





# Azure Cloud Computing Credits for Research & Teaching

Full Call for proposals -

https://escience.washington.edu/software-engineering/cloud/azure/

#### Topics for today's info session

- eScience Overview
- Azure Credit Awards Timeline
- Proposal Eligibility, Type & Selection Criteria
- Available Cloud Computing Support
- Post-award expectations
- Your questions



### Our Mission

The eScience Institute **empowers** researchers and students in all fields to answer fundamental questions through the use of large, complex, and/or noisy data.

As the **hub** of data-intensive discovery on campus, we lead a **community** of innovators in the techniques, technologies, and best practices of data science and the fields that depend on them.



#### eScience Institute Role at the U of Washington and Beyond

#### Education

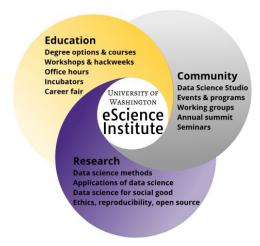
- Disseminate Data Science Expertise and Best Practices
- Lead Data Science Education at UW

#### Research

- Advance the State of the Art in Data Science
- Use Data Science for Social Good

#### Community

- Hub of data science community
- Partnerships









# Azure Cloud Computing Credits for Research & Teaching

Full Call for proposals -

https://escience.washington.edu/software-engineering/cloud/azure/

### **Program Timeline**

Preference given to proposals submitted by **11:59 p.m. PT on October 9th** via this online form <a href="https://form.jotform.com/232536812509154">https://form.jotform.com/232536812509154</a>

Notification by end of October

Credits will be available for use upon notification

Credits must be used by June 30, 2024. Unused credits may be reassigned.

## Eligible PIs - UW Researchers

- All UW campuses: Seattle, Bothell and Tacoma
  - Faculty
  - Postdocs
  - Research Staff



 Graduate and undergraduate students are encouraged to reach out to the <u>UW Research Computing Club</u> for access to cloud computing resources. https://depts.washington.edu/uwrcc/

#### Areas of Interest

- Up to \$200,000 of credits to award
- Both Research & Teaching Awards Available
  - Research awards up to \$20k per project
  - Teaching awards up to \$10k
- Can be used for any Azure service
- \*\*Any discipline\*\*



## Research Proposals



 The research project is new and can take advantage of the Azure cloud computing resource. The project needs to have other necessary resources in place so that it can start as soon as the computing credits are awarded.

#### <OR>

• The project is ongoing and the research team may or may not already be using Azure or other computing resources.

Note: We may be able to support HIPAA-compliant projects, please note on application.

## **Teaching Proposals**



- computing resources for undergraduate and graduate level for-credit courses
- short courses, workshops
- extracurricular research projects carried out by student clubs/teams with faculty mentoring
- lead teaching faculty or faculty mentors of student teams will need to be the Principal Investigators on the application and provide oversight for awarded projects

## **Proposal Content**

- Project description, up to 2 pages, with minimum font size 10.
  - Research proposals should include specific aims, background, significance and innovation, and methods.
  - Teaching proposals should include the description of the class, the curriculum outline, and the computing projects.
  - Both research and teaching proposals should include a description of how the computing credits will be used, and documentation that any other resources needed for this project are in place (for example, grant award notification, personnel who would undertake the work, or course approval documentation).
- Project development timeline shows the milestones for the project (up to 1 page).
- Expected usage of the Azure resources please use the Azure pricing calculator for this step (up to 1 page).
- References (no page limit).

## **Proposal & Project Support**

- Jon Badar Azure consultant
  - available for support and consultations for proposal preparation and project execution
  - v-jonbadar@microsoft.com
- Rob Fatland UW Director of Cloud and Data Solutions
  - rob5@uw.edu
- Sarah Stone eScience Executive Director
  - General solicitation questions
  - <u>sstone3@uw.edu</u>

#### Office hours (aka Drop-In Consulting now via zoom)



**Bryna Hazelton** brynah@phys.washington.edu

Will resume in the fall.



- Fourier and image analysis
- Statistical and mathematical modeling
- Monte Carlo simulations
- Python
- SQL
- O IDL
- Java



Bernease Herman bernease@uw.edu

Will resume in the fall.

- Expertise Pvthon, R. Scala
- Machine learning
- Interpretable models
- Data visualization (D3.js, Leaflet, Shiny)
- Version control (Git/GitHub)
- Reproducibility and open science



Joseph Hellerstein ioseph.hellerstein@gmail.com

Will resume in the fall.

Expertise

- R
- Python
- Bash
- SQL
- Software design
- Web server design
- Reproducibility and open science











UNIVERSITY LIBRARIES O Google Cloud Platform







https://escience.washington.edu/using-data-science/office-hours/

#### **Review Criteria**

- Suitability for cloud computing resources
- For research projects:
  - The significance and innovation of the proposed research
  - Likelihood of success
  - Impact to the research field
  - Potential for continuation, external funding and/or commercialization
- For teaching projects:
  - The need for this resource
  - The relevance and significance of the projects to the class and the learning outcome
  - The number of students this will benefit



## **Post-award Expectations**

All teams will be expected to submit:

- a brief progress report at the midpoint
- a brief closeout report at the end of the award

UW and Microsoft are interested in sharing out success stories to our communities.







# Thank you! Questions?

Full Call for proposals -

https://escience.washington.edu/software-engineering/cloud/azure/