Using Figshare as an Electronic Theses and Dissertation Repository

Figshare helps Purdue University reduce the cost and time of theses publications.

The Graduate School at Purdue University has launched <u>HammerRR</u> - the Electronic Theses and Dissertation Repository from the Graduate School. HammerRR is now powered by Figshare for Institutions infrastructure. Figshare as a solution was evaluated by a project team headed up by Ashlee Messrsmith, Manager, Theses & Dissertations Office, and Purdue Graduate School, and Jamie Mohler, Associate Dean of the Purdue Graduate School.



Ashlee Messersmith Manager, Theses & Dissertations Office, Purdue Graduate School



Jamie Mohler Associate Dean of the Purdue Graduate School

HammerRR is just one example of how the Figshare-managed repository infrastructure can be implemented quickly to serve next generation digital repository needs. These needs include support for the publication of dissertations in a variety of different file types and formats such as music scores, artwork portfolios, 3D models being submitted as theses, and GIS maps being submitted as part of a thesis project.

5 goals for the project

Purdue was looking for an electronic theses and dissertations repository solution to help them achieve 5 key strategic goals. As the head of the project, Ashlee summarizes the project goals in the following way:

- To participate in the Open Access movement and make it easier for students to publish their theses OA
- To support new types of theses now being published by students

These are diverse next generation PhDs that move beyond the static PDF. Ashlee comments, "We recently published our first theses portfolio on our Figshare platform. This included a thesis file uploaded by one student, followed by 2 associated data sets from the student, and then 63 gigabytes of timeline photos from the student's field of study. All these items were encapsulated in one portfolio despite the fact that each file had their own unique DOIs."

- To offer students a single repository with DOI association
- To combine thesis and other digital output (datasets, audio, video, etc.) publishing
- To enable faster degree clearance and thesis publishing

"A thesis can be automatically published using the approve and publish feature on Figshare. The thesis doesn't need to be sent to a 3rd party for evaluation and then wait up to 4 months for them to publish it. Typically, with the previous solution, if the student didn't have a specified embargo, it would take up to 4 months for a thesis to be approved and published. In addition, if the student chose OA publishing, they would have to wait up to 12 months for the thesis to be made open access. With Figshare, it is a case of approve and publish and it's right there." **Ashlee Messersmith**

Replacing the previous solution where the existing IR wasn't an option

As the library was going through a vendor change and migration, it wasn't possible for the Graduate School to use the library institutional repository as the new solution for theses publishing. Ashlee comments "By the beginning of the new academic term, we wanted to replace the previous solution with something fresh and absolutely, Figshare was ahead in our use case."

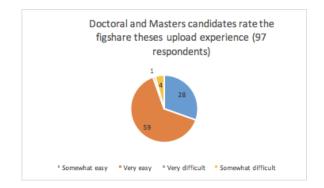
- Institutional control of thesis files
- Integration with local storage if required
- Fast implementation
- Relatively low subscription cost

"We could also just get an instance to host theses and dissertations and not necessarily have to invest in a repository for the whole institution. We liked the flexibility of Figshare."

Ashlee Messersmith

Ashlee and colleagues in the Graduate School were not happy with the previous solution as an infrastructure for ETD management. Ashlee describes this as the main pain point. The Graduate School needed to comply with the University's Open Access policy that was set in January 2012. Students were being charged \$95 by the previous solution to make their theses Open Access, but they also had a way to make their thesis Open Access from the University for no additional charge.

Many students believed that paying the previous solution to make thesis OA was the only way to publish OA and that caused a lot of confusion. Ashlee states that at the time, the library was backed up over a year making theses OA as they were being delivered via FTP to the university. Ashlee wanted to find a better solution. Discussions with peers during the Beyond the PDF mini-conference at University of Iowa in Spring 2018 helped inform the selection process.



Figshare addressed the 5 strategic goals well and its design also helped to develop goals that Ashlee and the project team hadn't thought of before.

These additional goals were:

- Retaining institutional control of files
- Combining thesis and dataset publishing

The implementation process went smoothly and the Figshare technical staff were very helpful throughout the process. Ashlee says, "I think it may have taken our institution a little longer to implement than intended due to the learning curve. I was the technical contact for the project so I had many questions to ask. It took around 3 months for implementation after contracts were signed."

Implementation process

The key project milestones for implementation of Figshare at Purdue were:

- Figuring out which department fell into what school and on what campus and if those departments were relevant for thesis purposes
- Coming up with the artwork for the repository branding
- Doing the integration with Shibboleth user authentication

Ashlee worked with a small graduate school administration group to brainstorm naming ideas. "We collected the ideas and relied on our graduate student developers to vote. They voted on HammerRR (Hammer for short). Purdue's mascot is the Boilermaker who carries a sledgehammer with him."

API intentions

There are also plans to discuss the use of the Figshare API (see more at docs.figshare.com) to connect to the IUPUI Scholarworks repository. Ashlee says "They will also be discussing the API when they are thinking about archiving the data from HammerRR."

Reception

Ashlee has done some outreach to students. "During seminar sessions of which there are about 6 each semester, we demo the repository and show students and faculty the potential of the platform." Ashlee continues, "We are currently evaluating the project with a deposit process survey which measures submissions from our website to the actual submission process. Current results favor the new platform."