

LIRT empowers librarians from all types of libraries to become better teachers through sharing best practices, leadership and professional development, and networking.



ISSN 2161-6426

June 2023

Volume 45

No. 3/4

School

Public

Special

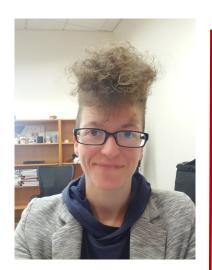
Academic

Library Instruction Round Table NEWS

From the President

Greetings, colleagues!

I want to begin this message by thanking each and every one of you for the hours and efforts you've contributed over the past year toward the promotion of library instruction both in your own communities and (inter)nationally via LIRT membership and service. As librarians, we all play a vital role in advancing the information literacy within our communities and over the past year, the restriction of that role has been front and center of legislative agendas across several states in the US. Naively, this sort of large-scale attempt to censor libraries is something I never imagined I would experience in my lifetime. Nevertheless, it is times like these that truly highlight the value of our professional organizations as vehicles for communication, collaboration, and action. To that end, I encourage all who are able to connect with



Becca Neel LIRT President

colleagues in person or online at the <u>ALA Annual Conference</u> this summer in Chicago and to keep those conversations going via the LIRT community on ALA Connect and <u>committee membership</u>. Finally, I'm very grateful for the opportunity to have served as LIRT president for the past year and am excited to welcome our incoming president, Victor Baeza, who brings a wealth of knowledge and experience to the role!

Becca

contents

- 1 ... From the President
- 2 ... From the Interim Editors
- 3 ... LIRT @ ALA Annual President's Program
- 4 ... LIRT @ ALA Annual Awards Ceremony Bites with LIRT
- 5 ... LIRT Awards
 Librarian Recognition
- 6 ... LIRT Awards
 Innovation in Instruction
- 8 ... LIRT Top 20 Articles
- 16 ... Tech Talk ChatGPT
- 31 ... Get Involved with LIRT

From the Interim Editors

The saying 'change is the only constant in life' has never felt more true than over the past three years. Our lives and our work have changed, and no one has been untouched. This also includes *LIRT News*. A transformation is underway, but after reviewing the newsletter archives online, we realize this is nothing new. The inaugural issue was typewritten and distributed by mail. In fact, much of the archives are digital copies of printed mailings. It's reassuring to look back at all the different layouts and formats and see some constants: Member A-LIRT, programs and meetings at Midwinter and Annual conferences, Top Twenty, and Tech Talk. The more things change, the more they stay the same.

From typewritten and mailed, to born digital and distributed online, *LIRT News* has endured with only a few gaps in publication. We were sorry to skip the March 2023 edition, but we are between Editors. Following Sherri Brown's more than five-year tenure, the search is on for a new steward of this decades-old newsletter. We are investigating platforms, and hope to have the next issue out to you in an exciting new format. In the meantime, we know you want to hear about events at ALA Annual in Chicago, and read the Top 20 and Tech Talk, so we'll just say thank you for your patience, and keep an eye out for *LIRT News* again in the Fall.



Renee Kiner (Chair, Communications Committee)

Rachel Mulvihill (LIRT Secretary, Production Editor)



LIRT News is published quarterly (September, December, March, June) by the Library Instruction Round Table of the American Library Association. ISSN 2161-6426

http://www.ala.org/lirt/lirt-news-archives

All material in the *LIRT News* is subject to copyright by ALA. Material may be photocopied for the noncommercial purpose of scientific or educational advancement.

©American Library Association



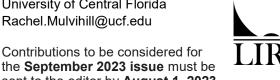


http://www.facebook.com/groups/ala.lirt/@LIRT_ALA / Twitter

Interim Editors:

Renee Kiner Public Services Librarian University of Pittsburgh at Greensburg reneekiner@pitt.edu

Rachel Mulvihill Head, Downtown Campus Library University of Central Florida Rachel.Mulvihill@ucf.edu



the **September 2023 issue** must be sent to the editor by **August 1, 2023.**

Production editor: Rachel Mulvihill University of Central Florida Libraries



LIRT Programming at the 2023 ALA Annual Conference

Universal Design for Learning - Planning for All Learners

LIRT President's Program Saturday, June 24, 2023 1:00pm – 2:00pm McCormick Place, W176c

Universal design for learning is an educational framework that optimizes teaching to accommodate all learners through multiple means of representation, expression, and action & engagement. By creating accessible, inclusive learning experiences, libraries of all types can provide more equitable library services and support for learners through intentional, proactive, and reflective practices. In this session, participants will learn how librarians from public, school, and academic libraries are incorporating universal design for learning into their instruction to help reduce barriers and encourage learning.

Our panelists will include:

Carrie Banks, Brooklyn Public Library (Brooklyn, NY)

Carrie Banks has been in charge of Brooklyn Public Library's (BPL) <u>Inclusive Services</u> since 1997 and taught "Including Youth with Disabilities" at Pratt Institute from 2013 to 2015. At *Inclusive Services*, she has developed programs for children with and without disabilities, their families, peers and caregivers, and for self-advocates. A frequent presenter at conferences, Ms. Banks is active in the American Library Association. In 2014, she substantially revised <u>Including Families of Children with Special Needs: A How to Do It Manual for Librarians</u>. <u>Libraries and Gardens: Growing Together</u>, written with Cynthia Mediavilla, was published in the Spring of 2019. <u>Library Programming for Adults with Developmental Disabilities</u>, written with Barbara Klipper, was published in Spring 2021.



Emily Porter, Curie Metropolitan High School (Chicago, IL)



Emily Porter is the Director of the Media Center at Curie Metropolitan High School in Chicago.

A 20 year veteran of Chicago Public Schools, Emily has been able to adapt, learn, and apply critical information literacy strategies to collaborative instruction in school libraries. She believes that literacy takes many forms and she strives to inspire inquiry and curiosity in her students.

When she isn't traveling to National Parks, Emily can be found reading, trying new recipes, and crafting with her family. Her favorite book is *East of Eden* by John Steinbeck.

Cristina Colquhoun, Oklahoma State University (Stillwater, OK)

Cristina Colquhoun is the Instructional Design and Online Learning Librarian for Oklahoma State University Libraries. She is an experienced instructional designer and holds a Master of Science in Educational Technology from Oklahoma State University and a Bachelor of Science in Communication from the University of Miami. Cristina is passionate about increasing educational equity and expresses this through her work and scholarship in accessible learning design, student data privacy, and open educational resources (OER).





LIRT Programming at the 2023 ALA Annual Conference

10th Annual LIRT Awards Ceremony

Sunday, June 25, 2023 4:00pm – 5:00pm McCormick Place, W196b

In recognition of the accomplishments of librarians and libraries who promote information literacy, LIRT will host their annual Awards Ceremony on Sunday, June 25th. This year, we will be honoring winners of the 2023 Librarian Recognition and Innovation in Instruction Awards. The honorees will briefly discuss their work in forwarding information literacy.

All ALA Annual conference attendees and LIRT members are welcomed and encouraged to attend. No advance registration is required.

Honorees:

- Chapel Cowden, Associate Professor at the University of Tennessee at Chattanooga
- The Ohio State University Libraries

The 2022-2023 LIRT Awards Committee:

- Bridget Farrell, Co-Chair
- Wayne Finley, Co-Chair
- Abbie Basile
- Alexandra Mitchell
- Monica Latham
- Maria Sclafani
- Kimberly Shotick

Bites with LIRT

On **Sunday, June 25 at noon**, we will gather at II Culaccino (https://ilculaccino.com). This Italian restaurant is just a short walk from McCormick Place in Chicago, Illinois.

Reservations are limited. Deadline is Wednesday, June 21.

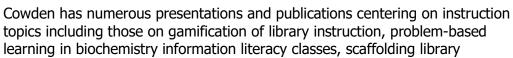
LIRT welcomes anyone who has an interest in instruction from all types of libraries. You need not be a member of LIRT to participate. We hope you will join us in this opportunity to exchange ideas and experiences about library instruction in a relaxed setting. Enjoy a stimulating and fun lunch with LIRT -good food, good company, and interesting conversation.

Confirmations will be sent by e-mail. Use the form below or communicate directly with Lily Dubach (lily@ucf.edu) with any questions. https://www.ala.org/rt/lirt/bites-annual

LIRT Librarian Recognition Award 2023

LIRT has chosen Chapel Cowden, Associate Professor at the University of Tennessee at Chattanooga, as the 2023 recipient of the LIRT Librarian Recognition Award. The Librarian Recognition Award was created to recognize an individual's contribution to the development, advancement and support of information literacy and instruction.

Cowden began her library career at the University of Tennessee at Chattanooga in 2008. She has held many roles during her time at UT Chattanooga—serving as the Circulation Day Supervisor and then as an Archives Specialist before beginning her current role of Health & Sciences Librarian in 2013. As Health and Sciences Librarian, she provides information literacy to students in Nursing, Physical Therapy, Health and Human Performance, Biology, Chemistry, Engineering, and introductory composition courses. She also teaches as adjunct faculty for UT Chattanooga's Honors College.





instruction into STEM curriculum, and student learning and motivation in authentic learning environments. Most notable is Cowden's research on culturally responsive pedagogy in library instruction classes. She led a sponsored workshop on culturally responsive pedagogy at ACRL 2019 and wrote an article on this topic which was published in *portal: Libraries and the Academy* in 2021.

Cowden's leadership and membership on several ACRL committees and role as a mentor in ACRL Instruction Section's Peer Mentor Program show a strong commitment to service and leadership within our profession. She has served as member on several national committees including ACRL Science & Technology Section's (STS) Equity, Diversity, and Inclusion Task Force & Implementation Team. She has held leadership roles on several other ACRL STS committees including the Development Task Force, Research Committee, and Professional Development Committee. The Awards Committee was most impressed by her excellent research on incorporating culturally responsive pedagogy in library instruction, the strength of her nomination letters, and her record of service to the profession.

"It is an absolute honor to receive the 2023 LIRT Librarian Recognition Award and join the outstanding ranks of past recipients. Though a science librarian, I consider the passionate core of my work to be improving the instructional experience for all who enter library classrooms. A few years ago, I became interested in culturally responsive pedagogy and its potential application to library instruction, and I spent the ensuing years collaborating with colleagues to adapt CRP to library instruction. I view receiving the LIRT award as an opportunity to highlight the importance of culturally responsive pedagogy and its potential for cultivating a more inclusive environment in our libraries."

-- Chapel Cowden, Associate Professor at the University of Tennessee at Chattanooga

2023 marks the tenth year the Librarian Recognition Award has been awarded. Chapel Cowden will be presented with a \$1,000 cash prize and a plaque commemorating the award. Their achievement will be celebrated at a ceremony during the ALA Annual Conference on Sunday, June 25th at 4pm in McCormick Place, room W196b. Visit LIRT's webpage to find out more about LIRT, its mission, and the awards.

The LIRT Librarian Recognition Awards Subcommittee included Bridget Farrell of the University of Denver (co-chair), Kimberly Shotick of Northern Illinois University, and Alex Mitchell of Texas A&M University.

LIRT 2023 Innovation in Instruction Award

LIRT is pleased to announce that the 2023 Innovation in Instruction Award will be presented to The Ohio State University Libraries. Created to recognize a library that demonstrates innovation in support of information literacy and instruction, this year's award recognizes The Ohio State University Libraries' "Meaningful Inquiry Workshop", which provides teaching-focused professional development for instructors,

including faculty, graduate teaching associates, instructional designers, and librarians/library staff. The MI workshop combines scholarship in the fields of education, sociology, psychology, and library and information science with pedagogical best practices to support instructors in creating equitable and inclusive learning environments for students.

The Meaningful Inquiry Workshop program is originally based on the dissertation research of Dr. Amanda Folk, Assistant Professor and Head of the Teaching & Learning Department in the University Libraries, which explored first-generation college students' experience with research assignments, as well as her own experience as a librarian providing research consultations to undergraduates. According to Dr. Folk, "Our goal is to have conversations related to information literacy while













Clockwise from top left: Dr. Amanda Folk, Chris Manion, Katie Blocksidge, Jane Hammons, and Hanna Primeau

foregrounding persistent equity gaps in higher education, highlighting the need to make information literacy expectations transparent to students and moving it out of the hidden curriculum."

The program was further developed and refined by Dr. Folk's colleagues Katie Blocksidge (Library Director, OSU-Newark), Jane Hammons (Assistant Professor and T&L Engagement Librarian, University Libraries), Chris Manion (Coordinator, Writing Across the Curriculum, Center for the Study & Teaching of Writing), and Hanna Primeau (Instructional Designer, University Libraries).

Upon hearing about being awarded the Innovation in Instruction Award on behalf of the University Libraries, Dr. Folk said, "The Meaningful Inquiry facilitation team at The Ohio State University Libraries is honored to be this year's recipient of LIRT's Innovation in Instruction Award. We know that this is a competitive award with many worthy nominations submitted each year, so we acknowledge that this is a significant achievement for our program."

One of the key criteria for winning the Innovation in Instruction Award is the ability of the program to be adapted by other libraries and educators, and the Meaningful Inquiry Workshop and its facilitation team are an exemplar of that criteria. "We are grateful to have worked with over 80 instructors in more than 20 departments and 3 campuses at Ohio State since we launched Meaningful Inquiry in August 2019," said Dr. Folk. "We are now taking Meaningful Inquiry on the road, presenting elements of the workshop to educational developers at the POD Network Conference, fellow librarians at the upcoming LILAC Conference,

(Continued on next page)

LIRT 2023 Innovation in Instruction Award, continued

and writing studies professionals at the upcoming IWAC Conference. We are proud of what we have developed and are thrilled to share our work with colleagues from various professions in the United States and beyond. We hope Meaningful Inquiry will be a useful tool for our library colleagues to combine their expertise in information literacy with a desire to close equity gaps at their institutions."

2023 marks the 10th year the Innovation in Instruction Award has been awarded. The Ohio State University Libraries will be presented with a \$1,000 cash prize and a plaque commemorating the award. Their achievement will be celebrated at a ceremony during the ALA Annual Conference on Sunday, June 25th at 4pm in McCormick Place, room W196b. Visit <u>LIRT's webpage</u> to find out more about LIRT, its mission, and the awards.

The LIRT Innovation in Instruction Awards Subcommittee included Wayne Finley of Northern Illinois University (co-chair), Maria Sclafani of Wichita State University, and Monica Latham of Colorado State University.



2022 LIRT Top 20 Instruction Articles

Committee Members

Virginia Seymour (Chair) Julie Pactor

Christina Taylor Gibson Kathryn Sullivan

Arianne Hartsell-Gundy Sarah Wade

Holly Hebert Elizabeth White

Rebecca Maniates Christine Woods

Aytac, S., & Mizrachi, D. (2022). The mindfulness framework for implementing mindfulness into information literacy instruction. *The Reference Librarian*, 63(1–2), 43–61. https://doi.org/10.1080/02763877.2022.2030273

Though mindfulness has become a popular topic in general discourse and in conversations around supporting students' mental health, it has not fully entered into the conversation of how we teach information literacy. The authors of this article are starting this conversation with their mindfulness framework, which consists of three pillars: paying attention, being in the present moment, and being non-judgmental. They created this framework based on a literature review that investigated, among other topics, the results of technology on people's attention span, and a survey of nearly 600 academic librarians about their teaching strategies. For each of the pillars listed above, they show how the information literacy teaching strategies identified can connect with different aspects of the pillars and help enhance the overall learning experience. For example, one of the attributes of the first pillar (paying attention) is mindful breathing. Mindful breathing can help with transitions between different learning modes and help students retain their focus in a flipped classroom experience. As a result, students will then be able to more deeply consider the principles of information literacy being covered. The authors make an especially strong case that teaching students how to be more present will aid them in overcoming information overload, a common obstacle in becoming more information literate. This framework should serve as a good starting point for other instruction librarians to build on in pursuit of improving students' mindfulness and ability to process the information they encounter inside and outside the classroom. **AHG**

Bloss, J. E., LePrevost, C. E., Cofie, L. E., & Lee, J. G. L. (2022). Creating information resources and trainings for farmworker-serving community health workers. *Journal of the Medical Library Association*, 110(1). https://doi.org/10.5195/jmla.2022.1272

This article was written about an NIH grant funded program that is being run out of East Carolina University in Greenville, North Carolina. The program's aim is to create resources that community health workers can use to talk with the farmworkers about issues relating to their health. The community health worker is a public health worker that lives in the community they serve and has a close relationship with the farm-workers that are predominantly Hispanic and Spanish speaking. The farmworkers usually have a range of health-related issues from mental health problems to heat stress and pesticide exposure. The team that put together the resources together is made up of a health sciences librarian and professors in Ecology and Health and Human Performance. The team also has students and an advisory panel that helped to contribute to the selection of resources that were produced.

The informational resources that were produced were a set of four videos that included topics such as searching for online information and how to evaluate it, free consumer health resources, and two about running basic searches in Google and PubMed. The team that produced the videos made sure that all of the resources were free so that they were easily accessible to the community health workers who may or may not have access to libraries. The resources were

introduced to the community health workers via three webinars with the first being in Spanish and the second two in English with interpretation in the opposite language at all three. The final step in the process is evaluation of the resources by both the advisory board and the community health workers: "to provide usable information to our team and partners for program and material improvements." In addition to this article there have been two others previously written about it. One in 2018 and one in 2021. **SW**

Bozcar, A. and S. Jordan (2022). Continuity during COVID: Critical digital pedagogy and special collections virtual instruction. *International Federation of Library Associations and Institutions*, 48(1) 99–111. https://doi.org/10.1177/03400352211023795

Like most university special collections, University of South Florida Libraries—Tampa Special Collections faced an unprecedented challenge to provide instruction at the onset of the Covid-19 pandemic. This article overviews their strategies for pivoting to online instruction, primarily through the use of "an open-access digital learning experience using ArcGIS StoryMaps." Through the article, they discuss ways in which critical digital pedagogy and feminist approaches to digital humanities were considered. Unique among pandemic-era instruction case studies, this article goes beyond recounting virtual replacements for existing in-person lessons by addressing issues related to working with less-than-ideal reproductions, materials that may be dynamic in person but do not translate on screen, and building continuity and engagement in asynchronous experiences. The inclusion of concrete descriptions of workflows, implementation, assessment, and post-pandemic applications makes this case study particularly useful for special collections librarians looking to develop asynchronous student experiences even following the return to in-person learning. **VS**

Cahill, M., Hoffman, H., Ingram, E., & Joo, S. (2022). Supporting school readiness through librarian-child interactions in public library storytimes: An analysis of assessment scores and influential factors. *Early Childhood Education Journal*, 50(1), 11–19. https://doi.org/10.1007/s10643-020-01133-6

The authors of this article investigated storytelling in public libraries using the CLASS (Classroom Assessment Scoring System) to evaluate their effectiveness in preparing children for school readiness. Thirty-six public libraries in three states (Kentucky, Ohio, and Indiana) were in the study, which included urban, suburban, and rural locations. Storytime programs were evaluated using the three domains of CLASS, emotional support, classroom organization, and instructional support. They also collected information about the librarians involved in the storytime programs, such as qualifications, education level, teaching experience, and years of experience with children's services. The authors identified *emotional support* as one way that librarians successfully prepared children for school. Classroom organization was in the medium range. The authors noted that engaging children with questioning or other ways to be involved would have raised the score in this area. Librarians who anticipated or paid attention to possible misbehavior issues scored higher in this area. The area that needed improvement was *instructional support*, meaning concept development, quality feedback, and language modeling were lacking in most storytimes. The only factor with a strong correlation was the librarians' years of experience. Librarians with three years or more experience had higher CLASS scores. The main takeaway from this article is that professional development should focus on preparing public librarians for storytime, especially improving classroom management skills and instructional support while maintaining already evident emotional support. **CW**

Chisholm, A., & Hartman-Caverly, S. (2022). Privacy literacy: From doomscrolling to digital wellness. *portal:* Libraries and the Academy, 22(1), 53–79. https://doi.org/10.1353/pla.2022.0009

Many of us are familiar with research on the impact of mobile technologies on Generation Z students: anxiety, depression, and isolation. Physical isolation due to COVID-19, and thus increased reliance on mobile technologies, only magnified the problem. This article provides readers with an in-depth introduction to the concept of "digital wellbeing," which seeks to examine both the positive and negative aspects of mobile technologies and how individuals can best balance them. The article concludes with a detailed examination of the Digital Wellness Workshop offered at Penn State Berks Thun Library in Reading, Pennsylvania.

In addition to issues of balance, this article explores the hidden impacts of mobile technologies, such as surveillance, doomscrolling, data exhaust, and attention engineering. The authors persuasively argue that librarians are the ideal

facilitators for digital wellness initiatives, due to their information / digital literacy expertise, plus their partnerships with professors and other departments. At Penn State, librarians created the Digital Wellness Workshop, which sought to explore the various factors of digital wellness while emphasizing the issue of digital privacy. The article provides detailed information on the planning and execution of the Digital Wellness Workshop, such that it could be successfully recreated at other libraries.

This article is valuable to librarians in two ways: as an exploration of the impacts of digital living on students and as a roadmap for recreating the successful digital privacy workshops offered at Penn State. **JP**

Cobourn, A. B., Brown, J. C., Warga, E., & Louis, L. (2022). Toward metaliteracy and transliteracy in the history classroom: A case study among underserved students. *The American Archivist*, 85(2), 587–608. https://doi.org/10.17723/2327-9702-85.2.587

This article presents a case study of an oral history project in an undergraduate history class at a regional university with a large population of students from underrepresented backgrounds. In this case study, the authors worked with students on a project that allowed them to build skills relating to multiple literacies, including digital literacy, visual literacy, primary source literacy, and information literacy. It is one of only a few studies in the field that looks at how these different literacies can be used in conjunction with students' digital scholarship projects. In this study, a history professor hoped to create a project in which students could practice discipline-specific research skills while also building career skills through the use of digital tools. The professor collaborated with two librarians and an archivist to plan class activities and projects which would culminate with the creation of a digital history exhibit to showcase oral histories that students had conducted in the previous semester. Throughout the project, students practiced archival literacy skills through primary source research, visual literacy skills through locating images and understanding potential copyright issues, and technology literacy skills by building a website to house their projects.

This article is a great example of a meaningful and productive collaboration between teaching faculty and librarians and archivists. Librarians who are interested in exploring digital humanities in their teaching will be sure to find good inspiration from this article. **EW**

Ding, Y. (2022). Feminized flexibility, one-shot, and library professionalism: Oxymoron or opportunity? *College & Research Libraries*, 83(5). https://doi.org/10.5860/crl.83.5.795

This article offers a critique of the "one-shot" model of library instruction through a feminist lens. The author describes the historical perspective of how teaching has traditionally been viewed as a feminized profession. Ding explains that values that are commonly perceived as feminine, such as flexibility and altruism, are emphasized in educational fields. She then connects these values and perceptions to library instruction specifically, noting some of the differences between the expectations and treatment of instruction librarians compared to guest lecturers. In particular, guest lecturers tend to have more control over the content they cover and have more freedom to decline instruction invitations that instruction librarians. Librarians, in contrast, have considerably less autonomy because they are expected to come to classes as part of the service they provide, and they are often asked to teach specific skills and support research assignments that the faculty member designed. Ding asserts that these feminized perceptions of library work have significant consequences, including stress and burnout. These issues are especially pronounced for librarians of color.

Ultimately, Ding argues that there are benefits to embracing some feminist values, including flexibility, in our work. However, librarians should strive for "autonomous flexibility," rather than the "imposed flexibility" that we typically face. She offers suggestions for how librarians can have more productive conversations with faculty members in pursuit of this goal. This eye-opening article is a must read for any instruction librarian who has lamented the challenges of single session instruction and is interested in considering ways to improve upon existing library instruction models. **EW**

Douglas, V. A., & Gadsby, J. (2022). The power of presence: One-shots, relational teaching, and instruction librarianship. *College & Research Libraries*, 83(5), 807–818. https://doi.org/10.5860/crl.83.5.807

In "The Power of Presence: One-Shots, Relational Teaching, and Instruction Librarianship" authors Veronica Arellano Douglas and Joanna Gadsby explore the question, why are some teaching experiences fulfilling and others draining for librarians? They contend that the answer lies in the connectedness that librarians experience through "growth-fostering teaching and learning relationships." In other words, classroom experiences where the participants have changed or been changed by others create a connectedness that is invigorating rather than exhausting. One-shot instruction can be meaningful because the duration of teaching practices is less important than the quality of the teaching interactions, what they refer to as the *quality of presence*. Quality of presence includes a commitment to openness, mutual respect, and a capacity to change and grow. In this work, the authors apply Harriet L. Schwartz's model of relational (or Connected Teaching) to one-shot library instruction. They describe the elements that can make even a brief or singular encounter one of high-quality connectedness: care, relational authenticity, presence and openness, and empathy. Care as they advocate for it includes creating an environment where roles and boundaries are clear and opportunities for growth within a learning relationship exist. Relational authenticity further delineates roles within the educational relationship and presents an opportunity to create interactions that matter to students, and empathy allows learners to set boundaries, be vulnerable, and seek help. The authors also describe the dynamics that can lead to disconnection, including unacknowledged asymmetrical primacy (or uneven perceptions of the significance of interactions) and uncomfortable power dynamics between the faculty member and the instruction librarian. KS

Hicks, A., Nicholson, K. P., & Seale, M. (2022). Make me think! Exploring library user experience through the lens of (critical) information literacy. *The Library Quarterly*, 92(2), 109–128. https://doi.org/10.1086/718597

This article aims to begin a critical conversation around points of tension between information literacy (IL) and library user experience (UX) in the context of higher education. The authors posit that recognizing key differences between these parallel practices opens the possibility to create "thoughtful and critically focused educational practices" through actions like interrogating the role of search engines and reconsidering potentially "paternalistic information environments." It highlights the different perspectives in the field regarding context, social dynamics, the body, and time in information interactions. The article warns about the potential risk of reverting to behaviorist pedagogies and emphasizes the need to clarify and interrogate the educational ideas underlying library UX tools. It also explores the divergence in pedagogical principles and the implications for library teaching, including the potential sidelining of social dynamics and the focus on efficiency. The tension between seamless user experience and critical literacy is examined, particularly in relation to search engines and information tools. The article concludes by suggesting opportunities for collaboration and conversation around IL and UX, such as research into critical approaches, the examination of gender, race, and disability in accessibility, the consideration of time in UX, and the exploration of boundary objects and pedagogy in information environments. The authors provide a variety of angles for practitioners to consider as they aim to develop more critical and thoughtful educational practices that support learners' engagement with complex information environments. VS

Hostetler, K., & Luo, T. (2022). Understanding academic librarians' one-shot instructional design process via a Delphi Study. *The Journal of Academic Librarianship, 48*(2), 102501. https://doi.org/10.1016/j.acalib.2022.102501

This study focuses on using the Delphi technique to gather recommendations and best practices from experienced librarians about their design recommendations for one-shot instruction sessions. The study involved three iterative rounds of surveys, in an attempt to bring participant librarians to a consensus around questions focused on preparedness for teaching, preferred teaching strategies and models for one-shots, as well as librarians' decision-making process around design decisions in the classroom. The survey instruments included open-ended questions, ranking, and Likert-scale techniques.

The results suggest that many librarians did receive instructional training during their MLIS; however, librarians indicated little opportunity for experiential training through classroom use of instructional design and pedagogy techniques. Librarians shared that formal and informal collaboration and observation of peers were essential outlets for learning new strategies in the classroom. For many, formal professional development was not possible due to the cost and time constraints, with librarians primarily relying on listservs, as well as collaboration with peers and teaching faculty. Librarian participants focused on backwards design as their primary instructional design model, despite its

minimal presence in the professional literature. The only instructional strategy which lasted to the final consensus round was demonstration. The study also identified four instructional design priorities of librarians who teach one-shots: pedagogical principles based on personal learning preferences, goal-driven criteria to focus one-shot lessons, context-specific priorities related to the course and student experience, and consideration of the limits of one-shots in general. Recommendations include more experiential learning for MLS candidates, as well as incorporating the layers of necessity approach to those one-shots developed with backwards design. **RM**

Koh, K., Ge, X., & Petrella, J. B. (2022). Librarian-teacher co-teaching and the role of school librarians in facilitating inquiry and maker learning. *School Library Research*, 25.

In this article, authors Kyungwon Koh, Xun Ge, and Julia Burns Petralla investigate how school librarians and classroom teachers co-teach in order to facilitate learner-centered instruction. The research included three years of interviews and field observations with educators at three different schools—one elementary, one middle, and one high school. Librarians and teachers in their study worked together throughout the instructional process, including planning, delivery, and assessment. The classroom subjects were wide ranging and across language arts, social studies, science, and math. They describe the role of the school librarian, including to what extent they were involved with co-teaching, provided expertise on the inquiry process and maker technologies, and supported both students and teachers throughout the inquiry and maker units. They found that the co-teaching methods varied and included team co-teaching, supportive co-teaching, and parallel teaching. Their findings suggest that librarian-teacher co-teaching greatly benefits the implementation of learner-centered instruction in schools. Librarian-teacher co-teaching provided greater opportunities for individual assistance, coaching, and scaffolding, both for students and other teachers. **KS**

Marsh, F. (2022). Unsettling information literacy: Exploring critical approaches with academic researchers for decolonising the university. *Journal of Information Literacy, 16*(1). 4 http://dx.doi.org/10.11645/16.1.3136

This qualitative research examines critical information literacy (CIL) in decolonial work within academic libraries, acknowledging the need to challenge colonial legacies in universities and exploring the potential of IL teaching for decolonization. The study interviews five academic researchers to examine IL from a decolonial perspective and its impact on the curriculum. The article also emphasizes the role of libraries in decolonizing the curriculum by questioning traditional notions of authorship and knowledge sources. It advocates for the validation of non-textual forms of knowledge and the inclusion of marginalized voices. CIL is presented as a critical approach that examines power structures and socio-political dynamics of information, prioritizing student co-creation of knowledge. The research highlights the need to integrate decolonial considerations into IL practices and recognizes the shared responsibility of interrogating library practices for decolonial ambitions. It cautions against co-opting IL and decolonization for neoliberal motives and offers insights for IL practitioners to foster decolonial pedagogy.

Key themes that emerged from the findings have implications for IL and libraries' pedagogical approaches. These include the importance of recognizing positionality and overcoming Eurocentric approaches to knowledge, centering marginalized voices in reading lists, embracing non-traditional and non-textual information sources, destabilizing normative knowledge categories, empowering students to identify gaps in information, understanding the situated nature of knowledge, and recognizing libraries as non-neutral interfaces. The research suggests that IL can play a crucial role in decolonizing the curriculum and calls for further investigation into language implications, disciplinary approaches to decolonization, libraries as sites of resistance, and student perspectives on decolonial information practices.

This research article offers valuable insights and recommendations for librarians and information professionals seeking to decolonize information literacy (IL) practices in academic libraries. It emphasizes the importance of embracing non-traditional information sources, challenging Eurocentric knowledge and source evaluation, and recognizing libraries' complicity in perpetuating coloniality. The article also highlights the need for pedagogies of relationality and transitionality, focusing on student-centered teaching and challenging power dynamics. **VS**

McMullin, R. M. (2022). Universal Design and library one-shot instruction. *Public Services Quarterly*, 18(3), 177–189. https://doi.org/10.1080/15228959.2021.2009406

The author explained how to improve one-shot instruction by utilizing Universal Design strategies. Several different versions of UD were described and compared. The author shared strategies from UD broadly rather than focusing on one specific framework. The strategies that were recommended were the following: provide a welcoming environment, greet students, provide relevant examples, use polling systems, use technology to engage students, provide organized instruction and learning materials, define terms, state your goals or objectives at the beginning and the end of lessons, keep lessons focused, slow down, use different methods to teach students, break down learning into small chunks, use multiple formats to present information such as visuals, incorporate multiple ways for students to show what they learned, offer many ways to get support following lessons, create and show students guides created for courses and assignments, supply class notes or copy of slides. Since there were many suggestions, the author highlighted a few as a great way to get started with UD. Pinch points are points in the class that librarians can anticipate that students might struggle with. Librarians should plan to slow down and demonstrate or explain pinch points several times. Another great idea was to choose one class or one small group to work with. The author recommended starting with one or two strategies rather than feeling overwhelmed. **CW**

Nataraj, L., & Siqueiros, A. I. (2022). "Slow your roll": Making time for reflection and diverse epistemic practices in library instruction. *College & Research Libraries*, 83(5), 819-832. https://doi.org/10.5860/crl.83.5.819

This article challenges librarians to think more critically about the structure of the one-shot and its inherent biases towards Western notions of time and authority. The authors argue that the practical focus of the one-shot, and the prioritization of assessment data, is emblematic of the Western / capitalist bias that pervades academia. The time constraints of the one-shot prohibit discussion of inequalities inherent in the peer review process and the scholarly publishing system in general. The result is the devaluation and suppression of non-western epistemologies.

The authors situate this time-crunch in the Western conception of the linearity of time, plus the shift from lifelong learning to career preparation prevalent in universities today. Academics and students are pushed to produce more in a shorter period of time. Over-reliance on "cognitive authorities" further privileges western epistemology and devalues the experience and knowledge of BIPOC librarians and students.

The authors recommend pedagogical dissent and instituting microchanges to slowly shift the instructional paradigm towards critical reflection. Examples include Sentipensante Pedagogy, which helps learners integrate rationality with experiential knowledge, and Relational Cultural Theory, which builds trust by revealing instructor vulnerabilities in the classroom. "Microchanges" include advocating use of unorthodox sources such as Wikipedia or including discussion of how scholarly publishing omits the voices of BIPOC individuals. By thus "slowing our roll," librarians can help build intellectual spaces that value alternate ways of knowing. **JP**

Park, D.E., & Bridges, L.M. (2022). Meet students where they are: Centering Wikipedia in the classroom. *Communications in Information Literacy, 16*(1), 4-23. https://doi.org/10.15760/comminfolit.2022.16.1.2

Many students have been told never to use Wikipedia as a source, but what about editing and contributing sources to Wikipedia as part of an honors college information literacy course? The authors explain in detail how and why they did just that by creating a two-credit course that includes the class editing Wikipedia articles through Wiki Education and their experiences after teaching it three times between 2019-2021. Using Wikipedia as a teaching tool allows for students to actively participate in information equity and at the same time build research skills that allow an understanding of the ACRL Framework for Information Literacy for Higher Education.

The authors explain the topics for each of the 10 weeks of the course in detail, including the short student survey at the beginning to ascertain how familiar students are with editing Wikipedia. Students were assessed on a reflective assignment, expansion of a Wikipedia article and a final presentation. The overall reaction to the class was positive. For the future, the researchers are making changes to the peer review portion of the class, and including race and racial bias as a main topic whereas it had been previously centered on gender bias.

Pickard, E., & Sterling, S. (2022). Information literacy instruction in asynchronous online courses: Which approaches work best? *College & Research Libraries*, 83(2), 184-220. https://doi.org/10.5860/crl.83.2.184

This article discusses five methods of delivering information literacy instruction (ILI) to two asynchronous, online-only courses. ILI methods were assessed by evaluating student bibliographies, as well as the appropriateness of sources across five course sections. The ILI scenarios include: 1. No intervention; 2. Curriculum scaffolding; 3. Intensive ILI involvement through a course embedded librarian; 4. Synchronous, one-shot session led by librarian; 4. ILI delivered via digital learning objects. The researchers sought to determine the most effective ILI to increase students' abilities to find relevant sources, understand research resources, as well as better understand the research process overall.

Students in the no intervention and curriculum-scaffolded treatments (lower-touch approaches) met the minimum requirements for bibliography length (3 sources). Despite the assignment for the embedded librarian treatment not differing from the curriculum-scaffolded assignment, more than 60% of students provided four or more sources. Students in the synchronous one-shot session and the digital learning object group also exceeded the minimum number of sources.

Dedicated ILI approaches (embedded librarian, synchronous one-shot, and digital learning objects) helped students to select more appropriate sources, compared with the lower-touch approaches. Students from the embedded librarian treatment selected more 'advanced' articles compared with any other treatment. Students who received dedicated ILI also used more specialized databases, compared with the lower-touch approaches. Additionally, the researchers suggest including ILI as part of a graded assignment has a positive impact on students' learning by encouraging accountability. The implications of this research suggest how librarians might work more effectively with faculty to incorporate effective ILI into both synchronous and asynchronous classes with the goal of improving student engagement and output. **RM**

Rybin Koob, A., Ibacache Oliva, K. S., Williamson, M., Lamont-Manfre, M., Hugen, A., & Dickerson, A. (2022). Tech tools in pandemic-transformed information literacy instruction. *Information Technology and Libraries*, 41 (4), 1-32. https://doi.org/10.6017/ital.v41i4.15383

Information Literacy Instruction often relies on digital tools to increase engagement. Instructors report choosing tools based on availability. This article summarizes the accessibility of five commonly used digital tools, Kahoot!, Mentimeter, Padlet, Jamboard, and Poll Everywhere, allowing instructors to factor accessibility when selecting digital tools. Study authors recruited users of screen reading assistive technology to test the tools by following the authors' scripts. Afterward, testers provided thorough reports on their experience. The reports indicated that Mentimeter was the most digitally accessible of the tools. Kahoot! and Poll everywhere worked in most cases as well. Jamboard and Padlet were inaccessible for many individuals using assistive technologies. All tools presented severe problems at least some of the time. Results suggest that instructors need to balance the ease of use for them with the digital accessibility for the students when selecting instruction tools. **CG**

Sye, D. (2022). Innovating digital literacy for history students during COVID-19 and beyond. *Journal of New Librarianship*, 7(1), 10–16. https://doi.org/10.33011/newlibs/11/2

The author of this article provides a case study on how he taught history students to access digital archives and collections during the pandemic. This instruction required a different approach than what had been previously done because traditionally the training for using archival materials centers around using physical collections. As the author notes, the competencies needed to access digital primary sources and physical primary sources are not exactly the same, though archivists and librarians need to begin teaching them more in context with each other. The strength of this article lies in the fact that the author does not just outline the tools or skills that are necessary for accessing these materials but rather shows the intellectual approach students need to take and the kinds of questions they need to ask. He builds on the work of Helle Strandgaard Jensen in a recent article in the journal *Media History* and discusses four components of digital archival literacy: availability of sources, bias in representation, aspects of the search system, and responsible usership. For each of these components, he goes beyond the basics of the concept. For example, when students are considering whether something is available, digital archival literacy asks students to consider more than just whether an item has been digitized but rather to examine the labor necessary and the layers of privilege that can impact what is and is not digitized. Though this article was clearly written while the author was still navigating the impact of

library and archive closures during the pandemic, the author wisely acknowledged that the concepts being covered in these instruction sessions would still be applicable to students even after libraries and archives began to open up more again as digital collections are only growing in importance for scholars. **AHG**

Tardiff, A. B. (2022). Have a CCOW: A CRAAP alternative for the internet age. *Journal of Information Literacy*, 16 (1), 119-130. https://doi.org/10.11645/16.1.3092

Recent critiques of the CRAAP test suggest that the mnemonic is not equal to the internet age. Opponents often suggest that the checklist approach itself is invalid, recommending students use heuristics instead. The trouble is the CRAAP acronym continues to be a convenient way to present first principles in a compressed frame, and so it continues to be used, despite known limitations.

The author of this article suggests a middle approach, devising a new acronym, CCOW (credentials, claims, objectives, and worldview), and presenting it in a flipped classroom research guide. The terms chosen and the mechanism presenting them respond to many of CRAAP's critics. To that end, the research guide is more than a passive delivery platform, but a way to contextualize the terms and to ask students to explore them in advance of class discussion. Tardiff's method relies less on the mnemonic itself than on the holistic presentation method requiring active student involvement. He has made the research guide and exercises available under a Creative Commons license if librarians would like to reuse his material. Ultimately, however, the author is merely presenting one way to add more subtlety to threshold information literacy concepts in the one-shot class environment. **CG**

Ward, L. (2022). A librarian's experience teaching critical information literacy. *Legal Reference Services Quarterly*, 41(2), 52–66. https://doi.org/10.1080/0270319X.2022.2089808

This article includes an extensive literature review on critical information literacy and a discussion of the American Association of College and Research Libraries' (ACRL) Framework for Information Literacy in Higher Education, which is a large portion of this article which does a good job of explaining critical information literacy and how the ACRL Framework can be used to help students think more critically about information.

Focusing on the frame "Authority Is Constructed and Contextual" frame, the author taught a session in a legal research class of second- and third-year students in law school. Instead of passively learning the content, the author purposely created the class sessions to include interactive activities, starting with engaging dialog which forced the students to think more critically about the information and how it was created, by whom, and for what purpose. The author explains how this is especially important for law students who must be able to think critically about information in order to better serve their clients. **HH**



Tech Talk

By Billie Peterson-Lugo, Baylor University billie_peterson@baylor.edu

Dear Tech Talk-- ChatGPT. . . everyone is talking about trying ChatGPT. As a librarian, I'm trying to discern what my role is with ChatGPT; however, I am totally overwhelmed with information. Can you help? Challenged by ChatGPT

Dear ChCh-- If you work in some realm of education, it would be impossible to escape the deluge of information – hype, doomsday predictions, overzealousness, cautious optimism, disruption – that has resulted from the release of ChatGPT by OpenAI on November 30, 2022. Early evidence of this interest is demonstrated in an EDUCAUSE QuickPoll administered on February 6 and 7, 2023 where only 3% of 1,070 higher education administrative or teaching personnel "indicated that they were not at all familiar with generative AI". (Robert, 2023)

Even with daily diligence, it's impossible to keep up. With that in mind – I originally completed this column in late February and have now updated it with information from the end of May. Even so, with the landscape shifting so quickly, some of what's written below may be outdated by the time this column is read. Also, to quote Lorcan Dempsey (2023), "The click-bait is strong, and it can be difficult to separate the spectacular but short-lived demonstration from the real trend." This column attempts to focus on the *real trend*.

First, let's begin by saying that most of us have been using artificial intelligence in our daily lives for a while – spelling and grammar flags in MS Word or Google documents; autocomplete of sentences in e-mail messages or *click-and-send* responses to e-mail messages; spam automatically sent to junk mail; daily messages from Microsoft Viva related to tasks identified in e-mail messages; Google Translate; Alexa and Siri; and more.

However, ChatGPT (**G**enerative **P**re-trained **T**ransformer) is a manifestation of artificial intelligence (AI) with technology that enables it to perform in ways that distinguish it from these types of artificial intelligence:

- It's as easy (or, perhaps easier) to use as Google or any other internet search engine Enter a statement or query using run-of-the-mill (natural) language and receive an informative, human-like, well-formulated response that meets the parameters of the prompt.
- It *remembers* Interact with responses from ChatGPT in the same way you would interact with a human without providing context from the previous interactions.
- And it's very, very fast especially when considering the amount of data behind the technology.

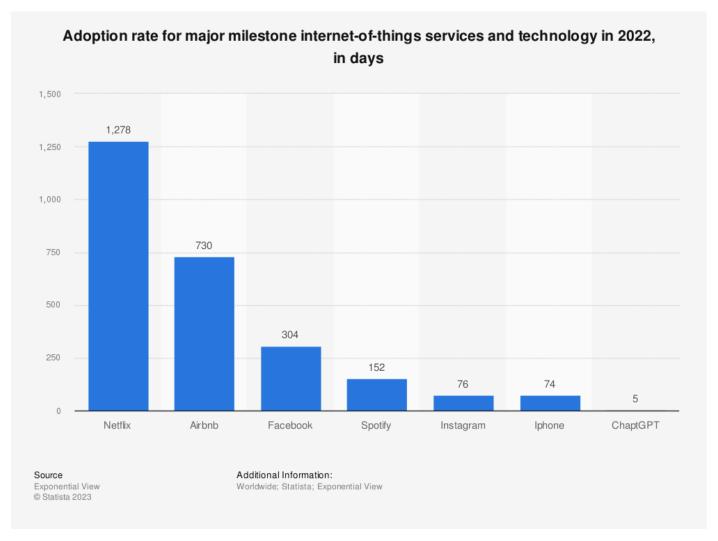
ChatGPT is not the only generative AI system available, but it's rapidly become the most well-known. Below is a list of others, some not fully available and some defunct. More broadly, Abbene (2023) provides an on-going list of AI tools and resources – some are generative, and some are not.

- Al-based image generators
 - ° DALL-E (https://openai.com/dall-e-2/) Released by OpenAI in early 2022.
 - ° Midjourney (https://midjourney.com/home/)
 - Stable Diffusion (https://stablediffusionweb.com/)
- Al Dungeon (https://play.aidungeon.io/) -- A free-to-play single-player and multiplayer text adventure game that uses artificial intelligence to generate content.
- Bard (https://bard.google.com/) Google's generative AI implementation. (Pichai, 2023)
- Bing AI (https://www.bing.com/new) Microsoft's generative AI implementation (which presumably incorporates ChatGPT 4 technology).
- Character AI (https://beta.character.ai/) Have conversations with fictional characters or characters based on well-known people (living or dead).
- CodeWhisperer (https://aws.amazon.com/codewhisperer/) Amazon's version of GitHub Copilot; generates code based on prior code and comments in the integrated development environment (IDE).
- Copysmith (https://copysmith.ai) Generates marketing copy, product descriptions, social media posts, etc.
- Elicit (https://elicit.org/) Helps to automate research workflows, like parts of a literature review, brainstorming,

summarization, and text classification.

- ExplainPaper (https://www.explainpaper.com/) "Upload a paper, highlight confusing text, get an explanation."
- Fermat (https://fermat.ws/) Collaborate with artificial intelligence to brainstorm, create storyboards, screenplays, concept art, and other creative activities.
- Galactica (https://futurism.com/the-byte/facebook-takes-down-galactica-ai) Facebook's attempt at AI, released on November 15, 2022, which was taken down almost immediately.
- GitHub Copilot (https://github.com/features/copilot) Turns natural language prompts into programming code across dozens of programming languages.
- Google LaMDA (https://blog.google/technology/ai/lamda/) The technology underpinning Google's Bard.
- Grammarly (https://www.grammarly.com/) Helps to improve writing.
- Hugging Face (https://huggingface.co/) Develops tools for building applications that use machine learning, most noted for its Transformers library. (https://en.wikipedia.org/wiki/Hugging-Face)
- Jasper (https://www.jasper.ai/) Another AI system for marketing copy.
- Librari (https://librari.com/) Created by librarians (as reported by the website), this resource "answers factual questions, helps with schoolwork, provides reader advisory services, and performs creative tasks."
- Tay (https://en.wikipedia.org/wiki/Tay (bot)) Microsoft's first (and failed) attempt with an AI chatbot in 2016.
- You.Com (https://you.com) Al-enabled search engine.
- Whisper (https://openai.com/research/whisper) Also from OpenAI, it transcribes spoken word into text.

The usage of ChatGPT has been phenomenal. The chart below demonstrates how quickly ChatGPT reached one million users (5 days) as compared to other internet-of-things services and technologies.



https://www.statista.com/statistics/1360613/adoption-rate-of-major-iot-tech/

Additionally, "ChatGPT currently has 100 million users, [and] it achieved this feat within two months. [It] surpassed one billion monthly page visits in February 2023." (Ruby, 2023) From a different perspective, an April 2023 EDUCAUSE QuickPoll demonstrated 67% of those surveyed felt *optimistic* or *very optimistic* regarding generative AI in higher education as opposed to 54% in February. (McCormack, 2023)

Before going any further, it might be helpful to become familiar with some AI vocabulary, since these words and phrases are often used when learning about ChatGPT:

- *Alignment* Training techniques that "steer AI systems towards humans' intended goals, preferences, or ethical principles." (https://en.wikipedia.org/wiki/AI alignment)
- Generative AI "A broad label that's used to describe any type of artificial intelligence (AI) that can be used to create new text, images, video, audio, code or synthetic data." (https://www.techopedia.com/definition/34633/generative-ai)
- Generative Pre-trained Transformer 3 or GPT-3 "An artificial intelligence technology and a random language model that uses deep structure learning to generate and write texts like human minds." (Gupta, 2022)
- Guardrails "Programmable rules or constraints that guide the behavior of an LLM-based application to reduce undesired outcomes." (Dempsey, 2023)
- Hallucinations A response by ChatGPT (or any generative AI system) that sounds highly plausible, but in fact is
 partially or entirely bogus. More recently, the word confabulation has been suggested because it removes the
 anthropomorphism implied by using the word hallucination and identifies a "creative gap-filling principle at
 work." (Edwards, 2023)
- Large Language Models (LLM) "Artificial intelligence tools that can read, summarize and translate texts and predict future words in a sentence letting them generate sentences similar to how humans talk and write." (https://fordschool.umich.edu/tags/large-language-models) LLMs are a type of neural network.
- Natural Language Processing (NLP) "The branch of artificial intelligence... concerned with giving computers the
 ability to understand text and spoken words in much the same way human beings can." (https://www.ibm.com/topics/natural-language-processing)
- Neural Networks "A mathematical system, modeled on the brain, that learns skills by finding statistical patterns in data." (Pasick, 2023)
- Parameters "The [numerical] values in a network that get adjusted during training" that help it guess what words come next. (Heaven, 2023a and Pasick, 2023)
- Reinforcement Learning A technique that incorporates feedback into a large language model to enable it to learn more effectively and provide better responses.
- Synthetic Media ("also known as Al-generated media, generative media, and personalized media") "Any media created or modified by algorithmic means, especially through the use of artificial intelligence algorithms." (https://www.w3.org/community/synthetic-media/wiki/Main Page)
- Transformers A kind of neural network that can track where each word or phrase appears in a sequence, which enables contextual understanding. (Heaven, 2023a) It can look at an entire sentence at once. (Pasick, 2023)
- Turing Test Can one discern if text was generated by a human or a machine?

Using the definitions above, and without going too deeply into the weeds, ChatGPT is *generative AI* built on a *Large Language Model*, consisting of a ginormous corpus of data (text) primarily obtained from the internet up through September 2021. See Walker (2023) for some details on the dataset used. It contains more than 175 billion *parameters* (IBL News, 2023) and uses both *reinforcement learning* and human reinforcement training to help it provide more effective responses that heed *alignment* and stay within *guardrails*. More succinctly, it is programmed to predict the next sequence of words in a sentence, using the corpus of data in the Large Language Model. For an example of how a tool like ChatGPT is developed, read Roose's (2023c) article or Bhatia's (2023) article that includes interactive models. Additionally, Webb's (2023) *Generative AI Primer* is a useful introductory tool.

OpenAl introduced GPT-3 in 2020; ChatGPT is built on a more advanced GPT-3.5 platform. (ChatGPT, 2023) Although it looks like ChatGPT just suddenly sprang into existence, this is not the case. Heaven (2023a) provided a succinct timeline for the development that led to the ChatGPT released in November 2022.

It's also important to know about the company behind the development of ChatGPT -- OpenAI. "OpenAI, led by technology investor Sam Altman, was founded as a nonprofit in 2015 with the goal of pursuing artificial- intelligence research for the benefit of humanity. Its initial backers included Tesla Inc. Chief Executive Elon Musk, LinkedIn cofounder Reid Hoffman and Mr. Altman." (Berber & Kruppa, 2023)

As the saying goes – follow the money. "In 2019 OpenAl transitioned into a capped for-profit company [emphasis

mine] (with investors limited to a maximum return of 100 times their investment) and **took a US \$1 billion investment from Microsoft** [emphasis mine] so it could scale and compete with the tech giants." (Walsh, 2022) Most recently, OpenAi appears to be poised to receive **an additional \$10 billion investment from Microsoft** [emphasis mine]. (Anonymous, 2023c; Ghoshal, 2023; and Perrigo, 2023). To this end, Gralla (2023) stated "ChatGPT is powered by **Microsoft's Azure cloud** [emphasis mine] technology and was trained using **Azure's Al supercomputing infrastructure** [emphasis mine].

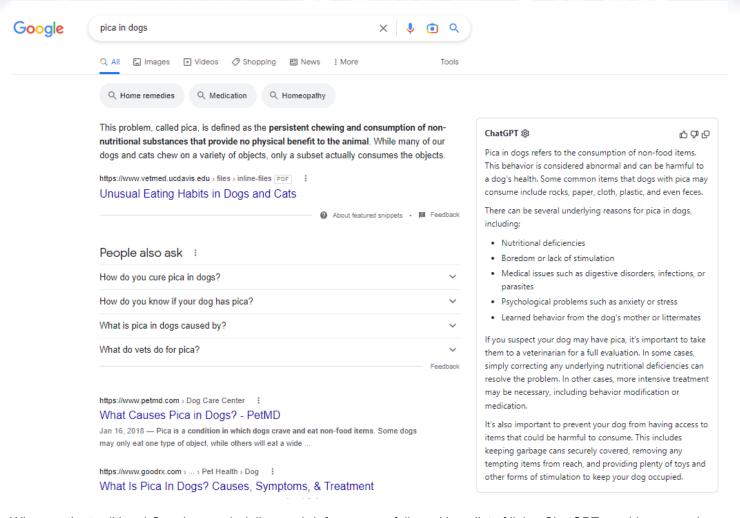
Microsoft is heavily invested in OpenAI, with an endgame of integrating this technology with Microsoft products – in particular, Bing and the Microsoft Edge browser – as well as marketing a cloud-based service to companies that want to use robust AI technology (Azure OpenAI Service) without investing in the significant infrastructure. (Gralla, 2023) In fact, Microsoft has already announced the availability of a new AI-powered Bing, initially making it available to a limited audience for testing and now making it available to anyone using Edge with a Microsoft account – with the goal that it will transform Bing into a robust competitor for Google. (Mehdi, 2023a & 2023b and Roose, 2023e) For those not interested in establishing a Microsoft account, experiment with the demonstrations of the Bing AI by selecting one of the preprepared prompts provided at: https://bing.com/new. OpenAI indicated that "Bing is powered by one of our next-generation models that Microsoft customized specifically for search. . . [incorporating] advancements from ChatGPT and GPT-3.5." (Heaven, 2023b)

One additional comment, Griffith and Metz (2023) suggested that "Google, Meta and other tech giants have been reluctant to release generative technologies to the wider public because these systems often produce toxic content, including misinformation, hate speech and images that are biased against women and people of color. But newer, smaller companies like OpenAI – less concerned with protecting an established brand – have been more willing to get the technology out publicly."

At this time, ChatGPT is publicly available, at no charge; however, to use ChatGPT, users must create an account. In part OpenAl uses the openly available ChatGPT to see how people will interact with it, to enlarge the population of people *training* it, to surface unknown issues. However, there is no question that OpenAl (as well as Microsoft) intends to profit from the ChatGPT technology. On February 1, 2023, OpenAl announced ChatGPT Plus (aka ChatGPT 4), a ChatGPT subscription service that provides subscribers with general access to ChatGPT, even during peak periods; faster response times; and priority access to new features and improvements – for \$20/month. (https://openai.com/blog/chatgpt-plus/)

Now a bit about using ChatGPT. To be clear -- when someone enters a prompt into ChatGPT, it does not perform a live search across the internet like traditional search engines. Instead, it works through a massive set of somewhat structured text data, looking for similarities in word patterns, connections, and context. It transforms the corresponding data into a response that reads as if it was written by a human (thereby *potentially* passing the *Turing Test*). What kinds of responses can it provide? Multi-paragraph essays, poems, short stories, plays, computer code, lesson plans, course outlines, feedback on written text, text written in the voice of well-known writers, and more. ChatGPT is quite often spot on with its responses. However, it can also produce *hallucinations*. Like a human hallucination (which seems totally real), the information provided by ChatGPT appears to be completely plausible, but those with knowledge of the topic or who investigate more deeply can expose the hallucination for what it is – distorted information or completely inaccurate. Chiang (2023) provided an understandable metaphor for why these generative AI tools provide hallucinations.

One way to use ChatGPT is to install the ChatGPT Chrome extension (https://tinyurl.com/cz25289a). With the extension (if logged in to your ChatGPT account), you see the both the traditional search results (Google, Bing, DuckDuckGo, and others), with the ChatGPT result displayed on the right side. See the screenshot on next page.



Whereas the traditional Google search delivers a brief summary, followed by a list of links, ChatGPT provides several paragraphs of useful information that one otherwise would have obtained by clicking on the various links provided by Google. The responses from ChatGPT are simultaneously amazing and scarry.

In one instance, I had an extended interaction with ChatGPT, first asking it to write an outline for the basics of copyright workshop for librarians. The outline was decent, but too brief, so I asked it to provide a more detailed outline, which it did. I then asked it for a list of resources for this workshop and it provided a list of 9 suggestions. I followed up by asking for some actual examples for each suggestion, which it provided. Last I asked for URLs for the examples. That series of interactions felt **amazing**.

In another example, I asked ChatGPT to *draft a story about Dozer, a 15-year-old pug, with one eye that passed away on New Year's Day 2023, the only survivor of a litter of 9 puppies*. ChatGPT responded with 4 brief paragraphs that were remarkably appropriate and made it feel almost sentient. That was **scary**!

However, it appears that the scariest scenario resulting from the emergence of ChatGPT is its perceived impact on teaching and learning – especially writing. What does it mean when high school or college students can provide ChatGPT with an essay prompt and receive a decent essay on the topic in return? Will ChatGPT enable rampant plagiarism (if plagiarism is the correct word); will it erode people's ability to write? Maybe, maybe not.

John Warner, author of *Why They Can't Write: Killing the Five-Paragraph Essay and Other Necessities*, has argued for years that writing pedagogy is not where it should be. Warner (2022) believes instructors made a "wrong turn. . . more than a couple of decades ago when it comes to what we ask students to do when they write in school contexts, and the kind of standardized assessments that have come to dominate." Warner (2022) also stated, "I think we should collectively see this technology [generative AI] as an opportunity to re-examine our practices and make sure how and what we teach is in line with our purported pedagogical values."

He is not alone in his belief that ChatGPT should be viewed more as an *opportunity* than a *threat*. Many educators already suggest techniques for pedagogical changes in light of ChatGPT – changes that not only have the potential to improve writing and other types of pedagogy but also changes that incorporate ChatGPT into the teaching, learning, and critical thinking process. Some examples include Alexander, 2022a and 2022b; Anders, 2023a; Belkin, 2023; Bell, et. al.,

2023; Fyfe, 2022; Gurung, 2023; Heaven, 2023b; Mintz, 2023; Qamac, 2023; Terwiesch, 2023; Trust, 2023; Watkins, 2022, and Yorio, 2023. Additionally, the resources below provide ideas for incorporating ChatGPT and generative AI into teaching and learning:

- Al and Teacher Success Resources | Turnitin (https://www.turnitin.com/resources/academic-integrity-in-the-age-of-Al)
- Al Text Generators: Sources to Stimulate Discussion among Teachers (https://docs.google.com/document/d/1V1drRG1XIWTBrEwgGqd-cCySUB12JrcoamB5i16-Ezw/mobilebasic?urp=gmail_link) This is a lengthy resource, specific sections of interest might be: Course Materials on Al Text Generators, Using Text Generators for Pedagogical Purposes, Using Text Generators for Help Preparing Courses and Assessing Students; and Al and Creative Writing.
- Code Completion (https://platform.openai.com/docs/guides/code/introduction) From Open AI, "Learn how to generate or manipulate code".
- Guide for Approaching Al-generated Text in Your Classroom |Turnitin (https://marketing-tii-statamic-assets-us-west-2.s3-us-west-2.amazonaws.com/marketing/tli ai respondinginyourclassroom guide us 0123.pdf)
- Make Any Assignment ChatGPT Resistant & Many Other ChatGPT Resources (https://sovorelpublishing.com/index.php/2023/01/28/make-any-assignment-chatgpt-resistant-and-other-resources/)
- Resources for Restructuring and Revising Course Design, Assignments, Lesson Plans and Syllabi (https://libraryhelp.sfcc.edu/Chat-GPT/revised-assignments)
- Suggestions for Dealing with Artificial Intelligence (AI)-Produced Assignments (https://honorcode.web.baylor.edu/ academic-integrity-office/faculty-resources/suggestions-dealing-artificial-intelligence-ai-produced)
- Text Completion (https://platform.openai.com/docs/guides/completion/introduction) From OpenAI, "Learn how to generate or manipulate text.

Of course, there are also the alternative perspectives – ban ChatGPT, as was done (most noticeably) in New York City. (Klein, 2023). However, the problem with banning ChatGPT is that students **will** find a way to use ChatGPT outside the school network – if so desired. Another solution is to use some type of detection software GPTZero (https://gptzero.me/) or the tool Turnitin has developed (Chechitelli, 2023). OpenAl has a GPT-2 Output Detector Demo (https://penai-openai-openai-detector.hf.space/) and is also working on a watermark for ChatGPT-generated content. (https://tinyurl.com/3zwcckjs) However many believe the technology is changing – and improving – so quickly that using detection software would result in a never-ending game of whack-a-mole. Still others have suggested returning to in-class, handwritten works – remember blue books? – or having students use locked-down computers and/or technologically monitored computers. Most of these solutions result in an adversarial relationship between the student and the instructor, which fails to enable a positive learning environment.

More importantly, discouraging or trying to prevent students from using ChatGPT does them a disservice. As mentioned at the beginning of this column, artificial intelligence is already a part of our home and professional lives. Its pervasiveness will only increase. Computer programmers use GitHub Copilot (another Microsoft OpenAi partnership) to accelerate the process of writing computer code. Marketing companies use generative AI systems to help them develop marketing language. These interactions result in collaborative work between generative AI systems and humans. Students, instructors, and others need to develop skills so they can use generative AI systems effectively – in both their home and professional lives.

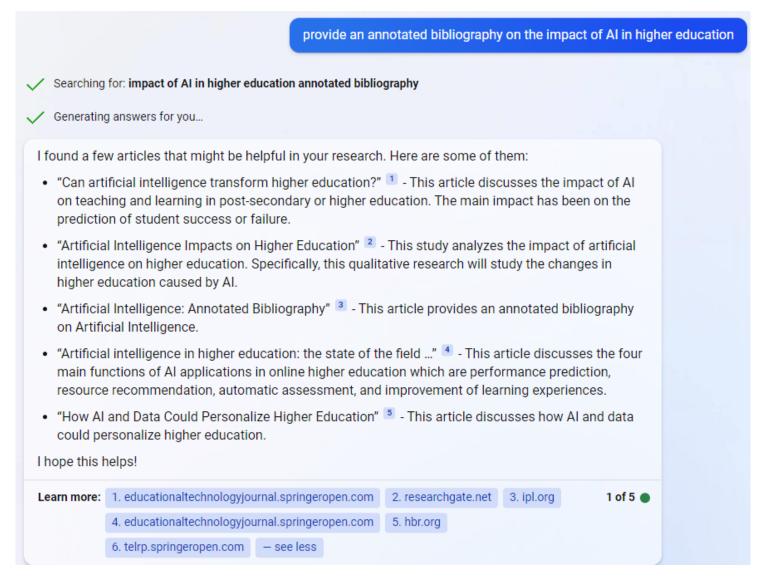
With the right prompt, ChatGPT generates text that can be tweaked, modified, revised to best meet the needs of the individual asking the question. It may take several interactions before ChatGPT generates a response that effectively meets the need. Which brings up a key point about systems like ChatGPT, "you need to develop skills for these tools so you can word a command or query that quickly delivers the result you want." (Enderle, 2023) Natural language searching differs significantly from current search techniques. This process (*prompt engineering*) is reminiscent of the traditional reference interview – librarians don't accept a question at face value but gently probe to ensure that both they and the researcher understand the actual need. Lo (2023) emphasized the importance of librarians developing a skillset for prompt engineering and described the CLEAR framework for incorporating prompt engineering into information literacy instruction. Gregersen & Bianzino (2023) suggested that generative AI has the potential to enable asking smarter questions. And this still-a-work-in-progress *Prompt Engineering Guide* (Anonymous, 2023f) may also be of value.

Similarly, search strategies for AI generative systems differ from those used with traditional internet search engines or library systems. Because these systems are trained on LLMs, the information provided to ChatGPT is a natural language prompt, as opposed to keywords or phrases tied together with quotes or Boolean logic. ChatGPT and comparable systems require an entirely different approach. This becomes a new instruction opportunity for librarians – to teach students and instructors how to use this innovative technology effectively. As an example, the Santa Fe Community College library has provided some ChatGPT search tips. (https://libraryhelp.sfcc.edu/Chat-GPT/notes).

To get a sense of interactions between humans and ChatGPT, read some of these articles in which the authors used

ChatGPT to generate some/all of the content, along with (in some cases) their analyses of that activity: Carpenter, 2023; Davis, 2023; Fernandez 2023; Grobe, 2023 (ChatGPT writes the final paragraph); Kendrick, 2023; Kesselman, 2023); King, 2023; Lund & Wang, 2023; Miller, et. al., 2023 (play a game – written by a human or ChatGPT?); O'Connor, 2023 (ChatGPT writes the first 5 paragraphs); Pavlik 2023; Perrigo, 2022; Roose, 2023d; Stern, 2022; Terwiesch, 2023; and Woods, 2022. Also, note that publishers have expressed reservations about the use of generative Al in manuscripts. (Kingsley, 2023a)

Addressing *hallucinations* (or confabulations) presents another teachable moment – librarians (and instructors) emphasize evaluating the quality of and sources for information – whether found on the internet or in perceived *reputable* published resources. They also discuss inherent biases that could be associated with sources of the information. Hallucinations provide an added dimension – in the openly available ChatGPT, the resulting paragraphs are well-crafted, but there are no sources for the information provided, no reliable references (at least not at this time), no author(s) to investigate. In some instances, one needs to be fairly knowledgeable in the field to discern a hallucination. As can be seen from the screenshot below, the Bing Al does provide sources for its responses; nevertheless, at least for the near term, verifying the accuracy of the responses and learning to identify hallucinations will be an important skill. Also note the sources of this information – in particular SpringerOpen and ResearchGate. These represent scholarly resources *openly* available on the internet, not those behind paywalls.



Hallucinations related to citations can be particularly problematic as Kendrick (2023) illustrated. He asked ChatGPT to provide a list of scholarly references on the topic of *racism and whiteness in academic libraries* (listed in Appendix II of Kendrick's article). At face value, these 29 citations looked completely viable – articles written by people known to write on this topic, published in scholarly library journals. However, "of the 29 citations checked, only one was accurate, one was correct but had the title transposed, and one was to a real article, but the source journal provided by ChatGPT was incorrect." (Kendrick 2023) The rest of these citations were hallucinations that ChatGPT created, using its understanding of the data and the connections seen in the data. Added to this is anecdotal evidence that interlibrary loan personnel

now report a significant increase in requests received for plausible but bogus citations.

Another crucial point about the data underlying ChatGPT – it doesn't include metadata or full text data from behind publisher paywalls. Consequently, ChatGPT has limited access to information published in scholarly resources. Kingsley (2023b) posed the question on Twitter – do these LLMs have access to publishers' content, which stimulated quite a discussion. Currently, it seems most likely that the scholarly content in the LLMs comes from open access publishing, institutional repositories, perhaps sources like ResearchGate – as is demonstrated in the Bing AI search above.

However, Pride (2023) announced the development of CORE-GPT which is building a LLM using 34 million open access scientific articles; NVIDIA announced that the Swedish National Library is "training state-of-the-art AI models on a half-millennium of Swedish text to support humanities research" (Salian, 2023); Lexis has announced Lexis+ AI (Anonymous, 2023b); and at the recent ELUNA 2023 conference, Ex Libris (Part of Clarivate) indicated they are experimenting with generative AI technology, using *trusted sources*, to incorporate it in their products. Dempsey (2023) stated, "It will be interesting to see what large publishers do, particularly what I call the scholarly communication service providers. . . (Elsevier, Holtzbrinck/Digital Science, Clarivate). These have a combination of deep content, workflow systems, and analytics services across the research workflow. They have already built out research graphs of researchers, institutions, and research outputs." These burgeoning initiatives represent an area that bears close monitoring.

Part of learning how to work with these systems effectively is acknowledging their limitations. Some limitations for ChatGPT are listed below, with the first 5 coming from OpenAI (Anonymous, 2022), and the rest from other sources:

- "Sometimes writes plausible-sounding but incorrect or nonsensical answers" Hallucinations.
- "Sensitive to tweaks to the input phrasing or attempting the same prompt multiple times" prompt engineering.
- "Often excessively verbose and overuses certain phrases, such as restating that it's a language model trained by OpenAI."
- Usually guesses what the user intended (uses statistical models) instead of asking clarifying questions.
- Despite the Moderation API, it will sometimes respond to harmful instructions or exhibit biased behavior.
- ChatGPT's 3.5 training data cuts off in 2021, which means that it is completely unaware of current events, trends, or anything that happened after its training.
 (https://help.openai.com/en/articles/6827058-why-doesn-t-chatgpt-know-about-x)
- Doesn't provide references or sources (Alexander, 2022a) or provides fake references. However, the Bing Al search, which presumably incorporates ChatGPT 4 technology, does provide viable linked references with its responses.
- Negative impact on employment and/or job requirements. (Dempsey, 2023)
- Shouldn't be used by children 12 and under because of potential violation of the Children's Online Privacy Protecting Act (COPPA) (Trust, 2023)
- Intellectual property issues on the horizon (Dempsey, 2023; Elgan, 2022; and Gralla, 2023), with the US Copyright
 Office announcing a Copyright and Artificial Intelligence site (https://www.copyright.gov/ai/) and a webinar on the
 Application Process for Registration of Works with Artificial Intelligence-Generated Content
 (https://www.copyright.gov/newsnet/2023/1007.html)
- Instructors need institution policies or guidelines related to generative AI technologies (Keegan, 2023)

In addition to these limitations Trust (2023) identified privacy concerns:

- May retain sensitive information input during training or usage.
- · May share data without user's consent.
- Issues with personalizing and profiling users if someone uses the data in unintended ways.
- May perpetuate biases or inaccuracies (misinformation).
- Lack of transparency in how data is collected, stored, trained, and used.

Anders (2023a), Caines (2022), Downing (2023). and Forrestal (2023) also addressed privacy issues, and Anders (2023a) identified thorny issues related to academic integrity and student ethics policies. (pp. 57-58) Perrigo (2023) and Dempsey (2023) addressed unethical labor practices associated with the use of people in developing countries for human reinforcement training of the LLM, and Dempsey (2023) asked important questions about the alignment process, discussed bias issues, and raised environmental concerns.

Most recently, leaders in AI development have recommended a slow down or even a pause in this development, providing time for the development of regulations and legislation that might provide more oversight for rapid AI development. These activities include congressional testimony by Sam Altman (OpenAI CEO) and others (Fung, 2023); an open letter to the community with well-known AI signatories (Anonymous, 2023d); a cautionary statement from the Center for AI Safety also with well-known AI signatories (Anonymous, 2023g); alerts put forward by Geoffry Hinton, the *godfather* of AI (Metz, 2023b); a roadmap for policy making (Anonymous, 2023e); and a rapid response report from the Australian Council of Learned Academies. (Bell et al., 2023) All address similar concerns: potential for increased generation of misinformation, especially as we approach the 2024 election year; unknown or possibly negative impact on

the job market; hidden biases perpetuated in LLMs; and the potential for long-term threat to humanity. Hinton stated, "Look at how it [Al technology] was five years ago and how it is now. . . Take the difference and propagate it forwards." As well as, "unlike with nuclear weapons. . . there is no way of knowing whether companies or countries are working on the technology in secret. The best hope is for the world's leading scientists to collaborate on ways of controlling the technology." (Metz, 2023b) To this end, Heikkila (2023) provided six approaches to address this issue from an international perspective. On the other hand, O'Reilly (2023) argued that "you can't regulate what you don't understand."

To sum up, throughout much of the literature available about ChatGPT, persistent themes consistently emerge:

- Generative Al systems already exist, are used in the real world, and will only become more pervasive and sophisticated.
- Don't ban ChatGPT (or other generative AI systems); play with them to learn both their capabilities and their limitations.
- Set student expectations for the use of ChatGPT in courses and/or institutions.
- Ultimately, students entering the work force will need to know how to interact effectively with generative AI.
- Experiment with ways generative AI can be leveraged for beneficial human-machine collaborations.
- Examine how generative AI can work with and/or enhance learning experiences.
- Good writing involves critical thinking and invokes learning; perhaps the pedagogy around writing needs to change

 as opposed to abandoning the essay.
- ChatGPT responses tend to use grammatically correct language but often fall short of providing prose that is critically insightful.
- Instructors are already thinking about how to incorporate ChatGPT in the work they do both for themselves (lesson plans, syllabi, tests, rubrics) and for student learning activities.
- Explore the potential to use ChatGPT to increase productivity, enabling instructors/library personnel to focus on activities that AI cannot do effectively, like increased personal interaction with students, researchers, etc.
- Generative AI has the potential to replace or substantially enhance traditional search engines like Google or Bing.
- How will the implementation of generative AI technology become financially viable in the same way the traditional search engines are financially viable? (Linthicum, 2023)
- Be mindful that generative Al is in an emergent state and as such, is changing quickly; also, be on the alert for negative side effects associated with it.

However, the dominant theme central to almost everything written about ChatGPT is that it is a *transformative* and *disruptive* technology, akin to the introduction of the iPhone. This could be hype but considering the amount of money Microsoft has invested and is investing in OpenAI – as well as competitors such as Alphabet and Meta – hype seems unlikely. Additionally, ChatGPT-4 has been released. "While. . . ChatGPT-3 has 175 billion parameters, ChatGPT-4 might have 1 trillion, or even more, according to some reports. Similarly, it will be capable of text answering, content generation, language translation, and text summarization, just like the current ChatGPT-3. The increase of parameters – a measure of the complexity of the neural machine to do useful things – should enable ChatGPT-4 to produce more accurate responses at a much faster rate." (IBL News, 2023) Additionally, multimodal generative AI systems (can work across modes, e.g., text, images, etc.) are in development. (Dempsey, 2023)

Kovanovic (2022) provided the following quote (supposedly attributed to Vladimir Lenin):

There are decades where nothing happens, and there are weeks where decades happen.

With the emergence of increasingly sophisticated generative AI systems, we are in a period of *weeks where decades happen*. As Dempsey (2023) stated, "Generative AI is being deployed and adopted at scale. It will be routine and surprising, productive and problematical, unobtrusive and spectacular, welcome and unwelcome." Consequently, librarians need to experience and explore ChatGPT, Bing AI, Bard, and other generative AI tools to see for themselves how they might incorporate these systems into their work; develop guides (https://tinyurl.com/mtu4xfj5) and workshops; and learn to weave it into their instruction sessions – both to benefit their constituents but also so that within their institutions they become recognized sources of reliable information about ChatGTP and other generative AI systems and can contribute to addressing the challenges presented by generative AI in academic environments.

The list of references is lengthy, but still not all inclusive, However, they do represent some of the more robust conversations and information about ChatGPT as of this date.

Additional Resources

- Abbene, L. (2023). Al powered tools & resources. Google Docs. https://docs.google.com/document/d/1jslq6OuFPM_vpCONZSaxWa4ALTQGM05LQgJsgY_lobQ/edit
- Alexander, B. (Director). (2022a). What might ChatGPT mean for higher education? Part 1. [Video/DVD] YouTube. https://www.youtube.com/watch?v=Bz7aW6vStBw
- Alexander, B. (Director). (2022b). What might ChatGPT mean for higher education? Part 2. [Video/DVD] YouTube. https://www.youtube.com/watch?v=gB6fM5TMp5c
- Anders, B. (2023a). ChatGPT AI in education: What it is and how to use it in the classroom. Independently Published.
- Anders, B. (2023b). Sovorel educational blog YouTube channel. YouTube. https://www.youtube.com/@sovorel-EDU
- Anonymous. (2022). ChatGPT: Optimizing language models for dialogue. OpenAl. https://openai.com/blog/chatgpt/
- Anonymous. (2023a). For education, ChatGPT holds promise and creates problems EdSurge guides. EdSurge. https://www.edsurge.com/research/guides/for-education-chatgpt-holds-promise-and-creates-problems
- Anonymous. (2023b). LexisNexis announces launch of lexis+ AI commercial preview, most comprehensive global legal generative AI platform. LexisNexis. https://tinyurl.com/bdf6pyjb
- Anonymous. (2023c). *OpenAI and Microsoft extend partnership*. OpenAI. https://openai.com/blog/openai-and-microsoft-extend-partnership/
- Anonymous. (2023d). *Pause giant AI experiments: An open letter.* Future of Life Institute. https://futureoflife.org/open-letter/pause-giant-ai-experiments/
- Anonymous. (2023e). *Policymaking in the pause*. Future of Life Institute. https://futureoflife.org/wp-content/uploads/2023/04/FLI_Policymaking_In_The_Pause.pdf
- Anonymous. (2023f). Prompt engineering guide. Prompting Guide AI. https://www.promptingguide.ai/
- Anonymous. (2023g). Statement on AI risk AI: Experts and public figures express their concern about AI risk. Center for AI Safety. https://www.safe.ai/statement-on-ai-risk
- Belkin, D. (2023). *Professors turn to ChatGPT to teach students a lesson*. Wall Street Journal. https://www.wsj.com/articles/professors-turn-to-chatgpt-to-teach-students-a-lesson-11674657460
- Bell, G., Burgess, J., Thomas, J., & Sadiq, S. (2023). Rapid response information report: Generative AI --- language models (LLMs) and multimodal foundation models (MFMs). Australian Council of Learned Academies. https://www.chiefscientist.gov.au/GenerativeAl
- Berber, J., & Kruppa, M. (2023). ChatGPT creator is talking to investors about selling shares at \$29 billion valuation. Wall Street Journal Online Edition. https://www.wsj.com/articles/chatgpt-creator-openai-is-in-talks-for-tender-offer-that-would-value-it-at-29-billion-11672949279
- Bhatia, A. (2023). Watch an A.I. learn to write by reading nothing but Jane Austin, Shakespeare, Moby-Dick, Harry Potter, Star Trek. New York Times. https://www.nytimes.com/interactive/2023/04/26/upshot/gpt-from-scratch.html
- Bogost, I. (2022). ChatGPT is dumber than you think. The Atlantic. https://www.theatlantic.com/technology/archive/2022/12/chatgpt-openai-artificial-intelligence-writing-ethics/672386/
- Bogost, I. (2023). *The first year of AI college ends in ruin.* The Atlantic. https://www.theatlantic.com/technology/archive/2023/05/chatbot-cheating-college-campuses/674073/
- Brooks, D. (2023). *In the age of A.I., major in being human*. New York Times. https://www.nytimes.com/2023/02/02/opinion/ai-human-education.html
- Bruder, A. (2023). What ChatGPT means for writing instruction. *Education Week, 42*(18), 15. https://www.edweek.org/technology/opinion-what-chatgpt-means-for-how-we-teach-writing/2023/01
- Caines, A. (2022). *ChatGPT and good intentions in higher ed.* Is a Liminal Space. https://autumm.edtech.fm/2022/12/29/chatgpt-and-good-intentions-in-higher-ed/
- Caines, A. (2023). *Prior to (or instead of) using ChatGPT with your students*. Is a Liminal Space. https://autumm.edtech.fm/2023/01/18/prior-to-or-instead-of-using-chatgpt-with-your-students/
- Chamorro-Premuzic, T. (2023). How ChatGPT is redefining human expertise: Or how to be smart when AI is smarter than you. Forbes. https://www.forbes.com/sites/tomaspremuzic/2023/01/12/how-chatgpt-is-redefining-human-expertise-or-how-to-be-smart-when-ai-is-smarter-than-you/

- Carpenter, T. A. (2023). Thoughts on Al's impact on scholarly communications? an interview with ChatGPT. The Scholarly Kitchen.
 - https://scholarlykitchen.sspnet.org/2023/01/11/chatgpt-thoughts-on-ais-impact-on-scholarly-communications/
- ChatGPT. (2023, Feb 13). In Wikipedia. https://en.wikipedia.org/wiki/ChatGPT
- Chechitelli, A. (2023). Al writing detection update from Turnitin's chief product officer. Turnitin. https://www.turnitin.com/blog/ai-writing-detection-update-from-turnitins-chief-product-officer
- Chiang, T. (2023). ChatGPT is a blurry JPEG of the web. New Yorker. https://www.newyorker.com/tech/annals-of-technology/chatgpt-is-a-blurry-jpeg-of-the-web
- D'Agostino, S. (2023). Academic experts offer advice on ChatGPT. Inside Higher Ed. https://www.insidehighered.com/news/2023/01/12/academic-experts-offer-advice-chatgpt#at_pco=cfd-1.0
- Davis, P. (2023). Did ChatGPT just lie to me? The Scholarly Kitchen. https://scholarlykitchen.sspnet.org/2023/01/13/did-chatgpt-just-lie-to-me/
- Dempsey, L. (2023). Generative AI and large language models: Background and contexts. LorcanDempsey.net. https:// www.lorcandempsey.net/intro-gen-ai/
- Downing, K. (2023). OpenAI's massive data grab. Law Offices of Kate Downing. https://katedowninglaw.com/2023/03/10/openais-massive-data-grab/
- Edwards, B. (2023). Why ChatGPT and Bing chat are so good at making things up. Ars Technica. https://arstechnica.com/information-technology/2023/04/why-ai-chatbots-are-the-ultimate-bs-machines-and-howpeople-hope-to-fix-them/
- Elgan, M. (2022). The one real problem with synthetic media. Computerworld (Online Only). https://www.computerworld.com/article/3684408/the-one-real-problem-with-synthetic-media.html
- Enderle, R. (2023). The productivity promise (and perils) of generative AI. Computerworld (Online Only). https://www.computerworld.com/article/3685371/the-productivity-promise-and-perils-with-generative-ai.html
- Farnwell, A. (2023). AI will replace academics unless our teaching challenges students again. Times Higher Education Supplement. https://www.timeshighereducation.com/opinion/ai-will-replace-academics-unless-our-teachingchallenges-students-again
- Fernandez, P. (2023). "Through the looking glass: Envisioning new library technologies" Al-text generators as explained by ChatGPT. Library Hi Tech News, 40(3), 11-14. https://doi.org/10.1108/LHTN-02-2023-0017
- Forrestal, V. (2023). "Do we need librarians now that we have ChatGPT?". Choice 360. https://www.choice360.org/libtech-insight/do-we-need-librarians-now-that-we-have-chatgpt/
- Fyfe, P. (2022). How to cheat on your final paper: Assigning AI for student writing. AI & Society, https://doi.org/10.1007/s00146-022-01397-z
- Fung, B. (2023). Mr. ChatGPT goes to Washington: OpenAl CEO Sam Altman testifies before congress on Al risks. CNN. https://www.cnn.com/2023/05/16/tech/sam-altman-openai-congress/index.html
- Ghoshal, A. (2023). Microsoft in talks to invest \$10 billion in OpenAl: Report. Computerworld (Online Only). https://www.computerworld.com/article/3685208/microsoft-in-talks-to-invest-10-billion-in-openai-report.html
- Gralla, P. (2023). This lawsuit against Microsoft could change the future of AI. Computerworld (Online Only). https://www.computerworld.com/article/3684734/this-lawsuit-against-microsoft-could-change-the-future-of-ai.html
- Grant, N., & Metz, C. (2022). New chatbot is a 'code red' for Google's search business. The New York Times. https://www.nytimes.com/2022/12/21/technology/ai-chatgpt-google-search.html
- Gregersen, H., & Bianzino, N. M. (2023). Al can help you ask better questions and solve bigger problems. Harvard Business Review. https://hbr.org/2023/05/ai-can-help-you-ask-better-questions-and-solve-bigger-problems
- Griffith, E., & Metz, C. (2023). Tech slump doesn't slow new boom in A.I. field. The New York Times, 172(59661), B1-B4. https://www.nytimes.com/2023/01/07/technology/generative-ai-chatgpt-investments.html
- Grobe, C. (2023). Why I'm not scared of ChatGPT: The limits of technology are where the real writing begins. Chronicle of Higher Education. https://www.chronicle.com/article/why-im-not-scared-of-chatgpt
- Gruman, G. (2022). GPT: High-tech parlor trick or the first real AI for everyday use? Computerworld (Online Only). https://www.computerworld.com/article/3683209/gpt-high-tech-parlor-trick-or-first-real-ai-for-everyday-use.html
- Gupta, V. (2022). 5 best GPT3 text generator: Tools for online text generation. Neuebits. https://neuebits.com/gpt3-text-generator/

- Gurung, R. A. R. (2023). *The smart friend issue: A philosophy for coping with ChatGPT fears*. The Teaching Professor. https://www.teachingprofessor.com/topics/student-learning/the-smart-friend-issue-a-philosophy-for-coping-with-chatgpt-fears/
- Heaven, W. D. (2023a). ChatGPT is everywhere. Here's where it came from. MIT Technology Review. https://www.technologyreview.com/2023/02/08/1068068/chatgpt-is-everywhere-heres-where-it-came-from/
- Heaven, W. D. (2023b). ChatGPT is going to change education, not destroy it. MIT Technology Review. https://www.technologyreview.com/2023/04/06/1071059/chatgpt-change-not-destroy-education-openai/
- Heikkila, M. (2023). *Our quick guide to the 6 ways we can regulate AI*. MIT Technology Review. https://www.technologyreview.com/2023/05/22/1073482/our-quick-guide-to-the-6-ways-we-can-regulate-ai/
- Herman, D. (2022). *The end of high-school English.* The Atlantic. https://www.theatlantic.com/technology/archive/2022/12/openai-chatgpt-writing-high-school-english-essay/672412/
- Houston, A. B., & Corrado, E. M. (2023). Embracing ChatGPT: Implications of emergent language models for academia and libraries. *Technical Services Quarterly*, 40(2), 76-91. https://doi.org/10.1080/07317131.2023.2187110
- Hsu, J. (2023). Should schools ban Al chatbots? *New Scientist, 257*(3422), 15. https://doi.org/10.1016/S0262-4079(23)
- Huang, K. (2023). *Alarmed by A.I. chatbots, universities start revamping how they teach.* The New York Times. https://www.nytimes.com/2023/01/16/technology/chatgpt-artificial-intelligence-universities.html
- IBL News. (2023). ChatGPT-4, the fined tuned version of ChatGPT-3, might prompt a major shift. IBL News. https://iblnews.org/chatgpt-4-the-fined-tuned-version-of-chatgpt-3-might-prompt-a-major-shift/
- Karpf, D. (2022). Money will kill ChatGPT's magic. The Atlantic. https://www.theatlantic.com/technology/archive/2022/12/chatgpt-ai-chatbots-openai-cost-regulations/672539/
- Keegan, J. M. (2023). ChatGPT is a plagiarism machine: So why do administrators have their heads in the sand? Chronicle of Higher Education. https://www.chronicle.com/article/chatgpt-is-a-plagiarism-machine
- Kendrick, C. (2023). *The efficacy of ChatGPT: Is it time for the librarians to go home?* The Scholarly Kitchen. https://scholarlykitchen.sspnet.org/2023/01/26/guest-post-the-efficacy-of-chatgpt-is-it-time-for-the-librarians-to-go-home/
- Kesselman, M. A. (2023). LHTN special issue on ChatGPT editor's introduction. *Library Hi Tech News, 40*(3), 1-3. https://doi.org/10.1108/LHTN-04-2023-139
- King, M. R. (2023). A conversation on artificial intelligence, chatbots, and plagiarism in higher education. *Cellular & Molecular Bioengineering, 16*(1), 1-2. https://doi.org/10.1007/s12195-022-00754-8
- Kingsley, D. (2023a) Major publishers are banning ChatGPT from being listed as an academic author. What's the big deal? The Conversation. http://theconversation.com/major-publishers-are-banning-chatgpt-from-being-listed-as-an-academic-author-whats-the-big-deal-198765
- Kingsley, D. (2023b). What academic research is ChatGPT accessing? LinkedIn. https://www.linkedin.com/pulse/what-academic-research-chatgpt-accessing-danny-kingsley
- Klein, A. (2023a). *ChatGPT cheating: What to do when it happens*. Education Week. https://www.edweek.org/technology/chatgpt-cheating-what-to-do-when-it-happens/2023/02
- Klein, A. (2023). New York City blocks ChatGPT at schools. should other districts follow? *Education Week, 42*(18), 12-13.
 - https://www.edweek.org/technology/new-york-city-blocks-chatgpt-at-schools-should-other-districts-follow/2023/01
- Kovanovic, V. (2022) The dawn of AI has come, and its implications for education couldn't be more significant. The Conversation. http://theconversation.com/the-dawn-of-ai-has-come-and-its-implications-for-education-couldnt-be-more-significant-196383
- Linthicum, D. (2023). *Finding a business case for generative AI.* eWeek. https://www.eweek.com/big-data-and-analytics/generative-ai/
- Lo, L. S. (2023). The CLEAR path: A framework for enhancing information literacy through prompt engineering. *The Journal of Academic Librarianship, 49*(4), 102718-102719. https://doi.org/10.1016/j.acalib.2023.102720
- Lonas, L. (2023). *College students ready to embrace ChatGPT*. The Hill. https://thehill.com/policy/technology/3821219-college-students-ready-to-embrace-chatgpt/
- Lund, B. D., & Wang, T. (2023). Chatting about ChatGPT: How may Al and GPT impact academia and libraries? *Library Hi Tech News*, 40(3), 26-29. https://doi.org/10.1108/LHTN-01-2023-0009

- McCormack, M. (2023). EDUCAUSE QuickPoll results: Adopting and adapting to generative AI in higher ed tech. EDUCAUSE Review. https://er.educause.edu/articles/2023/4/educause-quickpoll-results-adopting-and-adapting-to-generative-ai-in-higher-ed-tech
- McMurtrie, B. (2023a). Al and the future of undergraduate writing: Teaching experts are concerned but not for the reasons You Think. Chronicle of Higher Education. https://www.chronicle.com/article/ai-and-the-future-of-undergraduate-writing
- McMurtrie, B. (2023b). *Will ChatGPT change the way you teach?* The Chronicle of Higher Education. https://www.chronicle.com/newsletter/teaching/2023-01-05
- Mehdi, Y. (2023a). Announcing the next wave of AI innovation with Microsoft Bing and Edge. The Official Microsoft Blog. https://blogs.microsoft.com/blog/2023/05/04/announcing-the-next-wave-of-ai-innovation-with-microsoft-bing-and-edge/
- Mehdi, Y. (2023b). Reinventing search with a new Al-powered Microsoft Bing and edge, your copilot for the web. The Official Microsoft Blog. https://blogs.microsoft.com/blog/2023/02/07/reinventing-search-with-a-new-ai-powered-microsoft-bing-and-edge-your-copilot-for-the-web/
- Metz, C. (2022). The new chatbots could change the world. can you trust them? *The New York Times* https://www.nytimes.com/2022/12/10/technology/ai-chat-bot-chatgpt.html
- Metz, C. (2023a). *AI is becoming more conversant. but will it get more honest?* The New York Times. https://www.nytimes.com/2023/01/10/science/character-ai-chatbot-intelligence.html
- Metz, C. (2023b). 'The godfather of Al' quits Google and warns of danger ahead. New York Times. https://www.nytimes.com/2023/05/01/technology/ai-google-chatbot-engineer-quits-hinton.html
- Metz, C., Weise, K., Griffith, E. & Isaac, M. (2023). *Microsoft bets big on the creator of ChatGPT in race to dominate A.I.* The New York Times. https://www.nytimes.com/2023/01/12/technology/microsoft-openai-chatgpt.html
- Miller, C. C., Playford, A., Buchanan, L. & Krolik, A. (2023). Fourth grader or chatbot? The New York Times. https://www.nytimes.com/interactive/2022/12/26/upshot/chatgpt-child-essays.html
- Mintz, S. (2023). ChatGPT: Threat or menace? Inside Higher Ed. https://www.insidehighered.com/blogs/higher-ed-gamma/chatgpt-threat-or-menace
- Mollick, E. (2022). ChatGPT is a tipping point for Al: The ability for anyone to produce pretty good text and code on command will transform work. Harvard Business Review. https://hbr.org/2022/12/chatgpt-is-a-tipping-point-for-ai
- Mouradian, V. (2023). Don't rage against the machine. National Review, 75(1), 20-22.
- Newton, C., & Roose, K. (2022). *Can ChatGPT make this podcast?*. The New York Times. Podcast. https://www.nytimes.com/2022/12/09/podcasts/can-chatgpt-make-this-podcast.html?
- Newton, C., & Roose, K. (2023a). *ChatGPT transforms a classroom and is 'M3GAN' real?*. The New York Times. Podcast. https://www.nytimes.com/2023/01/13/podcasts/hard-fork-chatgpt-teachers-gen-z-cameras-m3gan.html?
- O'Connor, S. (2023). Open artificial intelligence platforms in nursing education: Tools for academic progress or abuse? *Nurse Education in* Practice, 66(103537) https://doi.org/10.1016/j.nepr.2022.103537
- O Reilly, T. (2023). You can't regulate what you don't understand. O Reilly Media. https://www.oreilly.com/content/you-cant-regulate-what-you-dont-understand-2/
- Pasick, A. (2023). *Artificial intelligence glossary: Neural networks and other terms explained.* New York Times. https://www.nytimes.com/article/ai-artificial-intelligence-glossary.html
- Pavlik, J. V. (2023). Collaborating with ChatGPT: Considering the implications of generative artificial intelligence for journalism and media education. *Journalism & Mass Communication Educator*. https://doi.org/10.1177/10776958221149577
- Perrigo, B. (2022). Al chatbots are getting better. but an interview with ChatGPT reveals their limits. Time. https://time.com/6238781/chatbot-chatgpt-ai-interview/
- Perrigo, B. (2023). Exclusive: OpenAl used Kenyan workers on less than \$2 per hour to make ChatGPT less toxic. Time. https://time.com/6247678/openai-chatgpt-kenya-workers/
- Pichai, S. (2023). *An important next step on our Al journey*. Google. https://blog.google/technology/ai/bard-google-ai-search-updates/
- Pride, D. (2023). CORE-GPT: Combining open access research and AI for credible, trustworthy question answering. CORE. https://blog.core.ac.uk/2023/03/17/core-gpt-combining-open-access-research-and-ai-for-credible-trustworthy-question-answering/

- Qamar, Z. (2023). *Teaching in the age of AI means getting creative*. FiveThirtyEight. https://fivethirtyeight.com/features/teaching-in-the-age-of-ai-means-getting-creative/
- Robert, J. (2023). *EDUCAUSE QuickPoll results: Did ChatGPT write this report?* EDUCAUSE. https://er.educause.edu/articles/2023/2/educause-quickpoll-results-did-chatgpt-write-this-report
- Roose, K. (2022). *The brilliance and weirdness of ChatGPT*. The New York Times. https://www.nytimes.com/2022/12/05/technology/chatgpt-ai-twitter.html
- Roose, K. (2023a). A.I., once the future, has become the present. what do we do now? *The New York Times, 172* (59667), B1-B5.
- Roose, K. (2023b). *Don't ban ChatGPT in schools. teach with it.* The New York Times. https://www.nytimes.com/2023/01/12/technology/chatgpt-schools-teachers.html
- Roose, K. (2023c). How does ChatGPT really work? learning how a 'large language model' operates. New York Times. https://www.nytimes.com/2023/03/28/technology/ai-chatbots-chatgpt-bing-bard-llm.html
- Roose, K. (2023d). *Kevin Roose's conversation with Bing's chatbot: Full transcript.* New York Times. https://www.nytimes.com/2023/02/16/technology/bing-chatbot-transcript.html
- Roose, K. (2023e). *Microsoft's ChatGPT-powered Bing makes search interesting again*. New York Times. https://www.nytimes.com/2023/02/08/technology/microsoft-bing-openai-artificial-intelligence.html
- Roose, K. (2023f). Why a conversation with Bing's chatbot left me deeply unsettled. New York Times. https://www.nytimes.com/2023/02/16/technology/bing-chatbot-microsoft-chatgpt.html
- Rosalsky, G., & Peaslee, E. (2023). *This 22-year-old is trying to save us from ChatGPT before it changes writing forever.* National Public Radio: Planet Money. https://www.npr.org/sections/money/2023/01/17/1149206188/this-22-year-old-is-trying-to-save-us-from-chatgpt-before-it-changes-writing-for
- Ruby, D. (2023). 57+ ChatGPT statistics 2023 (updated data with infographics). DemandSage. https://www.demandsage.com/chatgpt-statistics/
- Salian, I. (2023). Sweden's National Library turns page to Al. NVIDIA. https://blogs.nvidia.com/blog/2023/01/23/sweden-library-ai-open-source/
- Stern, J. (2022). *ChatGPT wrote my AP English essay—and I passed.* Wall Street Journal Online Edition. https://www.wsj.com/articles/chatgpt-wrote-my-ap-english-essayand-i-passed-11671628256
- Stokel-Walker, C. (2022). Al bot ChatGPT writes smart essays should professors worry? *Nature*, https://doi.org/10.1038/d41586-022-04397-7
- Stokel-Walker, C. (2023a). Al chatbots could stagnate due to shortage of training data. *New Scientist*, 257(3421), 12. https://doi.org/10.1016/s0262-4079(23)00046-5
- Stokel-Walker, C. (2023b). ChatGPT listed as author on research papers: Many scientists disapprove. *Nature*, https://doi.org/10.1038/d41586-023-00107-z
- Terwiesch, C. (2023). Would chat GPT get a Wharton MBA? Mack Institute for Innovation Management at the Wharton School, University of Pennsylvania. https://mackinstitute.wharton.upenn.edu/2023/would-chat-gpt3-get-a-wharton-mba-new-white-paper-by-christian-terwiesch/
- Trust, T. (2023). *ChatGPT & education*. Figshare. https://figshare.com/articles/presentation/ChatGPT_Education_Slide_Deck/21901629
- Tufekci, Z. (2022). What would Plato think about ChatGPT? The New York Times. https://www.nytimes.com/2022/12/15/opinion/chatgpt-education-ai-technology.html
- Walker, J. (2023). ChatGPT is multilingual but monocultural, and it's learning your values. Jill/txt. https://jilltxt.net/right-now-chatgpt-is-multilingual-but-monocultural-but-its-learning-your-values/
- Walsh, T. (2022) Everyone's having a field day with ChatGPT but nobody knows how it actually works. The Conversation. http://theconversation.com/everyones-having-a-field-day-with-chatgpt-but-nobody-knows-how-it-actually-works-196378
- Warner, J. (2022). Freaking out about ChatGPT—Part I. Inside Higher Ed. https://www.insidehighered.com/blogs/just-visiting/freaking-out-about-chatgpt%E2%80%94part-i
- Warner, J. (2023). *ChatGPT both is and is not like a calculator*. Inside Higher Ed. https://www.insidehighered.com/blogs/just-visiting/chatgpt-both-and-not-calculator
- Watkins, M. (2022). *Al will augment, not replace*. Inside Higher Ed. https://www.insidehighered.com/blogs/just-visiting/guest-post-ai-will-augment-not-replace

- Webb, M. (2023). *A generative AI primer*. National Centre for AI. https://nationalcentreforai.jiscinvolve.org/wp/2023/05/11/generative-ai-primer/
- Will, M. (2023). With ChatGPT, teachers can plan lessons, write emails, and more. What's the catch? *Education Week* https://www.edweek.org/technology/with-chatgpt-teachers-can-plan-lessons-write-emails-and-more-whats-the-catch/2023/01
- Woods, A. (2022). *I wrote a story about ChatGPT's AI. Then I dared it to write a better one.* Toronto Star. https://www.thestar.com/news/canada/2022/12/10/i-wrote-a-story-about-chatgpts-ai-then-i-dared-it-to-write-a-better-one.html
- Yorio, K. (2023). The ChatGPT revolution. School Library Journal, 69(2), 10-12.
- Young, J. R. (2022). What will ChatGPT mean for teaching?. Soundcloud: EdSurge Podcast. https://soundcloud.com/edsurge/what-will-chatgpt-mean-for-teaching



Get Involved with LIRT

LIRT Standing Committees

Use the online form to volunteer

Adult Learners

This committee is charged with assisting library professionals to more effectively serve adult learners.

Awards

This committee is charged with selecting the recipients for the LIRT Innovation in Instruction Award and the LIRT Librarian Recognition Award.

Communications

This committee is responsible for soliciting and distributing content, in both written and visual formats, for all avenues of communication with LIRT membership. This includes, but is not limited to, preparing and distributing the round table's newsletter, curating all social media accounts, and providing oversight of LIRT's online presence. The committee may create and update content, as well as solicit content and advise other committees regarding the creation and maintenance of content.

Conference Program

This committee shall be responsible for annual program preparation and presentation.

Liaison

This committee shall initiate and maintain communication with groups within the American Library Association dealing with issues relevant to library instruction and shall disseminate information about these groups' activities.

Membership

This committee shall be responsible for publicizing the Round Table's purposes, activities and image; and for promoting membership in the Round Table.

Organization and Planning

This committee shall be responsible for long-range planning and making recommendations to guide the future direction of LIRT.

Teaching, Learning, & Technology

This committee will be responsible for identifying and promoting the use of technology in library instruction. Special attention will be given to technologies that enhance learning and can be easily adapted to a variety of different learning environments. Activities will include assisting with programs, writing reviews and articles for the newsletter, and promoting research that relates to our charge.

Top 20

This committee shall be responsible for monitoring the library instruction literature and identifying high quality library-instruction related articles from all types of libraries. Annually, this committee shall prepare and publish in the *LIRT News* a list of the Top 20 articles on library instruction.

Transitions to College

This committee builds and supports partnerships between school, public, and academic librarians to assist students in their transition to the academic library environment.

For more information about our committees, visit: http://www.ala.org/lirt/committees



Library Instruction Round Table News

c/o Danielle M. Ponton
American Library Association
225 N. Michigan Ave., 13th Floor
Chicago, IL 60601
dponton@ala.org
800.545.2433 x3213