

INFOGRAPHIC

SEMANTIC MODELING & KNOWLEDGE GRAPHS

An infographic which describes how semantic models and knowledge graphs might benefit your organization and gives an example how The Hyve worked together with a top pharma company to solve their data integration challenge!

DOWNLOAD VIA



The Hyve B.V.
www.thehyve.nl
office@thehyve.nl



Unlock the full potential of your research data with our **Research Data Management Engineering Services**



KNOWLEDGE GRAPHS

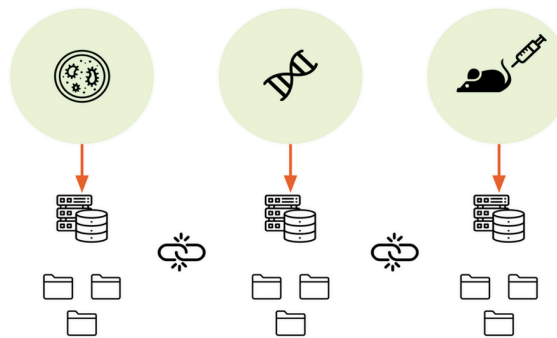
Understand your data and maximize its value with a Knowledge Graph

The Hyve can design and build knowledge graphs in the life sciences domain working with biomedical datasets.

We use tools such as **Protege**, **TopBraid Composer**, **AllegroGraph**, and **WebVOWL** - depending on the specific use case.

We can load our in-house developed model and knowledge graph into these tools and demonstrate SPARQL queries.

LIFE SCIENCES DATA IS SEPARATED IN SILOES



Research data is stored in various systems and applications, which are often disconnected and not integrated.

DID YOU KNOW?

Before engaging in any Semantic Model or Knowledge Graph work, it is essential to perform a **Data Landscape Exploration** within your organization. This will enable us to understand which type of data is available and where they are, how to improve compliance with regulations (GDPR) and best practices such as FAIR as well as being able to manage the full data lifecycle.

SEMANTIC MODELING

Simplify your research data integration & management with a Semantic Model.

Having a semantic representation of data ensures that researchers and analysts as well as machines **unambiguously understand** the data, its context, and its qualitative aspects. This may include experimental details (e.g. type of assay, experimental factors), provenance (e.g. who produced the data, traceability), or other metadata (e.g. usage conditions, qualified references to other sources).

The Hyve can create semantic models that cover distinct biomedical domains, typically from pharma R&D departments, such as small and large molecule research, omics, clinical, etc.

Our services include:

- ✓ Designing and building a Semantic Model
- ✓ Aligning metadata

FAIR BY DESIGN SERVICES

Design your own **scalable research data management solution**

We can help you implement the FAIR principles by building and/or customizing data management infrastructure or systems and making both existing and newly collected research data FAIR.

Besides the **Fairspace** platform we developed, we can support you in integrating other Research Data Management tools such as **Gen3**, **iRODs** and **COLID** to tailor to the needs of our clients on a case-by-case basis.

Main focus of our 'FAIR by Design' Services:

- ✓ Improve FAIRness for both humans and machines to automatically find, access and use data
- ✓ Support organizations with improving their current or future data management environment
- ✓ Guide to good Data Management and Stewardship practice.

For any inquiries on Research Data Management, please send an email to:

melissa@thehyve.nl

