



Facilities Planning & Management

UNIVERSITY OF WISCONSIN-MADISON

MEETING MINUTES – APPROVED

Campus Planning Committee

September 26, 2019

School of Education – 1000 Bascom Mall

Room 159 – Wisconsin Idea Room

8:30am to 10:00am

1. CALL TO ORDER

Present: Craig Berridge, Joel Gerrits, Yevgenya Grinblat, Mark Markel, Shelby O’Conner, Kurt Paulsen, Andrew Pietroske, Ian Robertson, Karl Scholz, Liz Sadowski, Ben Sharp, Bret Shaw, Lindsey Stoddard Cameron, Clifford Thurber, Mark Wells, Eric Wilcots

Excused: Aristotle Georgiades, Tina Marshalek, Leon Shohet, Linsey Steege, Julie Zachman

FP&M: Gary Brown; David Darling; Rob Kennedy, Brent Lloyd, Kip McMahan; Missy Nergard, Jeff Pollei, Dennis Rodenberg, Margaret Tennessen, Cindy Torstveit, Aaron Williams, Jesse Luckey Winters,

Guests: Chris Bruhn, Rick Moss, Peter Nemmetz, Alex Roe, Kurt Stephenson,

a. Scholz, committee chair, called the meeting to order at 8:30am.

2. OLD BUSINESS

a. Approval of Meeting Minutes from September 12, 2019. (ACTION ITEM)
▪ **A motion by Markel, seconded by Stoddard Cameron, to approve minutes as revised.**

3. CAPITAL BUDGET PRESENTATIONS (Refer to Slide Deck)

a. College of Engineering (CoE), Dean Ian Robertson
▪ Description of CoE facilities and college overview.
▪ 2006-2015 grew undergrads from 3,200 to 5,000.
▪ 2015, under controlled enrollment, undergrads are down to 4,500.
▪ Other peer institutions are investing in their engineering campuses, and with fewer in state high school graduates, UW is reliant on out of state students, which means facility conditions and spaces matter.
▪ Flad Architects study summarized that there is a deficit in the quantity and quality of research and collaborative learning spaces within the CoE.

b. Project: Engineering Education Building
▪ Site to be determined based on feasibility study.
▪ Proposed funding: 80% GFSB, 20% GG
▪ Project required to meet the demands of students and the industries in the state of Wisconsin and beyond.
▪ Allows CoE to grow towards 5,500 undergraduates

- c. Project: Engineering Research Building
 - Site to be determined based on feasibility study.
 - Proposed funding: 100% GG.
 - Project required to enable the faculty and staff to be competitive and provide technological solutions to national, worldwide, and societal challenges.

- d. Strategic investment in the CoE is important because:
 - Remain competitive.
 - Grow to meet demand for engineering for WI.
 - Expand educational opportunities.
 - Increase research expenditures.
 - Increase IP disclosures to WARF.
 - Increase alumni support.
 - Provide research space that meets safety standards and promotes research innovation.
 - Attract and retain talented faculty.
 - Continue to lead in engineering education innovation.
 - Provide students with essential support services.
 - Reverse trend of declining rankings at both undergraduate and graduate level.
 - Attract non-resident students.

 - Markel: What is the target student enrollment for the next 5-10 years with new projects being built?
 - Robertson: With new project and new faculty we can get to 5,500 in that timeframe.
 - Markel: How are you going to stagger this with educational growth?
 - Robertson: Tenure track to handle 5,200 students, renovations to date in instructional facilities have all been to grow capacity in key undergraduate labs. Can squeeze in 5,200, a growth to 700 from current point. In the next 3 or 4 years we'll see CoE growing enrollment to 5,200.
 - Paulsen: Education Building at \$150M in the 21-23 biennium? Engineering Research Building at \$170M in 23-25 biennium?
 - Robertson: Advanced planning in 20-21 for the Education Building.

- e. School of Medicine and Public Health (SMPH), Senior Associate Dean for Basic Research, Biotechnology and Graduate Studies Rick Moss and Assistant Dean for Facilities Mark Wells.
 - Overview in the context of the importance of accreditation and recent improvements.
 - SMPH is seeing new kinds of research requests, which require new kinds of research facilities.
 - SMPH had \$646M in research expenditures in 2017-18. UW-Madison as a whole at \$1.2B in research expenditures.
 - 9,577 employees and 1,951 investigators.
 - Wisconsin Partnership Program – dedicated to supporting research programs that will improve the health and quality of life to WI residents. Identifies health disparities and creates interventions.
 - SMPH has been working closely with their colleagues and FP&M to help define and implement a data driven decision support system for space assignment across SMPH.

- f. Project: WARF Building Floors 3-7 & 10
 - Earlier WARF projects have allowed SMPH to double capacity on renovated floors.
 - Will help decant employees out of lease space.
 - Improve adjacencies for research and collaboration.
 - Lease revenue is brought in to help defer the costs of the renovation.

- g. Project: McArdle Building Floors 5-8
 - Add a dedicated freezer facility for SMPH and the Graduate School.
 - Convert outdated lab space into modern office space for Biostatistics and Medical Informatics Chair recruitment.

- Allow reuse of existing Medical Sciences Center space.
- h. Project: WIMR Primate Center Remodel
- Provide additional modern vivarium space for SMPH and UW National Primate Center priorities.
 - Frees up space currently being used in this capacity in the center of campus.
 - Supports the national goal of finding a cure for HIV/AIDS.
- i. Project: Wisconsin Institute for Medical Research (WIMR III)
- Provide an additional 10 to 12 floors of modern wet and dry research space in the clinical science campus.
 - Provide more Medical Sciences Center space for reuse.
 - Hard to build a building quick enough so you need to be nimble with what you have.
- Markel: You are asking for the first three projects in the next biennium and the 4th project (WIMR II) is a vision at this point?
- Wells: That is correct.
- Scholz: Are these all gift/grant funded?
- Wells: Currently, yes.
- O’Conner: Will these projects bring faculty/staff into campus, or will they make the correct space for current users?
- Wells: Depends on the project. WARF is about bringing scattered employees throughout the community to campus. Helps with stewardship of money. WIMR III will allow for appropriate wet and dry research lab space.
- j. Facilities Planning & Management (FP&M) Utilities and Energy Management (UEM), Jeff Pollei
- UEM = Utilities Energy & Management
 - UEM is the district energy system on campus. It is composed of three plants on campus to provide the energy needs for Campus, State, and Federal facilities.
 - Current plants consist of:
 - Charter Street 1958-present
 - Walnut Street 1975-present
 - West Campus Cogeneration Facility (UW & MGE) 2005-present
 - 1996 Utility Master Plan
 - Expenditures on plants
 - 2005 Utility Master Plan
 - Expenditures on distribution throughout campus
 - 2015 Utility Master Plan
 - Expenditures for distribution upfront
 - Expenditures for production and plants toward the back
- Project: Engineering Drive Utilities \$29.7M
- Three areas of improvement
 - Engineering Drive – Steam & chilled water, Electric & communication, water, storm & sanitary.
 - Engineering Mall – Steam & chilled water, Electric & communication
 - W. Dayton Street – Chilled water
 - Utilities are undersized and at the end of their life. There is very little redundancy in this part of campus.
 - Scholz: How is this funded?
 - Pollei: General Fund Supported Borrowing (GFSB) and Program Revenue Supported Borrowing (PRSB)
- Project: South Central Campus Steam Utility Replacement \$54.6kM
- ‘Clean up’ project of four projects that were deferred or never included in previous projects.
 - University Avenue Steam Tunnel Replacement
 - Charter Street Steam Tunnel Replacement

- Johnson Street Steam/Condensate Renovation
- South Campus Utility Improvements
- Project: Charter Street Black Start & Generation Implementation \$54.3M
 - Resiliency project – ability to restart a plant after an extended outage due to power failure or natural gas outage.
 - 5kV emergency diesel generators
 - Propane backup ignition for boilers
 - Colling tower addition for steam condensing
 - 20-25 MW of additional power production
 - Markel: What is the campus utilities perspective on the research animal requirements, any animal facility has to have backup generator capacity. Is this a campus (district) wide issue? What is happening in other facilities around campus? Do individual buildings need to have their own resiliency designed in?
 - Pollei: From a utility side, we are not intended to be back up and running in 10 seconds after a system failure. This is why the building generators are important to the district system.
 - Darling: Operation ‘Dark Skies’ was an outage exercise UW conducted. Animal care became very relevant and critical to that exercise. Even if we have local generator capacity, we don’t necessarily have enough district generation to add ‘extra’ heating/cooling to an area.
 - Markel: NIH is going to mandate this?
 - Berridge: This was discussed recently at a committee I participate on. Backup is a ‘should’ and not a ‘must’ was the take of the committee. We have capacity to supply energy from multiple sources into campus (MG&E). We can treat that as a form of backup. As a committee we felt this helps comply with NIH requirements. Individual buildings, there is an ability to provide heat in the winter, but not chilled water in the summer. Considering the physiology of the animals (i.e. monkeys are from a warm climate, so cooling in the summer isn’t a must), it may not be as critical as people are discussing
 - Wells: SMPH vivaria in our new buildings are in good shape. The MSC building is our issue. Animals are kept in ventilated racks and cages which require power. For us, it’s not about providing an entire building back-up generator, but identifying the key areas that need the generation in case of emergency.
 - Paulsen: Jeff, which ‘system’ keeps you up more at night based on resiliency?
 - Pollei: Depends on the time of year. In the case of the polar vortex, it would take days for us to catch up if we went down. In the summertime, our blips might go unnoticed around campus. On July 19, the transformer blow-up, created significant issues for the city as a whole.
 - Wilcots: Clarification – the Engineering Research building was requesting GG funding?
 - Robertson: Yes.

4. ANNOUNCEMENTS

- a. Next meeting is October 17, 2019 – School of Education Room 159

5. MEETING ADJOURNMENT

- a. Scholz adjourned the meeting at 9:47am