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ISGC Curriculum Development Program - Request for Proposals

Released: April 28, 2023 - Deadline: July 10, 2023, Extended to July 31, 2023

Overview: The <u>lowa Space Grant Consortium (ISGC)</u> requests proposals for the curriculum development (CD) program which will support the development of Science, Technology, Engineering, and Mathematics (STEM) related curricula with a focus on improving student skills. The ISGC plans to award four projects with emerging curriculum aligning with any of the six <u>NASA Mission Directorates (MD)</u>, Aeronautics Research (<u>ARMD</u>), Exploration Systems Development (<u>ESDMD</u>), Mission Support (<u>MSD</u>), Science (<u>SMD</u>), Space Operations (<u>SOMD</u>), and Space Technology (<u>STMD</u>).

To be considered for this funding, proposals should utilize STEM related curricula focused on preparing the future STEM workforce and/or STEM preservice educators by including (but not limited to) augmenting hands-on instruction, using online and virtual NASA content experiences, using publicly available NASA data, and accelerating the use of digital learning tools.

Priority will be given to proposals which:

- are developing curricula supporting transdisciplinary learning and are attempting to develop STEM ecosystems fostering partnerships between educators and industry;
- 2. collaborate with other ISGC affiliates;
- 3. recruit females, members of underrepresented minorities, persons with disabilities, and U.S. military veterans.

Projects will be selected through a competitive process using selection criteria put forth in this RFP. These criteria will: show alignment with MD priorities, demonstrate capacity of key personnel, indicate acceptable level of likelihood to succeed, be sustained in the future, and involve students in the development of the curriculum. The detailed ISGC Strategic Plan 2020-2024, NASA strategic plan and MD links can be found on ISGC web page at https://www.iaspacegrant.org/nasa-resources/.

Eligibility, Amount of Award, and Duration: All faculty of ISGC <u>Core Institutions</u> and <u>Academic Affiliates</u> are eligible to apply: Des Moines Area Community College (<u>DMACC</u>), <u>Drake</u>, <u>Iowa</u>, <u>ISU</u>, Loras College, Morningside University, and UNI.

Submission is limited to one proposal per investigator. Up to four awards will be funded at \$10,000 per proposal for a period of performance beginning August 15, 2023, through June 21,

<u>2024.</u> A **progress report** will be required by **February 28, 2024**. A **final report** that includes an evaluation of the project's effectiveness relative to the proposed objectives and other standard ISGC and NASA requirements will be required 30 days after the performance period closes or by **July 21, 2024**. An ISGC reporting link will be provided to awardees. Future funding is contingent upon all reporting requirements being met annually. <u>All awards are dependent upon NASA funding availability.</u>

Proposal Content

- Title Page: project title, Principal Investigator name, and contact information.
- Project Description (five-page maximum, 12 pt. font) that should include:
 - a. Background
 - b. Goals and objectives of the project
 - c. Support for mission directorate alignment
 - d. Evaluation plan
 - e. Timetable
 - f. Long term benefits
 - g. Key personnel
- Budget and budget narrative (two-page maximum)
 - a. Budget and justification that explains, in itemized detail, the ISGC amount requested and non-federal match contributions from the proposing institution (see g. below)
 - b. Cost-share may be cash and/or in-kind contributions of faculty or staff release time
 - c. Charging indirect on NASA funds is not allowable
 - d. Waived indirect from NASA funds and cost share may be counted towards meeting the total match requirement of 1:1 per award (i.e., \$10,000)
 - e. Equipment purchases, facility construction or renovation, and foreign travel are not permitted (the definition of equipment is >\$5,000 per item)
 - f. The ISGC excel budget template is required, and is available online at: https://www.iaspacegrant.org/funding/faculty/ or https://www.iaspacegrant.org/files/2023/04/budget-template PY34-CD.xlsx
- Matching fund commitment letter from authorized institutional representative (typically an office of sponsored programs or grants office {except at ISU – use departmental approval process})
- Course approval from head/chair of the department or dean of the college
- Curriculum vitae of principal investigator (two-page maximum)

Allowable expenses: Funds may be used to purchase supplies, support faculty or staff release time, support undergraduate students, or domestic travel related to the course. <u>Funds may not be used to support tuition</u>. The proposal budget justification should describe how requested funds support the project goals. All supported individuals (faculty, staff, and students) must be U.S. citizens. Non-U.S. citizens may participate but cannot receive direct compensation from the award or cost-share funding. See budget template for unallowable expenses.

Criteria for Evaluation: A scientifically literate panel of individuals who may not necessarily be experts in the proposed area will review proposals. The ISGC interim director will make the final

decision on proposal funding. The following areas will be considered in the evaluation of the proposal:

Criteria	Topics	%	
Educational Merit	Scientific, technical, and educational merit of the proposed project. The degree to which this proposal is relevant to the Science, Technology, Engineering and Mathematics (STEM) curriculum.		
NASA Relevance	The degree to which this proposal is relevant to NASA MDs		
Management	Competency of the proposers to carry out the plan and achieve the stated goals. Potential of the project to increase undergraduate retention and achievement, particularly for women and underrepresented groups. Includes students in course development.		
Evaluation	Plan for evaluation of the course developed or re-designed	10%	
Budget	Adequacy and appropriateness of the budget to carry out the project, including institutional contributions or other matching funds.	20%	
	Total	100%	

Proposal Submission Procedure: Submit proposals in Microsoft Word format to the ISGC office via this link: <u>Curriculum Development Submission</u> by **July 31, 2023**. The budget is to be submitted with the ISGC Excel template illustrated below, and available for download at: https://www.iaspacegrant.org/funding/faculty/ or https://www.iaspacegrant.org/files/2023/04/budget-template_PY34-CD.xlsx. (Two sheets are provided: the budget template, and justification.)

Questions should be addressed to the ISGC administrative team:

- Director, Dr. Sara Nelson, sdnelson@iastate.edu
- Assistant Director, Matthew Nelson, mnelson@iastate.edu
- Program Coordinator, Carmen Fuchs, cjfuchs@iastate.edu
- Program Assistant, Hailey Waller, hewaller@iastate.edu

ISGC Budget template for proposal submission					
University (insert name)		NASA ISGC Funds	MATCH Non-Federal (Cost Share)		
P.I. (insert name here)					
ISGC Program Name: Curriculum Dev.					
Insert project/activity name here		Request			
Salary+Fringe (Faculty)		\$0	\$0		
Salary+Fringe (Graduate Students)		\$0	\$0		
Wages+Fringe (Undergraduates)		\$0	\$0		
Supplies and Services		\$0	\$0		
Travel (Domestic)		\$0	\$0		
Tuition		\$0	\$0		
TOTAL DIRECT COSTS		\$0	\$0		
Modified Total Direct Costs (MTDC)		60	\$0		
(NOTE: MTDC = Total Direct Costs - Tuition)		\$0			
INDIRECT COSTS (for ISGC office use of	\$0				
NASA Indirect (insert rate, ref. below)	53.0%		\$0		
Match Indirect (insert rate, ref. below)	53.0%		\$0		
TOTAL BUDGET	23.070	\$0	\$0		
		Ψ0	\$ 0		
Notes:					
Use appropriate university/college govern		l indirect rate as	shown below.		
Drake = 36.7%, ISU = 53%, UI = 54.5%, U					
DMACC = 37% of salary and fringe only;		1			
Morningside University = 58.5% of salary Match requirement is 1:1	and Iringe on	ly.			
Change/add expense type as appropriate, a	dd rows as ne	eded			
Check all calculations for accuracy when a		ded.			
Include budget justification below, or as	_	rd document.			
That which is not allowable from the NAS			e as Match		
and/or Cost Share.	,				
Unallowable expenses include:					
☐ Indirect charges (waived indirect cost	s may be coun	ted towards mate	ch)		
☐ Equipment (defined as >\$5,000 per in					
☐ Foreign travel					
☐ Facility renovations					
☐ Promotional materials (i.e. t-shirts, sw					
□ Non-U.S. citizen reimbursements (i.e.					
☐ Non-U. S. citizens may participate, bu	it cannot recei	ve direct support	t .		