



LEAF - Linking and Exploring Authority Files

IST-2000-26323

Coverage Matrix

DATE	23.04.2003
AUTHOR	K. Majcen, H. Vallant
QUALITY ASSURANCE	R. Bull
WORK PACKAGE	6
KEYWORDS	requirements, web pages, mapping
DELIVERABLE NUMBER	6.1

DOCUMENT HISTORY

Version	Date	Comments	Status	Distribution
0.1	5.12.2001	First internal draft of the structure	Draft	JR's LEAF team
0.2	7.6.2002	Added recommendations	Draft	JR's LEAF team
1.0	7.3.2003	Updated after technical meeting in Berlin (February 7 th 2003)	Draft for QA	LEAF consortium
1.1	9.4.2003	Minor corrections	Final for QA	Rob Bull
1.2	23.4.2003	QA Process	Final	LEAF consortium

Table of Contents

Table of Contents	2
1 Introduction	3
1.1 Scope.....	3
1.2 Document Overview	3
2 Workflows and web pages	3
3 Mapped user recommendations	4
4 Implicitly fulfilled recommendations	8
5 Dropped user recommendations	9
6 Development tasks	9
Figures	10
Tables	11
Definitions, Acronyms and Abbreviations	12
References	14

1 Introduction

1.1 Scope

This document is the Coverage Matrix for the development in the project LEAF (Linking and Exploring Authority Files; project number IST-2000-26323). This document was done under Work Package 6 (*Functional Specifications of the Demonstrator*) of the project (see [DoW]).

The purpose of this document is to show how the various system components and user interface screens of the LEAF demonstrator cover the user needs as described in the MRAD documents.

The intended **readership** of this document are all **project participants**.

1.2 Document Overview

Chapter 1 is this introduction. In chapter 2 the principle workflows and corresponding web pages are shown. Section 3 provides the mapping between the requirements the components or web pages. Chapter 4 lists the requirements which are implicitly fulfilled through the specific implementation. Some requirements were dropped in the discussion process of the LEA consortium – these are shown in chapter 5. A rough development plan in chapter 6 shows the phases of the development.

2 Workflows and web pages

Within this chapter some information is offered about the different web pages which exist for the LEAF system. The following figure shows the various basic workflows in the LEAF system and the web pages which belong to those workflows. In addition for one of the workflows also a database is shown which refers to one step (i.e. storing information from an annotation in the LEAF database). It has to be noted that the web page plan below is not a complete plan for all possible ways through the system. This cannot be shown in a simple and concise way.

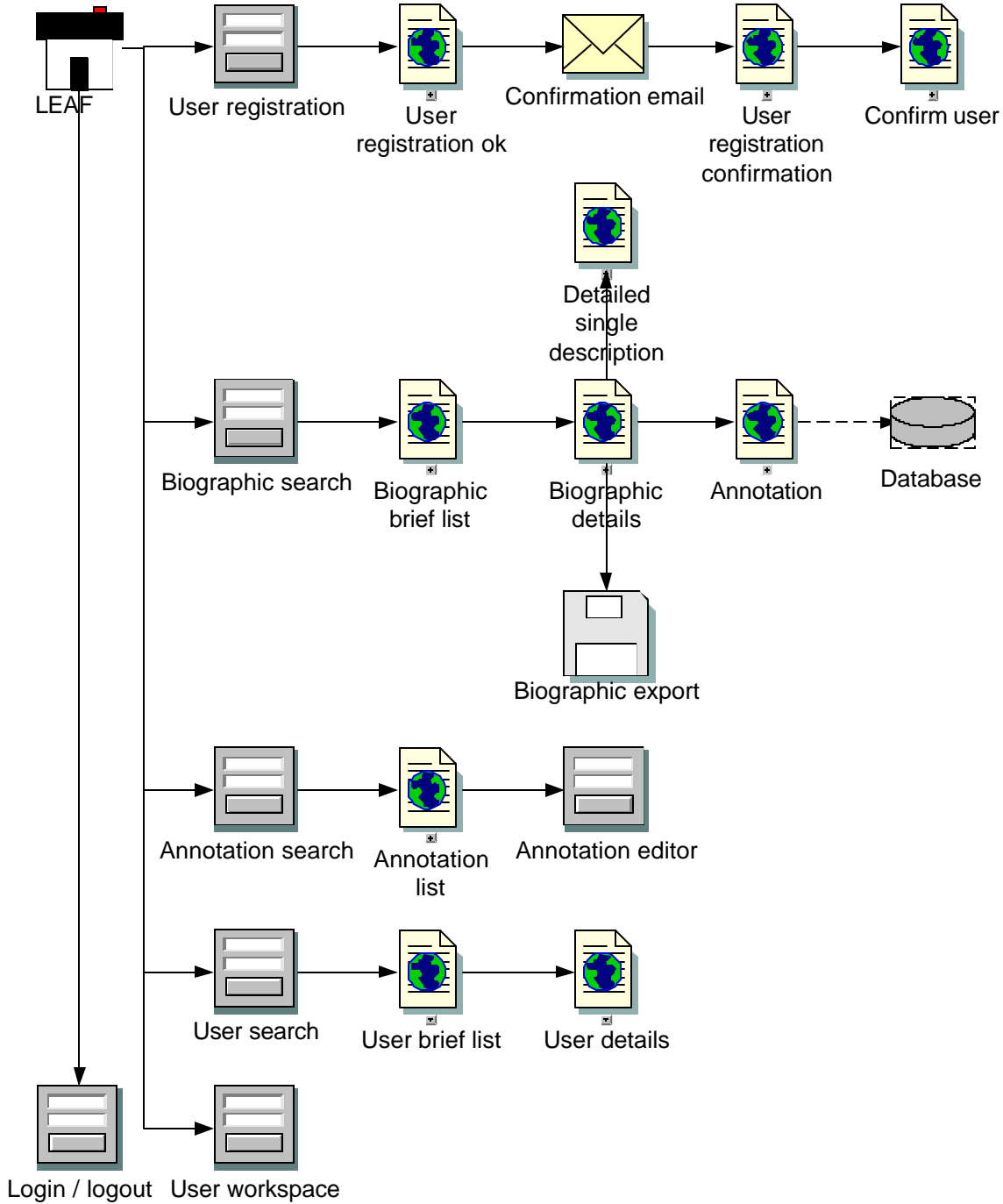


Figure 1: Workflows in the LEAF system

3 Mapped user recommendations

The following table lists the recommendations which were mapped to specific components or user screens.

No.	Description of Recommendation	Component(s)
R 1	LDPs need to be able to search the LAF	Public Biographic search UI

No.	Description of Recommendation	Component(s)
R2	LDPs need to be able to search the SLAF	Restricted Biographic search UI
R3	LDPs need to be able to search the CNAF	Restricted Biographic search UI
R4	LDPs need to be able to search the LEAF User / organisation Database	User search UI
R6	LDPs need to be able to register to the LEAF System (NOTE: Registration of LDPs is understood to be a two -step process which will involve an interaction with the LMA.)	Registration UI, Registration confirmation UI
R7	LDPs need to be able to register staff members to the LEAF System	Registration UI, Registration confirmation UI
R8	LDPs need to be able to post annotations	Annotation email
R9	LDPs need to be able to search for LTAs posted by staff members	Annotation search UI
R10	LDPs need to be able to search for LPAs posted by staff members	Annotation search UI
R11	LDPs need to be able to search for LTAs that are attached to its own LARs	Annotation search UI
R12	LDPs need to be able to modify / delete annotations which were posted by a staff member of this LDP	Annotation search UI, Annotation editor UI
R13	LDPs need to be able to modify / delete LTAs that are attached to its own LARs	Annotation search UI, Annotation editor UI
R16	LDPs need to have access to a user workspace	User workspace
R17	DPs need to be able to search the LAF	Public Biographic search UI
R18	DPs need to be able to search the CNAF	Restricted Biographic search UI
R19	DPs need to be able to search the LEAF User / Organisation Database	User search UI
R21	DPs need to be able to register to the LEAF System	Registration UI, Registration confirmation UI
R22	DPs need to be able to register staff members to the LEAF System	Registration UI, Registration confirmation UI
R23	DPs need to be able to post annotations	Annotation email
R24	DPs need to be able to search for LTAs posted by staff members	Annotation search UI
R25	DPs need to be able to search for LPAs posted by staff members	Annotation search UI
R26	DPs need to be able to modify / delete annotations posted by staff members of this DP	Annotation search UI, Annotation editor UI
R27	DPs need to have access to a user workspace	User workspace
R28	Public Users need to be able to search the LAF	Public Biographic search UI
R29	Public Users need to be able to search the CNAF	Restricted Biographic search UI
R30	Registered Public Users need to be able to search the LEAF User / Organisation database	User search UI

No.	Description of Recommendation	Component(s)
R32	Public Users need to be able to register to the LEAF System	Registration UI, Registration confirmation UI
R33	Registered Public Users need to be able to post annotations	Annotation email
R34	Registered Public Users need to be able to search for their own annotations	Annotation search UI
R35	Registered Public Users need to be able to modify / delete their own annotations	Annotation search UI, Annotation editor UI
R36	Registered Public Users need to have access to a user workspace	User workspace
R37	SPs need to be able to search the LAF	Public Biographic search UI
R38	SPs need to be able to search the CNAF	Restricted Biographic search UI
R39	SPs need to be able to search the LEAF User / Organisation database	User search UI
R41	SPs need to be able to register to the LEAF System	Registration UI, Registration confirmation UI
R42	SPs need to be able to register staff members to the LEAF System	Registration UI, Registration confirmation UI
R43	SPs need to be able to post annotations	Annotation email
R44	SPs need to be able to search for LTAs posted by staff members	Annotation search UI
R45	SPs need to be able to search for LPAs posted by staff members	Annotation search UI
R46	SPs need to be able to modify / delete annotations posted by staff members	Annotation search UI, Annotation editor UI
R47	SPs need to have access to a user workspace	User workspace
R48	LMA needs to be able to access and analyse the various LEAF log files	Load log files into appropriate analysis tools, database or EXCEL ...
R49	LMA needs to be able to add/remove interfaces of local databases to the LEAF system	Done via configuration files
R50	LMA needs to be able to change / add / delete linking rules	Update SQL in the linking scripts
R52	LMA needs to be able to register LDPs (NOTE: Registration of LDPs is understood to be a two -step process which will involve an interaction with the LMA.)	Registration UI
R53	LMA needs to be able to register users	Registration UI
R54	LMA needs to be able to administer registered users	Database client for LEAF user database
R56	LMA needs to be able to maintain control over the annotations system including being able to modify / delete annotations	Annotation editor UI
R61	An online LEAF Registration Form will be provided at the LEAF website for the registration of DPs, SPs, staff members and public users	Registration UI

No.	Description of Recommendation	Component(s)
R62	The LEAF System needs to be able to process up to 5 linking rules	SQL statements in the linking scripts
R63	Results will be presented in the expandable LPF	Detailed biographic result uses an XSL style sheet
R64	Results can be viewed in the native data format	Detailed biographic result provides a link to the native data format
R65	Results can be viewed in EAC	Biographic export with an XSL style sheet
R66	Results can be viewed in EAD	Not possible because not referring to biographic information
R67	Results can be viewed in MARC21	Biographic export with an XSL style sheet
R68	Results can be viewed in UNIMARC	Biographic export with an XSL style sheet
R69	Results can be viewed in MAB2	Biographic export with an XSL style sheet
R70	Results can be viewed as aggregated records (CNAR / SLAR) or as separate records (LAR)	Detailed biographic result, Detailed single result
R71	Users can link to CNARs from external documents or applications	ID in Detailed biographic result
R72	Users can contact the creator of any LAR by sound communication channels provided by the LEAF System.	Organisation email address
R73	Queries to the LEAF systems can be extended to external systems / databases	Distributing searches from Biographic search UI
R74	The Integrated MALVINE/LEAF System will allow for searches in authority records only	LEAF system functionality
R75	The Integrated MALVINE/LEAF System will allow for subsequent searches in authority records and document description records that are triggered by a "one step" user operation	Trigger LEAF search from MALVINE system
R76	The Integrated MALVINE/LEAF System will allow for searches in document description records only	MALVINE system functionality
R77	The integrated MALVINE/LEAF System will be linked via an Application Programme Interface (API).	Overwritten by an XML over HTTP interface
R78	When posting an annotation it is mandatory for a user to state what kind of annotation is directed to which record (LTA to LAR, LTA to SLAR, LPA to CNAR, LprA to CNAR)	Detail in Annotation email from Annotation editor UI
R79	Any LAR will have a unique ID (i.e. a unique identifier in the LEAF system)	ID from local system and local ID
R80	Any SLAR will have a unique ID (i.e. a unique identifier in the LEAF system)	ID from LEAF system and LEAF ID
R81	Any CNAR will have a unique ID (i.e. a unique identifier in the LEAF system)	ID from LEAF system and LEAF ID
R82	BDPs need to be able to search the LAF	Public Biographic search UI

No.	Description of Recommendation	Component(s)
R83	BDPs need to be able to search the CNAF	Restricted Biographic search UI
R84	BDPs need to be able to search the LEAF User /Organisation data Base	User search UI
R85	BDPs need to be able to create CNARs	Triggered by Detailed biographic result
R86	BDPs need to be able to register to the LEAF System	Registration UI, Registration confirmation UI
R87	BDPs need to be able to register staff members to the LEAF System	Registration UI, Registration confirmation UI
R88	Staff members of BDPs need to be able to have access to a user workspace	User workspace
R89	BDPs need to be able to post annotations	Annotation email
R90	BDPs need to be able to search for annotations posted by staff members	Annotation search UI
R91	BDPs need to be able to modify / delete annotations posted by staff members	Annotation search UI, Annotation editor UI
R92	BDPs need to be able to provide bibliographic data for integration into the LEAF System	Trigger LEAF search from MALVINE system
R93	BDPs need to be able to maintain search options specific for that BDP	Trigger LEAF search from MALVINE system

Table 3-1: Mapping of requirements

4 Implicitly fulfilled recommendations

The following table lists the recommendations which were implicitly fulfilled or which regard to implementation details.

No.	Description of Recommendation	Component(s)
R51	LMA needs to be able to ensure communications between various data providers and users (e.g. in cases of manual linkings or annotating of records)	Email
R55	LMA needs to be able to allocate workspaces to registered users	Implicit with user registration
R57	LMA needs to be able to modify the display of results via an interface which allows for the modification of XSLT stylesheets	XSL style sheets can be edited through text or XML editors; the Cocoon framework uses the style sheets
R58	LMA needs to be able to modify the website interface via an interface which allows for the modification of XSLT stylesheets	XSL style sheets can be edited through text or XML editors; the Cocoon framework uses the style sheets

Table 4-1: Recommendations not directly mapped to components

5 Dropped user recommendations

The following table lists the recommendations which were dropped either in the technical meeting in Berlin (August 2002) or during discussion of the ADD.

No.	Description of Recommendation	Component(s)
R5	LDPs need to be able to create CNARs	dropped
R14	LDPs need to be able to manually create links / SLARs	dropped
R15	LDPs need to be able to manually modify / delete links / SLARs	dropped
R20	DPs need to be able to create CNARs	dropped
R31	Public Users need to be able to create CNARs	dropped
R40	SPs need to be able to create CNARs	dropped
R59	LMA needs to be able to manually create links / SLARs	dropped
R60	LMA needs to be able to modify / delete links / SLARs	dropped
R94	LDPs need to be able to establish LMLs	dropped
R95	The LMA needs to be able to establish LMLs	dropped
R96	LDPs need to be able to establish LNLs	dropped
R97	The LMA needs to be able to establish LMLs	dropped
R98	A LML can either overrule or add to a LAL	dropped
R99	A LNL overrules a LAL	dropped

Table 5-1: Recommendations dropped in a technical meeting in Berlin (August 2002)

6 Development tasks

The [MRAD-2] document lists all recommendations from the end user and archive perspective. The development perspective is that there are a lot of different development tasks for achieving the whole functionality. To achieve the best results for the project taking into consideration resources and schedules a plan for the development is necessary. This is shown in the next table.

Step No.	Component(s)
1.	Basic online system
2.	Database update
3.	Offline system
4.	First archive systems (FTP)
5.	Malvine integration
6.	Other archive systems (OAI, Z39.50)

Table 6-1: Sequence of development steps

Figures

Figure 1: Workflows in the LEAF system

4

Tables

Table 3-1: Mapping of requirements8

Table 4-1: Recommendations not directly mapped to components8

Table 5-1: Recommendations dropped in a technical meeting in Berlin (August 2002).....9

Table 6-1: Sequence of development steps9

Definitions, Acronyms and Abbreviations

The following list provides the definitions and abbreviations used within this document.

- API** Application Programming Interface
- BDP** Bibliographic Data Provider
- CNAF** Central Name Authority File
- CNAR** Central Name Authority Record
- DP** Data Provider
- DT** Document Template
- DTG** Document Template Guidelines
- EAC** Encoded Archival Context (Initiative)
- EAD** Encoded Archival Description
- FTP** File Transfer Protocol
- HTTP** Hypertext Transfer Protocol
- IST** Information Society Technologies
- LAF** LEAF Authority File
- LAR** LEAF Authority Record
- LDP** LEAF Data Provider
- LMA** LEAF Maintenance Agency
- LEAF** Linking and Exploring Authority Files
- LAL** LEAF Automatic Link
- LML** LEAF Manual Link
- LNL** LEAF Negative Link
- LPA** LEAF Persistent Annotation
- LPF** LEAF Presentation Format
- LPrA** LEAF Private Annotation
- LTA** LEAF Temporary Annotation
- MAB2** "Maschinelles Austauschformat für Bibliotheken"
- MALVINE** Manuscripts and Letters via Integrated Networks in Europe
- MARC(21)** (Concise) Machine-Readable Cataloguing
- OAI** Open Archives Initiative (Protocol)
- SLAF** Shared LEAF Authority File
- SLAR** Shared LEAF Authority Record
- SP** Service Provider
- SQL** Structured Query Language
- UI** User Interface
- UNIMARC** Universal MARC Format
- XML** Extensible Markup Language

- XSL** Extensible Stylesheet Language
- XSLT** XSL Transformation
- WP** Work Package
- Z39.50** Information Retrieval (Z39.50): Application Service Definition and Protocol Specification

Partner Acronyms:

- BL** British Library
- BN** Biblioteca Nacional
- CNS** Crossnet Systems Ltd.
- DLA** Deutsches Literaturarchiv
- FDÖP** Forschungsstelle und Dokumentationszentrum für Österreichische Philosophie
- GSA** Goethe- und Schiller-Archiv
- IMEC** Institut Mémoires de l'Édition Contemporaine
- JRS** JOANNEUM RESEARCH
- NUK** National and University Library, Ljubljana, Slovenia
- ÖNB** Österreichische Nationalbibliothek
- RA** Riksarkivet
- SBB** Staatsbibliothek zu Berlin
- SNL** Swiss National Library
- UCM** Biblioteca de Universidad Complutense de Madrid
- UoB** University of Bergen

References

The following list shows references that are made within this document.

- [ADD]** Architectural Design Document; LEAF Deliverable D6.2; JRS
- [CompTool]** Model Compatibility Design; LEAF Deliverable D9.1; CNS
- [ConvTool]** Report on the XML encoding and conversion tools for the name data; LEAF Deliverable D4.3; UoB
- [DoW]** LEAF ANNEX 1, "Description of Work"
- [FTP]** RFC 959: File Transfer Protocol; <http://www.w3.org/Protocols/rfc959/Overview.html>; March 3rd 2003
- [MRAD-2]** Hans-Jörg Lieder (SBB), Max Kaiser (ÖNB); Model Requirements Analysis Document – Part 2; LEAF Deliverable D5.1 v1.0; May 14th, 2002
- [OAI]** Open Archives Initiative <http://www.openarchives.org>; November 29th 2002
- [RND]** Gunnar Karlsen (UoB); Report on a Recommended Name DTD; LEAF Deliverable D4.1 v1.0; December 15th, 2001
- [XML-Schema]** XML Schema, <http://www.w3.org/XML/Schema>; Mai 13th 2002
- [XSL]** Extensible Stylesheet Language (XSL); Version 1.0; W3C Recommendation 15 October 2001; <http://www.w3.org/TR/xsl>; November 29th 2002
- [XSLT]** XSL Transformations (XSLT); Version 1.0; W3C Recommendation 16 November 1999; <http://www.w3.org/TR/xslt>; November 29th 2002
- [Z39.50]** Z39.50 Maintenance Agency Page; <http://lcweb.loc.gov/z3950/agency/>; March 3rd 2003