



Conference Abstract

# Scholarly publication of barcoding data

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## Abstract

This presentation focuses on innovative approaches and best practices for the scholarly publication of barcoding data, emphasizing the importance of data publishing in academic contexts. It introduces the core principles of scholarly data publishing, highlighting key concepts such as "findability," "accessibility," "interoperability," and "reusability of digital assets," all aligned with the FAIR principles (Findable, Accessible, Interoperable, and Reusable). The discussion outlines two primary methods for publishing data: through scholarly journals, where data is integrated with peer-reviewed articles, and via data aggregators like BOLD, GenBank, and GBIF.

The significance of scholarly data publishing is underscored, noting benefits such as establishing priority for data collections, providing credit and recognition to researchers involved in data generation, enhancing metadata quality through peer review, and ensuring better data discoverability via DOIs and journal indexing.

The processes for importing and exporting data, along with examples of successful workflows incorporating structured specimen records, are demonstrated.

Additionally, the role of data papers as a mechanism for data publishing is explored, highlighting the potential for the automated conversion of metadata into manuscripts using tools like ARPHA. Barcode reference libraries (simple tables containing data about the relationships between taxa and their sequences) can also be published as standalone data papers.

In conclusion, it is essential to publish your data (sequences, specimens, etc.) in data aggregators, associate these with scientific articles, and adhere to the FAIR principles while including relevant identifiers.

## **Keywords**

FAIR Principles, Data Paper, barcode reference libraries

## **Presenting author**

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## **Conflicts of interest**

The authors have declared that no competing interests exist.