October 21, 2013

MEMORANDUM

TO: Dr. R. Bowen Loftin
President

SUBJECT: CBE Recommendation: Proposed Storage Building for TurboMachinery Laboratory

At its October 16, 2013 meeting, the Council for the Built Environment (CBE) discussed a request from Texas Engineering Experiment Station to construct a storage building located at the TurboMachinery Laboratory. The approximately 1,800 sq. ft. storage building will be located on the southwest corner of the Turbomachinery Lab’s existing lot and will not be visible from the street. Additional storage space is needed, as the current storage space is being converted to possible use as research space and is crowded with test rigs and other research equipment. The total project cost has been estimated to be approximately $280,000, which will be funded completely by the Turbomachinery Laboratory, a division of the Texas Engineering Experiment Station (TEES). The request was signed by Ray Matthews, Facilities Manager of the TurboMachinery Laboratory, and Dean Katherine Banks.

Recommendations from the Sub-Councils:
Facilities Utilization Sub-Council (FURsc) – concurs with the need for the space, believes the proposed solution is reasonable and recommends that the CBE support the proposal.

Maintenance Sub-Council (Msc) – recommends approval of the request as presented.

Technical Review Sub-Council (TRsc) – supports the proposed construction and recommends approval, provided the following concerns/issues are addressed and funded:

Energy & Utilities Services:
- The Facility will not require new electrical or DCW services. It is our understanding that these services will be provided from the existing building north of the site.
- Fire service to the new facility will be served via connection to an existing 6" DCW line on the east side of the project site. The project will need to install a valve and backflow preventer in accordance with TAMU UES Specs.
- Storm water run-off will be dealt with on site with grading to ensure that storm water rates will not increase.
The project will need to adhere to TAMU UES Design Guidelines - https://utilities.tamu.edu/design-standards/

The project will need to follow the rules regarding excavation on campus - https://utilities.tamu.edu/digging-campus/

Facilities Services: Facilities Services supports this project. It is our understanding that the project manager is ensuring that storm water runoff and back flow prevention for fire protection water are appropriately addressed for this project.

Safety & Security (EHS): Safety and Security agrees with stated plans to include fire system and fire suppression in the new building.

- The fire alarm system should be connected to the main fire alarm panel in Turbomachinery.
- The FDC (fire department connections) should be placed on the side of the building that is visible from the asphalt drive behind Turbomachinery (i.e., the east side rather than around the corner on the south-facing side).

The CBE voted unanimously to recommend the President's approval of the request by the Turbomachinery Laboratory to construct a storage building on the southwest corner of the TurboMachinery Lab's existing lot.

Karan L. Watson
Provost and Executive Vice President
for Academic Affairs
Co-Chair, Council for theBuilt Environment

R. Bowen Loftin
President

cc: Sub-Council Chairs, Council for the Built Environment
Dr. Katherine Banks
Project Information Requirements for Capital Planning

Name of Project: Addition of storage building for Turbomachinery Laboratory

Description of Project:
Add a 30' x 60' x 16' metal storage building to the SW corner of the Turbomachinery Laboratory's existing lot

New Construction/Addition: [ ]
Acquisition: [x]
Renovation/Rehabilitation Project: [ ]

Space Requirements:

- Offices: NASF
- Classrooms: NASF
- Labs: Wet (Undergraduate)
  - Dry: NASF
  - R&D: NASF
- Other: (describe below)

Justification for space need:
Additional storage space needed as the current storage space is being converted to possible use as research space. Also, the current storage space is becoming crowded with test rigs and other research equipment and additional space is desired.

- Total NetAssignable Square Footage: NASF
- Total E&G Square Footage: NASF
- Total Gross Square Footage: 1900 GSF

Project Planning and Funding:

- Project Planning amount: $140,000
- Revenue Financing System (RFS) Debt
- Permanent University Fund (PUF) Debt
- Cash
- Gift Funds
- Total $140,000

FY in which project design will be initiated: 12
Source of funds for RFS debt services (if applicable):

Infrastructure Impacts and Project Site:

- Parking required? [x] (Y/N)
  - Number of parking spaces needed: 0
  - Description of parking requirements
  - N/A

- Utility plant expansion required? [x] (Y/N)
  - Additional tons of CW/HW needed: 0
  - Description of utility plant expansion requirements
  - N/A

- Utility relocation required? [x] (Y/N)
- Data/Telecom required? [x] (Y/N)

- Other requirements? [x] (Y/N)
- Description of other requirements
  - Tap into existing domestic water for a water tap at building

- Project Site Identified? [x] (Y/N)
  - If yes, provide project site information
  - SW corner of existing Turbomachinery Laboratory lot

Will any services in the facility be contracted with a third party (dining, bookstore, advertising)? [x] (Y/N)
If yes, provide a copy of contract to Treasury Services and estimated NSF for third party operations.

Submitted By:
Ray Matthews, Facility Manager, Turbomachinery Laboratory
Project Coordinator

Dean or Vice President

System Member
Texas A&M University
Additional Details on the Turbomachinery Lab’s request to construct a storage building:

The attached slide shows the location (within a few feet) of the new building. Please note that the building will not be visible from the street. The building will be constructed with the same ‘R’ panel construction as the back side of the Turbomachinery Lab, and will be painted to match. Additionally, storm water runoff has been considered and a concrete gutter flume is to be installed along the front and North sides of the building to accommodate that runoff.

The new building will be located 50 feet from the nearest existing structure that has water available. The only water to the building will be for one hose spigot in the case that I need to run a pressure washer by the building. There will not be any drain connections, shop sinks, restrooms or other facilities that require water.

The building will tie into the existing domestic water supplying the hydrant at the back of the Turbolab so that the sprinkler system stand can have water available. The contractor is installing a dry system but obviously will need water in the event of a fire.

If you or the council has any more questions, please do not hesitate to ask.

Regards,

Ray Mathews
Facilities Manager
Turbomachinery Laboratory
Texas A&M Engineering Experiment Station
Texas A&M University
O: 979.845.6669
M: 512.799.4968
F: 979.847.8837
The new building will not be visible from the street due to elevation and location at the SW corner of the lab's lot.
MEMORANDUM

To: Dr. Karan Watson  
Chair, Council for the Built Environment

Dr. Rodney McClendon  
Chair, Council for the Built Environment

Subject: Proposed Storage Building for TurboMachinery Laboratory

RECOMMENDATION
The Council for the Built Environment’s (CBE) Facilities Utilization Review sub-committee (FURsc) recommends that the CBE support the request by the Turbomachinery Laboratory to construct approximately 1,800 square foot storage building adjacent to their research complex on George Bush Drive West.

SCOPE
The FURsc met this morning to consider the request by the Turbomachinery Laboratory to construct a building, sized at 30’ x 60’ x16’, to address their need for storage, resulting from an increase in their research program and the related conversion of spaces in their main building. The project will be constructed by a SSC contractor as a slab on grade (with piers to minimize shifting) and who’s appearance match the materials/color of the main building. The site was selected to optimize the access to the storage and to minimize the visual impact externally. There will be minimal utility support needed, all of which can easily be extended to service the storage building. Access, parking and adjacent uses will not be impacted by the new structure. The total project cost has been estimated to be approximately $280,000, which will be funded completely by the Turbomachinery Laboratory, a division of the Texas Engineering Experiment Station (TEES).

Recommendation
The Facilities Utilization Review Sub-council concurs with the need for the space, believes the proposed solution is reasonable and recommends that the CBE support the proposal to construct the new storage building adjacent to the Turbomachinery Laboratory.

We are pleased to offer this recommendation and welcome further inquiries related to this analysis.

Sincerely,

James Massey  
Chairman, CBE-Facilities Utilization Review sub-council  
Interim Associate Vice President for Facilities

Attachments
CC: CBE-FURsc members
Synopsis: The Turbomachinery Laboratory wishes to construct a new building at the South West corner of the Turbolab lot to act as a storage building.

Building 150, the facility currently used for test rig and material storage, is being converted to research space. As you will see from the powerpoint photos, remodeling efforts are proceeding apace.

Conversion of this space to possible future research use necessitated an additional storage building. Once researchers at the Turbo Lab are finished with a particular project or funding for a project runs out, the test rigs may be stored for a time until further funding can be established and the rig placed back into service. Building 150 has traditionally been the area where this research material was stored but recently the Director, Dr. Dara Childs, decided that building 150 should be made ready in the case that more, and/or larger research space was needed. We decided to construct a new building for storage of the test rigs and other research related materials.

Once construction is complete, the test rigs and other materials will be moved into the new building.

Purpose: To provide additional storage space so that building 150 can be quickly converted into research space should the need arise.

Size: The new building is 30' x 60' x 16'. Cost is estimated at $255,000. The Turbomachinery Laboratory will cover 100% of the cost of construction. Facilities Services/SSC will be responsible for normal building maintenance items like light bulbs and any electrical issues that may arise in the future but the building will be generally very low maintenance.

Location: The building will be located at the South West corner of the TL lot. See map addendum for location. The new building will have no impact on adjacent entities (Corps of Cadets training area, Easterwood Airport).

Type of Construction: Slab-on-grade with metal building construction. See design drawings.

Technological Needs: None.

Additional Parking: None.

Changes in Access: None.

Consistent with Space Master Plan: Yes

Visual Impacts: None.

Utilities: Little impact. Domestic water will be tapped for the dry-stand fire control system only. No utilities will be relocated.

Security, Liability, Risk, Nuisances: None or no additional.

Optimal Time Schedule for Completion: Begin dirt work week of September 29th or October 6th. Drop the metal building on October 16th. Project completion, February 28th, 2014.

FURSC 10.4.2013
From directly in front of the Turbo Lab. The new building location is indicated.
October 16, 2013

MEMORANDUM

To: Dr. Karan Watson
   Chair, Council for the Built Environment

   Dr. Rodney McClendon
   Chair, Council for the Built Environment

Subject: Turbo Machinery Lab – New Storage Building

The Maintenance Sub-Council met to discuss a request by Texas Engineering Experiment Station for a new Storage Building located at the Turbo Machinery Lab. The Msc find no significant maintenance issue with this type of facility.

RECOMMENDATION

The Msc recommends approval of Turbo Machinery Lab – New Storage Building

Ralph R. Davila
Chairman, CBE Maintenance Sub Council

CC: CBE-Msc members
MEMORANDUM

TO: Dr. Karan Watson
    Provost and Executive Vice President
    Dr. Rodney McClendon
    Vice President for Administration

FROM: Tom Reber
      Associate Vice President for Student Affairs

DATE: September 30, 2013

SUBJECT: CBE TRsc Recommendation: Turbomachinery Lab Request to Construct a Storage Building

On Monday, September 23, 2013, Mr. Ray Matthews, Facilities Manager of the Turbomachinery Laboratory, presented to the CBE Technical Review Sub-council on the proposed construction of a new storage building on the SW corner of the Turbomachinery Lab's existing lot.

Additional storage space is needed, as the current storage space is being converted to possible use as research space. What’s more, the current storage space is becoming crowded with test rigs and other research equipment.

Recommendation
The Technical Review Sub-council supports the proposed construction and recommends approval, provided the following concerns/issues are addressed and funded.

Energy & Utilities Services
The Facility will not require new electrical or DCW services. It is our understanding that these services will be provided from the existing building north of the site.

Fire service to the new facility will be served via connection to an existing 6” DCW line on the east side of the project site. The project will need to install a valve and backflow preventer in accordance with TAMU UES Specs.

Storm water run-off will be dealt with on site with grading to ensure that storm water rates will not increase.

The project will need to adhere to TAMU UES Design Guidelines - https://utilities.tamu.edu/design-standards/

And follow the rules regarding excavation on campus - https://utilities.tamu.edu/digging-campus/

Facilities Services
Facilities Services supports this project. It is our understanding that the project manager is ensuring that storm water runoff and back flow prevention for fire protection water are appropriately addressed for this project.
Safety & Security (EHS)
Safety and Security agrees with stated plans to include a fire alarm system and fire suppression in the new building.

1. The fire alarm system should be connected to the main fire alarm panel in Turbomachinery.
2. The FDC (fire department connections) should be placed on the side of the building that is visible from the asphalt drive behind Turbomachinery (i.e., the east side rather than around the corner on the south-facing side).

No other concerns were expressed.

[Signature]

Tom Reber
Associate Vice President for Student Affairs
Chair, CBE Technical Review Sub-council

Cc: CBE Technical Review Sub-council
CBE Support Staff