADRICK FARMS CHICKEN HOUSE	200	1962	Administration & Support	
1000970	RADRICK FARMS COMFORT STATION	251	1987	Administration & Support	
1005331	RADRICK FARMS COMFORT STATION #2	253	1987	Administration & Support	
1000959	RADRICK FARMS CORNCRIB #1	105	1962	Administration & Support	
1000918	RADRICK FARMS DRIVE RANGE SHELT	128	1989	Administration & Support	
1000962	RADRICK FARMS FIRE BARN	792	1962	Administration & Support	
1000960	RADRICK FARMS FOOD SERVICE BLDG	408	1995	Administration & Support	
1000974	RADRICK FARMS GOLF CART BUILDING	2,909	1976	Administration & Support	
1000963	RADRICK FARMS GOLF CLUBHOUSE	10,725	1940	Administration & Support	
1000971	RADRICK FARMS GOLF STORAGE BLDG	6,458	1966	Administration & Support	
1000954	RADRICK FARMS PUMP HOUSE	168	1976	Administration & Support	
1000956	RADRICK FARMS SHED-GARAGE	2,370	1962	Administration & Support	
1005048	RADRICK FARMS STORAGE	4,055	2003	Administration & Support	$4,472.65
1000957	RADRICK FARMS TACKROOM-BARN	2,855	1962	Administration & Support	
1000953	RADRICK RECREATION FACILITY	2,459	1994	Recreational Sports Building	$5,398.03
1000208	RANDALL HARRISON M LABORATORY	217,047	1924	Teach, Research, Support	$7,486,870.94
1000812	RESEARCH MUSEUMS CENTER	153,375	1969	Teach, Research, Support	$3,262,701.18
1005426	REVELLI TEMPORARY STORAGE BUILDING	475	2018	Teach, Research, Support	
1000813	REVELLI WILLIAM D BAND REHEARSAL HALL	15,620	1973	Teach, Research, Support	$2,255,383.02
1000301	ROGEL CANCER CENTER	278,072	1997	TeachResSupport/CDS	$72,181,736.74
1005188	ROSS SCHOOL OF BUSINESS BUILDING	292,008	2009	Teach, Research, Support	$2,370,493.69
1005120	ROSS STEPHEN M ACADEMIC CENTER	45,356	2006	Teach, Research, Support	$0.00
1000193	RUTHVEN ALEXANDER G BUILDING	152,530	1928	Administration & Support	$24,338,875.56
1003542	SAGINAW FOREST GARAGE	682	1903	Teach, Research, Support	$3,931.88

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1003541	SAGINAW FOREST RESIDENCE	567	1903	Teach, Research, Support	$61,955.08
1000268	SALT STORAGE BUILDING	2,385	1984	Administration & Support	$75,658.97
1000705	SCHEMBECHLER GLENN E HALL	90,891	1971	Intercollegiate Athletics Bldg	$927,756.46
1000420	SCHOOL OF INFORMATION NORTH	30,930	1971	Teach, Research, Support	$6,241,531.16
1000211	SCHOOL OF KINESIOLOGY BUILDING	228,460	1915	Teach, Research, Support	$2,883,105.26
1000333	SCHOOL OF NURSING BUILDING 1	141,977	1913	Teach, Research, Support	$18,936,207.38
1005347	SCHOOL OF NURSING BUILDING 2	80,301	2015	Teach, Research, Support	$23,712.75
1000219	SCHOOL OF SOCIAL WORK BUILDING	143,675	1997	Teach, Research, Support	$4,669,458.25
1000999	SEISMOGRAPH STATION	576	1963	Teach, Research, Support	
1000227	SHAPIRO HAROLD T AND VIVIAN B LIBRARY	175,900	1957	Library Building	$9,060,238.97
1000944	SHEEP RESEARCH FAC EAST BARN	2,016	1983	Teach, Research, Support	
1005406	SHEEP RESEARCH FAC HOOP BARN	2,038	2002	Teach, Research, Support	
1000942	SHEEP RESEARCH FAC PORTAL VISTA	3,744	1993	Teach, Research, Support	
1000943	SHEEP RESEARCH FAC SQUARE DOME	1,280	1985	Teach, Research, Support	
1005405	SHEEP RESEARCH FAC TRACTOR SHED	680	1994	Teach, Research, Support	
1000947	SHEEP RESEARCH FACILITY HAY BARN	280	1976	Teach, Research, Support	
1000973	SHEEP RESEARCH FACILITY OLD BARN	1,153	1962	Teach, Research, Support	$10,024.90
1000946	SHEEP RESEARCH FACILITY P BARN 1	4,575	1976	Teach, Research, Support	
1005349	SHEPHERD DONALD R SOFTBALL CENTER	10,500	2014	Intercollegiate Athletics Bldg	
1005077	SHEPHERD DONALD R WOMENS GYMNASTIC CENTER	22,837	2002	Intercollegiate Athletics Bldg	
1000320	SIMPSON CIRCLE PARKING STRUCTURE	467,374	1968	Parking Structure	$80,078.20
1000212	SIMPSON THOMAS H MEMORIAL INST MEDICAL RESEARCH	17,769	1927	Teach, Research, Support	$6,787,511.14
1005401	SOCCER TICKET BUILDING	238	2015	Intercollegiate Athletics Bldg	
1000063	SOUTH QUADRANGLE	371,519	1951	Resident Hall	$74,160,739.57
1000714	STADIUM PUMPING STATION	6,746	1927	Intercollegiate Athletics Bldg	
1005224	STAMPS AUDITORIUM	13,488	2008	Teach, Research, Support	$0.00
1000445	STEARNS FREDERICK BUILDING	18,261	1955	Teach, Research, Support	$2,377,162.23
1000064	STOCKWELL MADELON LOUISA HALL	145,204	1940	Resident Hall	$706,947.41
1000215	STUDENT ACTIVITIES	119,626	1957	Student Services	$8,508,816.93
1000216	TAPPAN HALL	37,576	1894	Teach, Research, Support	$2,252,873.26
1005037	TAUBMAN A ALFRED BIOMEDICAL SCIENCE RESEARCH BLDG	593,717	2006	Teach, Research, Support	$8,530,547.12
1000317	TAUBMAN A ALFRED HEALTH CARE CTR	405,003	1986	Clinical Delivery System	$35,570,114.47
1000209	TAUBMAN A ALFRED HEALTH SCIENCES LIBRARY	143,974	1980	Library Building	$1,763,210.53
1002515	TELECOMMUNICATIONS BLDG I	311	1985	Administration & Support	
1000259	THAYER ST PARKING STRUCTURE	165,419	1962	Parking Structure	
1000255	THOMPSON ST PARKING STRUCTURE	365,996	1963	Parking Structure	$0.00
1000738	TISCH PRESTON ROBERT TENNIS BLD	89,026	1997	Intercollegiate Athletics Bldg	

Bldg #	Building Name	Gross Sq Ft	Original Construction	Building Type	Deferred Maintenance Backlog
1000313	TOWSLEY CENTER FOR CONTINUING MEDICAL EDUCATION	52,332	1969	Teach, Research, Support	$7,882,033.24
1005240	TOWSLEY CHILDRENS HOUSE	25,428	2010	Teach, Research, Support	$891,061.66
1005400	TRACK AND FIELD AUXILIARY BUILDING	2,325	2018	Intercollegiate Athletics Bldg	
1005397	TRACK AND FIELD STADIUM	512	2018	Intercollegiate Athletics Bldg	
1000808	TRANSPORTATION SERVICES BUILDING	40,633	1964	Administration & Support	$2,111,552.28
1005413	TROTTER WILLIAM MONROE MULTICULTURAL CENTER	20,719	2019	Student Services	$0.00
1002519	UM TRANS RES FLAMMABLE STOR BLDG	192	1996	Teach, Research, Support	
1000444	U-M TRANSPORTATION RESEARCH INST	77,883	1969	Teach, Research, Support	$12,112,632.57
1005338	UM TRANSPORTATION RESEARCH TESTING BUILDING	3,454	2012	Teach, Research, Support	
1005051	UMH MODULAR OFFICE A	2,050	2000	Clinical Delivery System	
1005046	UNDERGRADUATE SCIENCE BUILDING	141,749	2005	Teach, Research, Support	$1,628,180.37
1000390	UNIV HOSPITALS CHILD CARE CENTER	14,850	1991	Clinical Delivery System	$476,565.05
1000316	UNIVERSITY HOSPITAL	1,713,623	1986	Clinical Delivery System	$189,704,602.46
1000309	UNIVERSITY HOSPITAL SOUTH UNIT 1	67,494	1950	Clinical Delivery System	$4,059,268.58
1000312	UNIVERSITY HOSPITAL SOUTH UNIT 2	266,038	1969	Clinical Delivery System	$61,073,497.72
1000314	UNIVERSITY HOSPITAL SOUTH UNIT 3	19,988	1972	Clinical Delivery System	$1,355,107.69
1000318	UNIVERSITY HOSPITAL SOUTH UNIT 4	158,938	1990	Clinical Delivery System	$8,570,406.72
1005012	UNIVERSITY HOSPITALS HELIPAD	5,397	2001	Clinical Delivery System	
1005117	UPJOHN RACHEL BUILDING	117,097	2006	Clinical Delivery System	
1000261	UTILITIES SERVICE BUILDING	15,183	1973	Administration & Support	$2,154,193.85
1000204	VAUGHAN HENRY FRIEZE PUBLIC HEALTH BUILDING	210,906	1942	Teach, Research, Support	$1,017,390.76
1000065	VAUGHAN VICTOR C HOUSE	51,518	1939	Teach, Research, Support	$6,461,378.70
1005059	WALGREEN CHARLES R JR DRAMA CENTER	84,149	2007	Teach, Research, Support	$1,276,039.55
1005193	WALL STREET EAST PARKING STRUCTURE	249,962	2014	Parking Structure	
1005430	WALL STREET WEST PARKING STRUCTURE	367,321	2020	Parking Structure	$0.00
1008067	WALLACE MIKE AND MARY HOUSE	7,863	1909	Teach, Research, Support	
1000731	WEIDENBACH JOHN P HALL	23,229	1955	Intercollegiate Athletics Bldg	$535,556.46
1005101	WEILL JOAN & SANFORD HALL	97,989	2006	Teach, Research, Support	$4,081,446.29
1000165	WEISER HALL	144,701	1963	Teach, Research, Support	$2,242,865.22
1005319	WEISFELD FAMILY GOLF CENTER	11,307	2011	Intercollegiate Athletics Bldg	
1005388	WEST ANN ARBOR HEALTH CENTER NEW	75,260	2017	Clinical Delivery System	
1000167	WEST HALL	166,528	1904	Teach, Research, Support	$1,617,002.31
1000066	WEST QUADRANGLE	386,265	1937	Resident Hall	$3,566,157.63
1008090	WOLVERINE TOWER	224,981	1973	Administration & Support	$13,166,583.18
1000135	WYLY SAM HALL	82,855	2000	Teach, Research, Support	$848,882.83
1000709	YOST ICE ARENA	125,259	1924	Intercollegiate Athletics Bldg	$2,195,061.78