CONSTRUCTION PLANNING AND PROGRESS MEETING
BROUGHT TO YOU BY INFRASTRUCTURE PLANNING AND FACILITIES
Thursday, November 14, 2013

Twitter hash tag #msuconstruction
Today’s agenda

• Board of Trustee updates

• New presentations
  • Campus Snow Plan
  • Veterinary Medical Center – Replace Fire Alarm System
  • Bessey Hall – Renovate Third Floor
  • West Circle Housing Complex – Infrastructure Improvements – 2014 (Phase 2 of 2)

• Progress updates
  • North Campus Infrastructure Improvements – West Circle Drive 2015
  • Chittenden Hall – Renovation
  • Bio Engineering Facility
  • Auditorium – Alterations to Fairchild Theatre
  • Transportation Services – New Fuel Station
Step 1: Authorization to Plan
  - Parking – Lot 97 – Engineering Research – Additional Spaces

Step 2: Authorization to Proceed
  - Akers Hall – Dining and Life Safety Renovation
  - Clinical Center – C-Wing – HVAC Renovation and Addition 1
Step 2: Authorization to Proceed

• Kresege Art Center – Courtyard Renovation
• West Circle Housing Complex – Infrastructure Improvements – (Phase 2 of 2)
• Veterinary Medical Center – Replace Fire Alarm System
• Bessey Hall – Renovate Third Floor
• Wilson Hall – Creative Commons Renovation

Step 3: Bid and Contract Award

• Well House No. 32 – Construct Original Building
• Athletic Fields – Munn Field – Artificial Turf Field
IPF Snow Plan video

Battling winter weather on campus
• Be snow safe!
  • Don’t rush – give yourself time to get to work
  • Drive carefully
  • Dress warmly
  • Wear sensible shoes
  • Watch where you are walking
  • Check the forecast before heading outside
• Safety
  • Do not dart out in front of or behind snow-removal equipment. It is large, loud and difficult to stop quickly.
  • Make eye contact with a snow-removal equipment operator before crossing in front of him/her.
• **Salt and ice-melt compound**
  - Dial **353-1760** to report icy spots on campus.
  - It takes time for the ice-melt compound to take effect.
Remember...

WALKWAY ICE MELT

If you see an icy area, please sprinkle it with ice-melt compound.
Please help us keep walking surfaces clear of snow and ice this winter.

The ice-melt compound is an environmentally friendly alternative to salt that is provided by your Infrastructure Planning and Facilities partners in snow removal:
- Building Services–Custodial Services
- Landscape Services

Thank you for your help!

INFRASTRUCTURE PLANNING AND FACILITIES

WE KEEP MSU RUNNING
ipf.msu.edu • Call 353-1760
• **Sidewalks**
  
  • Do not park so close to the sidewalk that your car’s bumper hangs over it.
• **Parking lots**
  
  • Avoid parking in the part of a lot that has not yet been cleared.
  • Park where it’s plowed or wait a few minutes for the driver to finish and then park freely in the cleared lot.
• **Residence hall parking loops**
  - Parking is prohibited in residence hall loops between 2 a.m. and 6 a.m.
  - With 65 people plowing, 26,000+ spaces must be cleared before 6 a.m.
• To request services or to report dangerous spots on campus, call 353-1760.

• If you can’t call, tweet IPF (@MSUFacilities) to report snow concerns (and to send photos).

• For more information on MSU’s snow-removal plans, visit ipf.msu.edu.
  o Snow and ice removal services: http://ipf.msu.edu/services/snow-and-ice-removal.html
  o Green practices for snow removal: http://ipf.msu.edu/green/practices/snow-removal.html

• E-mail feedback, suggestions and comments to
Veterinary Medical Center – Replace Fire Alarm Systems
Veterinary Medical Center – Replace Fire Alarm Systems

**Project objective:**
- Replace the existing fire and smoke alarm system with a modern system from National Time and Signal
- Current system has reached the end of its life and is becoming difficult to maintain and obtain replacement parts

**Project goals:**

**Equipment**
- Upgrade to the latest fire and smoke detection technology
- Low impact audible devices in sensitive animal areas
- Install Interactive Graphic Displays (IGD) for notification and campus/building way finding. IPF is working with MSU Police on the content of the displays for security and safety

**Operations and maintenance**
- Reduce maintenance calls
- Utilize the MSU IPF fire alarm personnel for installation
Project scope:

- The new fire and smoke alarm system will be provided in one building at a time within the Veterinary Medical Center
- Work can be done after hours as needed to minimize disruptions
- The existing fire and smoke alarm system will be left in place until the new systems are commissioned
- The new fire alarm system will be similar to several new National Time and Signal Fire alarm installations at MSU
- Design and construction will be similar to the recently completed fire alarm upgrade to the MSU Clinical Center

Timeline:

- Start of construction: February 2014
- Substantial completion: Feb. 28, 2015
Impacts:

- The project is inside the Veterinary Medical Center.
- There will be no interruptions to pedestrian or vehicular traffic.
- Potentially disruptive work will be coordinated to avoid impacts to building users.
University departments involved

**MSU Police**

**MSU College of Veterinary Medicine**

**MSU IPF**
Engineering and Architectural Services
Fire and Security Services
Veterinary Medical Center – Replace Fire Alarm Systems

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Veterinary Medical Center – Replace Fire Alarm System

Project phase: Planning/Design

The existing fire and smoke alarm system in the Veterinary Medical Center (Veterinary Teaching Hospital) was installed during the original construction. With the exception of the Oncology Wing, the system is nearly 50 years old.

The planning of the project is anticipated to include a new fire and smoke alarm system for the Veterinary Medical Center Building with the exception of the Oncology Wing, which already has an updated, modern fire alarm system.

The Veterinary Medical Center Building is located at the corner of Wilson Road and Bogue Street in the Central Academic District.

Questions, comments, concerns?
Design representative
- Kane Howard, khoward@ipf.msu.edu, 517-355-6486
Bessey Hall – Renovate Third Floor
Project scope:

- Comprehensive renovation of 11 classrooms in Bessey Hall to include rooms 304, 305, 306, 307, 310, 311, 312, 313, 314, 315, 316; and limited renovation to room 317
- Renovations to include:
  - new ceiling
  - lighting, flooring
  - paint, chalk or marker boards
  - window treatments
  - technology and furniture
  - room 317: new ceiling, lighting, and flooring only
- Four of the existing classrooms will be converted into two REAL (Rooms for Engaged and Active Learning) classrooms
- Informal learning and collaborative areas to be created within the corridor and lobby areas using furniture and technology
**Impacts:**

- Limited noise to second floor offices and classrooms
- Limited disruption to the third floor Writing Center

**Timeline:**

- Start of construction: May 5, 2014
- Substantial completion: Aug. 1, 2014
Energy sustainability:
• New energy-efficient lighting and occupancy sensors
• If possible, old equipment and demolished construction material will be recycled

Hazardous building materials review:
• Asbestos floor tile adhesive will be removed
Work area
Corridor
Corridor door frames
Podium-style classroom
Bessey Hall – Renovate Third Floor

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Bessey Hall – Renovate Third Floor

Project phase: Planning/Design

Bessey Hall was built in 1961 and is considered a core instructional building located near the heart of campus. The building houses 28 instructional spaces ranging in capacity from 24 to 338 seats, provides instructional space for a wide range of disciplines, and has the potential to serve more than 10,000 students every day. Renewed investment in this instructional resource is necessary to provide the facilities and technology that support our teaching and learning, and contribute to the success of our students.

As part of this investment, MSU has created the REAL (Rooms for Engaged and Active Learning). This initiative adopts innovative classroom designs and technology-rich environments to facilitate engaged and active learning. The designs utilize a range of furniture options, room layouts and technology that support student-centered and collaborative teaching and learning. REAL aims to create high-impact educational environments that engage students in active learning, aiding in improved student engagement and outcomes; and provides opportunities for research, leadership in instructional methods and innovation through a technology-rich environment.

This project is anticipated to be a comprehensive renovation to the third floor of Bessey Hall, which includes 11 university classrooms. The renovation will include the creation of two REAL rooms and the
Project area

West Circle Housing Complex – Infrastructure Improvements – 2014 (Phase 2 of 2)
Project scope:

• Second phase of a two phase project
• New steam tunnel, electric service, communication ducts, and water main replacing 50-year old services
• Improved reliability for all utility services

Timeline:
• Some early start work in March 2014
• Visible construction complete by August, 2014
• Continue electric cut-overs November-December 2014
Impacts:

• Some parking loss to Delta Court (West Circle housing complex planned to be vacant for summer, 2014)
• Maintain construction access to the Landon Hall construction traffic (via West Circle Drive)
• Delta Court closed east of the Wills House driveway
Preliminary utility layout
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Construction representative:  
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Project Need:

• The north campus arch-style steam tunnels are 87-102 years old and have significantly deteriorated.
• The structural anchors, pipe supports, and steam equipment within these tunnels are also severely deteriorated and require replacement or repair for safe and reliable operation of the steam distribution system.
• The project includes road reconstruction (pedestrian, bicyclist, and vehicular safety improvements), communication and electrical distribution improvements to the North Campus Region.
• This is the third phase of a four phase project.
Proposed phase 3 work scope – composite schematic plan
Laboratory Row – Master Plan

Marshall–Adams Hall

Chittenden Hall

Cook Hall

Old Botany

Agriculture Hall

North Campus – Infrastructure Improvements – West Circle Drive 2014 (Phase 3 of 4)

November 2013
Project impacts:

• Project requires road reconstruction

• Parking/traffic potential impacts:
  o requires road closings for part and full duration of the project
  o proposed work is being coordinated with MSU Police and outside
    entities, regarding closures/detours
  o temporary pedestrian detours will be required during construction

• Early project construction: November 2013 through April 2014
• Project site construction schedule: Beginning May 5, 2014
  through Aug. 16, 2014 (interim substantial completion, includes
  all site work).
• Project substantial completion: Sept. 26, 2014
Project objective:

• Comprehensive renewal while preserving its historical character
  ○ Building is on the State Register of Historic Sites

• Renovations to support and create a visible location for the Graduate School

• Consistent with comprehensive renewal projects completed at
  ○ Eustace - Cole Hall
  ○ Marshall - Adams Hall
Chittenden Hall background:

- Built in 1901 at a cost of $15,000
- 13,500 gross square foot building
- Located on West Circle Drive and part of historical Laboratory Row
- Initially known as the Dairy Laboratory, designed for the production and study of dairy products
- 1913 the dairy moved and it became home of the Department of Forestry until 1966
- 1969 the building was formally named after Alfred K. Chittenden
- College of Agriculture and Natural Resources, Department of Agricultural Economics graduate students occupied until 1999
- 1999 to present building vacant and awaiting renewal
Terrace plan
Historic photo – West elevation
Exterior rendering
Interior rendering
Proposed construction phasing
North Campus – Infrastructure Improvements – West Circle Drive 2014 (Phase 3 of 4)
November 2013


Proposed Construction Phasing

Steam Vault 222
Emergency Repairs

Museum Building

LEGEND:

- Chesterfield Hall Renovation
- Proposed Early Steam Construction December 15, 2013 - February 14, 2014
- Accelerated Phase May 5, 2014 - Mid July 2014
- Summer Construction May 5, 2014 - August 16, 2014
- Short Duration Construction to be Phased July-August 16, 2014
- Temporary Pathway during Construction (Install Fall 2013)
- North Campus Substation (NCS) & Existing Steam Tunnels & Buildings - Mid-November 2013-September 26, 2014
Proposed construction phasing: May 5, 2014 – Mid-July 2014
Proposed construction traffic detours: May 5, 2014 – Mid-July 2014
Proposed construction phasing: May 5, 2014 – Mid-July 2014
Proposed construction phasing: Mid-July 2014 to Aug. 16, 2014

North Campus – Infrastructure Improvements – West Circle Drive 2014 (Phase 3 of 4)
November 2013
West Circle detour map

Work begins mid-November

Work begins Nov. 18.
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Construction representative:  
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Project scope:

• This project includes a four-story research laboratory building that is designed to facilitate interdisciplinary research and interaction among all occupants/users, and the sharing of specialized research equipment, such as imaging.

• The building will be physically connected to the existing Clinical Center C-Wing and Life Science B-Wing, with proximity to the Radiology building to facilitate the sharing of core research resources.

Timeline:

• Construction start date: Sept. 30, 2013
• Construction end date: September 2015
Impacts:

- Sidewalk closure
- Access to Life Science loading dock will be coordinated with building occupants
Bio Engineering detour map
The proposed south elevation drawing for the new Bio Engineering building
New concrete foundation walls are created
A concrete pump truck pours the new foundation walls
Workers begin to form foundation footings before concrete is poured
Bio Engineering Facility

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Bio Engineering Facility

Project phase: Construction

The construction of the Bio Engineering Facility will provide a unique opportunity to bring together research teams from engineering and biomedical research to promote the development of bio-engineering and engineering health sciences at Michigan State University. These emerging research areas have significant opportunities for increased federal research funding, as well as for technology transfer to the private sector, which can promote the development of a transformational bio-based economy in Michigan.

Collaboration between researchers from different disciplines, ranging from chemical veneering, electrical engineering and mechanical engineering to pharmacology, physiology and radiology, will be essential in the development of new areas of research such as tissue engineering. The new laboratory space will provide research capacity necessary to support new hires and funded researchers in the area, and allow collaborators from different academic units to be co-located.
Auditorium – Alterations to Fairchild Theatre
November 2013
Project scope:
This project included
• installation of an orchestra pit with lift system
• an orchestra shell and acoustical upgrades
• renovation of existing and construction of additional restrooms
• fire suppression and fire alarm systems throughout the building
• rewiring the entire building
• installation of a snowmelt system on sidewalks adjacent to the new barrier-free access that includes the installation of an elevator at the northeast corner of the building

Timeline:
• Construction start date: Sept. 10, 2012
• Construction end date: Oct. 25, 2013
Impacts:

• No current impacts, project was complete as of Oct. 25, 2013.
Theatre view from side of stage accentuating wall paneling
View of stage from seats accentuating new sound systems
Barrier-free entrance
New studio 60 (formally the scene shop below the stage)
MSU Fairchild renovation video

MSU's Fairchild Theatre gets a facelift
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Auditorium – Alterations to Fairchild Theatre

November 2013

The College of Music has had a longstanding need for an additional and acoustically appropriate venue to accommodate its numerous rehearsals, performances, classes and musical productions. The 560-seat Fairchild Theatre, located within the Auditorium at the intersection of Farm Lane and Auditorium Road, provides an adequately sized facility, but has limited effectiveness as a music venue due to the lack of an orchestra pit and proper acoustics. Alterations to Fairchild Theatre and related spaces enabled improved and full use of this currently underutilized facility.
Transportation Services – New Fuel Station
November 2013

New fuel station
Project scope:

• This project included:
  o decommissioning the original fueling station at Spartan Stadium,
  o creating a new station in the service district with underground tanks, adding fuel pumps, an overhead canopy and a paved circulation space to accommodate all university fleet vehicles

Timeline:

• Construction start date: May 6, 2013
• Construction end date: Oct. 18, 2013
Impacts:

• Reviewing car wash operations, with goal to open as soon as possible
Outside view of car wash
Fuel pumps
Car wash
Vacuum area inside car wash facility
Transportation Services – New Fuel Station
November 2013

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Transportation Services – New Fuel Station

Project phase: Construction

The original Transportation Services Fueling Station was located adjacent to Spartan Stadium. There were safety and environmental issues that require moving the fueling station from this large assembly area. Further, there were efficiencies to keeping the car wash, which was at the end of its useful life, located with the fueling station, and relocation of the car wash eliminated the need to move vehicles for major events as Spartan Stadium. The project team identified Service Road, east of the Laundry Building, as the best location for a new facility.

The project is located at Spartan Stadium (between Shaw Lane, Shaw Road, and Field Drive).
New IPF website

- Alerts feed
- Construction
- Resources
- Listservs
- Much more!

www.ipf.msu.edu
Stay connected via social media

*New names to represent new IPF unit!*

For updates **on all things IPF** follow [MSUfacilities](https://twitter.com/MSUfacilities) on twitter and become a fan of our [facebook](https://www.facebook.com/MSUFacilities) page – [MSUFacilities](https://www.facebook.com/MSUFacilities). Also, check out our [YouTube](https://www.youtube.com/FacilitiesMSU) page at [www.youtube.com/FacilitiesMSU](https://www.youtube.com/FacilitiesMSU) for virtual tours of major projects on campus.
BEFORE YOU GO, VISIT THE CONSTRUCTION ‘SITE’:

CONSTRUCTION.MSU.EDU

Key features:
• Construction projects
  – Project info
  – Contact information
• Construction detours
• Construction Junctions
• Construction listserv
Construction Junctions continue monthly

Meetings are at 8:30 a.m. the second Thursday of the month

• Dec. 12 Location TBD
• Jan. 10 Brody Hall 112
• Feb. 13 Brody Hall 112

Please sign in and take a survey before you go!