

Linking Observations and Publications: the ESO Telescope Bibliography

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Telescope bibliographies – why?

- Retrieve published papers that use specific facilities
- Derive statistics to evaluate performance and measure scientific impact
- Define guidelines for future telescopes and instruments
- Interconnect resources:
 - publications >> observing programs >> archival data
 - archival data >> all publications using the same observational programs

Abstract

Bibliometric studies have become increasingly important in evaluating individual scientists, specific facilities, and entire observatories. In this context, the ESO Libraries have developed and maintain two tools:

(1) FUSE is a full-text search tool that semi-automatically scans defined sets of journal articles for organizational keyword sets, while providing highlighted results in context

(2) the Telescope Bibliography (telbib) is used to classify ESO-related papers, store additional metadata, and generate statistics and reports. Both tools rely heavily on the ADS Abstract Service for bibliographic metadata.

The new public telbib interface provides faceted searches and filtering, autosuggest support for author, bibcode and programID searches, hit highlighting as well as recommendations for other papers of possible interest. It is available at www.eso.org/libraries/telbib.html

Scientific literature

Semi-automated search tool
FUSE

Telbib database (back-end)

FUSE and telbib @ ESO (Fig. 1)

Access to literature

Online access to refereed e-journals

FUSE search tool

Semi-automated full-text search tool

Telbib back-end

Telescope Bibliography (telbib) database w/ bibliographic info from ADS

Telbib tags and programIDs

Standardized descriptions of telescopes, instruments, surveys, etc. as well as program IDs assigned by ESO Librarians

Data archive

Telbib records contain links to data in the ESO Archive

Telbib front-end

Information in the Archive leads to the telbib public interface, and from there to articles that use the data

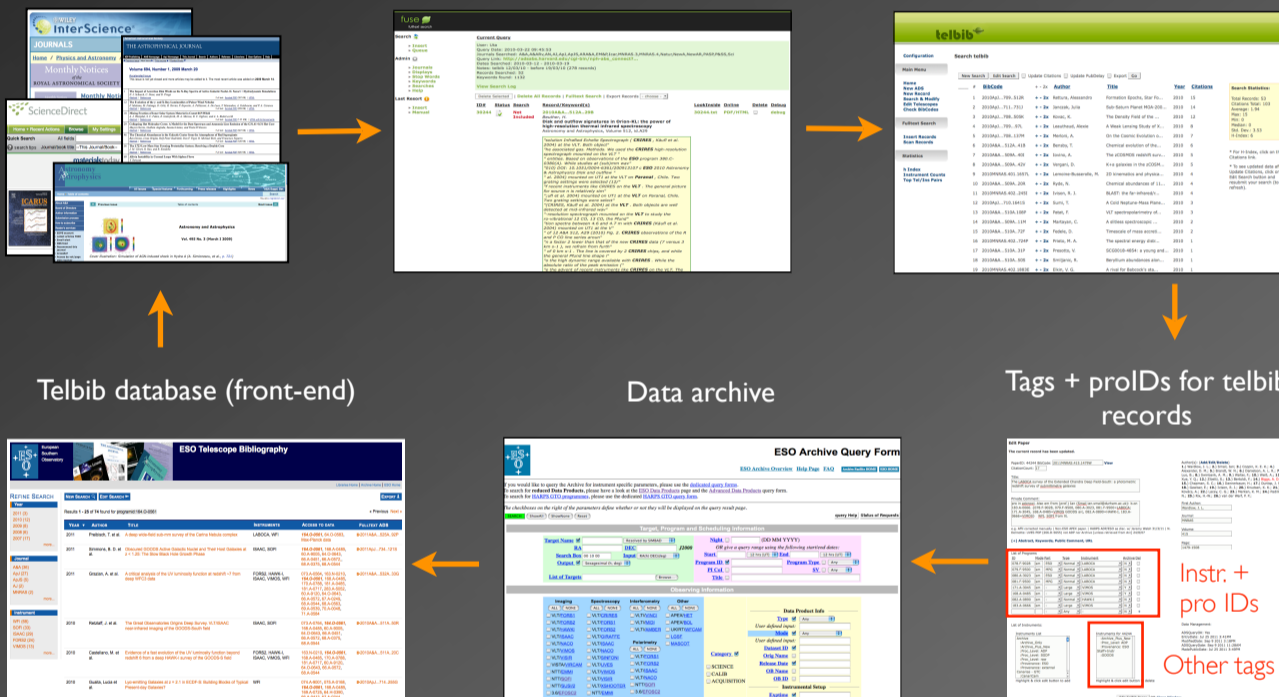


Fig. 1: FUSE and telbib link published literature and data located in the Archive, keeping track of the observing facilities and programs used for the research

ESO Telbib Public Interface

rollout in Q4 / 2011

(Fig. 2)

Search interface

- query by bibliographic info or instrument, telescope, proID
- spellchecker for search terms ("Did you mean...?")
- overview of top 5 journals and instruments
- autosuggest support for author, bibcode, proID searches

Results list

- paper titles linked to detailed display
- faceted filtering to limit results
- program IDs linked to data in ESO Archive
- export feature for further use of results set

Detailed record display

- full list of observing facilities + additional tags
- highlighted search terms
- recommendations for other papers of interest

Fig. 2: New public interface of ESO's telescope bibliography: (a) search interface (b) results list (c) detailed record display