



symplectic

solutions for higher education

**Symplectic Repository Tools  
For DSpace and Fedora**



# Motivation: Commercial

- Integrate our publications management system (Symplectic Elements) with DSpace and Fedora
- Provide support for full repository item lifecycle management
- Meet the specific requirements of our clients who are also DSpace or Fedora users



# Motivation: Community

- Current deposit client approaches require that content be stored outside the repository in an organised and well managed way prior to deposit;

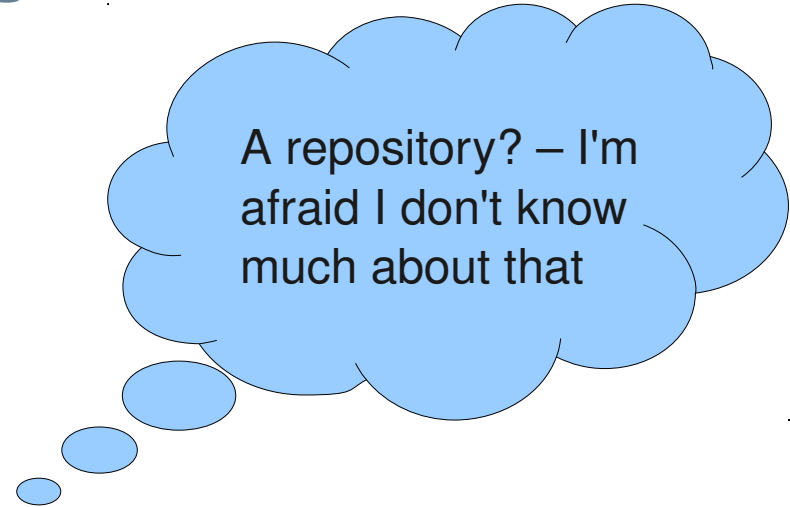
but this is what repositories are designed for!

- Current deposit client approaches require the end user to assert that a work is "finished";

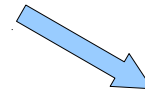
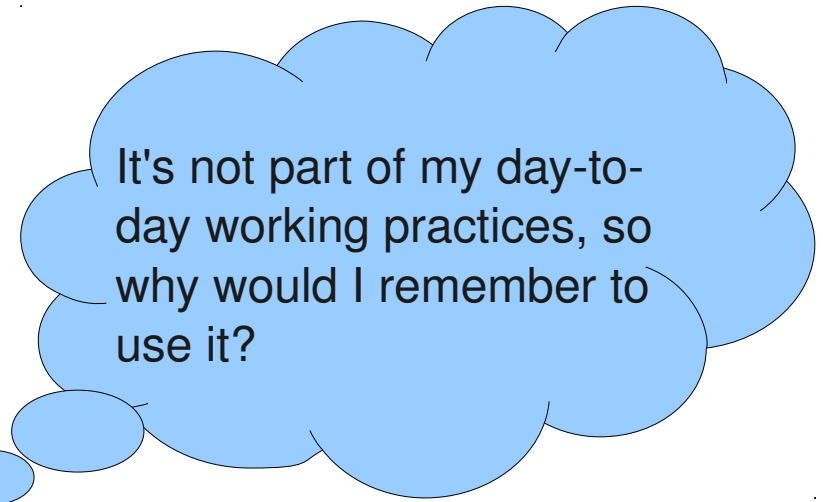
but this may not always be possible!



# 4 barriers to deposit



# 4 barriers to deposit

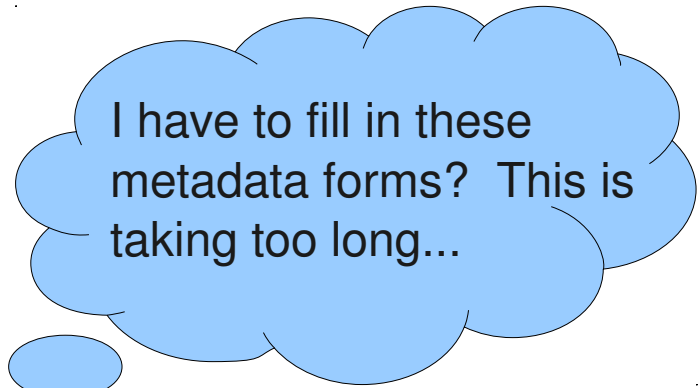
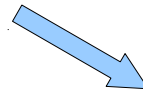
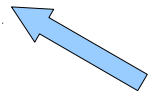


The existence and role of the repository



# 4 Barriers to deposit

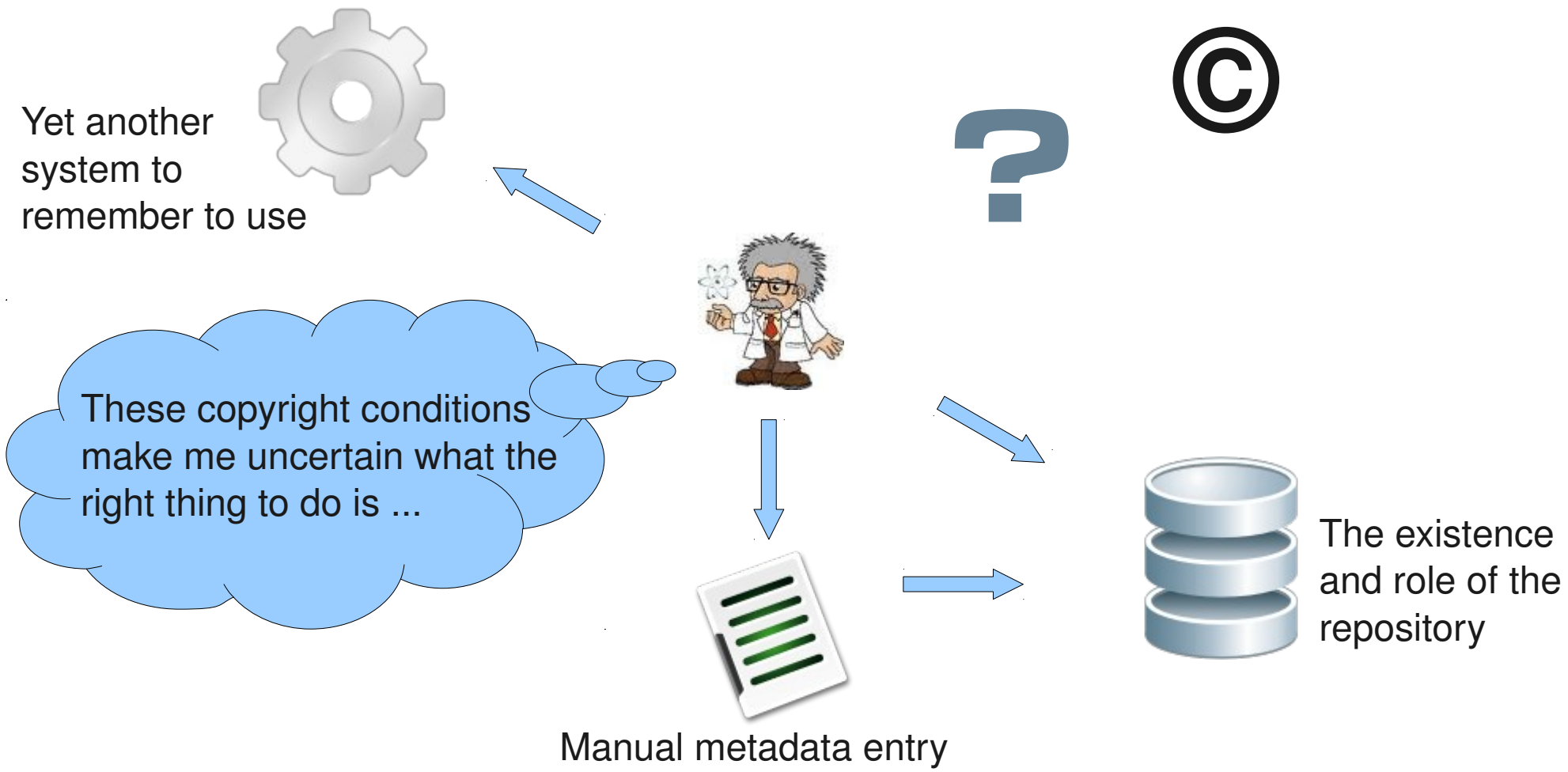
Yet another system to remember to use



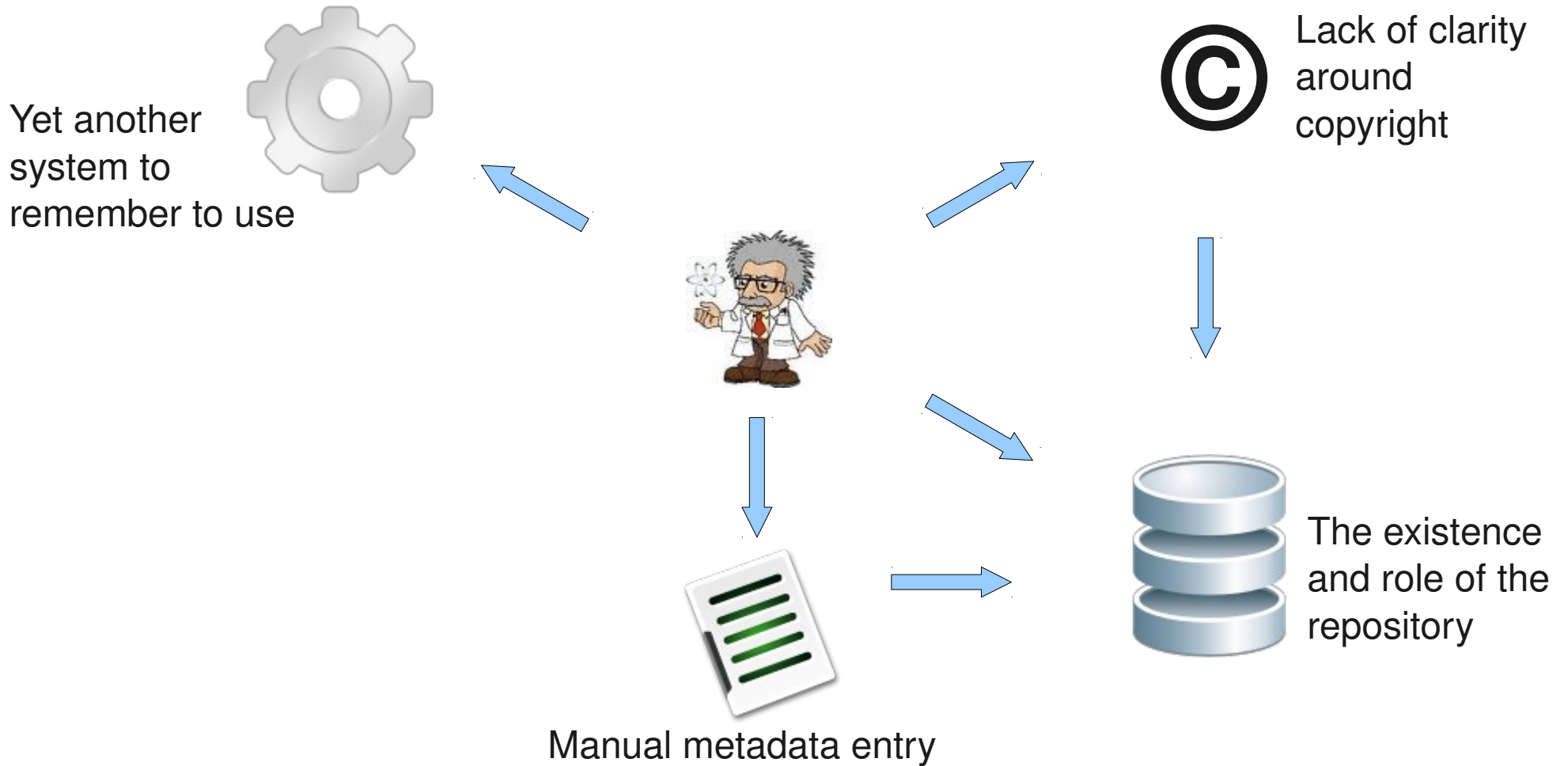
The existence and role of the repository



# 4 barriers to deposit

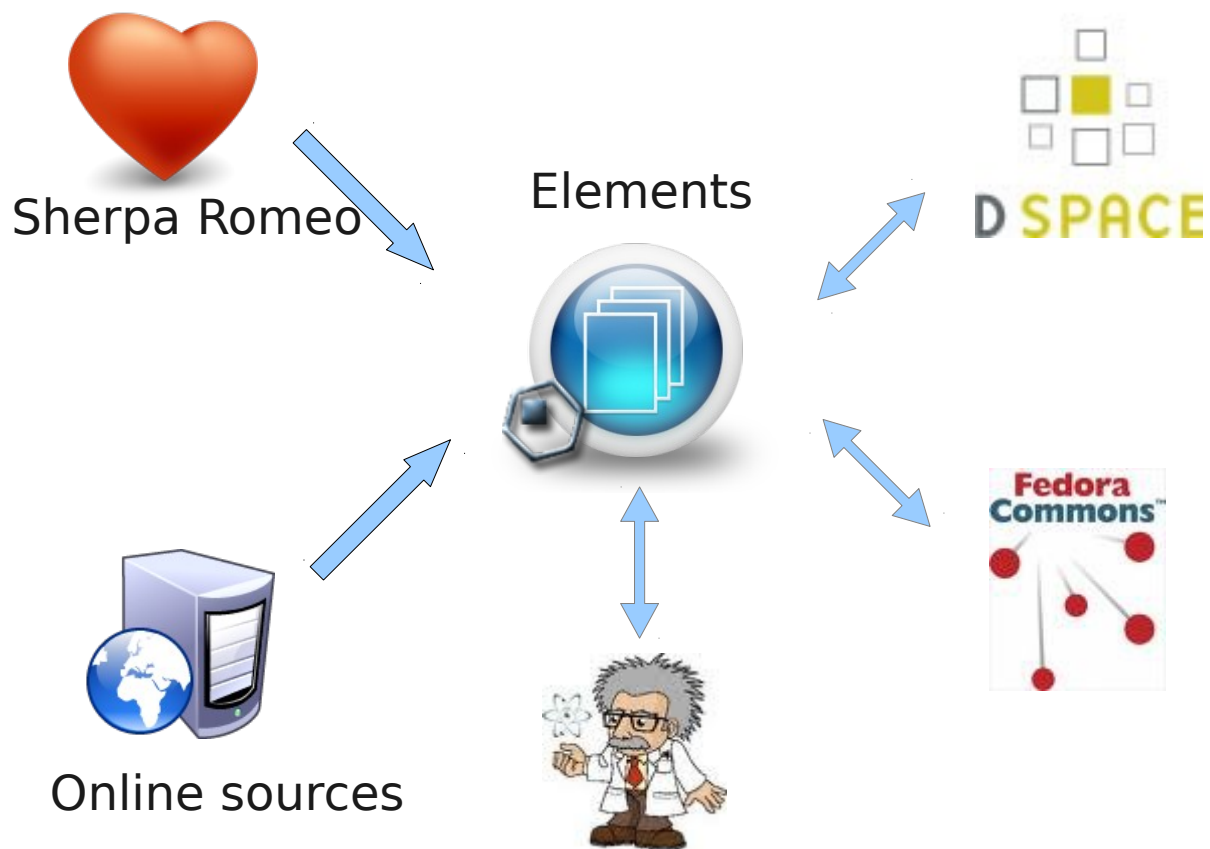


# 4 barriers to deposit

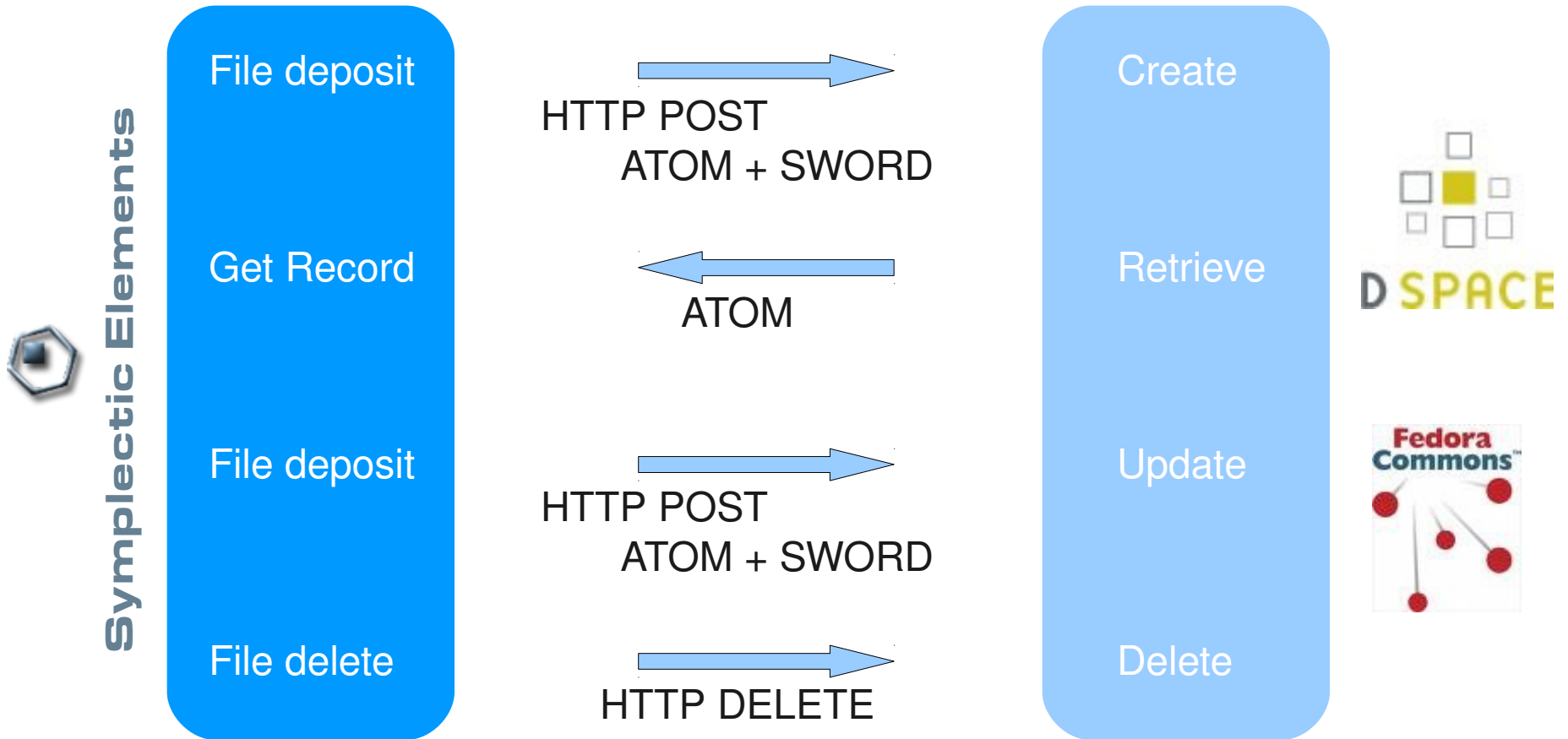




# Symplectic Elements with Repository Tools



# CRUD with AtomPub + SWORD

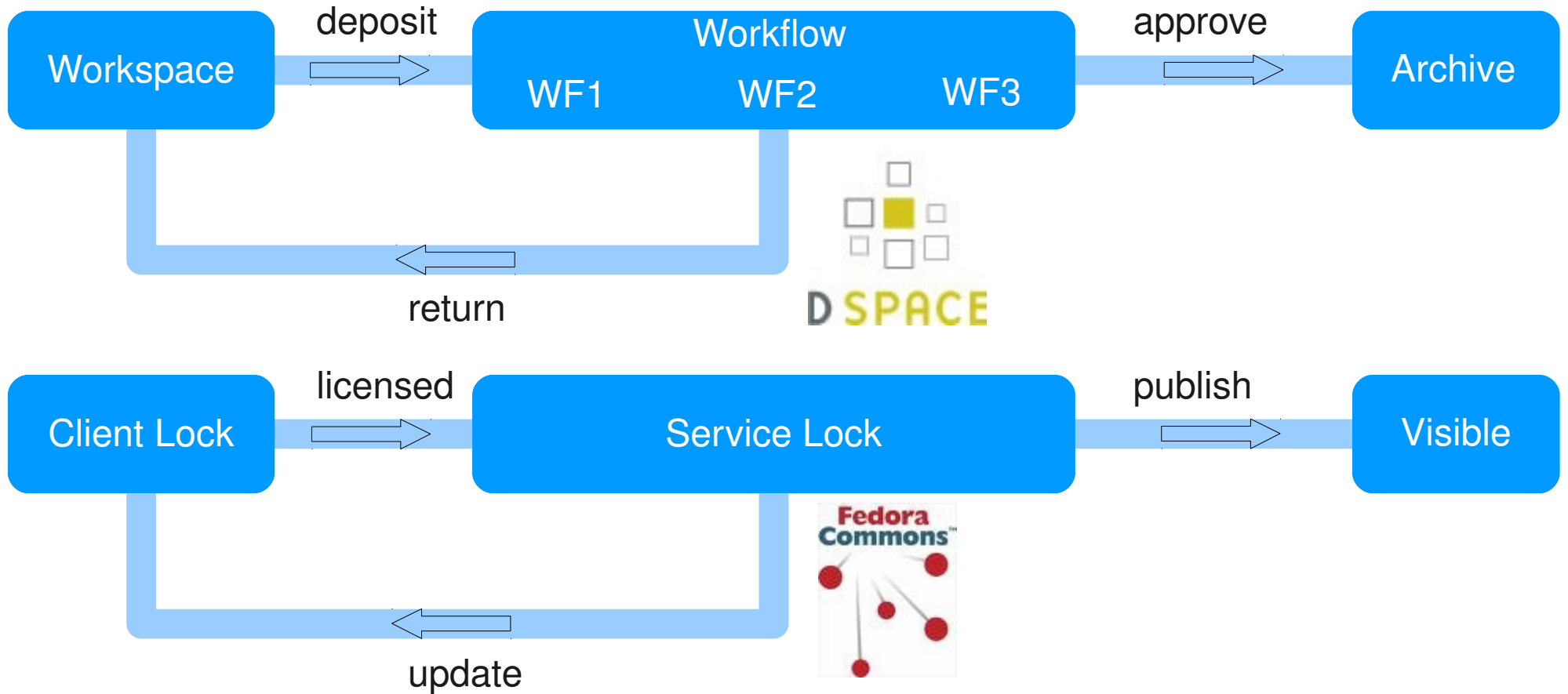


# Dynamic to Static Data Models

| Elements        | ATOM       | DSpace               | Fedora     |
|-----------------|------------|----------------------|------------|
| -               | Collection | Community/Collection | -          |
| Publication     | Feed       | Item                 | Object     |
| -               | -          | Bundle               | -          |
| Metadata Record | Entry      | Bitstream            | Datastream |

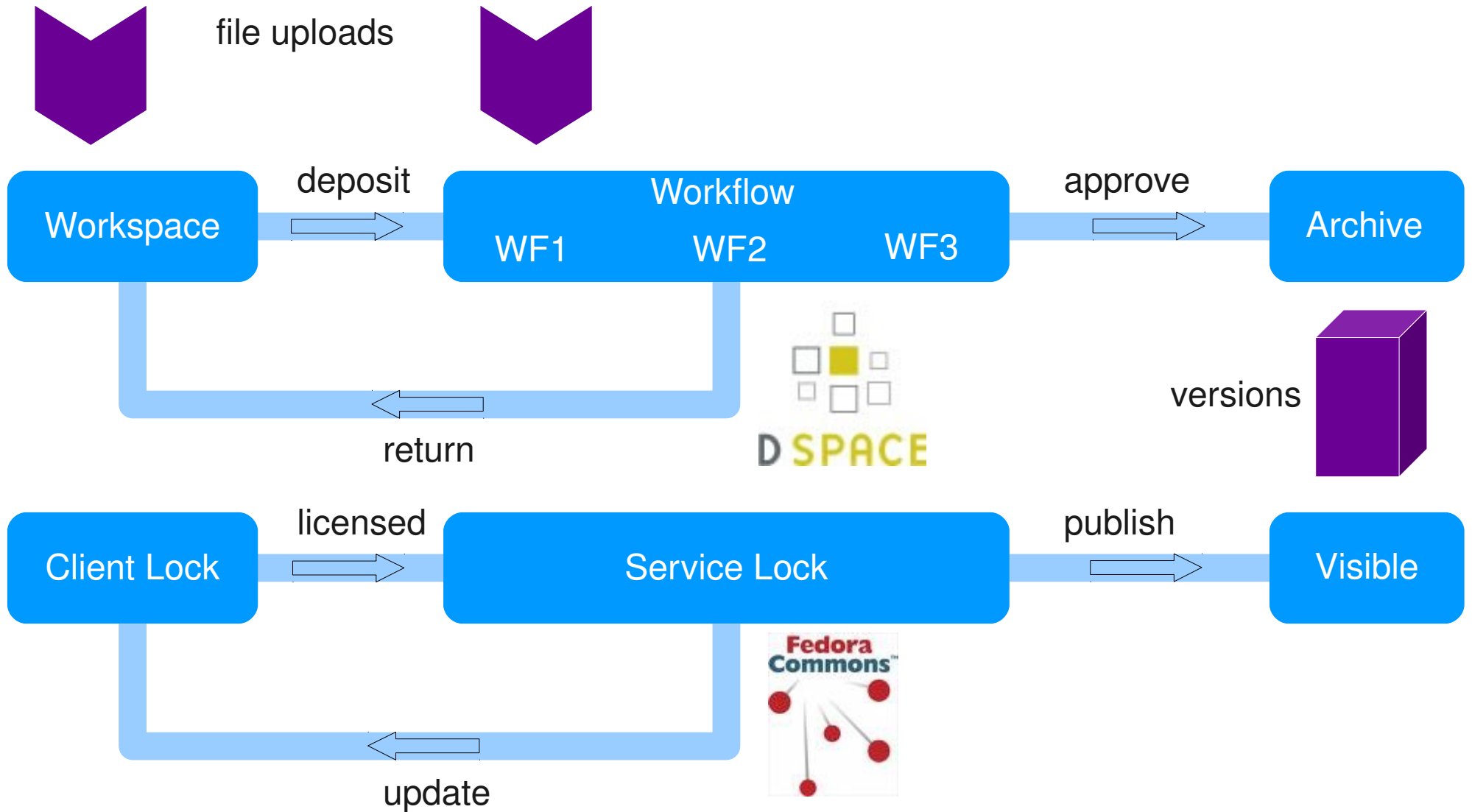


# Lifecycle Workflows



# Lifecycle Workflows

file uploads



# Implementation considerations

- ? Are metadata updates archivally significant?
- ? Are file deletes on archived files 'rapid takedown' requests?
- ? Does the repository actually require rights to store the metadata?
- ? Is it possible to completely remove content files?
- ? When should new versions of eprints be created?

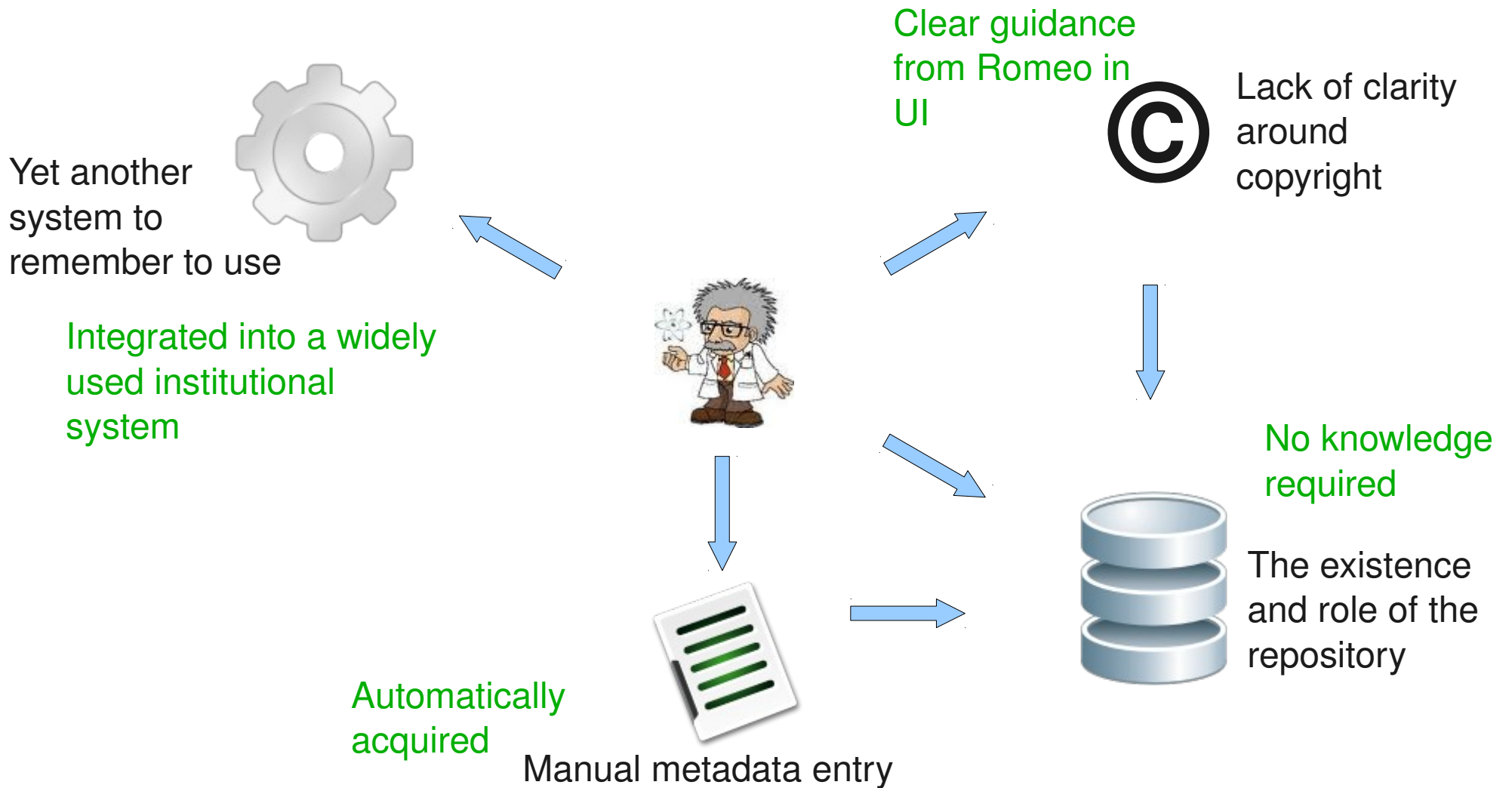


# Walkthrough

[see video]



# 4 barriers to deposit ... removed?





# Conclusions

- Seamless repository integration with Symplectic Elements (a research management system)
- Uses open standards (HTTP, AtomPub, SWORD)
- Feeding back the results of our work to SWORD
- Reduces barriers to deposit, increasing throughput to the repository
- More accurately reflects requirements for the constantly changing state of the information environment





symplectic

solutions for higher education

*Richard Jones*

*richard@symplectic.co.uk*

*<http://www.symplectic.co.uk/products/repository-tools.html>*