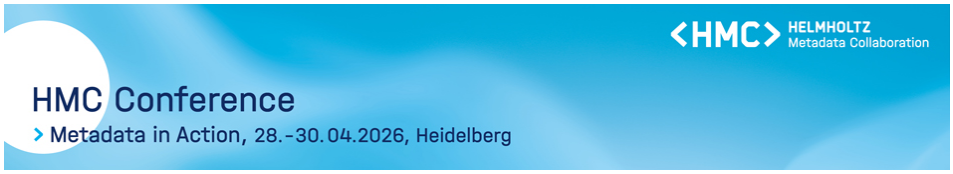

Beitrag ID: **93** Typ: **Talk**

Interoperable Metadata For Describing Health Studies –The NFDI4Health Metadata Schema

To structure metadata of health-specific research studies a tailored metadata schema (MDS) has been developed in the context of the German National Research Data Infrastructure for Personal Health Data (NFDI4Health) [1,2]. The MDS supports metadata publication from clinical, epidemiological, and public health studies, while maintaining interoperability with other resources. Designed in a modular fashion, it combines metadata for multiple purposes. Examples are health study design and use case-specific use for nutritional epidemiology, chronic diseases, record linkage, and medical imaging/radiomics. It also comprises bibliographic information and metadata about data sharing and access.

The MDS is based on DataCite for domain-independent metadata, and CT.gov for metadata specific for clinical trials, and other domain-specific schemas. For compatibility with clinical trial registries, the schema was mapped to DRKS and ICTRP. To support metadata exchange with other platforms mappings to the European Clinical Research Infrastructure Network metadata repository, the German Human Genome-Phenome Archive and the Directory of Registries of the European Rare Disease Registry Infrastructure were performed. To further promote semantic and syntactic interoperability of metadata across health research infrastructures, we aligned the MDS with HL7® FHIR® (Fast Healthcare Interoperability Resources) and included standard terminologies in the value sets such as DICOM for the imaging module. The emerging European Health Data Space (EHDS) will play a major role in Europe in the whole medical domain and to prepare for interoperability with the EHDS we have initiated an alignment of the MDS with the HealthDCAT-AP metadata standard underlying the EHDS systems.

Overall, MDS can be applied across a wide range of use scenarios, while maintaining interoperability. NFDI4Health services based on the MDS, such as the German Health Study Hub (https://health-study-hub.de/) and the Local Data Hub software (https://www.nfdi4health.de/en/service/local-data-hub.html) can easily interface with external resources.

[1] [https://doi.org/10.2196/63906]
[2] [https://www.nfdi4health.de/en/service/metadata-schema.html]

ONLY WORKSHOPS - Proposed interaction format

Alternative Track

ONLY WORKSHOPS - Tentative audience

ONLY WORKSHOPS - Maximum number of participants

ONLY WORKSHOPS - Special technical requirements

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Sitzung Einordnung: TALK SESSION

Track Klassifizierung: HMC Conference 2026 Track Topics: 3. Ontology-Driven Metadata Harmonization: Closing Semantic Gaps