Future information professionals and artificial intelligence: expectations of scientific libraries

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- The emergence of Artificial Intelligence (AI) in academic librarianship represents a paradigm shift, set to profoundly influence information management, dissemination processes, and library operations (Cox & Tzoc, 2023, Kautonen & Gasparini, 2024).

- In many ways the working tasks are already being reshaped by AI in search and recommendation, with implications for data and AI literacy. Moreover, as user contexts change through AI, libraries role supporting them will have to alter too.
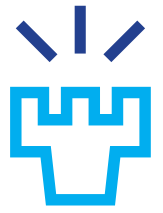
Education

- This transformation necessitates a corresponding evolution in librarians' competencies, making it crucial for professionals in this field to engage in continual reskilling to maintain relevance and efficacy in an increasingly AI-driven work environment (Lo, 2024).

- Library and information science (LIS) education prepares future information professionals. How should AI be taken into account in our teaching?
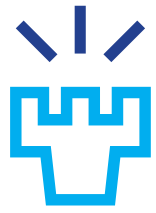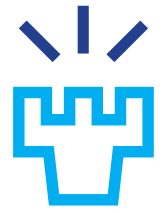
– The role of academic librarians in the AI debate relates to the ways in which universities respond to the changes brought about by AI, and is seen as particularly central to the development of ethical AI policy (Michalak, 2023).

What kind of AI-related knowledge and skills are expected from candidates applying to work in scientific libraries?

Data collection

- Interviewees: Directors, service managers or team leaders working in libraries of universities or universities of applied sciences from different parts of Finland.

- Invitations to the interviews were sent by personal emails. Consent form and privacy notice as an attachments.

- 9 semi-structured interviews have been conducted via Teams at April - June 2024.

- Interviews were recorded and transcribed.

- Lenght of the interviews: 36-58 minutes.
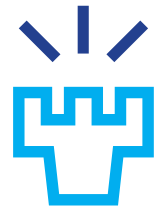
Job advertisements and work tasks

- Usually AI not yet mentioned in job advertisements but may have been discussed in interviews: "*So yes, we did "grill" these applicants pretty much on this knowledge and understanding.*"(Interviewee 7)

- The work tasks will differ from previous tasks: "*But of course, then the artificial intelligence and perhaps the automation of processes and such, so you also need to understand a little bit of the development that... That yes, it's like nowadays when you think about it, the level of demand has certainly increased.*" (Interviewee 1)
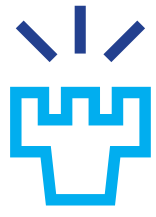
Open-minded attitude

Curiosity

Interest in the topic

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– *"In a way it does not matter what tool you have used so far, or whether you have used, if you are eager to learn, want to get acquainted, go experiment, and that the idea is not foreign that it will be, in any case, part of the work." "That's a road that can travelled by whoever wants to and sets out to do it, and tomorrow we could be at a very different stage again from where we are now.*" (Interviewee 2)
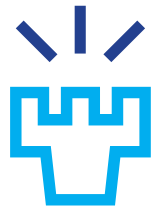
– ”*If we're talking purely about artificial intelligence, then maybe... it would be great to have someone who has done a thesis or research work, a survey, been involved in some projects that have studied the impact of artificial intelligence on library work… that would be a real bonus.*” (Interviewee 1)

Resilience, willingness to learn new things

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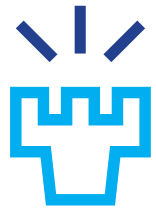
- Some level understanding or experience of task automation processes. Coding skills are not necessary.

- *"To understand what happens under the engine bonnet."* (Interviewee 7)

- Some level understanding of AI relating to information search, knowledge on the applications, ability to understand how the customers may have already been using AI.

Discussion and conclusions
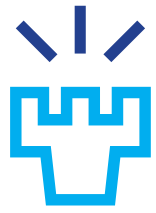
- Knowledge and skills expected still quite vague and difficult to define.
- Some experience in using is considered as advantage, but it seems that the open-minded attitude, curiosity and willingness to learn are even more important. But how to "measure" and, on the other hand, demonstrate these e.g., in work interview?
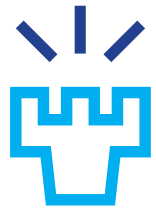
Libraries should consider incorporating AI skills into their hiring and professional development criteria, ensuring that all staff members have a baseline understanding of AI and its potential impact on their work. By promoting an environment that values and encourages ongoing learning, libraries can help mitigate resistance to change and foster a more proactive approach to technology adoption. (Lo 2024.)

"*Thinking about the future of the profession also needs to consider that AI is just one of a number of technologies that could impact it*" (Cox 2023).

– Moreover, the study contributes to increasing co-operation and mutual understanding of LIS educators and professionals working in scientific libraries.

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Thank you!
For further questions: *Heidi.enwald@oulu.fi*

Our university's library's LibGuide
about AI tools in
information searching:
https://libguides.oulu.fi/ai

Our university's general guidelines for the
use of AI in education:
https://www.oulu.fi/en/for-students/studying-
university/guidelines-for-use-artificial-
intelligence-education

And thank you for awarding me the travel grant to attend RLUK!

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