

# EXPANDS

**European Open Science Cloud Photon  
and Neutron Data Services**

**Persistent identifiers,  
and what about them in facilities**

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30 September 2021*

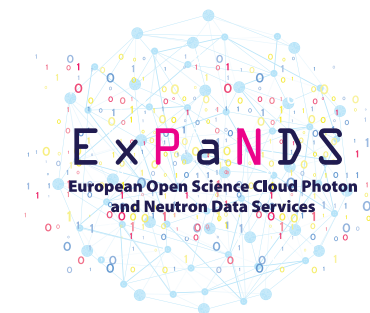
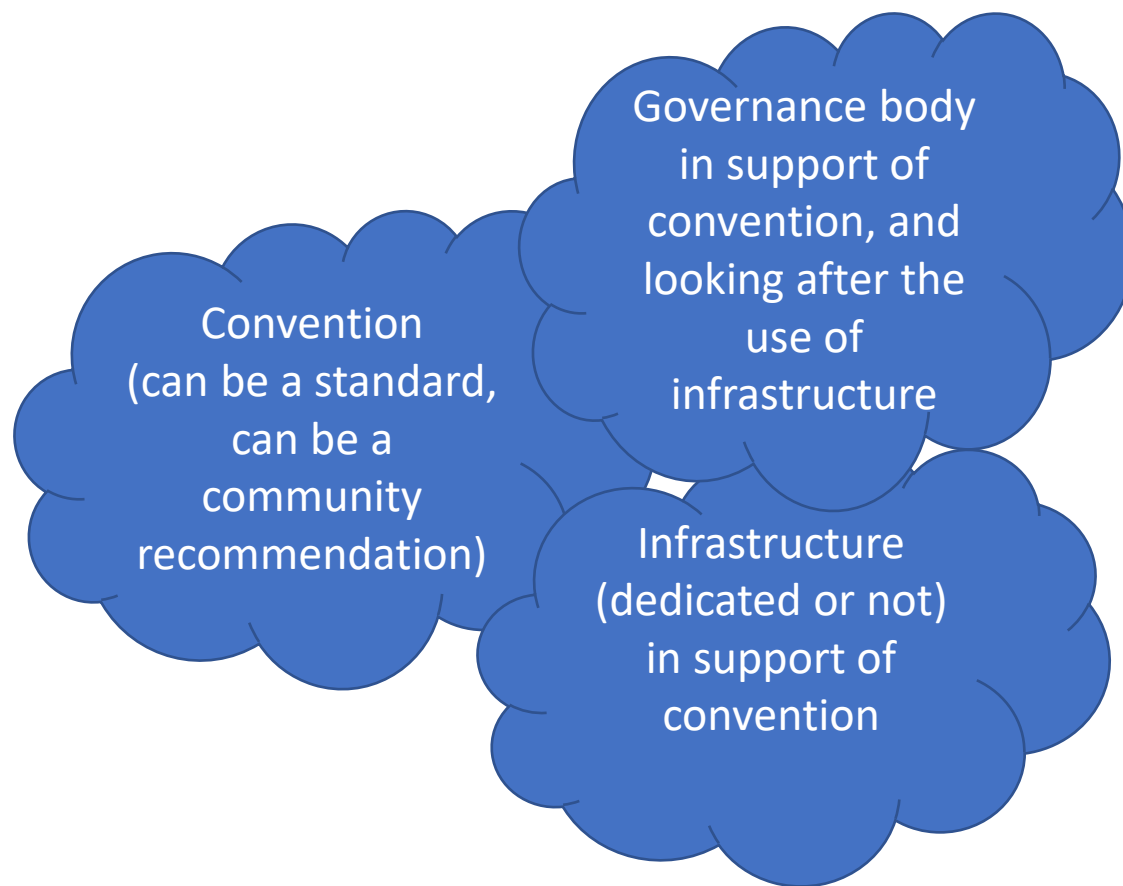


# Some misconceptions about persistent identifiers

- DOI and PID are the same thing
- DOIs can be only assigned to research papers or data
- PIDs are only for citations
- Research facilities are already doing a great job about PIDs
- Librarians and research information managers have nothing to do with the use of PIDs by facilities



# What makes a persistent identifier?

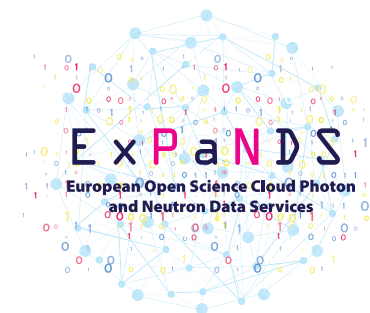
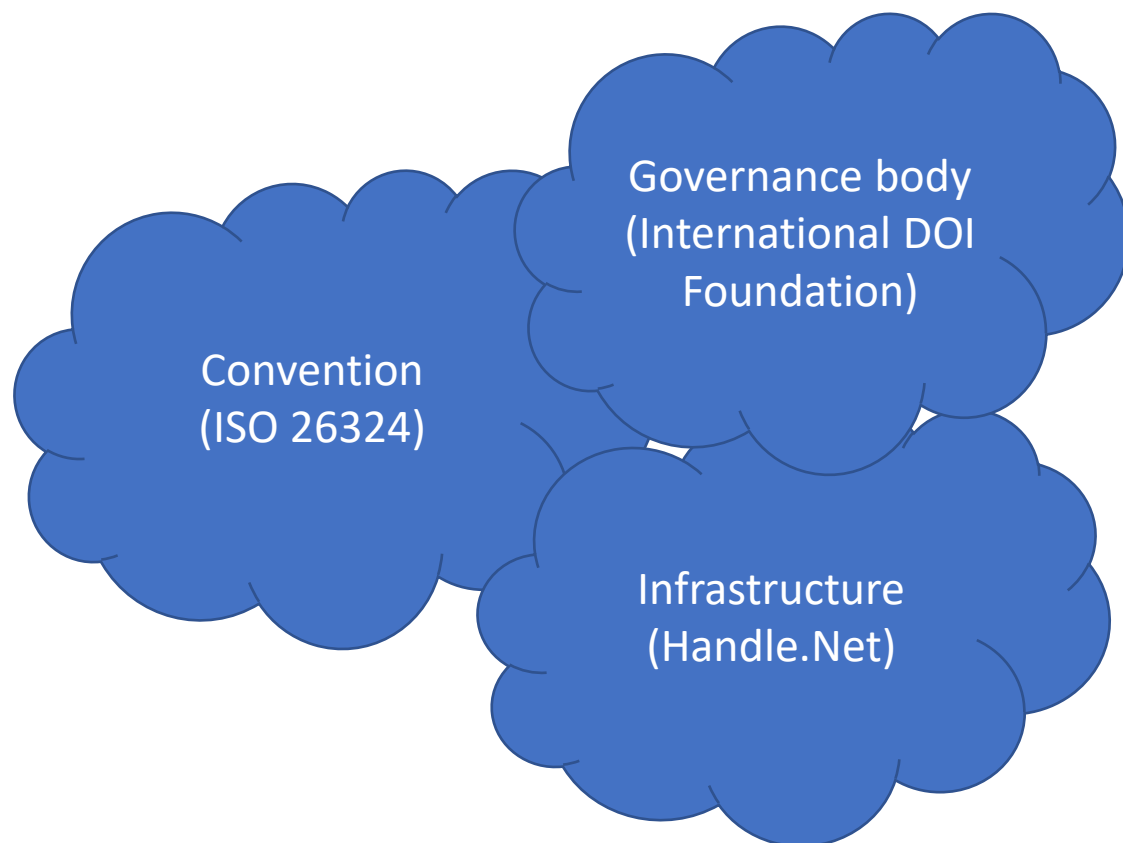


# DOIs demystified

- DOI is just one flavour of persistent identifiers
- What defines DOI is the use of a specific infrastructure and a specific convention governed by a specific body
- Convention: ISO standard for the DOI system (ISO 26324)
- Governance body: International DOI Foundation (IDF) [www.doi.org](http://www.doi.org)
- Infrastructure: DOIs use Handle system [www.handle.net](http://www.handle.net) that is used by some other PIDs, too



# What makes a DOI?



# Why DOIs are more universal than just their use as texts references?

*“Though the original model from which the Handle System derives dealt with management of digital objects, the Handle System does not mandate any particular model of relationships between the identified entities, nor is it limited to identifying only digital objects: non-digital entities may be represented as a corresponding digital object for the purposes of digital object management”*

*“Handle System” article in Wikipedia*

*[https://en.wikipedia.org/wiki/Handle\\_System](https://en.wikipedia.org/wiki/Handle_System) last checked on 29.09.2021*



# Other entities (but texts) the DOIs can be assigned to

- Data  
[www.datacite.org](http://www.datacite.org) , yet bear in mind that “data” in DataCite means many things
- Instruments  
[www.jlsrf.org](http://www.jlsrf.org) , also DataCite based on RDA recommendation
- Organizations  
<https://www.crossref.org/services/funder-registry/>
- Sky is the limit (make your own use of DOI system)



# Handles are even more diverse

*“There are thousands of handle services running today, located in 71 countries, on 6 continents; over 1000 of them run at universities and libraries. Handle services are being run by user federations, national laboratories, universities, computing centers, libraries (national and local), government agencies, contractors, corporations, and research groups.”*

*“Handle System” article in Wikipedia*

[https://en.wikipedia.org/wiki/Handle\\_System](https://en.wikipedia.org/wiki/Handle_System) last checked on 29.09.2021



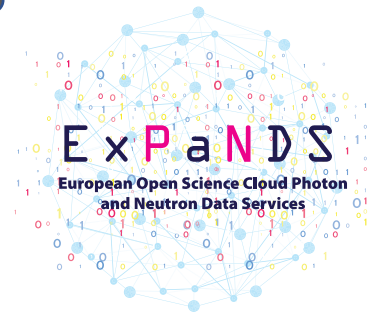
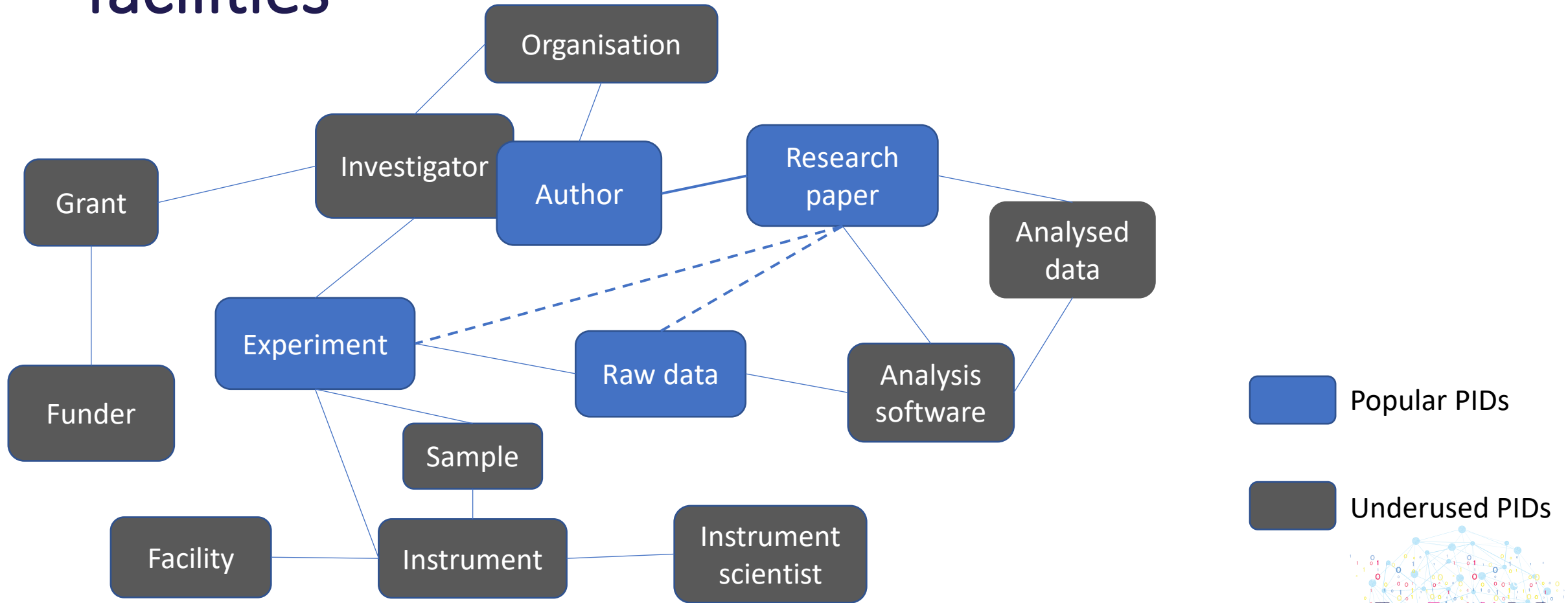


# Are PIDs only for citations?

- PIDs could be used for getting data (e.g. staging data to computation):  
*Service for data retrieval via persistent identifiers. DATA 2015 in Colmar, 20-22 July 2015.*  
<http://purl.org/net/epubs/work/21652744>
- PID graph (rather than individual PIDs) has the greater value:  
*Connected Research: The Potential of the PID Graph. Patterns Vol 2 (1), 2021*  
<https://doi.org/10.1016/j.patter.2020.100180>



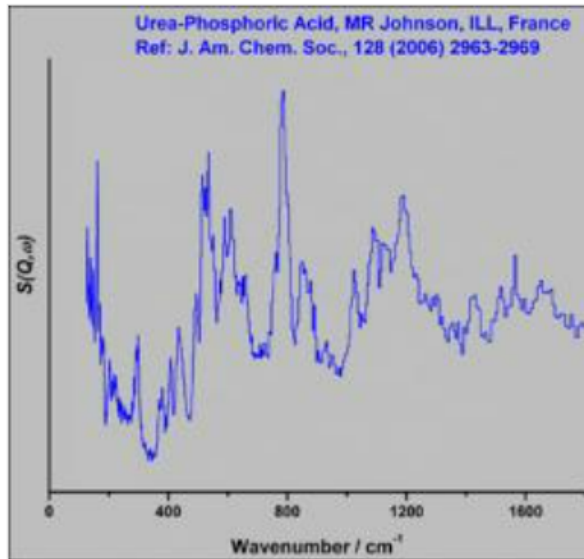
# What we could connect in a PID graph for facilities



# Facilities are natural research hubs with an extraordinary potential to promote PIDs. Do they use this opportunity?

## Urea/Phosphoric Acid

M.R. Johnson Institut Laue-Langevin, Grenoble, France



Inelastic Neutron Scattering spectrum of Urea/Phosphoric Acid,  $\text{NH}_2\text{CONH}_2/\text{H}_3\text{PO}_4$  measured on the TOSCA instrument

URI

<http://purl.org/net/edata/handle/edata/707>

<http://dx.doi.org/10.5286/edata/687>

Collections

INS Database

Related records

[J. Am. Chem. Soc., 128 \(2006\) 2963-2969](#) !

Licence

Creative Commons Attribution 4.0 International

View/Open

 Ureaphosphoricacid.gif (157.7Kb)

 Ureaphosphoricacid.dat (32.03Kb)

 Ureaphosphoricacid.dx (33.43Kb)



# Forums, events and groups where PIDs are discussed

- Research Data Alliance groups
  - National PID Strategies WG
  - Persistent Identification of Instruments WG
  - Data Citation WG (completed)
- A Persistent Identifier policy for the European Open Science Cloud – the output of two EOSC Working Groups
- PID Forum <https://pidforum.org/>
- PIDapalooza – The Open Festival of Persistent Identifiers  
[www.pidapalooza.org](http://www.pidapalooza.org)



# A dedicated workshop on PIDs in facilities is coming soon

Friday 22<sup>nd</sup> October, 9.00 – 13.00 CET

Watch your mailboxes

## Agenda:

- How PIDs contribute to the quality of scholarly record

- Overview of efforts towards sample PIDs

- Two different views into PIDs for instruments

- PIDs for research organizations

- Current practices – and better practices – of PIDs use in proposal systems

