

*Tuesday late afternoon session Track D, Tuesday, Sep 23 2025, 16:00-17:45*

*Location: Seminar 3*

**Session: RI and AI**

**Chair: Tom Lindemann**

OR-47

**Writing Assistant, Workhorse, or Accelerator? Insights from a Nationwide Survey on Researchers' Use of Generative AI and their need for guidelines**

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This presentation reports on a nationwide survey study that explores the use of generative AI (GenAI) and research integrity assessments of various use cases [1]. The survey was conducted in 2024 and was sent to all researchers based in Denmark. The study received 2,534 responses from researchers (including PhD students). It evaluated 32 GenAI use cases across five research phases: idea generation, research design, data collection, data analysis, and writing/reporting. Respondents reported on their own and their colleagues' GenAI usage. They also assessed whether the practices in the use cases were considered good research practice.

Through an explorative factor analysis, we identified three clusters of perception: "GenAI as a workhorse", "GenAI as a language assistant only", and "GenAI as a research accelerator". The findings further show varied opinions on GenAI's research integrity implications. Language editing and data analysis were generally viewed positively, whereas experiment design and peer review tasks faced more criticism. Controversial areas included image creation/modification and synthetic data, with comments highlighting the need for critical and reflexive use of GenAI.

The study further showed that GenAI usage differs by main research area, with technical and quantitative sciences reporting slightly higher usage and more positive assessments. Junior researchers used GenAI more than senior colleagues, while no significant gender differences were observed.

The study underscores the need for adaptable, discipline-specific guidelines for GenAI use in research, developed collaboratively with experts to align with diverse research practices and minimize ethical and practical misalignment.

[1] Andersen, JP; Degn, L; Fishberg, R; Graversen, EK; Horbach, SPJM; Schmidt, EK; Schneider, JW; Sørensen, MP. Generative Artificial Intelligence (GenAI) in the research process – A survey of researchers' practices and perceptions, Technology in Society, Volume 81, 2025. <https://doi.org/10.1016/j.techsoc.2025.102813>