

Requirements Analysis Overview – IRIOS-2

General Requirements

The IRIOS-2 platform builds upon the demonstrator system produced in the first phase IRIOS project. The existing functionality is to be extended in the following key areas:-

1. Four aspects of the IRIOS platform to be extended are:
 - a. Interoperate CERIF-compliant or wrapped CRIS at HEIs and RCs
 - b. Support for a benchmarking performance and outputs. 20 output types will be included in the IRIOS-2 platform including sculptures, artistic performances etc.
 - c. Relationship types between outputs and originators extended to support non author roles regardless of organisation. For the outputs supported by IRIOS-2 we will refer to the person(s) who created the output as the author (whereas they may actually be the composer/sculptor), and including multi-originator outputs (not supported by IRIOS 1), and also complex relationship management for example in multi-partner projects.
 - d. These complex relationships will then be linked to grants and awards, proportionately where appropriate – i.e. where a project is split 50-30-20% between three institutions the system will support the recording and supporting of this.
2. Providing an integrated platform for joint research activities between HEI's, by supporting the sharing of research on projects and publications. The IRIOS-2 platform will also support research proposal generation by providing a collaborative environment for the development of project partnerships by providing facilities such as discussion fora, document sharing, managing availability of resources etc. This will also provide a transparency of non-confidential research information, providing a unique resource of linked research project and output information in one place.
3. Finding and accessing outputs (including performance arts, sculptures, datasets and publications etc.), and also patents (for innovation activity).
4. Reconciliation of grant status and finance information between Research Councils and HEIs – providing an interface for HEIs to see project status information held at RCs, so that synchronising records can be more readily achieved. Currently, considerable time is spent handling this process manually.
5. An RMAS compliant platform – IRIOS-2 will incorporate an adapter-connector to the RMAS framework. Hosted in a cloud environment, the RMAS framework will provide

a conduit for HEIs to access the collaborative environment for project preparation and tracking outputs.

As outlined in the IRIOS-2 project plan, IRIOS-2 will take the proof-of-concept CERIF-based demonstrator from the first IRIOS project and use it to build a business-to-business (B2B) platform linking Research Councils (RCs) and Higher Education Institutions (HEIs). HEIs with established systems such as PURE and Converis will be able to access RC data on grants more readily. HEIs without third party information management tools will be able to use IRIOS-2 to access the RC data on grants (including finances) and outputs. By providing access for HEIs in addition to RCs to a centrally maintained repository of information on grants and outputs, IRIOS-2 will significantly improve efficiency by reducing time spent reconciling records, and providing access by making the platform available to other HEIs and offering it as a model for integration.

The schematic below (Figure 1) illustrates the general process of the phase one demonstrator.

The process is as follows:-

1. Import of research council data (whether CERIF or CSV) into the CERIF compliant (modified) UNIS platform
2. Providing CERIF compliant format RC data accessible to various HEIs (initially Sunderland, Glasgow and St Andrews) to search, filter
3. Ability to link project data (inputs) to outputs
4. Finally, the option to export appropriate data to individual HEIs CERIF compliant institutional repository systems, including the IRIOS-1 wrapper.

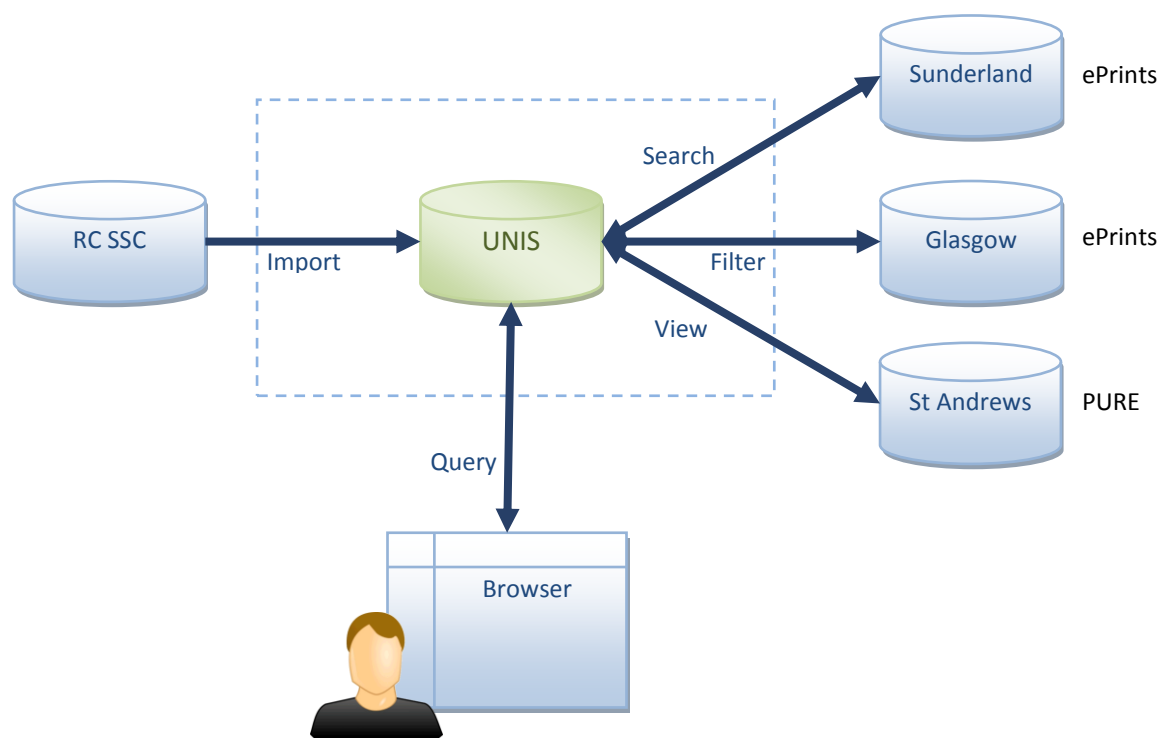


Figure 1 – the IRIOS phase one demonstrator

Each phase of the process have various technical, functional and user requirements.

The phase two (extended) IRIOS-2 platform is represented as follows:-

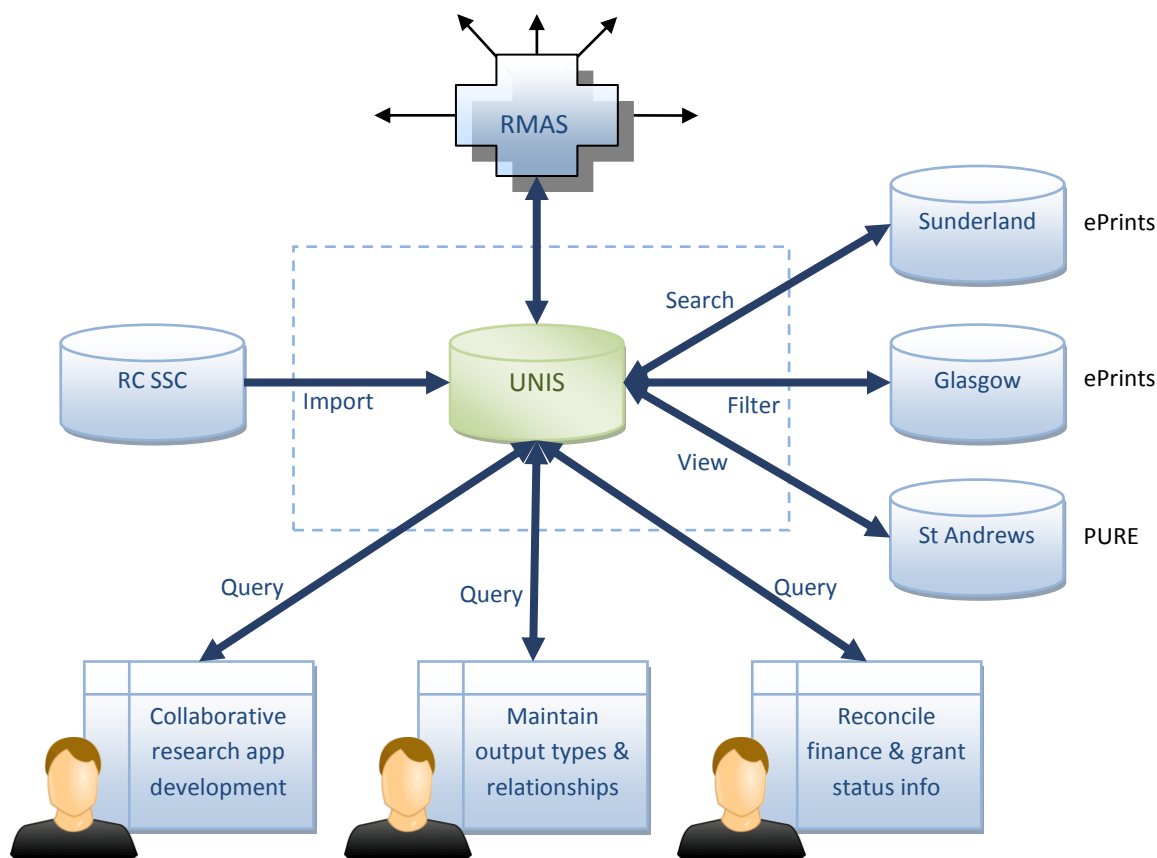


Figure 2 – the IRIOS phase 2 platform

Functionality and User Requirements

Users of the demonstrator require access to the system. Upon access, the demonstrator should facilitate user searching for appropriate and relevant information pertaining to various funding bodies.

Users will be able to manage a range of output types, and relationships between grants and outputs, exporting the results in CERIF format as required.

The IRIOS-2 platform will be able to support collaborative partnership formation between HEIs for research application generation. Exchange of published research outputs and metadata will also be supported.

An interface for viewing and editing project status information will be available to assist in financial reconciliation of records at HEIs and RCs.

A connection onto the RMAS framework will be available, to support the exchange of CERIF data between applications locally, and onto the national enterprise service bus.

Export of CERIF Data

The demonstrator will support the export of research council data in CERIF format. This will probably take the form of a filtered sub-set of the RC data.

The HEIs in the project require a standalone system capable of handling CERIF format data for import and storage.