

DGS-30-456

(Rev. 06/17)

Construction Management at Risk Procurement Review Submittal Form

General Project Information

Agency Name:	College of William and Mary
Is the agency a covered institution per §2.2-4379?	Yes
Project Name:	Integrated Science Center, Phase 4
Project Number:	204-18329-000

Other Project Information

Advising A/E Name:	Goody Clancy	License Number:	F1444605	
COV Sections: §2.2-4380.B.2, §2.2-4381.C.2				
Attach written determination for use of CM at Risk.				
COV Sections: §2.2-4380.C.2, §2.2-4380.B.1; §2.2-4381.D.2, §2.2-4381.C.1				
Is the procurement process proposed a two-step process?				Yes
COV Sections: §2.2-4380.C.2, §2.2-4380.B.7; §2.2-4381.D.2, §2.2-4381.C.7				

Agency Reasons for Use of CM at Risk

Construction Cost (COV Sections: §2.2-4381.B.1, §2.2-4380.C.3, §2.2-4381.D.3)	Yes
Building Use (COV Sections: §2.2-4381.B.1, §2.2-4380.C.3, §2.2-4381.D.3)	Yes
Project Timeline (COV Sections: §2.2-4381.B.1, §2.2-4380.C.3, §2.2-4381.D.3)	Yes
Need for Project Phasing (COV Sections: §2.2-4380.C.5, §2.2-4381.D.5)	No
Project Complexity (COV Sections: §2.2-4381.B.1, §2.2-4380.C.4, §2.2-4381.D.4)	Yes
Value Eng. and/or Constructability Analysis Concurrent with Design (COV Sections: §2.2-4381.A)	Yes
Need for Quality Control/Vendor Prequalification (COV Sections: §2.2-4380.C.5, §2.2-4381.D.5)	Yes
Need for Cost/Design Control (COV Sections: §2.2-4380.C.5, §2.2-4381.D.5)	Yes

Supporting Information for Procurement Method Selection

Project Use (i.e. lab, classroom, office, etc.): (COV Sections: §2.2-4380.C.3; §2.2-4381.D.3)	
This important William and Mary project constructs a 124,000 gsf multi-function teaching and research facility. This is phase four of the Integrated Science Center complex and it will be built on the former Millington Hall site. The project will also renovate 10,000 gsf of existing science center facilities to enable the connection to the existing and adjacent ISC1 building. ISC4 will accommodate Mathematics, Computer Science, Kinesiology and the new undergraduate program in Design & Engineering. Upon completion, science disciplines will be in conjoined space designed to promote state and university STEM initiatives by creating cutting edge laboratories and teaching spaces for instruction and research.	
Construction Cost:	\$46,052,000 (COV Sections: §2.2-4380.C.3; §2.2-4381.D.3)

Project schedule: (COV Sections: §2.2-4380.C.3; §2.2-4381.D.3)	Design Start Date	2/2/2018	Design Compl. Date	7/2/2019
	Const. Start Date	11/1/2019	Const. Compl. Date	3/1/2022
	Attach bar chart schedule to illustrate fast tracking or other schedule complexities. (COV Sections: §2.2-4380.C.3, §2.2-4380.C.4; §2.2-4381.D.3, §2.2-4381.D.4)			

Additional description to highlight key attributes that affect the project complexity, need for value engineering/constructability analysis, quality control/vendor prequalification, and cost/design control as indicated by "Yes" answers above:

Due to the project's complexity and unique nature of the project program, CM at risk is the recommended delivery method. Building of such type will need to accommodate cellular and molecular research labs which include fume hoods (100% exhaust), bio safety hoods that recirculate air through a HEPA filter with charcoal, natural gas for Bunsen burners and proper HVAC systems to handle large heat loads from devices such as refrigerators and freezers (ultra-cold at 80 degrees Celsius). Lab waste will have to be discharged through a neutralization tank and be separated from the domestic waste. Additionally, network connectivity and power is imperative in order to support teaching labs of 25 work stations, each needing its own power drop and provide data drops not through the hub but directly through the IT closet. Faculty offices, with high computer capacity will have immense power requirements and network connections. High bay makerspace will need to structurally accommodate a lift/crane station, provide proper HVAC systems for the fume hoods associated with the machine shop (dust control, soldering station, workshops, etc.) and sufficient power for the CADD and 3D scanning/printing stations.

Given the challenging nature of the site, and the extensive technical and management coordination required, risk to the institution should be minimized to the maximum extent possible. Selection of the builder should not be based on price alone as sufficient expertise, applicable experience and extensive coordination capability are most relevant factors to ensure success. Competitive sealed bids is not fiscally advantageous for this project, having a construction manager on board would eliminate time consuming/costly change orders and produce a higher level of quality. The College of William and Mary intent is to construct a facility that is state of the art. The college would like to take advantage of having a construction manager participate in developing a reasonable/constructible design to reduce construction risk and unknowns. Our goal is to resolve/eliminate construction issues in advance to ensure success on this long term project.

The construction team's talent will be required to manage this dynamic program with high volumes of pedestrian flow immediately surrounding the site. In order to stay on schedule and budget while managing overall risk, a high level of expertise is required to manage the project. Extreme care must be taken to ensure client needs are met, while keeping a keen eye on schedule and budget throughout this important project. The College of William and Mary, feels that value engineering and constructability analysis are beneficial and needed to produce the higher standard of quality promised to our students. Our buildings are valued for their aesthetics and structure integrity we want to maintain those high standards in our construction.

(COV Sections: §2.2-4380.C.4; §2.2-4381.D.4)

Submitted by:

Van Dobson

Date: Mar 21, 18

Signature:

[Signature]

Title:

Associate VP, Facilities Management

(Agency Head or Authorized Representative)

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Based upon the information provided by the Agency, the use of Construction Management at Risk
is recommended for this project.

Recommended by:

W-M. Coppa

3/26/18

W. Michael Coppa, RA

Acting Director, Division of Engineering and Buildings