The Library opens countless doors to knowledge, fueling discovery, creating connections and easing the exchange of information. It inspires, preserves and disseminates Cornell scholarship, making it visible around the globe.

In a 2017 survey of undergraduates, 97% of the over 5,200 respondents said the Library contributed to their success as a Cornell student. This percentage is even higher among those who sought personalized library help finding materials for their research or attended library workshops.

Here are some highlights of the Library’s essential work in this past year.
Digital privacy

Intellectual freedom requires privacy, and through library events, workshops, drop-in hours and consultations, students learn about risks to privacy and how they can take steps to protect their online data.

Advanced research skills

Library fellowships in the humanities, social sciences and life sciences draw rave reviews from graduate student participants, who gain advanced 21st century research skills in new and rapidly changing areas such as digital scholarship, data management and copyright.

Presenting research

Graduate students receive communication training and presentation experience by giving lightning talks in the Library, building their career skills and promoting interdisciplinary connections.

“I feel I have a whole new support system at the university to rely upon. I feel empowered and more protected by a lot of the things I learned about publishing and digital security. I know going forward that I will be a more confident and efficient researcher.”

Library fellowship participant
Collaboration and invention
Faculty are incorporating 3D printing, virtual reality and other tools into their curricula thanks to mannUfactory, the Library’s new makerspace, where users can build prototypes, create objects or invent for fun.

Systematic reviews
To meet rising demand, we’ve strengthened our team of systematic-review experts. We’re also piloting a one-year license for Covidence, a software toolkit making it easier for faculty in life, veterinary and health sciences to manage these comprehensive syntheses of existing research to answer new questions.

Digital scholarship
Graduate students learn to develop, implement and manage complex digital humanities projects and get ongoing support for their own research through a six-week fellowship sponsored by the Library and the Society for the Humanities.

“I was in awe of all the opportunities for hands-on learning and creation that are taking place in that space. The visit inspired me to think of creative ways to communicate messages and ideas.”

Student after mannUfactory class project

10,322 visits to mannUfactory in its first seven months
"The ability to build on the discoveries and insights of others rather than repeat past mistakes, dead ends and progress already made depends on having the best Library we can."

*Faculty member, animal science*

---

**Wason Collection**

2018 marks the centennial of the Charles W. Wason Collection on East Asia, one of the largest and most significant collections of its kind in North America, now with more than 150 databases and 750,000 volumes. Celebrations include an exhibit and conference on transnational migration, drawing scholars from around the world.

**Expanding access**

The Library’s Division of Rare and Manuscript Collections and the Herbert F. Johnson Museum of Art are collaborating to find innovative ways to share resources and connect their photography collections, creating new opportunities for teaching and research, thanks to a grant from the Andrew W. Mellon Foundation.

**Supporting research**

The Kheel Center’s railroad collections, now open to scholars, tell important stories about how railroads shaped the nation and the world. These 63 collections, recently organized through a grant from the National Historical Publications and Records Commission, will support research in the ILR School and beyond.
The Portal
Temporarily on campus for three months in fall 2018, the Portal—an A/V-equipped shipping container on the Arts Quad, coordinated by the Library and sponsored by the Office of the Vice Provost for International Affairs and the Office of Engagement Initiatives—enables innovative, cross-disciplinary coursework and profound engagements with people all over the world.

University of Puerto Rico students
Following the devastation caused to their university by Hurricane Maria, Cornell University Library and its Student Library Advisory Committee welcomed UPR students spending the spring 2018 semester in Ithaca.

Diversity fellows
The Library is committed to improving the diversity of its staff and providing new opportunities to hire librarians from underrepresented groups through an expanding diversity program.

“Really speaks to Cornell’s mission to connect with the world—very exciting!”

Pop-up portal visitor on March 7 in Biotech.
A Smooth Exit from Eternal Inflation?
S. W. Hawking, Thomas Hertog

The usual theory of inflation breaks down in eternal inflation. We derive a dual description of eternal inflation in terms of a deformed Euclidean CFT located at the threshold of eternal inflation. The partition function gives the amplitude of different geometries of the threshold surface in the no-boundary state. Its local and global behavior in dual toy models shows that the amplitude is low for surfaces which are not nearly conformal to the round three-sphere and essentially zero for surfaces with negative curvature. Based on this we conjecture that the exit from eternal inflation does not produce an infinite fractal-like multiverse, but is finite and reasonably smooth.

arXiv:1707.07702v2

Promoting open access to scholarship

Preprint repositories

arXiv.org, the world’s preeminent scientific preprint repository stewarded by the Library, last year surpassed 1 billion downloads and now regularly receives more than 12,000 submissions a month—including, in March, the late physicist Stephen Hawking’s final paper.

Revamped map data

Researchers can more easily find and use a broader variety of map data through a redesign of the Cornell University Geospatial Information Repository, known as CUGIR. Long an important resource for agencies and researchers in New York state, CUGIR now accepts global geospatial data gathered by Cornell researchers.

Cornell University Press

The Library is working with Cornell University Press to promote open access to backlist titles during 2019, when the Press celebrates its 150th anniversary as North America’s oldest-established academic press.

“...The provision of these resources through CUGIR is a huge service to the natural resources community.

CUGIR user

168M articles downloaded in 2017 from library-managed repositories, an 18% increase from the previous year

20+ years that CUGIR has provided free and open access to New York geospatial information
Advancing research through partnerships

**Resource sharing**
Cornellians have rapid and seamless access to information beyond Cornell through a growing number of agreements with academic libraries for borrowing and on-site use, including Ivy Plus schools and a new partnership with the Ithaca College Library.

**Improving digitization practices**
In partnership with the Vietnamese Nom Preservation Foundation and funded by the Henry Luce Foundation, library staff led sessions and participated in a two-day workshop at the Institute of Information Technologies in Hanoi, Vietnam, to help build support for the preservation of and access to Vietnamese cultural heritage.

**Data curation**
As funders and publishers increasingly require data preservation and sharing, Cornell researchers can benefit from the shared knowledge of specialized experts through the Data Curation Network, a multi-institutional effort which will launch over the next three years, funded by the Sloan Foundation.

“...The help that we received for archiving research data was simply superb. As a result our data is now on the web and freely accessible to anyone.”
*Faculty member who used library data management services*

---

2,060 Cornellians to date have used research data management services

55,644 fulfilled Borrow Direct requests in 2016/2017
Digitizing historical texts and images

Historical texts on cider apples were digitized and placed online in a partnership between Mann Library, the Biodiversity Heritage Library and Gregory Peck, assistant professor of horticulture, supporting students, scholars and New York state’s growing cider industry.

More than 1,700 images from the International Workers’ Organization and Jewish People’s Fraternal Order archives in the Kheel Center were digitized and made available online through the Grants Program for Digital Collections in Arts and Sciences, casting light on the lives of Jewish immigrants during World War II and the Cold War.

Web archiving

New York climate change science websites and other selected websites are now being archived and preserved by the Library before these rich primary sources vanish from the open web.

“The images in the digital collection [we created] had an impact on my students—they helped to drive home that these were real people who were going through tumultuous times.”

*Faculty member who received an award from the Grants Program for Digital Collections in Arts and Sciences*
Priorities

In my first year as the Carl A. Kroch University Librarian I enjoyed discussing with library staff and other stakeholders the following five areas of strategic interest that will guide our efforts over the next few years:

**Student Experience**
The Library will focus on providing an outstanding experience for all students who access its amazing resources, whether physically or online.

**Research Life Cycle**
The Library will seek to offer valuable services to Cornell researchers in all disciplines at every stage of their research, from initiation to dissemination.

**Global Impact**
The Library will develop its unique range of services and partnerships in support of Cornell’s global mission to make a difference in the world.

**Diversity and Inclusion**
The Library will benefit from an expanding range of diversity and inclusion programs to develop a sense of belonging among all staff, faculty and students.

**Work Prioritization**
The Library will take advantage of new opportunities—and meet new challenges—by thinking strategically about where to focus its tremendous level of staff expertise and passionate commitment.

With your help we can ensure that Cornell University Library remains one of the most responsive and innovative research libraries in the world. Please send your thoughts or suggestions to libadmin@cornell.edu.

Gerald R. Beasley
Carl A. Kroch University Librarian
The World at Cornell, by Shrinidhi & Deepa Pandurangi, the winning entry to the Library's 2018 elevator art contest.