

The Open Source Programs Office (OSPO)

Open Source Connects Research at Carnegie Mellon

The Open Source Programs Office (OSPO) at Carnegie Mellon University is a no-cost campus resource that supports the CMU community in developing, using, and sharing open-source software. Housed within the Carnegie Mellon University Libraries, we help turn open source from a project into an opportunity for innovation and impact.

Why Open Source? Why Now?

Open source has become the default in research.

- Funders increasingly require open sharing of code and data
- Students benefit from learning and working in open environments
- Collaboration across institutions, including industry, depends on shared tools
- Reproducibility and transparency are critical to research integrity

What We Do

- Build Capacity
- Enable Research
- Bridge Ecosystems
- Amplify Impact

Open Source in Action at CMU

The Open Source Programs Office works across disciplines to help research and teaching extend beyond the university and achieve broader impact.

FEATURED COLLABORATIONS

Penrose (School of Computer Science)

When the Penrose team received NSF funding to grow its open-source ecosystem, they partnered with the OSPO to navigate required industry engagement and training. Acting as embedded advisor, the OSPO helped them connect with collaborators, adapt the training to their needs, and build a stronger plan for expanding use in research and education.

Collaborative Open Source Course (School of Computer Science)

To give students hands-on experience in open-source development, faculty partnered with the OSPO to design a course modeled on real-world collaboration. OSPO connected instructors with industry mentors and open-source communities, enabling students to contribute to active projects while building skills and creating pathways from the classroom to careers in open source and software development.

Across Campus

- **SPIRAL (ECE):** Translating signal processing research into real-world applications through open-source development
- **Alice (ETC):** Reimagining a widely used educational platform as sustainable, web-based open source software
- **DARE (Dietrich):** Expanding access to AI in higher education through open, transparent tools for human-AI collaboration
- **OEO Temoa (Scott Institute):** Advancing open-source energy modeling to support transparent, reproducible analysis of future energy systems
- **Penrose (SCS):** Making high-quality mathematical and scientific diagrams more accessible through intuitive, open-source tools

Building a Connected Ecosystem

OSPO helps coordinate open-source activity across Carnegie Mellon and beyond:

- **ENGIN Software Foundation (ESF):** Supports academic open-source projects in growing beyond their initial research phase by providing guidance, tools, and pathways for long-term sustainability.
- **Open@CMU Collaboration:** In partnership with the Libraries' Open@CMU initiative, OSPO co-develops programming and events that promote open science, open access, and open-source practices across the university
- **Global and National Engagement:** In partnership with the United Nations, hosted open source hackathons at CMU-Africa and CMU Doha campuses. Contributing to advancement of the field through membership in CURIOSS Network of 25+ universities and OSPOs

Bridging Research and Industry

Stephen Walli, former Microsoft executive and open source leader, serves as an advisor and educator within the OSPO ecosystem. Through teaching and mentorship in both Pittsburgh and Doha, he brings real-world industry perspective directly into classrooms and active research projects and helps guide the translation of academic innovation into sustainable open source initiatives.

Get Involved

Interested in using or developing open source software for your research or teaching?

Explore services and opportunities: library.cmu.edu/services/ospo

Contact the OSPO team: ospo@andrew.cmu.edu

Sayeed Choudhury, Director

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