National libraries and URNs

> National libraries must identify all digital documents in their collections
>> ISBNs for books, ISSNs for serials, and NBNs (national bibliography numbers) for resources that lack a standard identifier, such as pre-ISBN books or serial issues and individual articles
>> Unique access key; persistent identification of the resource

> these identifiers are not actionable in the Web, and NBNs are not even globally unique (but URN:NBNs are)

> URNs and other PIDs provide persistent linking from the resource metadata to resources themselves

URN usages

➢ enhancing traditional identifiers: ISBN as a persistent link
  ➢ http://urn.fi/URN:ISBN:978-952-10-6392-3
➢ changing NBNs into globally unique persistent links
  ➢ http://urn.fi/URN:NBN:fi-fe201004271727
➢ One PID – multiple physical locations (e.g. the "normal" and the Internet Archive version of a resource)

➢ with URN and other PIDs, there is a single point of failure (the PID – URL mapping). If URLs are used and the address changes and DNS is not kept up to date (which does happen) URL update is required for every bibliographic record which contains a link to the resource

URN users

➢ National libraries are a significant user community, because their (digital) collections are large
  ➢ Koninklijke bibliotheek: 10+ million Elsevier articles
  ➢ NLF: millions of digitized newspaper pages
➢ National libraries are a significant user community, because their collections are large and very persistent
  ➢ (Legal) deposit responsibility dictates that these libraries must keep the publications (including digital content) available for posterity
➢ A need for a solution that will never become commercialised (patent / registered trademark)
  ➢ ISOC copyright approach is seen as acceptable

Goals (1st year)

- **To set up an European infrastructure to resolve the URNs particularly in the NBN namespace.**

- **To establish a policy for long term sustainability of an international resolution and discovery service.**

- **To define an interoperability framework among URN namespaces and different PI systems.**

- **To review & update the related URN RFCs.**

Persistent access to digital publications and other electronic resources is important. One prerequisite for this is unambiguous identification of digital objects. PersID will establish a persistent identifier infrastructure that will support unambiguous identification and access to objects.

Such infrastructure must be open, interoperable, trusted and controlled by all actors in the research and cultural heritage community – and capable to incorporate other global identifier initiatives.

To provide the necessary (future) services to stakeholders in the (changing) research and scholarly processes and information exchanges there is a need for a (global) Persistent Identifier system – infrastructure and services. There will not be one worldwide dominant Persistent Identifier system.

Technology is not the most important challenge – agreed policies and governance are; preferably under control of the international research, scholarly and cultural heritage communities.

To further the Persistent Identifier agenda action on an international level is needed, as well as on a national level, to work on shared approaches regarding agreed policies, governance and communication.

Given the dynamics in other PID systems the URN-NBN system needs to mature rapidly to offer its potential to serve our Research and Cultural heritage community best.

Why URN-NBN?

➢ based on trust – national libraries are responsible for the long term preservation of published national cultural heritage, joint development of policies and governance by community partners such as archives and museums

➢ in use – in a number of production systems and test beds, collaborative projects such as PersID; participants are libraries, research organisations, museums, archives…

➢ open & flexible – suitable for different user communities (cultural, scientific, private, ..), caters for various needs and requirements (e.g. selection criteria, rights management, etc ..) and enables different architectures to share responsibility and sustainability

PersID - participants

➢ **Danmarks Elektroniske Fag og Forskningsbibliotek - Denmark's Electronic Research Library (DEFF)**

➢ **Consiglio Nazionale delle Ricerche - National Research Council (CNR), Italy**

➢ **Data Archiving and Networked Services (DANS), Netherlands**

➢ **Deutsche Nationalbibliothek - German National Library**

➢ **Det Kongelige Bibliotek - The Royal Library, Denmark**

➢ **Kungliga biblioteket - National Library of Sweden**

➢ **Fondazione Rinascimento Digitale (FDR), Italy**

➢ **Kansalliskirjasto - National Library of Finland**

➢ **SURFfoundation, Netherlands**

➢ **Knowledge Exchange**