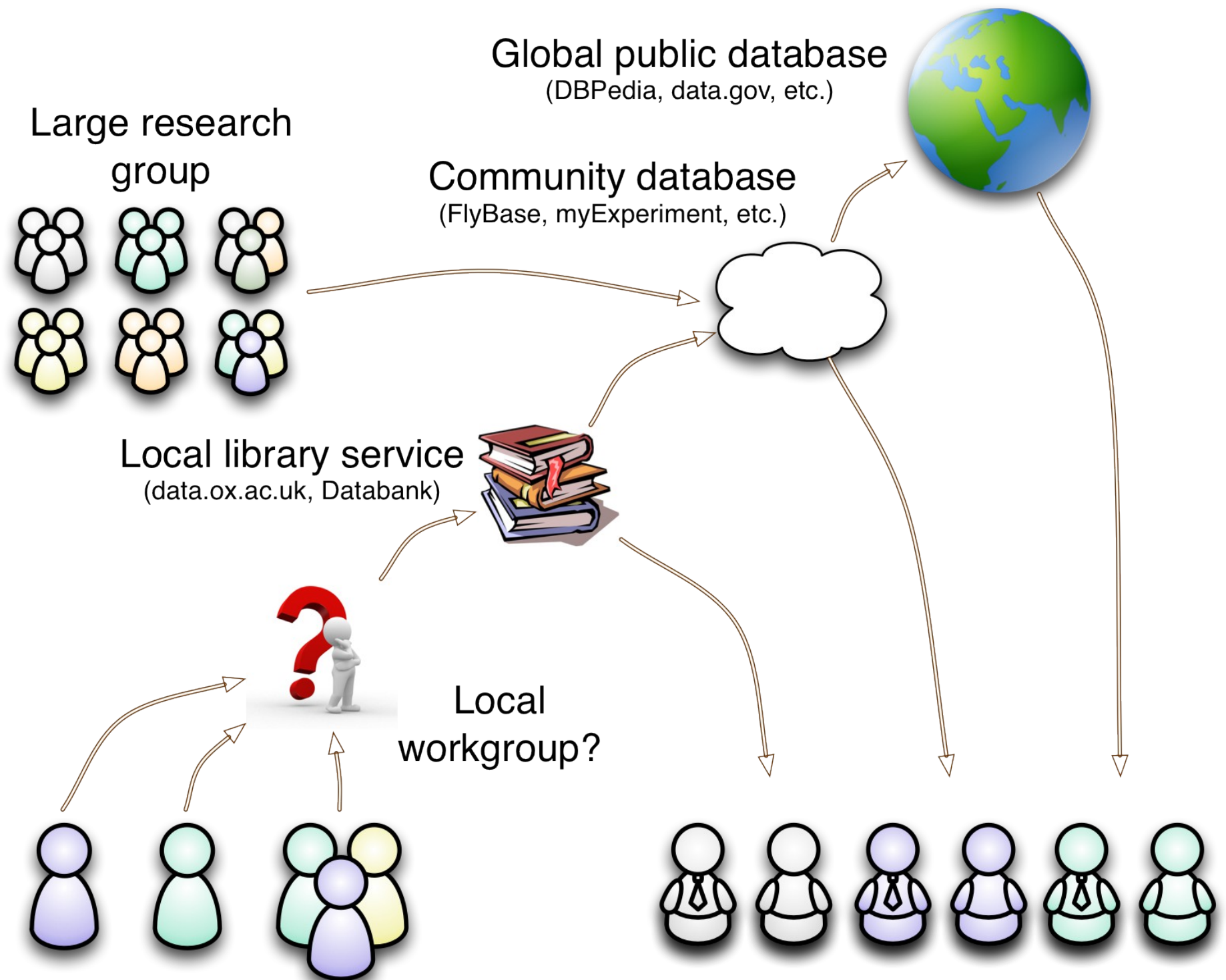


A gap in the landscape...

A gap in the landscape...

... of research data management tools  
for individual researchers and small  
research groups



*Missing:* a tool for researchers to gather, organise and share their data...

*Easily:* straight “out of the box”,

*Flexibly:* adapting to evolving needs,

*Collaboratively:* controlled exchange of data with colleagues, and

*Re-usably:* mixing with external data.

*Annalist* \*

is my attempt to fill this gap...

\* *Annalist*: a keeper of records

# Screenshots

The following screenshots illustrate some of *Annalist's* capabilities.

These screenshots are all created through the *Annalist* web interface, without prior configuration.

*Annalist* not only provides an interface for collecting semi-structured data, but also for defining its structure as it is collected...

*Live examples at: [demo.annalist.net](http://demo.annalist.net)*

Annalist data notebook site

Canal cruising log

annalist.net - Annalist demon...

Annalist data notebook site

demo.annalist.net/annalist/site/

Search

DownloadHomeStarAddNewPrinterShareMore

iGoogle

GitHub

Luggage

ImageWeb

antiparos

in progress

Checklists

Twitter

Most Visited

# Annalist data notebook site

Home

User adminLogout

## Collections

	Id	Label
<input type="checkbox"/>	<a href="#">BibliographyData</a>	Bibliographic data
<input type="checkbox"/>	<a href="#">CALMA_data</a>	CALMA data from Sonic Annotator
<input type="checkbox"/>	<a href="#">CruisingLog</a>	Canal cruising log
<input type="checkbox"/>	<a href="#">DMO_Experiment</a>	Experimental Digital Music Object
<input type="checkbox"/>	<a href="#">MusicalInstruments</a>	Catalogue of musical instruments

Remove selected

New

## Front page

This page lists available data collections, and allows new ones to be created.

# Canal cruising log

Home CruisingLog

User admin

Logout

## List of daily log entries

Search

List view

DailyLog\_list

View

View all

	Id	Place moored	Label
<input type="checkbox"/>	Log_20111002	Weston_cliff_wood	2011-Oct-02: Mercia to Weston
<input type="checkbox"/>	Log_20111003	Sawley_cut	2011-Oct-03: Weston to Sawley cut
<input type="checkbox"/>	Log_20111004	Bishops_Meadow	2011-Oct-04: Sawley - Shardlow - Loughborough
<input type="checkbox"/>	Log_20111005	Loughborough_Moor	2011-Oct-05: Bishops Meadow - Loughborough - Loughborough Moor
<input type="checkbox"/>	Log_20111006	Loughborough	2011-Oct-06: Loughborough Moor - Pillings Lock - Loughborough
<input type="checkbox"/>	Log_20111007	Beeston_canal	2011-Oct-07: Loughborough - Beeston Canal
<input type="checkbox"/>	Log_20111008	Nottingham	2011-Oct-08: Beeston canal - Nottingham
<input type="checkbox"/>	Log_20111009	Cranfleet_cut	2011-Oct-09: Nottingham - Cranfleet cut
<input type="checkbox"/>	Log_20111010	Mercia_marina	2011-Oct-10: Cranfleet cut - Shardlow - Mercia
<input type="checkbox"/>	Log_20111014	Mercia_marina	2011-Oct-14: Mercia marina
<input type="checkbox"/>	Log_20120227	Mercia_marina	2012-Feb-25/27: Maintenance visit
<input type="checkbox"/>	Log_20120405	Shobnall_fields	2012-Apr-05: Mercia - Shobnall
<input type="checkbox"/>	Log_20120406	Alrewas	2012-Apr-06: Shobnall - Alrewas
<input type="checkbox"/>	Log_20120407	Rugely	2012-Apr-07: Alrewas - Fradley - Rugely
<input type="checkbox"/>	Log_20120408	Stoke	2012-Apr-08: Fradley - Stoke Newington - Stoke



# Canal cruising log

[Home](#)
[CruisingLog](#)
[DailyLog](#)
[User admin](#)
[Logout](#)

Id	<a href="#">Log_20120405</a>	Type	<a href="#">DailyLog</a>
Label	2012-Apr-05: Mercia - Shobnall		
Cruise segments	Place departed	Travel time	
	<a href="#">Mercia_marina</a>	3	
Place moored	<a href="#">Shobnall_fields</a>	Travel time	3
Notes	<p>Ran Bubble stove overnight to heat water and warm boat. Full power for 5 hrs, medium for 5 hrs, then low. Continuous running at low does seem to be effective for keeping the boat warm once the chill and damp have been dispelled.</p> <p>Filled up the stove fuel tank: 18": when full. 65.8 litres taken.</p> <p>Mercia - Shobnall: 3 hrs</p>		
Engine hours	3492.6+	Engine fuel	
Water level		Stove fuel	18
Pictures	(None)		
<a href="#">Close</a> <a href="#">Copy</a> <a href="#">Edit</a>			<a href="#">View description</a>

Choose view
 [Dailylog\\_view](#)
[Show view](#)



# Canal cruising log

Home CruisingLog Place User admin Logout

Id Shobnall\_fields Waterway Trent\_Mersey

Label Shobnall fields, Burton

Notes Very pleasant moorings on edge of Burton-on-Trent, about 15 minutes walk from town centre, and adjacent to playing fields.,  
No facilities.

Pictures

Picture



Description

Daffodils at Shobnall Fields in spring.

Close Copy Edit

View description

# Canal cruising log

Home CruisingLog Place User admin Logout

Id Shobnall\_fields Waterway Trent\_Mersey +

Label Shobnall fields, Burton

Notes

Very pleasant moorings on edge of Burton-on-Trent, about 15 minutes walk from town centre, and adjacent to playing fields.,

No facilities.

Pictures

Picture	Description
<input type="checkbox"/> <a href="https://farm8.staticflickr.com/7331/1587324">https://farm8.staticflickr.com/7331/1587324</a>	Daffodils at Shobnall Fields in spring.

Remove picture Add picture

Save

Cancel

Edit view



# Canal cruising log

Id

Label

Help 

Description of a place on or near a canal

Record type

Editable view? ☒ (edit view from edit entity form)

Fields

	Field id		Property	Position/size
<input type="checkbox"/>	Entity_id	+	(field URI or CURIE)	(0/6)
<input type="checkbox"/>	Waterway	+	(field URI or CURIE)	(0/6)
<input type="checkbox"/>	Entity_label	+	(field URI or CURIE)	(0/12)
<input type="checkbox"/>	Place_notes	+	(field URI or CURIE)	(0/12)
<input type="checkbox"/>	AnnotatedPictures	+	ccl:pictures	(0/6)

# Experimental Digital Music Object

Home DMO\_Experiment

User admin

Logout

## List of events

Search

List view

Event\_list

View

View all

	Id	Label	Type of event
<input checked="" type="checkbox"/>	<a href="#">2014_11_05_das_rheingold</a>	Das Rheingold, Birmingham, 5 November 2014	<a href="#">Performance</a>
<input type="checkbox"/>	<a href="#">2014_11_06_die_walkure</a>	Die Walküre, Birmingham, 6 November 2014	<a href="#">Performance</a>
<input type="checkbox"/>	<a href="#">2014_11_08_siegfried</a>	Siegfried, Birmingham, 8 November 2014	<a href="#">Performance</a>
<input type="checkbox"/>	<a href="#">2014_11_09_gotterdammerung</a>	Götterdämmerung, Birmingham, 9 November 2014	<a href="#">Performance</a>
<input type="checkbox"/>	<a href="#">2014_11_ring_cycle</a>	Wagner Ring Cycle, Birmingham, November 2014	<a href="#">Festival</a>

New

Copy

Edit

Delete

Close

Set default

Customize

## List of entities

This page lists entities records in a collection, and provides options for them to be created, copied, edited or deleted. Initially, the default behaviour is to display all entities defined in the current collection, but different list options may be selected from the 'List view' dropdown, and displayed contents may be filtered by entering a value in the 'Search' box. To **refresh the display** after making any such selections, click the 'View' button. To **set the default list** for the current collection to be the currently displayed list, click on the 'Set default' button at the bottom of the page.

# Experimental Digital Music Object

Home

## DMO\_Experiment

Event

User admin

Logout

Id	2014_11_05_das_rheingold		Type of event	Performance
Label	Das Rheingold, Birmingham, 5 November 2014			
Description	First opera of the The Wagner Ring Cycle performed at the Birmingham Hippodrome, conducted by Valery Gergiev.			
Umbrella event	2014_11_ring_cycle	Event location	birmingham_hippodrome	
Event starts	2014-11-05	Event ends	2014-11-05	
Composition(s)	Composition wagner_ring_cycle			
Performers	Role	Performer		
	Conductor	valery_gergiev		
	Bass	willard_white		
	Mezzo-soprano	ekaterina_gubanova		
	Tenor(?)	andreas_schager		
		vitaly_kovalyov		
	Bass	mikhail_petrenko		
	Soprano	mlada_khudoley		
Organizations	Role of organization	Organization		
	Opera company	mariinsky_opera		
Documentary resources	Type of document	Documentary resource		
	Score	wagner_ring_cycle_scores		
Links	Role	Link		
	Festival web site	www.birminghamhippodrome.com/WhatsOn_focus.asp?showId=18		
	Performance web page	www.birminghamhippodrome.com/WhatsOn_focus.asp?showId=18		

Close

Copy

Edit

[View description](#)



**demo.annalist.net/annalist/c/DMO\_Experiment/v/Event\_view/Event/2014\_11\_05\_das\_rheingold/lec**

---

**Label**  
Das Rheingold, Birmingham, 5 November 2014

**Description**  
First opera of the The Wagner Ring Cycle performed at the Birmingham Hippodrome, conducted by Valery Gergiev.

**Umbrella event**  
2014\_11\_ring\_cycle    Event location  
birmingham\_hippodrome

**Event starts**  
2014-11-05    **Event ends**  
2014-11-05

**Composition(s)**

Composition
<input type="checkbox"/> wagner_ring_cycle

Remove composition   Add composition

**Performers**

Role	Performer
<input type="checkbox"/> Conductor	valery_gergiev
<input type="checkbox"/> Bass	willard_white
<input type="checkbox"/> Mezzo-soprano	ekaterina_gubanova
<input type="checkbox"/> Tenor(?)	andreas_schager
<input type="checkbox"/> (role)	vitaly_kovalyov
<input type="checkbox"/> Bass	mikhail_petrenko
<input type="checkbox"/> Soprano	mlada_khudoley

Remove performer   Add performer

**Organizations**

Role of organization	Organization
<input type="checkbox"/> Opera company	mariinsky_opera

Remove organization   Add organization

**Documentary resources**

Type of document	Documentary resource
<input type="checkbox"/> Score	wagner_ring_cycle_scores

Remove document   Add document

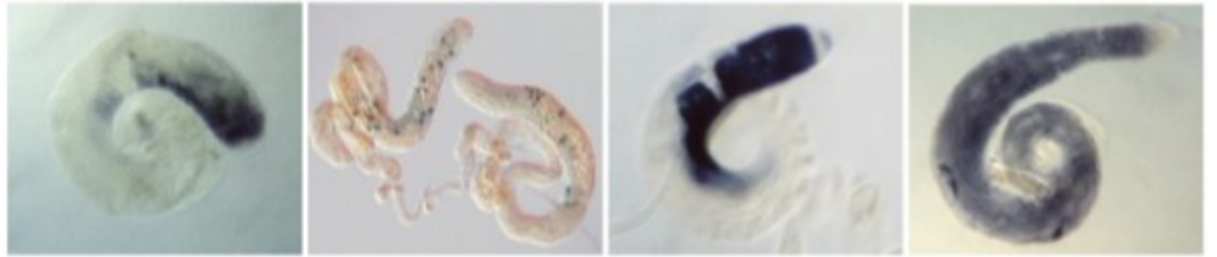
**Links**

Role	Link
<input type="checkbox"/> Festival web site	http://www.birminghamhippodrome.com/WhatsOn_focus.asp?showId=18
<input type="checkbox"/> Performance web page	http://www.birminghamhippodrome.com/WhatsOn_focus.asp?showId=18

Delete link   Add link

Save   Cancel   Edit view

# Target applications (ideas)

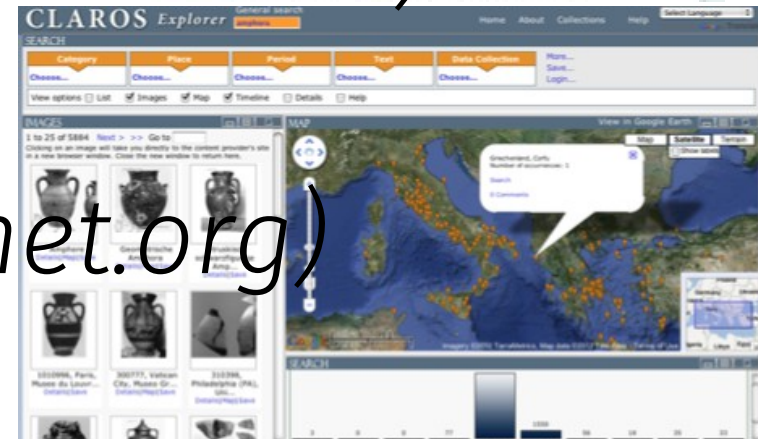


Annotated image collections (*FlyData*)

Research Objects (*myExperiment*)

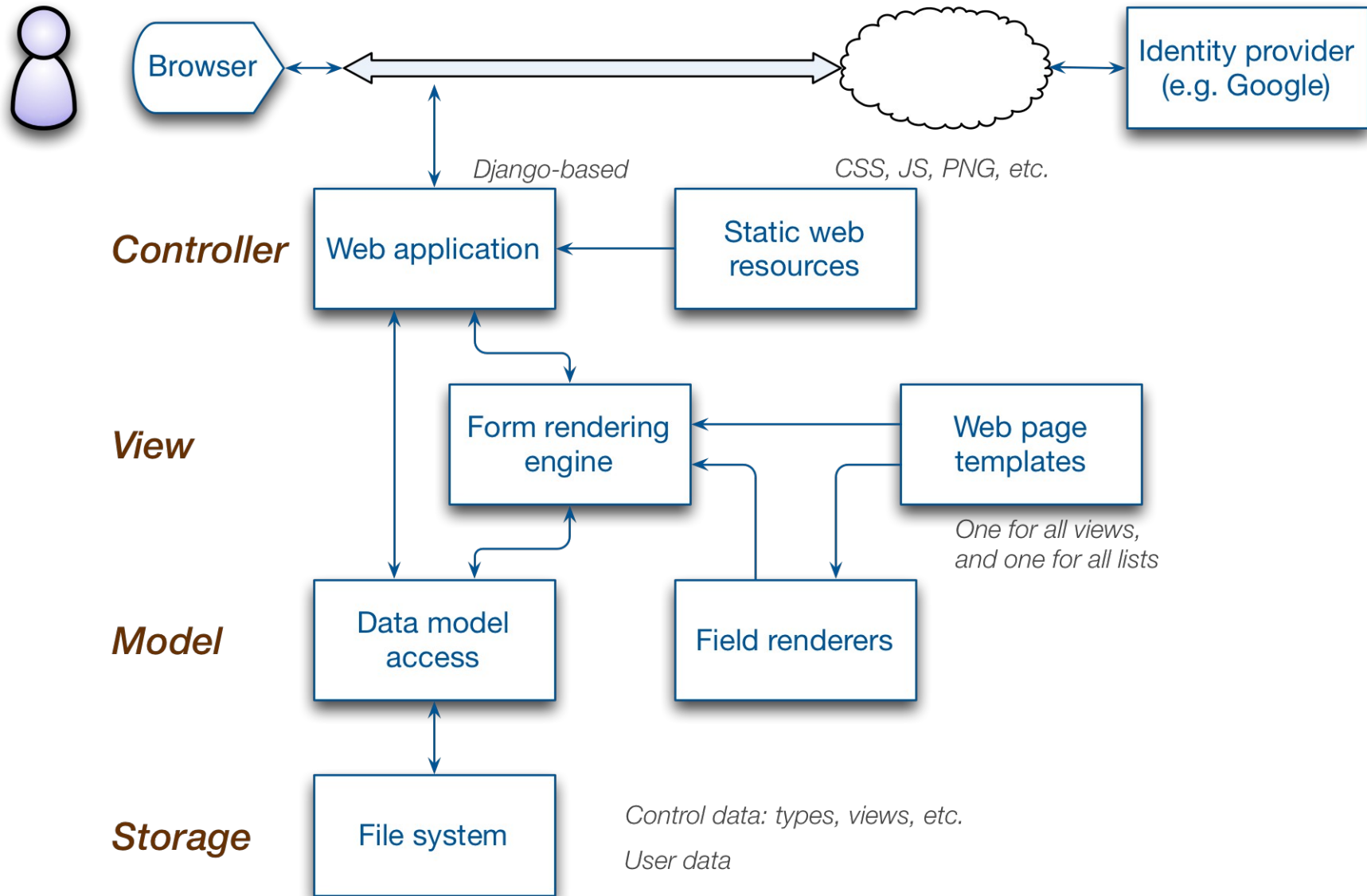
Digital Music Objects (*FAST IMPACT*)

CLAROS notebook (*clarosnet.org*)





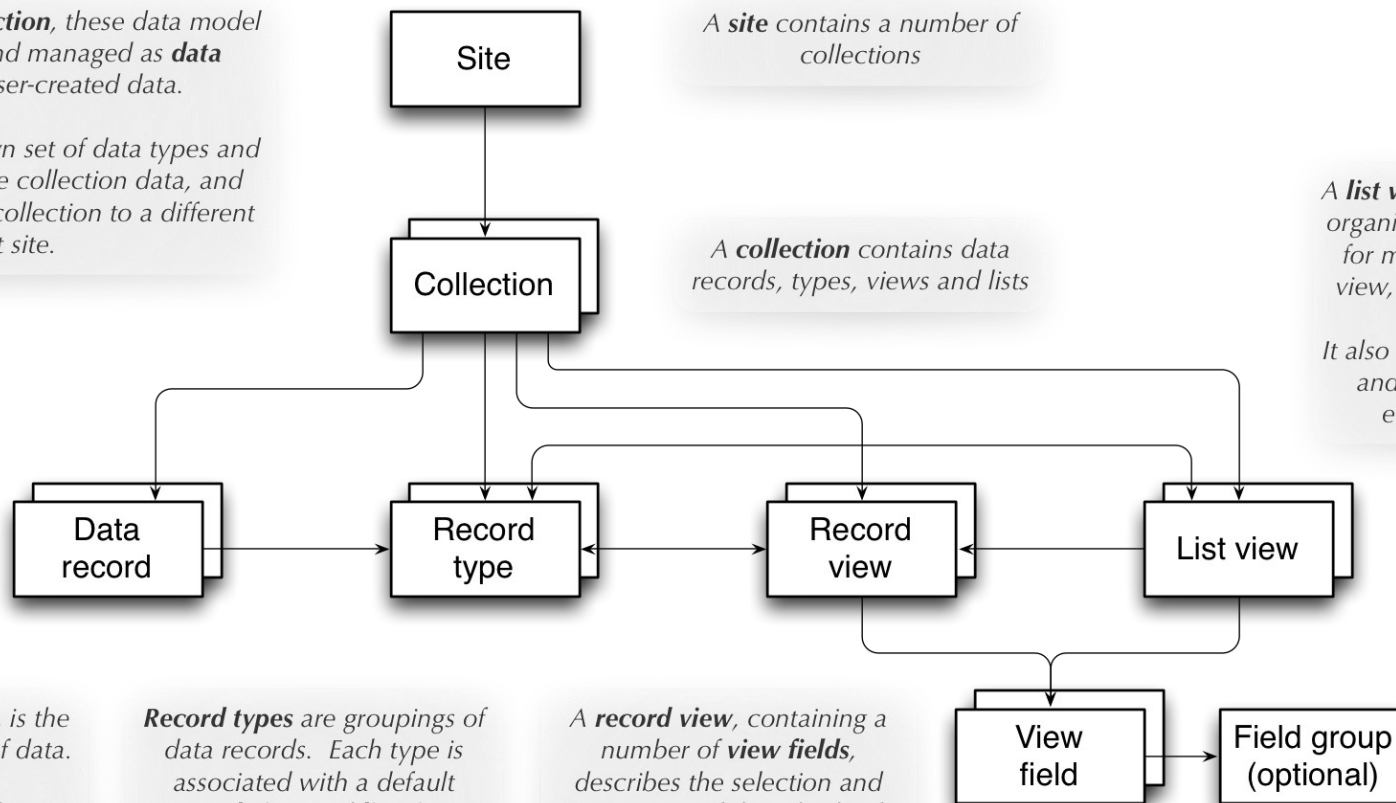
# Technical elements



# Data storage model

Apart from **site** and **collection**, these data model elements are stored and managed as **data records**, like any user-created data.

Each collection has its own set of data types and views that are part of the collection data, and may be moved with the collection to a different Annalist site.



A **site** contains a number of collections

A **collection** contains data records, types, views and lists

A **list view** describes the selection and organisation of summary data display for multiple records. Like a record view, it has a number of view fields.

It also associates a default record type and view for use when creating, editing or viewing a record.

A **data record**, or entity, is the basic addressable unit of data.

It contains labelled fields, one of which is an identifier string, but otherwise has no predefined structure.

Each data record is stored and accessed as a JSON file.

**Record types** are groupings of data records. Each type is associated with a default **record view** and **list view**.

Types do not define any structure for data records.

A **record view**, containing a number of **view fields**, describes the selection and organisation of data display for a single data record.

Possible data structures within a data record are exposed through these views.

A **view field** describes a data element (or **field group**) that may appear in a **record view** or **list view**.

It describes how data are located within a data record, whether or not they are one-off or repeated, and how they are presented (rendered)

A **field group** may be used for describing a set of fields that are displayed together, often as a repeating pattern

# Experimental Digital Music Object

## List users

Search

List view 

User\_list

View View all

	User Id	URI	Permissions
<input type="checkbox"/>	<a href="#">_default_user_perms</a>	annal:User/_default_user_perms	VIEW UPDATE
<input type="checkbox"/>	<a href="#">_unknown_user_perms</a>	annal:User/_unknown_user_perms	VIEW UPDATE
<input type="checkbox"/>	<a href="#">admin</a>	mailto:admin@localhost	VIEW CREATE UPDATE DELETE CONFIG CREATE_COLL DELETE_COLL ADMIN
<input type="checkbox"/>	<a href="#">gklyne</a>	mailto:graham.klyne@oerc.ox.ac.uk	VIEW CREATE UPDATE DELETE CONFIG ADMIN

New Copy Edit Delete

Close

Set default Customize

## List of entities

This page lists entities records in a collection, and provides options for them to be created, copied, edited or deleted. Initially, the default behaviour is to display all entities defined in the current collection, but different list options may be selected from the 'List view' dropdown, and displayed contents may be filtered by entering a value in the 'Search' box. To **refresh the display** after making any such selections, click the 'View' button. To **set the default list** for the current collection to be the currently displayed list, click on the 'Set default' button at the bottom of the page.

# Current status

Ongoing independent project

Public prototype, with demonstrator

<http://demo.annalist.net/>

Open development

<https://github.com/gklyne/annalist>

Looking for collaborations

to guide and support future developments

For more information:

<http://annalist.net/>

<http://demo.annalist.net/>

<https://github.com/gklyne/annalist>

<mailto:graham.klyne@oerc.ox.ac.uk>

... or just talk to me!