PennState
Physical Plant

Office of Physical Plant
Physical Plant Building
University Park, PA 16802-1118

Date: November 19, 2018

Subject: **Request for Proposals (RFP) – Architect/Engineering (A/E) Team Selection**
College of Engineering (COE) – New West 1 Building and New West 2 Building
University Park, PA

To: Bohlin Cywinski Jackson
ENNEAD
KPF & BLTa & Research Facilities Design (RFD)
Lake/Flato & KSS Architects
Morphosis Architects
Payette
Perkins+Will
Smith Group
SOM
Stantec & Pelli Clarke Pelli Architects
Weiss/Manfredi
Wilson HGA
ZGF Architects, LLP

A. INTRODUCTION

The Pennsylvania State University (PSU) wants to first thank the 50 submitting teams that expressed interest in these College of Engineering projects. After careful review of the submitted Letters of Interest, PSU has decided to combine the Request for Proposals (RFP) stage for these two projects and request only one Proposal from perspective A/E firms. After this RFP/Proposal phase, the West 1 and West 2 will most likely have independent A/E Team selection processes, as described herein. PSU uses a qualifications-based A/E Team Selection Process with three assessments: Long-list (based on Letter of Interest), Short-list (based on Proposal responses), and in-person Interviews.

Congratulations to the thirteen (13) A/E teams who were selected to continue to the next step in the process: invitation to respond to the combined West 1/ West 2 Request for Proposal (RFP). All of the remaining teams are being considered for either the **West 1 Building, West 2 Building, or both projects.** If a team chooses to submit on only one project, please specify which project you are pursuing in the cover letter and provide your firm's rationale.

The A/E Selection process is as follows: Combined West 1 / West 2 Proposal responses are due in my office by Noon on December 17, 2018. After review of Proposal responses, the Screening Committee will identify roughly total six firms for in-person interviews for either the West 1 Building, West 2 Building, or both projects:

- **The West 1 Building.** The **Short-List/ Interview Notice will be posted to website on January 9, 2019**. In-person interviews will occur on **January 29, 2019 in State College, PA.**
- **The West 2 Building.** The **Short-List/ Interview Notice will be posted to website by January 11, 2019**. In-person interviews will occur on **January 31, 2019 in State College, PA.**

Non-Binding Fees will be requested of the three Short-Listed teams, for each project, which will be due just prior to the respective Interview. The results of the West 1 and West 2 AE Team selection process will be announced at the Board of Trustees meeting on **February 22, 2019** and posted to this website.

Participation in this RFP and selection process is voluntary and at no cost or obligation to PSU. PSU reserves the right to waive any informality in any or all Proposals, and to reject or accept any Proposal or portion thereof. PSU reserves the right to modify dates as/if it deems necessary.

Confidentiality and Non-Disclosure. News releases pertaining to this project will not be made without prior approval from PSU, and then only in coordination with PSU. The contents of all A/E selection process correspondence are to remain confidential, and as such, not be made public.

B. PROJECT OVERVIEW

The College of Engineering at Penn State is embarking on a multiphase construction program that will result in physical infrastructure befitting the largest college at the flagship, land grant institution in the nation's 6th most populous state. The College, which currently enrolls nearly 10,000 students at University Park, is a leader in learning, discovery, entrepreneurship, and engagement and is recognized worldwide for excellence in academic programs, research enterprise, and service to the global engineering community. While being proud of its accomplishments, the College is determined to strengthen and broaden its educational programs, advance its research portfolio, expand the faculty in emerging areas, and hence deepen its impact on society and amplify its global preeminence. Additional information about the College of Engineering may be found at www.engr.psu.edu.

The College occupies approximately 750,000 assignable square feet in more than 40 buildings across and off the University Park campus. With the exception of a new building opening in January, 2019 that will house the departments of Chemical Engineering and Biomedical Engineering, the square-foot average age of the College's buildings dates to the 1960s. **PSU anticipates the West 1 and West 2 projects will significantly increase the quality and quantity of space while consolidating activities around thematic areas, aimed at advancing the College's mission of engineering humanity.**

Below is a link to Penn State College of Engineering Town Hall from Dean Justin Schwartz from October 2017. Themes discussed provide some of the philosophical values guiding these projects. https://www.youtube.com/watch?v=Ti7KLss6X4c

C. PROGRAM OF REQUIREMENTS

Since March 2018, the University and College have been working with our consultant, Payette, to develop a ten-year Collegewide Facilities Master Plan focusing on COE's space needs, capital investments, and the re- development of two existing districts on the University Park Campus. While the ten-year vision is being finalized, we have identified that the first two implemented projects, West 1 and West 2, will be constructed on the "West Campus" of the University Park campus (area of campus West of N. Atherton Street).

Detailed Space Programming Statements (including guiding principles, project goals/narratives, tabular programs, conceptual blocking and stacking, room data sheets) for both West 1 and West 2, underway as a part of the master planning effort, will be completed by the end of February 2019 and provided to the selected A/E Teams for West 1 and West 2.

A draft of this Program will be emailed to all of the Long-Listed teams, as a part of this RFP. Review and consider this document as a part of the RFP, as it contains additional program and site information. Together, the combined programs of West 1 and West 2 will provide new space to support Aerospace Engineering, Architectural Engineering, Civil and Environmental Engineering, and the undergraduate SEDTAPP program (School of Engineering Design, Technology, and Professional Programs), and potentially additional Departments, Centers, and/or units. The project breakdown is as follows:

West 1: $230.1M total project cost ($191.8M total construction cost)

The West 1 Building is envisioned as a freestanding new building at be approximately 279,000 Gross Square Feet providing approximately 159,000 Assignable Square Feet. The building will contain research labs, research cores, departmental teaching and studio spaces, departmental administration and faculty spaces, and grad/student spaces. The building is planned to include significant portion of the building that will serve as a West Campus magnet of activity. The active space will likely include the building's main lobby, a new main College of Engineering Knowledge Commons (student working and study space), likely food service and/or café elements, and a significant number of centrally-scheduled General-Purpose Classrooms.

The project will include significant site design/execution around the entire new building, the success of which will be critical to the success of the project. The project's new major exterior spaces include a new East-West pedestrian connection, located at the south of the new building, connecting the West Campus Garage to the western edge of the existing ramp of the Westgate Building. A significant new plaza space is planned this pedestrian connection intersects with the main entrance to the West 1.

West 2: $76.8 M total project cost ($64M total construction cost)

The West 2 Building is envisioned as a new 98,000 Gross Square Feet building providing approximately 56,000 Assignable Square Feet. The new building will be attached to a new West Campus parking garage, as referenced in this RFP. The building will contain a significant multipurpose high-bay space, research labs, research cores, departmental teaching and studio spaces, departmental administration and faculty spaces, and grad/student spaces.

The new parking garage and new West 2 building are sited in a way that the new West 2 Building becomes the focal point and sense of enclosure at the terminus of a re-imagined existing quadrangle, defined by Leonhard Building (to the south), Applied Science Building (east), and Earth and Engineering Science (north). The West 2 project will include the planning/re-design/execution of the redeveloped existing quadrangle.

The adjacent parking structure is considering the aesthetic and technical integration of the successive West 2 Building with respect to: building aesthetics/envelope, building footprint and height, fire separation, geotechnical and structural integration, site arrangement grading, utilities, and a new shared loading condition (shared between West 2, Earth and Engineering Science, and the new parking garage). To ensure aesthetic continuity between West 2 and the West Campus

Garage, the initial cladding of the East façade of the West Campus Garage is designed to be temporary (designed to receive a future cladding). The West 2 design team will design/detail/ execute the final cladding of the East façade of the West Garage, as a part of the West 2 project.

In addition to the project goals identified on the attached draft Program, project goals include:

- New buildings that help to strengthen and broaden the College's educational programs, advance its research portfolio, expand the faculty in emerging areas, and deepen the College's impact on society and amplify its global preeminence.
- Create new buildings to address the College's spatial deficiencies, both in quality and quantity of space. Additionally, replace existing buildings with extensive deferred maintenance backlog (Hammond Building, Engineering Units A, B, and C, and portions of the Sackett Building) with new state-of-the-art facilities.
- Create buildings that are space efficient and create new active centers for the COE and University. We are seeking architecture and programming consultants that can drive our formation of optimal grossing factors and teams that innovate efficiencies in the planning and design of similar facilities.
- Create flexible/adaptable buildings that supports evolving educational pedagogy, technology, and research initiatives. The buildings will consider consolidation of activities around thematic areas within the College of Engineering.
- Create well-designed, unique, destination buildings that provide a new face for, and enhance the identity of, the College and the University.
- Assisted with these projects, PSU wants to advance the West Campus' architectural and campus character in order to become an equally vibrant part of the University Park campus.
- In keeping with our commitment to environmental sustainability, these facilities will be high-performance buildings and will, at a minimum, attain LEED Certification. Projects may consider additional sustainability or high-performance innovations.

D. PRELIMINARY SCOPE OF WORK

The selected A/E Team(s) for West 1 and West 2 will start each project with a validation of the aforementioned program, including completion of a room-by-room program based on finalized space assignments. After the program validation phase, the project will follow the standard design phases – SD, DD, CD and CA Phases in accordance with Penn State's standard 1-P agreement. Selected AE Teams for West 1 and West 2 will be expected to engage other design and construction entities to carry forward the vision/mission of the master plan. This includes, but is not limited to:

- Collaboration between the West 1 and West 2 design and construction teams with respect to design, programming, phasing/logistics, etc.
- Collaboration with the COE Master Plan team for conformance to the master plan.
- Collaboration with the *West Campus Parking Structure and Roadway Connections* design-build team. PSU and Clayco, Inc. are in the Schematic Design phase of a design-build project to complete the site and roadway infrastructure for West Campus, which includes a new parking deck, current called the *West Campus Garage*. The *West Campus Garage* is being designed to be physically connected to the West 2 Building.

E. RFP ATTACHMENTS AND REFERENCED STANDARDS

- **Program (draft).** This will be sent to the Long-listed teams via email. The title of the document is *Penn State University – College of Engineering West 1 & West 2*

- **Form of Agreement.** Included is the link to our Form of Agreement 1-P: https://wikispaces.psu.edu/display/OPPDCS/Division+00+-+Procurement+and+Contracting+Requirements.
  Please review this agreement to ensure that your firm accepts all terms and conditions as written. In submitting a proposal for this project, you acknowledge that you concur, without exception, with all terms, conditions and provisions of Form of Agreement 1-P.

- **Design Phase Deliverables.** Reference this document under the heading *00 51 00 MISCELLANEOUS FORMS* at the following link: https://wikispaces.psu.edu/display/OPPDCS/Division+00+-+Procurement+and+Contracting+Requirements

- **Office of the Physical Plan (OPP) Standards.** The web sites www.opp.psu.edu and https://wikispaces.psu.edu/display/OPPDCS/Design+and+Construction+Standards provide information regarding specific design submission requirements and standards, of the University. Please review to ensure that your team is able to deliver a compliant building.

- **OPP High Performance Standards.** The University has a commitment to environmental stewardship with a focus on University and campus-wide carbon reduction and total-cost-of-ownership. Our projects require maximum consideration of potential sustainable and energy-efficient designs and specifications for architectural, site, utility, structural, mechanical, electrical, and plumbing disciplines. Refer to the following link for the University's high performance standards that exceed building code minimum requirements: https://wikispaces.psu.edu/display/OPPDCS/01+80+00+PERFORMANCE+REQUIREMENTS

  A part of this is PSU's High-Performance Building Design Standards: Building projects shall comply with ASHRAE Standard 90.1 Energy Standard for Buildings Except Low-Rise Residential Buildings, 2010 version AND as superseded by more stringent requirements of ASHRAE Standard 189.1 Standard for the Design of High-Performance Green Buildings, 2011 version.

  The standard defines a minimum requirement of LEED Certified for this project. The project will consider additional sustainability or high-performance measures and innovations.

F. SELECTION AND IMPLEMENTATION MILESTONES

COE West 1 Project Milestones

RFP Issued to Long-Listed Teams:	November 20, 2018
Submission of A/E Proposals Due:	**Noon, December 17, 2018**
Post Short-List results + Interview notice:	January 9, 2019
A/E Team Interviews:	January 29, 2019 (at University Park)
Board of Trustees Selection of Team + Post Results:	**February 22, 2019**
Contract Award / Letter of Intent:	March, 2019
Construction Start Date	**March, 2021**
Construction Completion	May, 2023
Project Occupancy	**July, 2023**

COE West 2 Project Milestones

• RFP Issued to Long-Listed Teams:	November 19, 2018
• **Submission of A/E Proposals Due:**	**(Combined proposal with West 1)**
• Post Short-List results + Interview notice:	January 11, 2019
• A/E Team Interviews:	January 31, 2019 (at University Park)
• **Board of Trustees Selection of Team + Post Results:**	**February 22, 2019**
• Contract Award / Letter of Intent:	March, 2019
• **Construction Start Date**	**October, 2020**
• Construction Completion	September, 2022
• **Project Occupancy**	**November, 2022**

G. PRE-PROPOSAL SUBMISSION CONTACT

The Office of Physical Plant encourages you to visit the site and discuss the project with representatives of the user group in order to understand all goals and the major issues driving this project. **We will have two scheduled tour dates, as follows.** The tours are not mandatory, but if you seek to attend a tour, you must RSVP. Teams will be allowed to bring 3 people maximum to the tour.

- Tour date 1: November 30, 2018, 10am-noon (Eastern Standard Time)
- Tour date 2: December 3, 2018, 1:30-3:30pm (Eastern Standard Time)

Contact facility project manager Dwayne Rush (dcr13@psu.edu or 814-865-6475) and Brian Hayes (bwh11@psu.edu or 814-863-4665) to RSVP for a tour date. You can also contact Brian and Dwayne with any questions regarding the project. Campus Planning, design-related, or AE selection process questions should be directed to Greg Kufner, University Architect.

H. PROPOSAL REQUIREMENTS

Deliver sixteen (16) hard copies of your proposal and one (1) digital copy on a thumb drive to:

Greg Kufner, AIA, NCARB
University Architect
The Pennsylvania State University
206 Physical Plant Building, University Park, PA 16802

Hard copies of the combined West 1/West 2 Proposals are due December 17, 2018 at Noon, Eastern Standard Time. A PDF version of your proposal should be included on a thumb drive with your submission. Proposals received after this date and time may be automatically rejected. Proposals shall be provided in an 8.5"x 11" format. Limit submission to sixty (60) single-sided pages maximum (30 double-sided), plus a cover letter. Double-sided printing is strongly encouraged. Font size is to be 10-point type, minimum.

A cover letter shall be provided from the proposed leader(s) of the Candidate Team submitting. The cover letter should be one page maximum. The cover letter should include the following:

A. This letter should establish the contact information (name, address, phone, and e-mail) for your team's main point of contact

B. Primary office location of the submitting candidate team
C. A concise summary as to why your team is best suited for this project
D. Statement of certification that all information provided in your submittal is accurate

Collate and bind proposals according to the following four (4) Sections:

Proposals shall follow the below format, in the order stated to ensure that all pertinent information necessary for evaluation is included and easily comparable by Selection Committee. The cover letter, table of contents, and divider pages will not count towards the RFP page limitation. OPP encourages you to be as brief as possible without sacrificing accuracy and completeness.

* **Note 1: As applicable throughout the proposal, provide professional credit to architectural partners (including design architect, architect of record, and academic / lab planning partners) for all projects discussed within the proposal and for all project images shown.**

Section 1.0 –TEAM STRUCTURE

A. Identify prime firm, architecture and/or planning consultants, and key engineering/ consultant firms. For each firm, identity the firm differentiators, size of firm, each firm's qualifications and experience on similar projects, and clearly identify each firm's role on this project. Identify past collaboration between prime firm and key consultants, including number/ value of projects, and the added benefit the key consultants provide to your team.

   Penn State University values variety in the composition of consultant teams. As such, teams should demonstrate previous successful collaboration, execution of projects similar to the ones in this RFP, and the ability to incorporate owner's design standards similar to the Penn State Design and Construction Standards. While we appreciate firms with experience at PSU we do not have a preferred vendor list and encourage the selection of the best talent possible for our projects.

B. Provide team organizational chart. Include prime and key consultant firms, and provide the name and role of key team members. Clearly identify which team members are designated for leadership positions on the team. Please highlight Diverse Business Enterprise Program (DBE) representation on your team.

C. Provide role descriptions and resumes of key team members identified in the organizational chart. Include registrations/ certifications, educational background, years of experience, and relevant project experience. Relevant project experience should include size, budget, program type, project overview, and define what each team member's role was on each project listed on their resume (emphasize the most relevant experience, including similarity of team member roles and projects). Include at least two client references for each key team member. **If possible, please avoid using Penn State employees as references.** Include, at a minimum, the following key team members:

   1. Principal in Charge (Project Team Lead)
   2. Lead Design Architect (Lead Designer)
   3. Project Manager
   4. Project Architect (Architectural Technical Lead)
   5. Sustainability Leader
   6. Construction Administration Leader

7. Laboratory programmer/planner
8. Lead Mechanical, Electrical, Plumbing/FP, Structural, and Civil Engineers
9. Lead Landscape Architect

Note: If any individual(s) is fulfilling multiple project roles, identify multiple roles on the organizational chart and within individual resumes.

Section 2.0 – TEAM QUALIFICATIONS

A. Provide a summary of qualifications and expertise of the firms with specific emphasis on:

1. Design Excellence, including national recognitions.
2. Distinguishing factors of team differentiation.
3. Experience delivering programs, studies and projects of a similar scope, scale, and complexity. **(See Note 1)**
4. Expertise in the planning, design, and delivery of state-of-the-art academic, research, and workplace environments for College of Engineering programs. **(See Note 1)**

B. **Identify a maximum of ten (10) example projects within the last ten (10) years, which BEST exemplify qualifications and expertise listed above for the proposed team.** Include brief description of each project, project gross square feet, project budget, final project cost, and completion date of project and a client reference(s). Show illustrative representation of the example projects, particularly those highlighting the work of your team's proposed Lead Design Architect. **(See Note 1)**

Develop a matrix that illustrates the similarities between the example projects and this project. Please be as specific as possible.

In matrix form, show the participation of individuals from the proposed team on the identified projects. List team member's respective role on each of the example projects.

C. Briefly describe your proposed methodology to help address PSU's Diverse Business Enterprise Program (DBE), including outreach, and how you propose to maximize DBE firm participation within your proposed team. DBE requirements can be found in this link: https://opp.psu.edu/planningdesignconstruction/diverse-business-enterprise-program-dbe

D. List errors and omissions insurance coverage limits of the lead/ prime entity of the candidate team. Provide information on errors and omissions claims in the last (7) seven years.

E. Provide historic breakdown of project performance. Include project delivery method, history of project budgets compared to completed construction cost, history of change orders, average response time to RFIs, and any other key project profiles relevant to this project.

F. Acknowledgment of your review and acceptance of the attached Form of Agreement 1-P, ensuring that your firm accepts all terms and conditions as written. In submitting a proposal for this project, you concur, without exception, with all terms, conditions and provisions of this Form of Agreement.

Section 3.0 – PROJECT APPROACH AND SCHEDULE

A. Describe your team's design approach, including:
    1. Project visioning and goal setting, and approach to achieving the project vision and goals.
    2. Validating the project program, including verifying the mix of program elements.
    3. Building planning, including: defining programmatic adjacencies, creation of blocking and stacking options to respond to project aspirations and requirements.
    4. Design approach to develop interior/ exterior "look and feel".

B. Describe your team's overall approach to:
    1. Planning, managing, and executing the project. Include approach to guiding the decision making process, scheme options analysis, and consensus building.
    2. Innovative design.
    3. Use of BIM, technology, predictive modeling, and digital tools.
    4. Cost estimating, cost control, and quality control through the design and construction phases.
    5. Creating a collaborative environment between architects, academic/ lab planners, engineering consultants, and PSU stakeholders.

C. Design/Delivery approach to one or both projects. A unique aspect of this AE selection is that we may consider one design team, or separate design teams, for both projects.

    Therefore, describe your AE team's approach to coordinate with a separate AE design team (for the other project).

    If your team is interested in both projects, please describe your approach to design/manage/execute both projects concurrently.

D. Briefly describe your approach to Penn State reviews, PSU design reviews, and jurisdictional reviews. Anticipated jurisdictional reviews include Labor & Industry. Local municipal reviews and permits may be required and the professional shall be responsible for securing these permits with assistance of the University. Any fees associated with permits shall be paid for by the Professional and will be reimbursed by the University.

E. Approach to MEP. Narrative approach to MEP planning/ design/ delivery of facility that will contain programs and space types as noted herein. Be specific with your experience and highlight your project type expertise.

    Given the engineering and architectural-engineering programs in the new buildings, we may consider engineering innovations in the new buildings. Describe your thoughts or experience regarding potential innovations. Potential topics may include: building science, building system integrations, building as a living lab (link to pedagogy), research & development efforts that inform innovation, evidence-based design, advanced computational and/or predictive modeling techniques, etc.

F. Approach to Sustainability. After reviewing PSU's High-Performance Standards, describe your team's approach to driving towards PSU's sustainability goals on the project, including

exceeding our standards. Highlight your experience meeting similar high-performance standards.

Among other applicable topics, discuss your team's approach and experience applying advanced sustainability measures, ability to apply best practice in sustainable design, applications of creative innovations to obtain the optimum performance for projects, and experience using energy models to drive design thinking.

Describe overall team commitment to sustainable design, including number of completed LEED projects.

G. Approach to Multiple Prime delivery. PA Department of General Services (DGS) funding for the project necessitates that the project is delivered with multiple prime contracting. PSU anticipates hiring a single Construction Manager as Agent for West 1 and West 2 to act as an owner's representative and to help coordinate between the two projects. PSU will hold all contracts and also manage the design/construction process, a typical for our projects.

   Describe your approach to working with PSU's third-party Construction Manager as Agent throughout design and construction phases. Describe your approach and experience to successfully delivering projects with the multiple prime contracting.

H. Approach to Cost Control. Briefly describe your approach to cost control, especially considering escalating construction costs. Outline critical factors to consider with respect to the project budget. Discuss your impression of the budget and how you manage scope/budget change through the entire project.

I. Project Schedule. Provide your thoughts and approach to the project schedule. Create a graphic project schedule showing phase durations, owner engagement and review periods, and identify critical path items, milestones, and schedule drivers. This can be printed on an 11x17 fold-out and will only count as a single page.

   Verify the entire AE team's availability to appropriately staff the project, given the project schedules and inclusive of project and/or firm workload.

Section 4.0 – PROJECT-SPECIFIC KEY DRIVERS AND IDEAS

A. Project Understanding. Briefly demonstrate your understanding of the project. Provide any observations of the project program or other provided information.

B. Your firm's vision of what, beyond purely functional issues, constitutes the essence of this type of facility.

C. To indicate your understanding of the uniqueness of this project, describe key project drivers, critical design elements, and potential constructability considerations your team has identified as a priority for this specific project. Discuss how you addressed similar issues on other projects.

   If important to your team, discuss an example project(s), highly relevant to our project, in more detail than your Section 2 response may allow. Include insights into what made the

example project(s) successful, including how those design intentions were translated into a meaningful and synthesized final solution.

D. Delivering a highly active, collaborative and adaptable/flexible building is critical to project success. We seek to explore innovations and efficiencies in the planning and design of the completed facility. Describe programming, planning, benchmarking tools and methodologies that your team will use to meet these objectives.

   Provide specific principles/ideas or project examples for the following programs/spaces **(See Note 1)**:

   1. Teaching labs and Studio spaces
   2. Research labs
   3. Research Core & Shops & High Bay
   4. General purpose classrooms
   5. Library, Knowledge Commons (student working and study space), café/food service
   6. University workplace environments
   7. Optional: Highlight experience with projects that support Aerospace Engineering, Architectural Engineering, and/or Civil and Environmental Engineering programs.

E. Provide any initial design ideas, thoughts or considerations regarding the project. We are not seeking design solutions, but rather your design thinking. Considerations may include your thoughts/opinions related to the project site, master planning and/or placemaking factors, environmental considerations, programmatic considerations, building massing and/or any other design considerations. Your considerations can be specific to West 1, West 2, or both projects.

Thank you for your anticipated participation in this A/E Team Selection process. The Pennsylvania State University looks forward to reviewing your responsive proposal for this important project.

Please feel free to contact me with any questions you may have.

Respectfully,

Greg Kufner, AIA, NCARB

University Architect
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Phone: 814-865-8177 | Mobile: 614-512-2287
Email: gak21@psu.edu

CC: West 1 Screening Committee
West 2 Screening Committee