

# Ryan P. Womack

## *curriculum vitae*

Rutgers, The State University of New Jersey  
Alexander Library  
169 College Avenue  
New Brunswick, New Jersey 08901  
rwomack@rutgers.edu  
848-932-6107  
Last updated: 2025-09-20

homepage: <https://ryanwomack.com>  
orcid: 0000-0003-4873-4268  
blog: [ryanwomack.com/blog](https://ryanwomack.com/blog)  
guides: [libguides.rutgers.edu/data](https://libguides.rutgers.edu/data)  
youtube: [youtube.com/librarianwomack](https://youtube.com/librarianwomack)  
mastodon: [ryandata@mastodon.social](https://ryandata@mastodon.social)  
github: [github.com/ryandata](https://github.com/ryandata)

## Education

### **M.S., Rutgers, The State University of New Jersey, Statistics and Biostatistics, 2015**

Core sequence: Regression Analysis, Interpretation of Data, Design of Experiments, Theory of Probability, Methods of Inference

Option in Biostatistics: Biostatistics I (Observational Studies), Biostatistics II (Clinical Trials), Life Data Analysis, Categorical Data Analysis, Survey Sampling

### **M.S.L.S., University of North Carolina at Chapel Hill, Library Science, 1996**

Thesis: "An Economic Analysis of the Role of Libraries in the Evolving Information Distribution Structure: Will the Internet Be Your Library in the Digital World?"

### **M.A., University of Pennsylvania, Economics, 1993**

Concentration in public economics, thesis in economic history

### **B.A., Columbia University, Economics, 1989**

*summa cum laude*, Phi Beta Kappa

## Librarianship

### **Data Librarian, New Brunswick Libraries, Rutgers, The State University of New Jersey, 2013-**

- Promoted to the rank of Librarian I in 2019 (equivalent to full Professor).
- Designated Point of Contact (lead) for *Statistical Data Services*, as of 2019, serving as primary expert in statistical data and statistical methods for New Brunswick Libraries.
- Designated Point of Contact (lead) for *Government Documents*, as of 2020, with sole responsibility for all aspects of government documents for New Brunswick Libraries as of 2023, serving as Interim Government Documents Librarian following the retirement of the Government Documents Librarian.
- With respect to data resources available to the public (e.g., purchased datasets, guides to freely available data, instructional services, data computing facilities for students):
  - Develop and support user-centric data services in response to the needs of the Rutgers community, including:
    - \* Give workshops on statistical software (especially R), including advanced workshops on topics such as IPUMS and the usage of statistical data sources.
    - \* Give workshops on special topics such as data visualization, data wrangling, data literacy, and reproducible research.

- \* Create integrated, multimodal instructional materials for these workshops that include written PDF guides, screencast videos available through YouTube, and executable software scripts available via Github.
  - \* Work with campus partners such as the Office of Advanced Research Computing and the School of Arts and Sciences to support collaborative training and learning opportunities and develop programs. Examples include workshops on machine learning using the Amarel high performance computing cluster, shared workshop calendars and participation in the [Erdos Institute](#) data science bootcamp.
  - \* Through the *Graduate Specialist Program*, hire and mentor yearly cohorts of graduate specialists in the creation of relevant workshops and presentations supporting data, such as machine learning with Python and R, statistical inference, data wrangling, data visualization, qualitative analysis, diversity and inclusion in data topics, and more. Currently supervising Data Science Graduate Specialist.
- Promote the publicly available data services of the Libraries through outreach, in-person instruction, the creation of instructional materials/guides, individual consultation, social media outreach via YouTube, blog, and via collaboration with subject-specialist librarians and researchers.
- Develop and maintain Libguides for numeric data, data by subject, and economics, and government data resources.
- Work with teaching faculty, librarians, and other campus partners to support quantitative reasoning and quantitative aspects of information literacy in the curriculum (data literacy).
- Identify and acquire data resources in collaboration with other librarians and staff, and manage existing data collections.
- Provide in-depth research consultations on finding data, statistical analysis, and statistical software.
- Administered *Secure Data Facility* (operational 2010-2022), providing access to restricted-use data sets.
- From 2016 to 2018, participated in the New Brunswick Research Spaces Team to study, plan for, and support innovative spaces supporting advanced research, including work with data.
- Beginning in 2018, oversaw creation and implementation of the *Graduate Specialist Program*, hiring graduate student experts in data analytics, digital humanities, and research methods to provide workshops and consultations to the New Brunswick community, serving as Point of Contact (lead) through 2022.
- With respect to faculty-generated research data at Rutgers (datasets deposited by faculty in repositories, data-intensive grant projects):
  - As the specialist for numeric data, quantitative research methods, data visualization and data analysis, provide support for Rutgers University projects that are data-intensive, as well as consultation and reference on these topics to the Rutgers community in general.
  - Participate in grants providing innovative data services, such as the Virtual Data Collaboratory.
  - Since 2025, support Research Data through membership in the systemwide Data Management Team, part of the Research Services Support Team.
  - From 2016 to 2025, participated in support for Research Data through the New Brunswick Research Data Services Team (formerly Research Data Outreach Team).
  - Chaired the Libraries' Research Data Team from 2011 to 2016, leading a period of growth from less than 10 to over 25 professionals engaged with data work.
  - Until 2016, in collaboration with the Research Data Manager, participated in the development of research data services. These included data management consultation and training, archiving in RUcore, and developing and refining the Libraries' policies and guidelines relating to data management.
  - Until 2016, in relevant areas, as coordinated by the Research Data Manager, consulted with faculty on data management plans and data management needs and worked with faculty to archive data in RUcore.
- Serve as Rutgers Official Representative to ICPSR and Roper Center.

- Serve as member of the Data Management Team.
- Provide bibliographic instruction for courses and research consultation for faculty and students in the Department of Economics (School of Arts and Sciences) and the Department of Agricultural, Food and Resource Economics (School of Environmental and Biological Sciences).
- Responsible for research guides and collection development in the areas of economics, agricultural economics, and government documents for the New Brunswick Libraries.
- General reference duties including participation in e-mail and chat reference service.
- From 2015 to 2018, served as *Head of Research and Content*, overseeing department that developed and oversaw research services and created resources to support the researchers of the Rutgers community in New Brunswick, including teams focused on Graduate Services, Content, Research Data Outreach, Scholarly Communication, and Research Spaces.
- Led the work of the *Exploratory Committee for the Future of Librarian Roles within New Brunswick Libraries*, producing a report on future hiring in 2021 and served as inaugural chair of the Standing Exploratory Committee, charged with recommending specific positions, through 2022.
- From 2022 to 2025, served as *Head of the New Brunswick Libraries Research Services Unit*, leading NBL personnel in the development of support for research activities aligned with the missions and strategic plans of the Libraries and Rutgers-New Brunswick, and enabling transition to the systemwide RUL Research Support Services Team.

#### **Data and Economics Librarian, Research and Instructional Services (New Brunswick), Rutgers, The State University of New Jersey, 2008-2013**

- Activities and duties substantially the same as those of Data Librarian above. Duties of the position and emphasis on providing numerical and statistical data expertise for the library system were clarified in the reclassification of 2013.
- In addition, served as *Research Data Manager* for RUcore (2010-2013)
  - During the initial development and launch of the RUresearch data service, served as primary contact and coordinator for research data.
  - Supervised and trained staff member who eventually became Research Data Manager in 2013.
  - Developed presentations and outreach strategy to faculty on RUresearch.
  - Served on Cyberinfrastructure Steering Committee and Software Architecture Working Group.
  - Represented RUresearch in other teams and groups within the Libraries and outside the Libraries at national and university meetings.

#### **Business and Economics Librarian, New Brunswick Libraries, Rutgers, The State University of New Jersey, 1999-2007**

- Granted tenure and promotion to the rank of Librarian II in 2005 (equivalent to Associate Professor).
- Responsible for all aspects of collection development in the areas of business, economics, agricultural economics, and career information for the New Brunswick Libraries.
- As liaison to the School of Business, the Department of Economics, and the Department of Agriculture, Food, and Resource Economics, provided bibliographic instruction for courses and research consultation for faculty and students.
- Responsible for training New Brunswick Libraries' faculty and staff on databases and resources in business and economics.

- Developed and maintained online subject research guides and other electronic guides to collections in business and economics.
- Maintained “Wild Card” guide to truncation symbols, 1999-2008.
- General reference duties included regular desk hours at Kilmer Library and Alexander Library, and participation in e-mail reference service.
- Participated in selection and evaluation of system-wide electronic resources.
- Continued as acting business librarian until new Business Librarian hired in June 2009.

#### **Assistant Professor of Bibliography, University of Alabama in Huntsville, 1996-1999**

- Responsible for collection development and liaison with the College of Administrative Science, and the departments of Art and Art History, English, Foreign Languages, Music, and Philosophy.
- Taught the credit course, Library Research in Business and Economics.
- Provided instruction, research consultation, and general reference service.

## **Publications**

### **Website**

Ryan Womack (Founding Editor). *The Central Asia and Mongolia Gender Data Portal* (CAMGDP). <https://camgdp.org>. Launched 2023.

### **Peer-reviewed Articles (sole author)**

7. Ryan Womack, “ARL Libraries and Research: Correlates of Grant Funding”, *The Journal of Academic Librarianship*, volume 42, 2016, pp. 300-312. <https://doi.org/10.1016/j.acalib.2016.06.006>. Preprint in RUcore.
6. Ryan Womack, “Research Data in Core Journals in Biology, Chemistry, Mathematics, and Physics”, *PLoS ONE*, volume 10, issue 12, 2015. <https://doi.org/10.1371/journal.pone.0143460>.
5. Ryan Womack, “Data Visualization and Information Literacy”, *IASSIST Quarterly*, volume 38, issue 1, 2014, pp. 12-17. <https://doi.org/10.29173/iq619>.
4. Ryan Womack, “The Orientation and Training of New Librarians for Business Information”, *Journal of Business and Finance Librarianship*, volume 13, issue 3, 2008, pp. 217-226. <https://doi.org/10.1080/08963560802183203>. Preprint in RUcore.
3. Ryan Womack, “Basic Business Dictionaries Compared”, *Journal of Business and Finance Librarianship*, volume 10, issue 4, 2005, pp. 3-14. [https://doi.org/10.1300/J109v10n04\\_02](https://doi.org/10.1300/J109v10n04_02). Preprint in RUcore.
2. Ryan Womack, “Information Intermediaries and Optimal Information Distribution”, *Library and Information Science Research*, volume 24, issue 2, 2002, pp. 129-155. [https://doi.org/10.1016/S0740-8188\(02\)00109-3](https://doi.org/10.1016/S0740-8188(02)00109-3). Preprint in RUcore. Also anthologized in *Information Science: Critical Concepts in Media and Cultural Studies, Volume IV, The Economics of Information Science*, David Nicholas and Eti Herman (Editors), pp. 275-305. Routledge, 2014.
1. Ryan Womack, “Bel Jour: A discipline-specific portal to periodicals”, *Information Technology and Libraries*, volume 21, number 2, 2002, pp. 81-86. <https://doi.org/doi:10.7282/T3959FXH>.

### **Peer-reviewed Articles (co-authored)**

Laura B. Palumbo, Ron Jantz, Yu-Hung Lin, Aletia Morgan, Minglu Wang, Krista White, Ryan Womack, Yingting Zhang, and Yini Zhu, “Preparing to Accept Research Data: Creating Guidelines for Librarians.” *Journal of eScience Librarianship*, volume 4, issue 2, 2015. <https://doi.org/10.7191/jeslib.2015.1080>.

### **Edited Collections**

Ryan Womack (Editor), *Success by the Numbers: Statistics for Business Development*. Chicago: Reference and User Services Association of the American Library Association, 2005. (RUSA Occasional Paper, number 28).

## Published Conference Proceedings

- Ryan Womack, "Collaborative Knowledge Creation with the Central Asia and Mongolia Gender Data Portal", ALTI 2025: Academic Libraries: Trends and Innovations, Bishkek, Kyrgyzstan, June 12, 2025 [forthcoming].
- Julia Anne Maxwell, Francesca Giannetti, Triveni Kuchi, Laura Palumbo, and Ryan Womack, "The Graduate Specialist Program: Students Working in Research and Data Services", *Proceedings of ACRL 2025: Democratizing Knowledge + Access + Opportunity*, Minneapolis, MN, April 2-5, 2025, pp. 434-442. <https://www.ala.org/sites/default/files/2025-03/TheGraduateSpecialistProgram.pdf>.
- Ryan Womack, "High Speed, High Price, High Demand: Business Internet Resources and Databases in American Academic Libraries", *Proceedings of Central Asia 2002: Internet and Library, Information Resources in Science, Culture, Education, and Business*, Bukhara, Uzbekistan, October 2002, pp. 37-41. [Preprint in RUcore](#).

## Articles in Reference Books

- Ryan Womack, "Azerbaijan", *The World of Child Labor: An Historical and Regional Survey*, Hugh D. Hindman (Editor). ME Sharpe, 2009.
- Ryan Womack, "Kazakhstan", *The World of Child Labor: An Historical and Regional Survey*, Hugh D. Hindman (Editor). ME Sharpe, 2009.

## Other Papers

- Ryan Womack, "ARL Libraries and Research: Correlates of Grant Funding", 2016, [arXiv:1601.05104](https://arxiv.org/abs/1601.05104) [cs.DL].
- Mei Ling Lo, Li Sun, Ryan Womack, Connie Wu, and Tao Yang. "Celebrating Diversity, Welcoming the World: Developing Chinese Webpages at Rutgers University Libraries", CALA Occasional Papers Series, number 5, June 2009.
- Ryan Womack, "Career Exploration Resources", pp. 32-37, in Gary W. White (Ed.), *Help Wanted: Job and Career Information Resources*, RUSA Occasional Paper, number 26, 2003. <https://doi.org/doi:10.7282/T3TX3CRD>.
- Ryan Womack, "Radio and the Internet: A study in the development of new communications technology", *Alabama Librarian*, volume 49, number 3, 1998, pp. 10-14. <https://doi.org/doi:10.7282/T3S46Q9M>.

## Electronic Publications

- "Guide to Finding Data about Racism and Ethnic Bias", 2023, with other members of the IASSIST Anti-racism Interest Group, available at <https://iassistdata.org/community/antiracism-resources-guide/>.
- "Career Exploration Resources" section in "Help Wanted: Jobs and Career Information for the New Millennium", bibliography prepared by the Business and Reference Services Section of the Reference and User Services Association of the American Library Association, 1999, with Pam Craychee.
- "Issues in Access to Information", bibliography prepared by the Access to Information Committee of the Reference and User Services Association of the American Library Association, 1999.

## Reviews

- Annual Register of World Events, *American Reference Books Annual (ARBA)*, volume 40, 2009.
- American Attitudes, *ARBA*, volume 40, 2009.
- Human Development Report, *ARBA*, volume 40, 2009.
- eVenturing Entrepreneur's Resource Center, *Journal of Business and Finance Librarianship*, volume 14, number 2, 2008, pp. 81-85.
- The Street.com Ratings' Ultimate Guided Tour of Stock Investing, *ARBA*, volume 39, 2008.
- World Directory of Business Information Libraries 2007, *ARBA*, volume 39, 2008.
- A Financial History of Modern U.S. Corporate Scandals: From Enron to Reform, *ARBA*, volume 38, 2007.
- An Historical Atlas of Central Asia, *AAMES Newsletter*, volume 4, number 1, Fall 2006.
- World Monetary Units, *ARBA*, volume 37, 2006.
- An Eponymous Dictionary of Economics, *ARBA*, volume 37, 2006.
- Corporate Giving Directory, *ARBA*, volume 36, 2005.
- Economist.com, *Journal of Business and Finance Librarianship*, volume 10, number 2, 2005, pp. 39-45.
- Bonds Online, *Journal of Business and Finance Librarianship*, volume 5, number 4, 2000, pp. 59-65.
- Thomas Register, *Journal of Business and Finance Librarianship*, volume 4, number 2, 1999, pp. 69-75.

## Other

Profiled in “Data Librarianship: a day in the life”, chapter 5 of Lynda M. Kellam (with contribution from Katharin Peter), *Numeric Data Services and Sources for the General Reference Librarian*. Chandos, 2011, pp. 151-160, also Appendix A, pp. 173-213.

## Talks

### Presentations

- “Collaborative Knowledge Creation with the Central Asia and Mongolia Gender Data Portal”, ALTI 2025: Academic Libraries: Trends and Innovations, Bishkek, Kyrgyzstan, June 12, 2025.
- “The Graduate Specialist Program: Students Working in Research and Data Services”, with Julia Anne Maxwell (presenter), Francesca Giannetti, Triveni Kuchi, and Laura Palumbo (presenter). ACRL 2025: Democratizing Knowledge + Access + Opportunity, Minneapolis, MN, April 3, 2025.
- “Power and the Construction of Knowledge: Overcoming Dynamics of Dominance in the Information Age”, panel with Janice Pilch (chair), Danica Anderson, Barbara Brigada Krupa, and Christine K. Peter, ASEES (Association for Slavic, East European, and Eurasian Studies) Annual Conference, Boston, MA, November 21, 2024.
- “The Central Asia and Mongolia Gender Data Portal, a tool for collaborative and non-violent knowledge production”, with Aizada Arystanbek, CESS 2024 (Central Eurasian Studies Society), Almaty, Kazakhstan, June 6, 2024.
- “Expanding and Refining CAMGDP, the Central Asia and Mongolia Gender Data Portal”, with Aizada Arystanbek [poster], IASSIST Annual Conference, Halifax, Nova Scotia, CA, May 29, 2024. <https://doi.org/10.5281/zenodo.11235875>
- “Central Asia and Mongolia Gender Data Portal”, with Aizada Arystanbek [poster], IASSIST Annual Conference, Philadelphia, PA, June 1, 2023. <https://ryanwomack.com/camgdp>
- “Finding tools for data documenting racism and the Black experience internationally and guides for searching and using data with an antiracism lens.” with Van Bich Tran, Jennifer Boettcher, Kevin Manuel, Jenny McBurney, and Anja Perry, IASSIST Annual Conference, Philadelphia, PA, June 1, 2023. <https://doi.org/10.5281/zenodo.7999836>
- “Addressing Diversity in Data through the work of Graduate Specialists”, IASSIST Annual Conference (Hybrid), Gothenburg, Sweden, June 8, 2022. [Prerecorded version of the talk.](#)
- “From Pilot to JetStream: Building training pathways and collaboration in data science and digital humanities through the Library”, IASSIST Annual Conference (Virtual), May 20, 2021. (postponed from 2020 due to COVID-19). [Short](#), [medium](#), and [long](#) versions of the talk.
- “Scaling research support services through a graduate specialist program at Rutgers University”, with Dee Magnoni, OCLC Research, Works in Progress Webinar, July 9, 2020.
- (invited-cancelled due to COVID-19) “Data Visualization in R with ggplot2 and Shiny”, Center for Social Research and Data Archives, Institute of Social Science, University of Tokyo, April 10, 2020.
- (invited-cancelled due to COVID-19) “Building a Culture of Reproducible Research”, Center for Social Research and Data Archives, Institute of Social Science, University of Tokyo, April 9, 2020.
- “Data in Libraries: Data Processing and Visualization”, Reference and User Services Association of the American Library Association, online, March 25, 2020.
- “Research Metrics Part II”, Rutgers University Libraries, New Brunswick, New Jersey, December 13, 2018.
- “Interdisciplinary Data – Views from Graduate Students and Faculty”, with Grace Agnew and Ron Jantz, Scholarly and Professional Activities Committee, Rutgers University Libraries, New Brunswick, New Jersey, November 28, 2018.
- “Understanding Research Metrics”, with Laura Bowering Mullen and Yingting Zhang, Rutgers University Libraries, New Brunswick, New Jersey, February 9, 2018.
- “Data in Libraries: Data Processing and Visualization”, Reference and User Services Association of the American Library Association, online, November 2, 2017.
- “Big Data, Data Visualization, and Reproducible Research”, Mongolian University of Science and Technology, Ulaanbaatar, Mongolia, May 12, 2017.
- “Big Data and Data Visualization”, Mongolian University of Life Sciences, Ulaanbaatar, Mongolia, May 11, 2017.
- “Data Literacy”, National University of Mongolia, Ulaanbaatar, Mongolia, May 10, 2017.
- “Data in Libraries: Data Processing and Visualization”, Reference and User Services Association of the American Library Association, online, May 4, 2017.



- “Research Data in Core Journals in Biology, Chemistry, Mathematics, and Physics”, Scholarly and Professional Activities Committee, Rutgers University Libraries, New Brunswick, New Jersey, December 12, 2016.
- “Enhancing Understanding Through Data Visualization”, Institute for Advanced Study, Princeton, New Jersey, December 5, 2016.
- “Putting Reproducibility into Practice: Workflows and Case Studies”, Rutgers Workshop on Reproducibility in Experimental and Computational Science, Piscataway, New Jersey, October 10, 2016. <https://doi.org/doi:10.7282/T3JS9TR6>
- “Data Analytics and Visualization: Experience from the Trenches”, Princeton-Trenton Chapter of the Special Libraries Association, Princeton, New Jersey, April 21, 2016.
- “(A bit about) Data Visualization”, ICPSR Biennial Meeting, Ann Arbor, Michigan, October 2, 2015.
- “Data Visualization and Information Literacy”, IASSIST Annual Conference, Toronto, Canada, June 5, 2014. <https://doi.org/doi:10.7282/T37P8WM1>
- “The Rutgers Experience: Building Data Management and Repository Services”, National Network of Libraries of Medicine, Middle Atlantic Region (NN/LM MAR) Research Data Management Symposium, Rockefeller University, New York, April 28, 2014. <https://doi.org/doi:10.7282/T3QN64ZN>
- “The Rutgers Secure Data Facility: A Small Scale Solution”, Panel on Managing Access to Restricted Data in Universities, IASSIST Annual Conference, Cologne, Germany, May 29, 2013.
- “The Disappearance of the Data Book, or, Whatever Happened to Summary Statistics?”, Documents Association of New Jersey, Fall Conference, Princeton University, December 17, 2012, with Bobray Bordelon. <https://doi.org/doi:10.7282/T3JQ0Z0W>
- “R at Rutgers”, NewJerseyR Users Group Meeting, November 27, 2012, Iselin, New Jersey.
- “Data Management Training to Support Faculty Research Needs: Lessons Learned”, IASSIST Annual Conference, Washington, DC, June 7, 2012, with the RUresearch Data Team. <https://doi.org/doi:10.7282/T3DB83H8>
- “Finding Decennial Census Data”, New Jersey State Data Center Annual Network Meeting, Rutgers University, June 17, 2010.
- “Designing Data Services for the Institutional Repository”, IASSIST Annual Conference, Cornell University, Ithaca, New York, June 2, 2010, with Ron Jantz. <https://doi.org/doi:10.7282/T3J38V7M>
- “Doing Data on YouTube: Outreach and Education using Web 2.0”, IASSIST/IFDO Annual Conference, Tampere, Finland, May 27, 2009. <https://doi.org/doi:10.7282/T3NV9KWQ>
- “Libraries as Information Intermediaries”, Scholarly and Professional Activities Committee, Rutgers University Libraries, New Brunswick, New Jersey, March 10, 2004.
- “High Speed, High Price, High Demand: Business Internet Resources and Databases in American Academic Libraries”, Central Asia 2002: Internet and Library, Information Resources in Science, Culture, Education, and Business, Bukhara, Uzbekistan, October 16, 2002. <https://doi.org/doi:10.7282/T33F4N0W>.
- “Bel Jour: Building a Discipline-Specific Portal to Periodicals”. Presented at “Who’s in the Driver’s Seat: You or Technology”, New Jersey Library Association College and University Section/ACRL New Jersey Chapter Spring Symposium, Lincroft, New Jersey, May 22, 2002.
- “The Expansion of Radio: An Analysis of the Development of a New Medium of Communication”, Alabama Library Association Annual Convention, Point Clear, Alabama, April 15, 1998.

### Workshops

- Offer ongoing workshop series on R and statistical/data topics for Rutgers students, offered to students and faculty across the University, from a wide range of science and social science departments.
- “Data Topics” series of workshops developed 2023-2027, integrated presentation of Data Science topics from R, Python, statistics, and programming topics using Quarto.
- “Tidyverse Approach” series of workshops developed 2020-2021, focusing on data analysis, wrangling, and visualization using the tidyverse suite of R packages.
- Special topics material on time series, survival analysis, visualization, and the “tidyverse”. Materials available on [my R guide](#) and [ryandata Github page](#).
- “Data Literacy for All, with R”, IASSIST Annual Conference, Montréal, Canada, May 29, 2018.
- “Introduction to Data Management for Researchers”, with Forough Ghahramani and Ron Jantz, Rutgers Discovery Information Institute and Virtual Data Collaboratory, Piscataway, New Jersey, May 15, 2018.
- “Data Literacy for All, with R”, IASSIST Annual Conference, Lawrence, Kansas, May 23, 2017.

- “Topics in Data Science/Өгөгдлийн шинжлэх ухаан [Data Visualization, Big Data, Reproducible Research, and Data Literacy]”, National Statistics Office of Mongolia, Ulaanbaatar, Mongolia, May 8-9, 2017. PDF available at <https://doi.org/doi:10.7282/T3CF9SS7>.
- “Hands-On Big Data”, IASSIST Annual Conference, Minneapolis, Minnesota, June 2, 2015. PDF available at <https://doi.org/doi:10.7282/T3ZW1NPZ>.
- “Data Visualization and R”, IASSIST Annual Conference, Toronto, Canada, June 3, 2014. PDF available at <http://dx.doi.org/doi:10.7282/T3VD6WNJ>.
- “Data Visualization and R”, IASSIST Annual Conference, Cologne, Germany, May 29, 2013.
- “Introduction to R”, IASSIST Annual Conference, Vancouver, Canada, May 31, 2011. Handout by Ryan Womack: “Introduction to R” and “R examples”, with Harrison Dekker.
- “Introduction to R”, IASSIST Annual Conference, Ithaca, New York, June 1, 2010. Handout by Ryan Womack: “Introduction to Data Manipulation in R”. with Harrison Dekker.

## Courses

- Rutgers Future Scholars, summer intern program for rising high school juniors, provided data instruction for Libraries group in summer 2016-2019, 2023-2025.
- Erdős Institute, Data Science Boot Camp, teaching assistant, May 4-31, 2020. Converted to online instruction, joint program with The Ohio State University, Rutgers University-New Brunswick (School of Arts and Sciences), University of Michigan, and others.
- “Big Data and Data Science”, Byrne Seminar (co-taught with Prof. Javier Cabrera, Dept. of Statistics and Biostatistics), Rutgers University, Spring 2020, Spring 2021, and Spring 2022.
- “Big Data: Revolution and Reality”, Byrne Seminar (co-taught with Prof. Javier Cabrera, Dept. of Statistics and Biostatistics), Rutgers University, Spring 2016, Fall 2016, Fall 2017, and Fall 2018.
- “Probability and Statistics with Small Data”, half-day session, part of “Mini-MBA: Data-Driven Management”, Rutgers Business School, New Brunswick, New Jersey, April 25, 2018, November 8, 2018, and May 15, 2019.
- “A Short Course in Multivariate Statistical Methods with R/Олон хэмжээст статистикийн богино хэмжээний сургалт R программ дээр”, one-week mini-course, Mongolian University of Life Sciences [Хөдөө аж ахуйн их сургуул], Ulaanbaatar, Mongolia, February 26-March 2, 2018.

## Editorial

- Founding Editor, *The Central Asia and Mongolia Gender Data Portal* (CAMGDP). <https://camgdp.org>. 2023-Editorial Board, *IASSIST Quarterly*, 2023-2027.
- Editor, World Wide Web Review Column, *Journal of Business and Finance Librarianship*, vols. 12-16 (2006-2011). Topical column reviewed web sites on the following topics: International Trade, Corporate Governance, Human Resources, Mutual Funds, Economic Ratings, Real Estate, Retirement, Small Business, Commodities, Business News, Country News, Think Tanks, International Organizations, Biotechnology, and Demographics.
- Editor, Economics, *Resources for College Libraries*, ACRL/Bowker, 2007-2009.
- Reviewer for *IASSIST Quarterly*, *Science and Engineering Ethics*, *Journal of Librarianship and Scholarly Communication*.

## Grants

- Senior Personnel and Lead for Education and Outreach (2020-2022), “Virtual Data Collaboratory – A Regional Cyberinfrastructure for Collaborative Data Intensive Science”, 2016-2022 (\$4 million National Science Foundation Grant to develop a Virtual Data Collaboratory (VDC) for state of the art data-intensive computing, storage, and networking solutions, federated with an innovative interdisciplinary data services layer, across multiple universities in New Jersey and Pennsylvania)
- Co-Principal Investigator, “Research and Instructional Support Across Disciplines: Data Services”, 2009-2010 (\$60,000 Academic Excellence Fund Grant to develop data services capacity on the Rutgers-Newark campus)
- Member, Video Mosaic Collaboratory project team, 2009-2010, (\$3 million National Science Foundation Grant to develop video archive and analytic tool for Rutgers Graduate School of Education collection of mathematics instruction recordings)



Co-Principal Investigator, Virtual Collaboratory for Food, Nutrition and Business Information, 2004-2008, (Rutgers course and web portal, funded by the U.S. Department of Agriculture Cooperative State Research, Education, and Extension Service Higher Education Challenge Grants Program)

## Honors and Awards

On Fulbright Specialist roster, 2017-2022

## Professional Activities

### *Offices held in Scholarly and Professional Societies*

Member-at-Large for USA, International Association for Social Science Information Service and Technology (IASSIST), 2019-2023  
 Secretary, IASSIST, 2015-2019  
 Chair, Nominating Committee of the Business Reference and Services Section (BRASS) of the Reference and User Services Association (RUSA) of the American Library Association (ALA), 2009-2010  
 Chair, Vendor Relations Committee, BRASS, 2008-2009  
 Past Chair, BRASS, 2007-2008  
 Chair, BRASS, 2006-2007  
 Chair, BRASS Executive Committee, 2006-2007  
 Vice-Chair/Chair-Elect, BRASS, 2005-2006  
 Chair, BRASS Membership Committee, 2004-2005  
 Chair, 2004 BRASS Annual Program Committee, 2002-2004  
 Chair, Thomson Financial/Primark Student Travel Award Committee, BRASS, 2000-2002  
 BRASS Representative to RUSA Nominating Committee, 2009-2010  
 BRASS Representative to RUSA Emerging Leaders Proposals Task Force, 2007  
 BRASS Representative to RUSA Conference Program Coordinating Committee, 2004-2005  
 BRASS Representative to the Access to Information Committee, RUSA, 1999-2001  
 Coordinator, IASSIST Jobs Repository, 2022-  
 Member, IASSIST Representation in Data Interest Group, 2022- (name changed from Diversity, Equity, and Inclusion Interest Group in 2025, name changed from Anti-Racism Interest Group in 2023)  
 Member, IASSIST Administrative Committee, 2015-2023  
 Member, IASSIST Conference Committee for 2023 Philadelphia Conference, 2022-2023  
 Member, IASSIST Executive Committee, 2015-2019  
 Member, IASSIST Open Source Interest Group, 2014-2017  
 Member, IASSIST Data Visualization Interest Group, 2013-2017  
 Member, IASSIST Data Management and Curation Interest Group, 2011-2015  
 Member, IASSIST Special Interest Group on Data Citation, 2010-2014  
 Member, IASSIST Membership Survey Action Group, 2010-2011  
 Member, IASSIST Conference Program Committee, 2009-2010  
 Member, Eurasia and Central Asian Subcommittee of the ALA International Relations Committee, 2008-2010  
 Member, BRASS Executive Committee, 2005-2008  
 Member, RUSA Board of Directors, 2006-2007  
 Member, RUSA Planning and Finance Committee, 2005-2006  
 Member, BRASS Publications Committee, 2004-2006  
 Member, 2005 RUSA President's Program Committee, 2004-2005  
 Member, 2003 Preconference Planning Committee, BRASS, 2001-2003  
 Member, Collection Evaluation Techniques Committee, Collection Development and Evaluation Section (CODES), ALA, 1998-2002  
 Member, Access to Information Committee, RUSA, 1997-1999  
 Member, 1999 Program Planning Committee, BRASS, 1997-1999

### *Memberships in Scholarly and Professional Societies*

American Statistical Association (lifetime member), 2011-  
 The Authors Guild, 2020-  
 Central Eurasian Studies Society 2024-  
 American Center for Mongolian Studies 2024-  
 IASSIST (International Association for Social Science Information Service and Technology), 2007-2034  
 Association of Public Data Users, 2022-2034  
 RDAP Association (Research Data Access and Preservation Association) 2021-2031  
 Institute for Mathematical Statistics 2014-2019  
 American Library Association, 1996-2011, active in Reference and User Services Association (Business Reference and Services Section; Collection Development and Evaluation Section). Other memberships have included the Association of College and Research Libraries (Asian, African, and Middle Eastern Section; Slavic and East European Section), Government Documents Round Table, Maps and Geography Round Table, and International Relations Round Table.  
 American Economic Association, 1998-2006  
 American Society for Information Science and Technology, 1998-2005  
 Special Libraries Association, 2001-2005

### *Major Professional Development Activities*

Certified Carpentries Instructor, 2019 (<https://carpentries.org>) - Software Carpentry, Data Carpentry, Library Carpentry  
 Triangle Research Libraries Network Management Academy: "The Business of Libraries", Chapel Hill, NC, 2015. [TRLN 2015](#)  
 Summer Institute on Data Curation, University of Illinois Graduate School of Library and Information Science, Champaign, IL, 2011.

## **Service**

### *National*

Member, Ithaka S+R Building Campus Strategies for Data Support Services project, 2023-2025, Rutgers team. Project to create national benchmarking data on current data support services, build tools to help users navigate existing services, and develop strategies for ensuring the future viability of data support services.  
 Member, ICPSR-IMLS project advisory committee, 2010-2012. This project formed partnerships between Institutional Repositories and ICPSR (Inter-University Consortium for Political and Social Research) to accomplish three goals. First, to curate and archive a small number of social science datasets as pilot studies. Second, to use these experiences to develop a best practices guide for Institutional Repositories for archiving such materials. Third, to identify and design services that ICPSR can offer to assist repositories in archiving social science data.  
 Member, TeachingWithData.org advisory group, ICPSR, 2009-2011. NSF-National Science Digital Library project to create a website to help faculty to integrate quantitative literacy activities using social science data into their courses.  
 External reviewer, tenure review and promotion for librarians at many universities, averaging 1-2 year.

### *Regional*

Member, BTAA Government Information Interest Group, 2025-  
 Member, BTAA Area Studies Interest Group, 2025-  
 Member, Advisory Board, New Jersey State Data Center, 2005-  
 Member, Census 2010 Complete Count Committee, New Jersey State Data Center, 2009-2010  
 Member, Virtual Academic Library Environment (VALE) Interface Committee, 1999

### *University*

Chair, Evaluation Committee for Vice-President for Information Services and University Librarian, 2019-2021  
 Co-Chair, Budget, Planning, and Infrastructure Committee, New Brunswick Faculty Council, 2017-2021  
 Member, New Brunswick Faculty Council, 2017-2023  
 Member, COACHE Research Working Group, Research Support and Infrastructure Team, 2020-2021  
 Member, AAUP Bargaining Committee, 2014-2015  
 Member, AAUP Work and Family Standing Committee, 2008-2014  
 Member, Advisory Committee for RU FAIR Data Warehouse, 2009-2011. NSF ADVANCE-funded project to create a data warehouse of information on gender, racial and ethnic equity in hiring and promotion at Rutgers.  
 AAUP Representative, University-Wide Committee on Work and Family Issues, 2008-2009  
 Member, Rutgers New Faculty Traveling Seminar, 2007  
 Member, Search Committee for School of Management and Labor Relations Librarian, 2007  
 Member, Advisory Committee for Instructional Computing, 2005  
 Member, School of Management and Labor Relations Library Task Force, 2000-2001

### *College*

Member, Curriculum Committee, Livingston College, 2001-2007  
 Fellow, Livingston College, 1999-2007

### *Rutgers University Libraries*

Faculty Chair, 2012-2013, 2024-2025  
 Deputy Faculty Chair, 2011-2012, 2023-2024  
 Chair, Appointments and Promotions Committee, 2025-2027  
 Chair, RUresearch Data Team, 2011-2016  
 Chair, RUL World Languages Task Force, 2006-2011  
 Chair, LibData Review Committee, 2006  
 Chair, Rules of Procedure Committee, 2003-2005  
 Chair, Social Sciences Networked Resources Evaluation Committee, 2001-2002  
 Chair, Scholarly and Professional Activities Committee, 1999-2001  
 Co-Chair, Streaming Instructional Videos Working Group, 2009-2011  
 Team Representative for Data Management to Research Services Support Team Steering Committee, 2025-2027  
 Team Leader for Research Support Services, Workforce Planning Task Force, 2024  
 New Brunswick Representative to Planning Committee, 2006-2007, 2019-2020  
 New Brunswick Representative to Library Resources Council, 2009-2011, 2015-2017  
 New Brunswick Representative to Planning and Coordinating Committee, 2006-2008  
 Social Sciences Representative to User Services Council, 2008-2010  
 Social Sciences Representative to Committee on Scholarly Communication, 2007-2009  
 Social Sciences Representative to Collection Development Council, 2001-2002  
 Parliamentarian, 2021-2023  
 Mentor, during probationary period for librarian who received tenure in 2025, 2019-2022  
 Mentor, during probationary period for librarian who received tenure in 2014, 2008-2014  
 Member, Data Management Team, 2025-  
 Member, Research Services Support Team, 2025-  
 Member, Search Committee for Associate University Librarian for New Brunswick, 2025-2026  
 Member, Faculty Planning Committee (formerly Coordinating Committee), 1999-2001, 2003-2004, 2006-2008, 2011-2013, 2019-2020, 2023-2025  
 Member, Inclusivity Librarian Initiative Task Force, 2024-2025  
 Member, Reading Committees for Librarian tenure actions (outside of NBL), 2018, 2021 (2), 2023  
 Member, Research and Scholarly Environment Working Group, 2017-2018  
 Member, Research Leave Review Committee, 2017-2018  
 Member, Committee of Review, 2009-2010, 2015-2017  
 Member, Research Data Exploratory Team, 2015-2016

Member, Collection Analysis Group, 2015-2016  
 Member, RUL Monograph Task Force, 2015-2016  
 Member, Research Data Implementation Task Force, 2014  
 Member, Software Architecture Working Group, 2011-2013  
 Member, Cyberinfrastructure Steering Committee, 2010-2013  
 Member, Web Board, 2010-2011  
 Member, RUCore Data Working Group, 2009-2011  
 Member, Learning Spaces Subcommittee, User Services Council, 2009-2011  
 Member, Meebo (Chat) Reference Team, 2008-2010  
 Member, ScienceDirect Task Force, 2009  
 Member, Personnel Policy and Affirmative Action Committee, 2005-2007  
 Member, Digital Repository Review Committee, 2004-2007  
 Member, Rules of Procedure Committee, 2005-2006  
 Member, Scholarly Communication Committee, 2003-2006  
 Member, ex officio, Communication/Marketing Team, 2005-2006  
 Member, Social Sciences Networked Resources Evaluation Committee, 1999-2003  
 Member, Collection Development Council Working Group on Digital Projects, 2002  
 Member, Electronic Statistics Subgroup of Collection Development Council, 2002  
 Member, Content Management System Working Group, 2002  
 Member, Real-Time Reference Committee, 2002

#### *New Brunswick Libraries*

Point of Contact, Statistical Data Services, 2019-  
 Point of Contact, Government Documents, 2020-  
 Point of Contact, Graduate Specialist Program, 2019-2022  
 Head, New Brunswick Libraries Research Services Unit, 2022-2025  
 Head, Research and Content Department, 2015-2018  
 Chair, Search Committee for Social Sciences Librarian, 2022  
 Chair, Standing Exploratory Committee, 2021-2022  
 Chair, Exploratory Committee for Future Librarian Roles, 2020-2021  
 Chair, New Brunswick Libraries Faculty, 2007-2008, 2019-2020  
 Deputy Chair, New Brunswick Libraries Faculty, 2006-2007, 2018-2019  
 Chair, Search Committee for three Part-Time Instruction Librarians, 2019-2020  
 Chair, Travel Allocation Committee, 2018-2019  
 Chair, New Brunswick Collections Group, 2009-2011  
 Chair, Social Sciences Subgroup, New Brunswick Collections Group, 2005-2009  
 Chair, Data Center Task Force, 2008  
 Chair, Peer Evaluation Committee, 2007-2008  
 Chair, Search Committee for Social Sciences Data Librarian, 2006-2007  
 Co-Chair, Travel Allocation Committee, 2008-2010  
 Interim Librarian for Government Documents 2023-  
 Interim Librarian for Bloustein School of Planning and Public Policy, 2021-2022, 2025-  
 Interim Librarian for School of Social Work, 2021-2022  
 Interim Business Librarian, 2008-2009, 2013, 2018-2022  
 Interim Data Librarian, 2003, 2007  
 Coordinator, LibCal Calendar, 2020-25  
 Coordinator, Multilingual Welcome to the Libraries, 2022-2023  
 Member, Research Data Services Team, 2018-25  
 Member, New Brunswick Libraries Collections Unit, 2023-25  
 Member, Standing Exploratory Committee, 2021-2023  
 Member, Equity and Social Justice Task Force, 2020-2023  
 Member, Scholarly Communication Team, 2018-2022  
 Member, Learning Community Advisory Group, 2021-2022

Coordinator, JetStream, 2019-2022  
 Member, Peer Evaluation Committee for Faculty Compensation Program, 2007, 2016, 2020  
 Member, School of Environmental and Biological Sciences/New Jersey Agricultural Experiment Station (SEBS/NJAES) Team, 2018-2019  
 Member, New Brunswick Libraries Strategic Planning Committee, 2018-2019  
 Member, Alexander-OIT Reference Planning Group, 2018-2019  
 Member, Research Data Outreach Team, 2016-2018  
 Member, Research Spaces Team, 2016-2018  
 Member, Global Experience Team, 2016-2018  
 Member, New Brunswick Libraries Steering Committee, 2016-2018  
 Member, Business and Entrepreneurship Librarian Search Committee, 2017  
 Member, Reading Committee for RUL librarian tenure and reappointment actions, 2005, 2006, 2012, 2016 (2), 2022, 2024  
 Member, New Brunswick Collections Group, 1999-2015  
 Member, Research and Instructional Services (New Brunswick) Reorganization Working Group, 2014-5  
 Member, New Brunswick Information Services Group, 2010-2015  
 Member, Search Committee for Chemistry/Physics Librarian, 2013  
 Member, Alexander Library Research and Learning Commons Committee, 2011-2012  
 Member, Alexander Library Reference and Lobby Redesign Committee, 2007-2009  
 Member, Annual Review Committee for Librarian V, 2005  
 Member, Technology Awareness Group, 2000-2005  
 Acting Liaison for Reference and Information Services, Kilmer Library, 2002  
 Member and Temporary Acting Chair, Search Committee for Digital Initiatives Librarian position, 2001  
 Member, Exploratory and Search Committee for Information and Instruction Librarian position, 1999-2000  
 Member, Committee to Develop A Vision Statement for the Kilmer Library for the 21st Century, 2000  
 Member, New Brunswick Technology Group, 1999-2000  
 Member, Real-Time Reference Working Group, 2000  
 Member, Approval Plan Fund Code Committee, 1999

## Skills

Proficient in R and RStudio, Shiny Server, Python and Jupyter,  $\text{\LaTeX}$ ,  $\text{\LyX}$ , Git/Github, Hugo, MySQL, CalyxOS, Digital Ocean, Debian/Ubuntu, Fedora/RedHat Linux, Tails, Qubes, LibreOffice, Opnsense, Pi-hole, Render, Vercel, Wasabi  
 Working familiarity with Maple, Mathematica, SAS, Stata, Hadoop ecosystem, other Cloud platforms (Azure, Google), HPC platforms including Rutgers Amarel, other Database platforms, other Linux distributions

## Linguistic Ability

English (fluent reader, speaker & writer)  
 French / Français (fluent reader, intermediate speaker & writer)  
 Mongolian / Монгол (intermediate reader & speaker, basic writer)  
 Russian / Русский (fluent reader, intermediate speaker & writer)  
 Turkic languages (familiarity with vocabulary and grammar, focusing on learning Kazakh)