



Lightweight Information Describing Objects An introduction

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Regine Stein

Philipps-Universität Marburg – Bildarchiv Foto Marburg





- 1. Background
- 2. LIDO Schema Design
- 3. LIDO Mapping Overview





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The broad view standards



Collections of History / Cultural History



Collections of Technical History



Art Collections



Collections of Natural History



Archaeological Collections



Geological / Mineralogical Collections



Ethnological Collections



Coin Collections



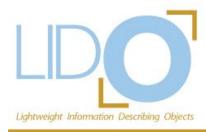
Architecture



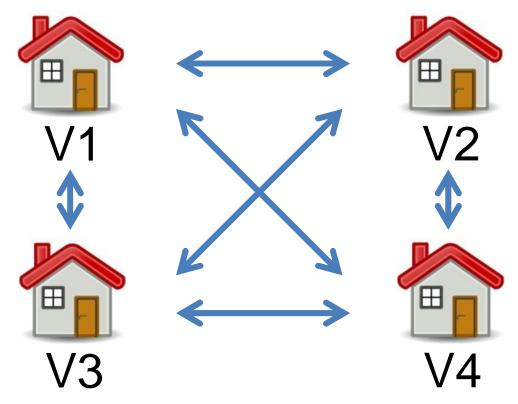
Photography Collections

. . .

. . . .

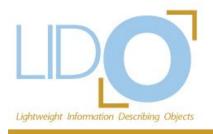


The broad view standards

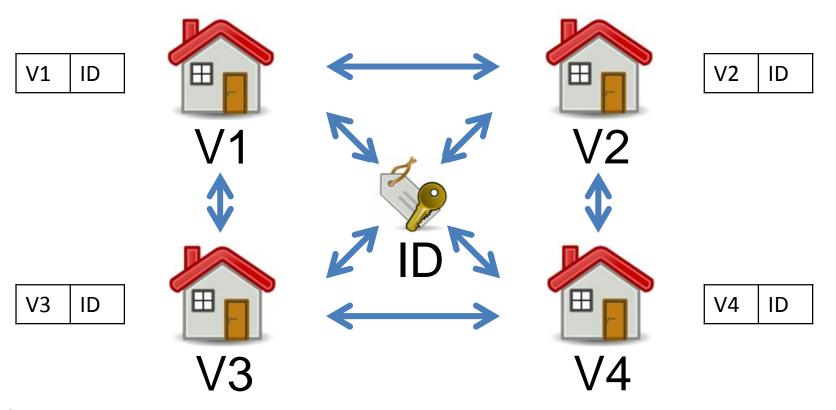


Standards are needed for integrating and exchanging information between institutions





The broad view standards



Standards are fundamentally facilitating cooperation.



Lightweight Information Describing Objects

The broad view standards

Reference: CIDOC-CRM / ISO 21127

CIDOC-CRM / ISO 21127 in less than a nutshell...

- Developed within CIDOC, the Documentation Committee of the International Council of Museums (ICOM)
- Is a formal domain ontology for cultural heritage information:
 - Describes the things that the cultural heritage sector deals with and how these things relate to each other
 - Expressed as an "object-oriented" schema
 - Not a metadata standard
 - No fixed technical format



The broad view standards

Reference: CIDOC-CRM / ISO 21127

"The primary role of the CRM is to serve as a basis for mediation of cultural heritage information and thereby provide the

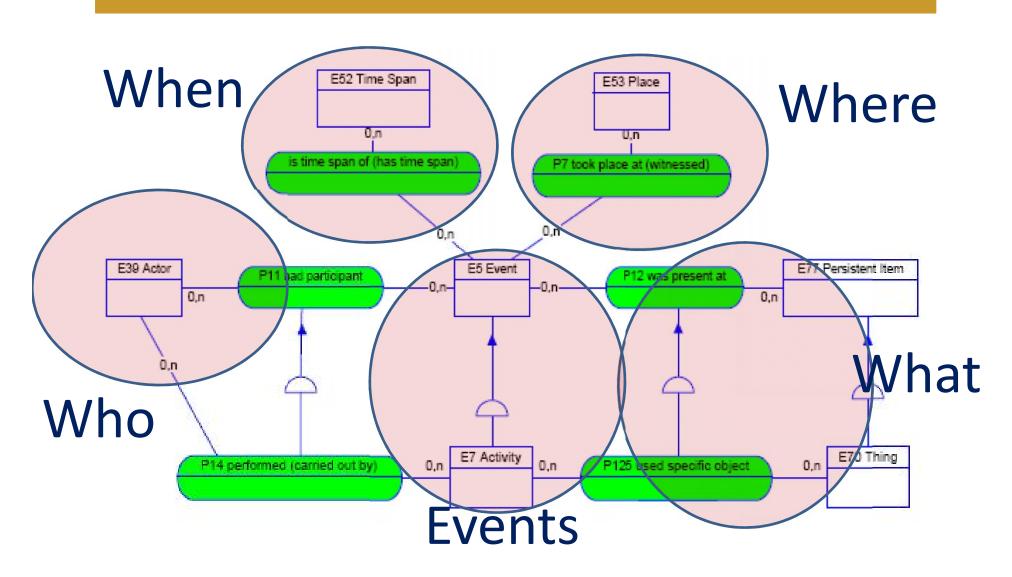
semantic 'glue' needed to transform today's disparate, localised information sources into a coherent and valuable global resource."

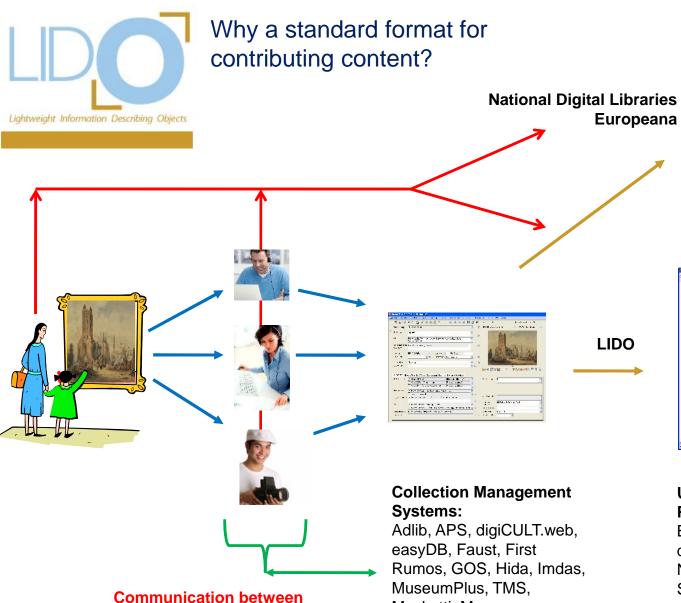
Nick Crofts



The broad view standards

Reference: CIDOC-CRM / ISO 21127





cataloguers

and builders of

cultural heritage systems







Musketti, Muusa, E-kuva, Memoron, ...

Union Catalogues and Portals

BAM, Bildindex, museumdigital, Museumsportal Nord, Museumsportal Saarland, ...

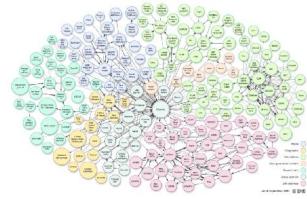




The broad view standards

Why a standard format for contributing content?

- Increasing relevance of internet presence for museums and other collections
- Increasing necessity to integrate your data into union catalogues and portals: facilitate resource discovery in a cross-collection and even cross-sectoral (archives, libraries, museums) manner
- Increasing requests to make your information available for the Semantic Web / Linked Data initiatives





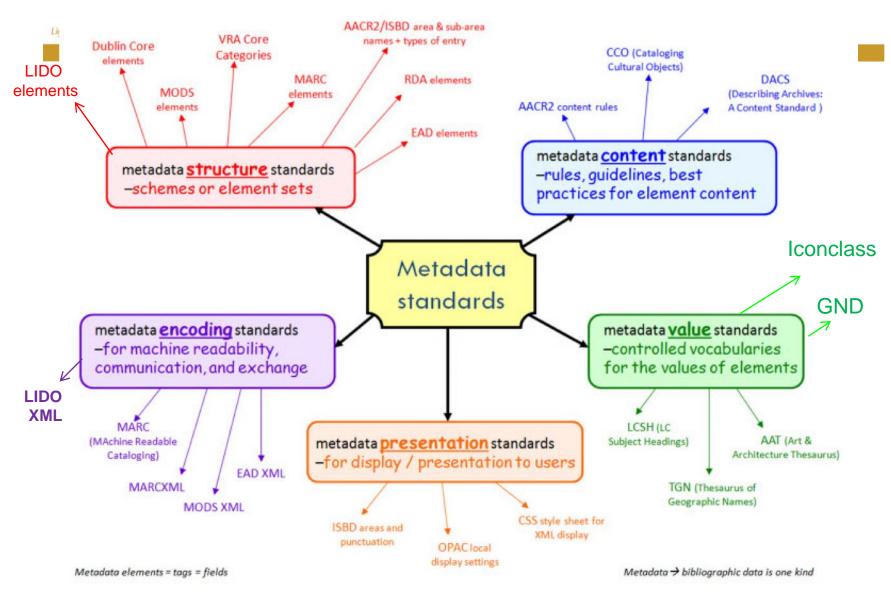


The broad view standards

Why a standard format for contributing content?

- It's all about
 - creating a consistent information base
 - making your information understandable outside of your collection database / your home context!
- Need for convenient instruments to provide cultural collection information
 - from different collections / object classes
 - from different data structures
 - from different software systems

Background The broad view standards







The broad view standards

LIDO – Lightweight Information Describing Objects

- Is the result of a collaborative effort of international stakeholders in the museum sector to create a common solution for contributing cultural heritage content to web applications.
- Provides an explicit format to deliver (museum's) object information in a standardized way.



The broad view standards

2006

The harvesting format CDWA Lite is published

2007

Generalization into museumdat to be applicable for all kinds of objects

2008

CDWA Lite / museumdat Working Group: Aims at establishing one common, single schema

2009

ATHENA Project: SPECTRUM community joins CIDOC Working Group established

2010

Release during ICOM-CIDOC Conference









www.lido-schema.org



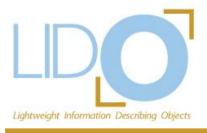


LIDO - Lightweight Information Describing Objects Version 1.0

November 2010

Erin Coburn, Richard Light, Gordon McKenna, Regine Stein, Axel Vitzthum







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- 2. LIDO Schema Design
- 3. LIDO Mapping Overview



Purpose

Why



Collections of History / Cultural History



Collections of Technical History



Art Collections



Collections of Natural History



Archaeological Collections



Geological / Mineralogical Collections



Ethnological Collections



Coin Collections



Architecture



Photography Collections

...

. . .

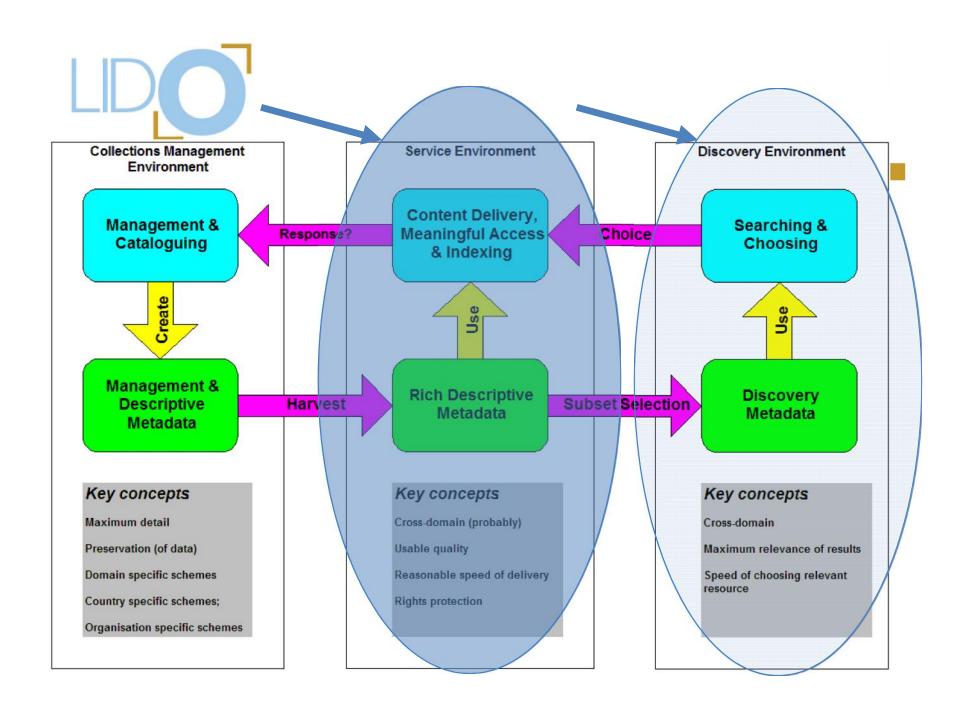




What it is

XML Schema for Contributing Content to Cultural Heritage Repositories

- For delivering metadata, for use in a variety of online services, from an organization's online collections database to portals of aggregated resources – as well as exposing, sharing and connecting data on the web.
- Intended to represent the full range of descriptive information about museum objects, e.g. art, cultural, technology and natural science.
- It supports multilingual environments.





Construction Principles

- Provide a specification and related XML schema that describes cultural materials appropriately
- Individual data providers can decide on how light or how rich – they want their contributed metadata records to be
- Allow for delivering <u>data and resources / digital</u> <u>surrogates</u> relating to your objects
- Include links from contributed metadata back to records in their 'home' context



Construction Principles

Cont.:

- Allow for delivery of full information: a record can include all the necessary information for display and retrieval of your object
- Allow for identification of each referenced entity, e.g. provide references to controlled vocabulary and authority files.
- Provide optimised metadata for retrieval on one hand and for display on the other -> distinction of display and indexing elements



Groups of Information

Descriptive and administrative information groups in LIDO

- Object Classifications -

Object / Work Type (mandatory)

Classification

-Object Identifications -

Title / Name (mandatory)

Inscriptions

Repository / Location

State / Edition

Object Description

Measurements

-Events -

Event Set

-Relations -

Subject Set

Related Works

-Administrative Metadata -

Rights

Record (mandatory)

Resource



Mandatory elements

LIDO Record Identifier

Object Classifications –

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Multilinguality

Full support of multilinguality

 Language attribute is mandatory for default language on high-level elements descriptiveMetadata and administrativeMetadata

Two possibilities to provide multi-lingual entries:

Repeat the high-level elements with different language attributes for fully multi-lingual resources

or

Repeat text-level elements with different language attributes for providing translations only for just a few elements



Schema Design Identifier Handling and Vocabulary References

- Identifiers are repeatable
- Entities including an identifier el.:
 - Concept
 - Actor / Legal Body Ref
 - Place
 - Event
 - Object
- Example:

<lido:conceptID lido:type="URL" lido:source="Iconclass"> http://iconclass.org/44G123</lido:conceptID>



xxxWrap (0-1)

Schema Design

Display <> Index

Display and Index elements – basic structure:

```
xxxSet (0-unbounded)
   displayXXX (0-unbounded) (for language variants only)
   XXX (0-1)
e.g.
objectMeasurementsWrap
  objectMeasurementsSet
   displayObjectMeasurements
   objectMeasurements
```

```
objectMeasurementsSet
displayObjectMeasurements: 44,3 x 35,4 cm (Blatt); 10 Bildfelder
 objectMeasurements
  measurementsSet: (value: 44,3) (unit: cm) (type: Höhe)
  measurementsSet: (value: 35,4) (unit: cm) (type: Breite)
  extentMeasurements: Blatt
```





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Related Works

-Administrative Metadata -

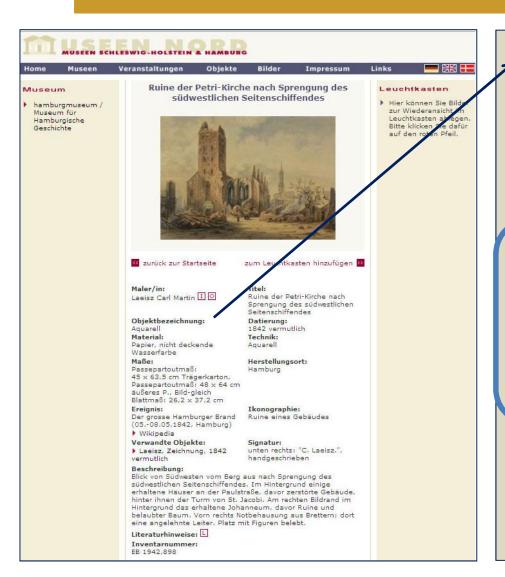
Rights

Record (mandatory)

Resource







objectWorkType: Aquarell

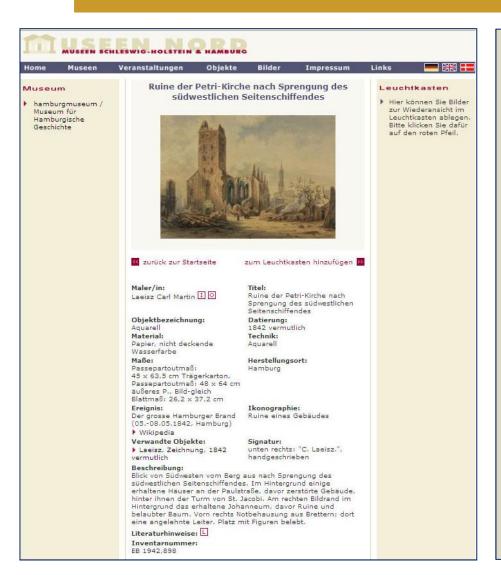
http://www.lido-schema.org/schema/v1.0/lido-v1.0-specification.pdf

<u>Definition</u>: The specific kind of object / work being described.

<u>How to record</u>: Preferably taken from a published controlled vocabulary. For a collection, include repeating instances for identifying all of or the most important items in the collection.







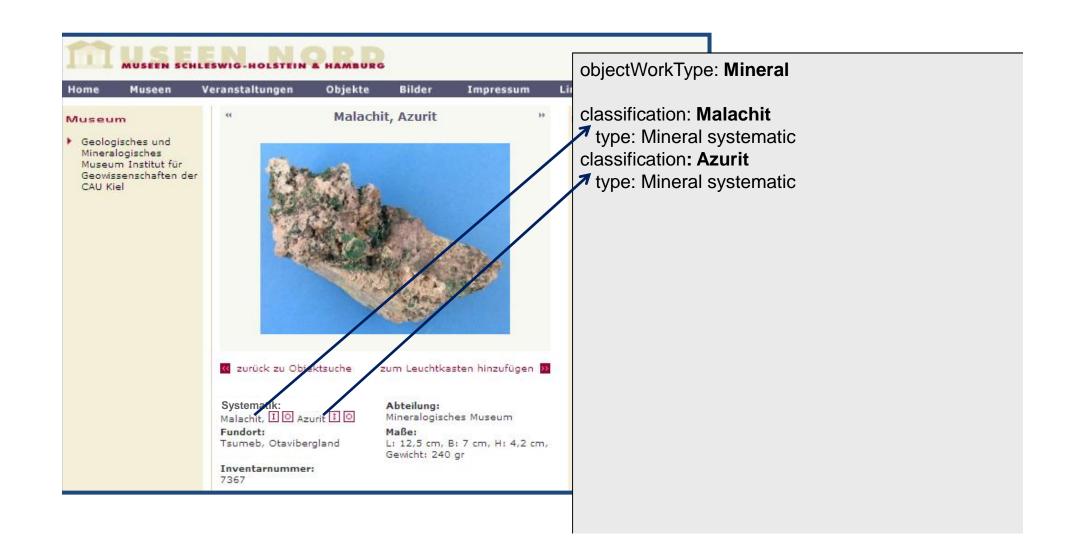
classification: Zeichnung / Grafik

<u>Definition</u>: Concepts used to categorize an object / work by grouping it together with others on the basis of similar characteristics.

How to record: The category belongs to a systematic scheme (classification) which groups objects of similar characteristics according to uniform aspects. This grouping / classification may be done according to material, form, shape, function, region of origin, cultural context, or historical or stylistic period. In addition to this systematic grouping it may also be done according to organizational divisions within a museum (e.g., according to the collection structure of a museum). If the object / work is assigned to multiple classifications, repeat this element.Preferably taken from a published controlled vocabulary.











Object Identification

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Rights

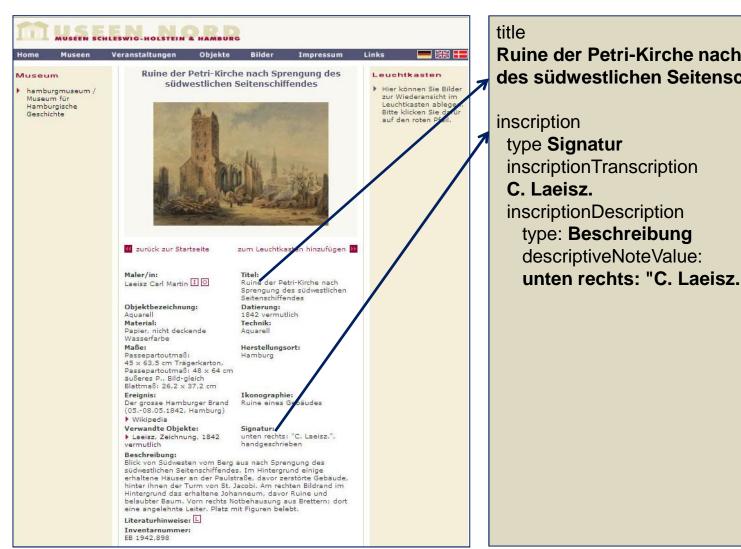
Record (mandatory)

Resource





Object Identification



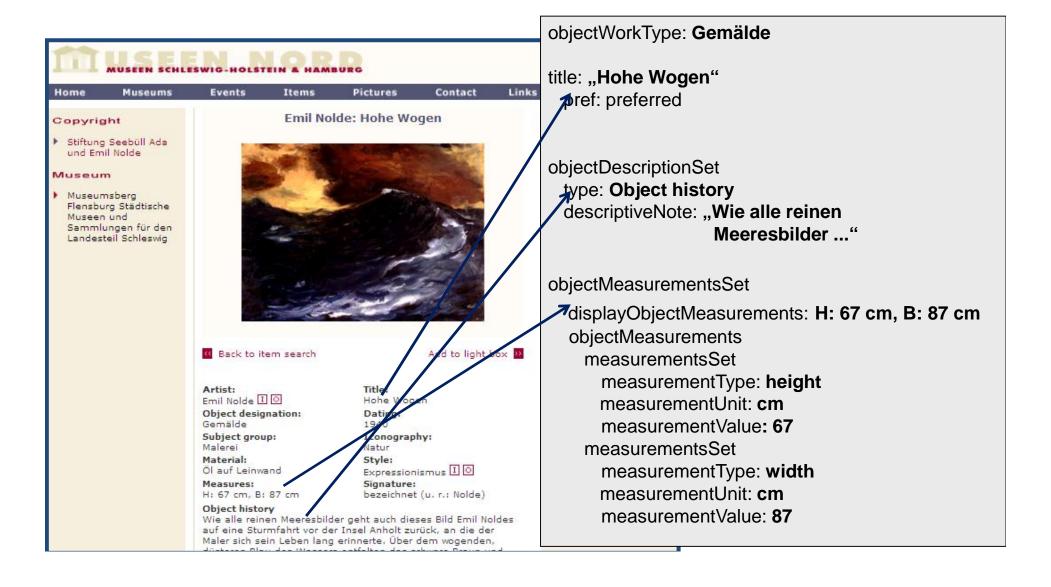
Ruine der Petri-Kirche nach Sprengung des südwestlichen Seitenschiffendes

unten rechts: "C. Laeisz.", handgeschrieben





Object Identification





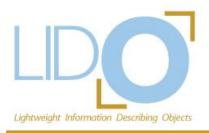
Designation and

identification of the

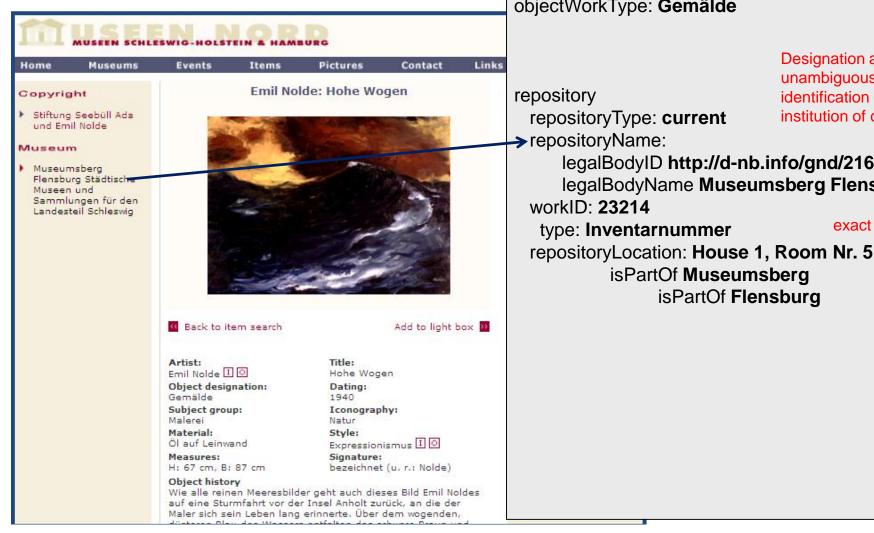
institution of custody

exact Location

unambiguous



Object Identification



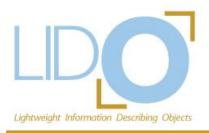
objectWorkType: Gemälde

repositoryType: current

legalBodyID http://d-nb.info/gnd/2166186-8 legalBodyName Museumsberg Flensburg

type: Inventarnummer

isPartOf Museumsberg isPartOf Flensburg



Event <> Subject

No artist? No creation date? No finding place?

Museum objects may relate to any actor, date, or place in two ways:

- The object was present at an event (such as creation, find, use, ...)
 - having participants / carried out by some actors
 - at some time
 - in some place

or

- The object refers to such entity by
 - depicting it
 - "being about"





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Record (mandatory)

Resource



-Event Identifier

–Event Type

-Role in Event

-Event Name

–Event Actor

-Culture

-Event Date

–Period

-Event Place

-Event Method

-Materials / Technique

-Thing Present

-Event Related

-Event Description



Themen

```
title: La primavera / Der Frühling
event
 eventType Herstellung / Production
 eventActor
   actor
     nameActor BotticeIIIi, Sandro
   roleActor Maler
 eventDate
   earliestDate 1482
   latestDate
               1482
 eventMaterialsTech
   termMaterialsTech Tempera
   termMaterialsTech Pappelholz
event
 eventType Herkunft / Provenance
 eventPlace
   place
     namePlace Florenz, Palazzo Medici Riccardi, Via
     partOfPlace
       namePlace Florenz
       partOfPlace
        namePlace Firenze, Provincia
        partOfPlace
          namePlace Italien
 eventDate
    earliestDate 1498
    latestDate 1498
event
 eventType Restaurierung / Restoration
 eventDate
   earliestDate 1982
   latestDate
              1982
```



Schlesspark Nymphenburg, München - Nymphenburg

veiter og: harles Carbonet Gartenarchitekt

usbau: Joseph Effner Architekt

Umgestaltung Eriedrich Ludwig von Sckell Gartenarchitekt

sb 1664 Erweiterung: ab 1702, Ausbau: ab 1715 Umgestaltung: 1799-1823

Schlosspark, Gartenkunst



Foto Marburg, Aufnahme-Nr. LAC 42.732;; (color); Aufn.-Datum: 1940/1949; Fotoinhalt: Blick von der Freitreppe nach Nordosten übers Hauptparterre



Foto Marbur Aufnahme-I Aufn.-Datur Fotoinhalt: I nach Weste des Bacchu 1782)

30両分



Foto Marburg, Foto: Schmidt-Glassner, Helga; Aufnahme-Nr. 1.554.091;; Aufn.-Datum: 1950/1955; Fotoinhalt: Blick von der Badenburg über den See zum Monopteros



Foto Marbur Aufnahme-F (color); Auf 1950/1955; Fotoinhalt: Fenster der nach Norde Pagodenbur

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Foto Marburg, Aufnahme-Nr. C 1.570.774;; (color); Aufn.-Datum: 1950/1955; Fotoinhalt: Blick aus einem Fenster der Pagodenburg nach Südosten zum See



Foto Marbur Aufnahme-I Aufn.-Datur Fotoinhalt: I Fenster der nach Südos

同内間子

Abb. auf Microfiche: mi15652f03-mi15652f07 Objekt 20144943 (Foto Marburg)

-Event Identifier

–Event Type

-Role in Event

-Event Name

-Event Actor

-Culture

-Event Date

-Period

-Event Place

-Event Method

-Materials / Technique

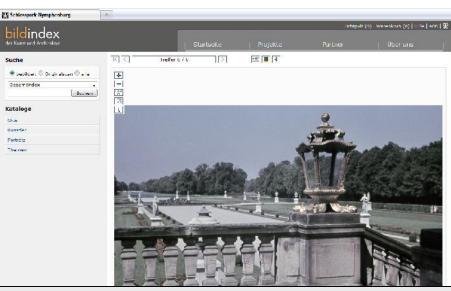
-Thing Present

-Event Related

-Event Description



- -Event Identifier
- –Event Type
- -Role in Event
- -Event Name
- -Event Actor
- -Culture
- -Event Date
- -Period
- -Event Place
- -Event Method
- -Materials / Technique
- -Thing Present
- -Event Related
- -Event Description



objectWorkType: Schlosspark title: Schlosspark Nymphenburg

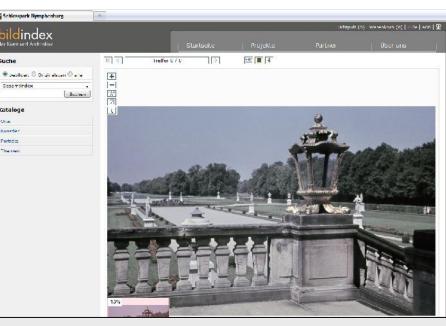
eventType Herstellung / Production eventActor

displayActorInRole unknown

eventDate
displayDate ab 1664
date
earliestDate 1664
latestDate 1664
eventPlace
place
namePlace München - Nymphenburg



- –Event Identifier
- –Event Type
- -Role in Event
- -Event Name
- -Event Actor
- -Culture
- –Event Date
- –Period
- –Event Place
- -Event Method
- -Materials / Technique
- -Thing Present
- -Event Related
- -Event Description



objectWorkType: Schlosspark title: Schlosspark Nymphenburg

event

eventType Erweiterung / Part Addition

eventActor

displayActorInRole Charles Carbonet (1701?-171)

actorInRole

actor

nameActor Carbonet, Charles

roleActor Gartenarchitekt

eventDate

earliestDate 1702

latestDate 1702

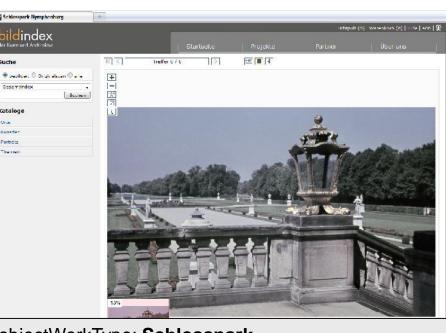
eventPlace

place

namePlace München - Nymphenburg



- -Event Identifier
- –Event Type
- -Role in Event
- -Event Name
- -Event Actor
- -Culture
- -Event Date
- -Period
- –Event Place
- -Event Method
- -Materials / Technique
- -Thing Present
- -Event Related
- -Event Description



objectWorkType: Schlosspark title: Schlosspark Nymphenburg

event

eventType Umgestaltung / Modification

eventActor

displayActorInRole Friedrich L. von Sckell actorInRole

actor

nameActor **Sckell, Friedrich Ludwig von** roleActor **Gartenarchitekt**

eventDate

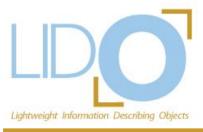
earliestDate 1799

latestDate 1823

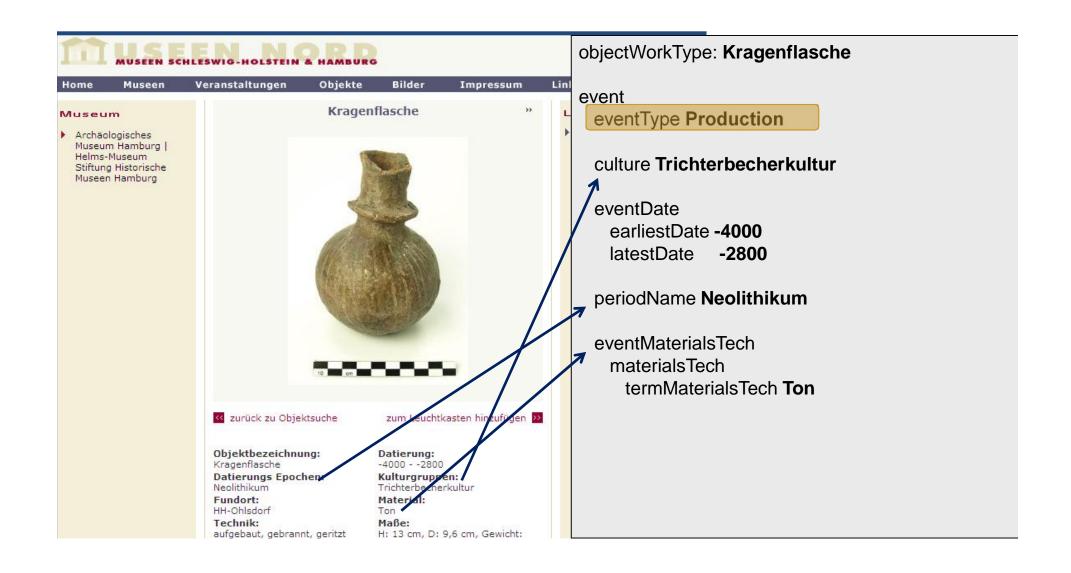
eventPlace

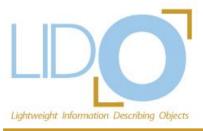
place

namePlace München - Nymphenburg

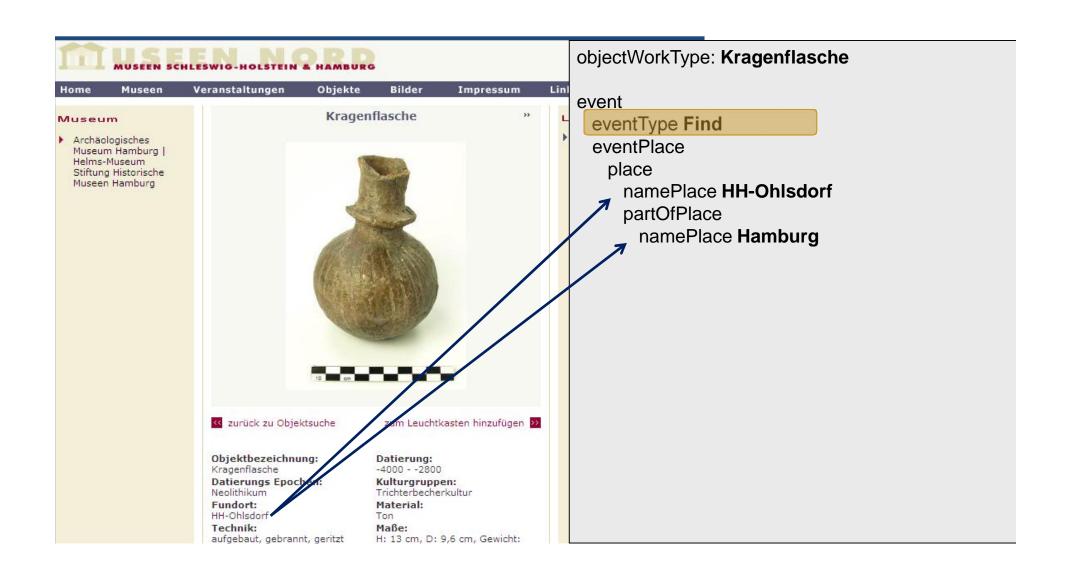


Event





Event





Event

Basic Event Types include:

Acquisition Finding Production

Collecting Loss Provenance

Commissioning Marketing Publication

Conservation Modification Restoration

Creation Move Transformation

Designing Part addition Type assignment

Destruction Part removal Type creation

Excavation Performance Use

Exhibition Planning





Subject / Content

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Rights

Record (mandatory)

Resource



Subject / Content

- –Extent Subject
- -Subject Concept
- -Subject Actor
- –Subject Date
- -Subject Place
- -Subject Event
- -Subject Object



subjectSet

subjectSet

subjectConcept

subjectConcept

subject (type: Ikonographie)

V subjectConcept

conceptID: 43 B 31 (type: local) (source: lconclass) term: Gasthaus, Kaffeehaus, Kneipe, etc.



Subject / Content



Holzschnitt/Woodcut: **Bildnis des Johann Aventinus**

creator: Hans Sebald Lautensack -> Event

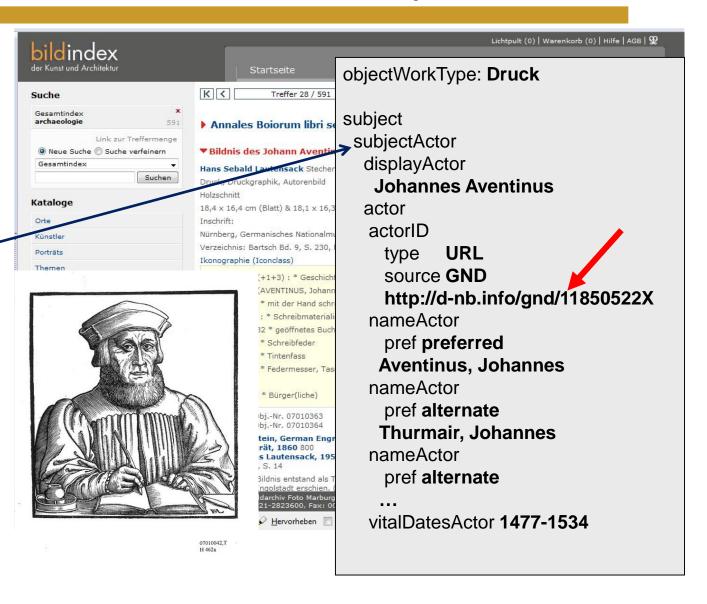
depicted Person: Johann Aventius -> Subject Actor

07010042,7 H 462a



Subject / Content

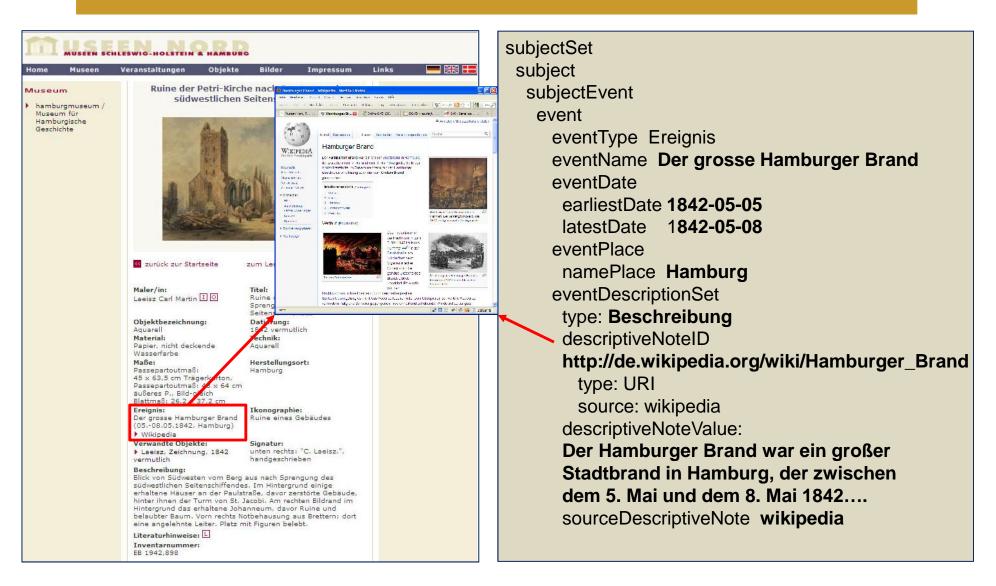
- -Extent Subject
- -Subject Concept
- -Subject Actor
- -Subject Date
- -Subject Place
- -Subject Event
- -Subject Object







Subject / Content







Administrative Metadata

- Object Classifications -

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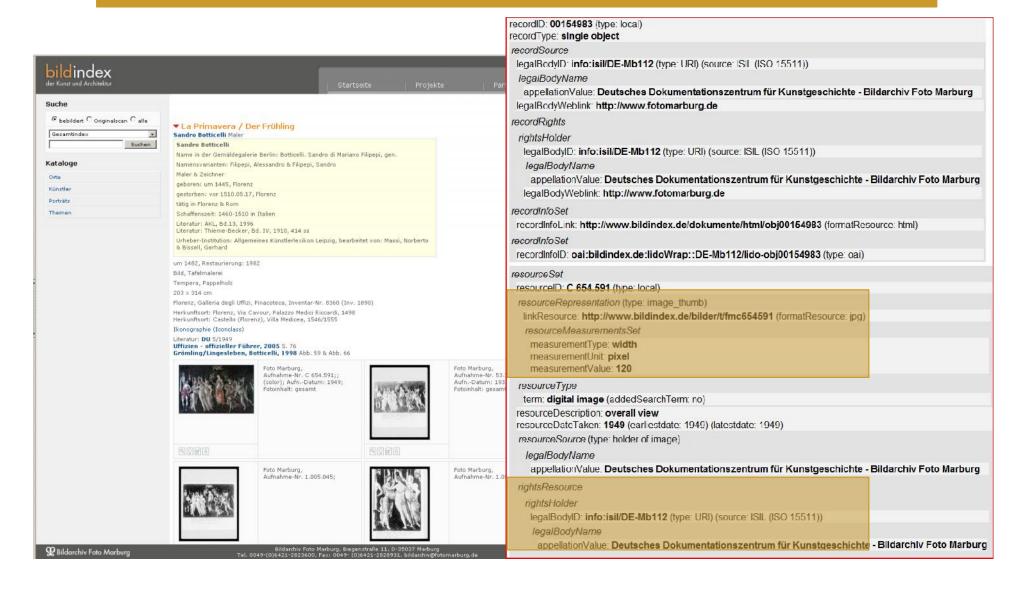
Rights

Record (mandatory)

Resource



Administrative Metadata





Using LIDO















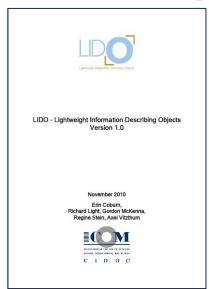






www.lido-schema.org

Lightweight Information Describing Objects



Regine Stein

Philipps-Universität Marburg – Bildarchiv Foto Marburg (UNIMAR)

E-Mail r.stein@fotomarburg.de