

Fedora 6.0 and the Oxford Common File Layout



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**What is the Oxford Common File Layout
(OCFL)?**

**A simple, non-proprietary,
specified, open-standards
approach to the layout of
preservation persistence.**

OCFL Elements

Object root

Conformance declaration

Inventory

Inventory Digest

Version directories

Content

```
[object root]
├── 0=ocfl_object_1.0
├── inventory.json
├── inventory.json.sha512
├── v1
│   ├── inventory.json
│   ├── inventory.json.sha512
│   └── content
│       ├── metadata
│       │   ├── descriptive.xml
│       │   ├── technical.xml
│       │   └── rights.xml
│       ├── page-1-OCR.txt
│       ├── page-1.tiff
│       ├── page-2-OCR.txt
│       └── page-2.tiff
└── v2
    ├── inventory.json
    ├── inventory.json.sha512
    └── content
        └── metadata
            └── descriptive.xml
```

How does the OCFL benefit Fedora and Samvera?

OCFL offers...

Parsability, both by humans and machines, to ensure content can be understood in the absence of original software

Robustness against errors, corruption, and migration between storage technologies

Versioning, so repositories can make changes to objects allowing its history to persist

Storage diversity, to ensure content can be stored on diverse storage infrastructures including cloud object stores

Completeness, so that a repository can be rebuilt from the files it stores



What will be in Fedora 6.0?

Issues being addressed

1. Preservation persistence
2. Built-in, synchronous query service
3. Better performance and scale

High-level design goals

1. Replace ModeShape
2. Implement the OCFL
3. Implement synchronous query service
4. Minimize changes to the API
5. Release with migration tooling and support

Thanks!

Fedora 6.0 Design:

<https://wiki.duraspace.org/display/FF/2019-02+Fedora+Design+Summary>

OCFL:

<https://ocfl.io>

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