

# CEDVU (Central Records of Fine Art Works) as a Tool of Knowledge Management for Galleries in Slovakia

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**Abstract:** The presentation partly comes from the dissertation thesis where the research is focused on a documentation of fine art works through its digitizing and the way it may enhance knowledge society. The article introduces information tool called CEDVU (Slovak abbreviation for Central Records of Fine Art Works) as a complex system and the example of knowledge management with national, and as expectantly in the near future with also international, scope. The end of the presentation demonstrates options how to link CEDVU to other open source applications like JIRA and Confluence, which facilitate advanced functions involving external users and thus optimizes several internal processes within institutions. The system CEDVU offers working online; the access is possible through the internet and program support of JAVA. CEDVU was developed by EEA Communication Solutions under the impulse of Slovak National Gallery (SNG) several years ago. Since that SNG is the guarantee. CEDVU primary works as a complex registration of collections from membership galleries in Slovakia, which can but also are obliged to use it if they are registered under the Law No. 206/2009. The presentation will furthermore display samples of various modules (acquisition, catalogue, restorer, and presentation), which as the unit capture the story, life cycle and movement of every collection item. As the technology goes also CEDVU is a great tool but would be useless without human input and knowledge. On the other hand its constant development gives to cultural institutions with very limited budgets an opportunity to join the world of digital age.

## Introduction

Registered museums and galleries in Slovakia are cultural institutions under the supervision of either Ministry of Culture or cities of Self-Governing Regions. The word “registered” means they have to go through certain procedures in order to get a legal status of a “gallery”. Their main mission is to acquire culturally significant items and record them as collection items [1]. Slovak National Gallery is a legal entity owned by the Ministry of Culture. It serves as a national center for collection, research, methodology and cultural education. It documents and researches in particular the development of the visual arts in the Slovak Republic in all artistic disciplines [1]. The Act No. 206/2009 of National Council of Slovak Republic appoints Slovak National Gallery to keep an electronic central catalogue of catalogued collection items from all registered galleries in Slovakia and electronically provide selected information to a general public. This is the reason why Slovak National Gallery operates and suggests developments for CEDVU – Central Evidence of Visual Art Items, huge and complex database system where the information and data can be accessed by all registered members. However, if a student or an external expert wants to research data he/she has to come to registered institution personally and browse in the database from there. Second option is to send a request for recherche of certain topic and gallery’s employee will make a research for him/her. This may sound inconvenient but personal visit is usually the last step for researches and often means they need deepen analysis that sometimes includes curator's assistance. The basic information about art works is available online at [www.webumenia.sk](http://www.webumenia.sk), which offers extracted data from CEDVU. The pity is not all galleries gave a permission to present extracted information to

public. This is one of the reasons why Slovak National Gallery feels the need for some kind of “enlightenment” presented by a transparent digital strategy.

## **Museum and Galleries Documentation**

Documentation of collection items is the primary resource of information for professional curators as well as for general public. From the moment galleries started to collect cultural objects curators were trying to keep records about these items. The main motive for keeping the records was to report a historical meaning and facts about the item for expert and professional work. Basic criteria for description have not changed for a long time. There was no need. As Cameron mentions in her book standard descriptions are set in the long-established practices of curators from various disciplines such as art history, history, science, decorative arts etc. [4]. These standards are strictly factual and sort of boring in comparison with the interpretive texts and forms during exhibitions. On the other hand these standards work well for functions like searching, ranging, necessary updates, verifications and identifications.

Before the electronic form started to be affordable even for public institutions, galleries kept their records in hard copies catalogue cards. They were mostly used as an internal tool for the use of employees, curators, sometimes external experts. One can imagine updating cards was not very effective, neither was making it accessible to broader public. The first step towards user friendly version was rewriting these cards into electronic form. In order to do so it was necessary to unify data structure for objects description. Basic data such as author's name, title, date, technique are the keystones of objects' statement. Unification of data is usually supported by the legislation. In case of Slovakia the Act. No 523/2009 referring to special activities in museums and galleries and the evidence of objects of cultural significance. It orders to record fundamental information about items stating following data:

- Gallery name
- Author's name and nationality
- Title
- Type of art and style
- Inventory number
- Accession number
- Digital image of the item with its number
- Date of origin
- The level of processing
- Dimensions
- Marks
- Integrity
- The way acquisition
- Name of the employee who catalogue the item
- Name of the collection's curator
- Date of record

- Acquisition value
- Notes.

Above listed categories copy also the standards from international environment where museums and galleries deal with same needs. Uniform structure enable effective and quick search within records.

## **CEDVU and SNG**

Slovak National Gallery (SNG) was appointed by the law as a leader and supervisor in providing and keeping electronic central catalogue of collection items from all registered galleries in Slovakia [1]. SNG also serves as methodical, expert, advisory and educational center for registered galleries. Therefore it is natural SNG should set standards, strategies and objectives for steps and approaches in implementing new trends and technologies.

Collection management has started back in the history with paper documentation cards including black and white photo of an item. Photos were made by SNG employees who travelled all around Slovakia and collected them in order to insert it in Central Catalogue.

Several years ago (2005) SNG placed an order for developing a SW tool that would be based on open source, would be available online, and would reflect the needs galleries as specialized institutions have; an online catalogue / database for all collection items of fine art in registered galleries in Slovakia as an easy and effective instrument for search . Project was cooperated by IBM and developed by EEA communication solutions that provides support and necessary updates up today. The result is information platform where curators can add, edit, update, delete and extract information and the only thing they need is a PC and internet.

Printed outputs from CEDVU can include standard documentation cards, inventory records, excel list of collection items listed and categorized by requested term, description entries and other records, which galleries had to keep in order to follow the law. Keeping records according the law usually required long time because the books were handwritten and of course after some time hard to read.

CEDVU has five modules:

- a) catalogue entry – basic information about works of art registered in galleries (Pic. 1)
- b) acquisition entry – process of acquisition: proposals, prices, and findings
- c) digital objects entry – managing digital images and other digital content (Pic.2)
- d) restoration entry – documentation of restoration operations
- e) administration of collections and depositories – locating, loans registration (Pic. 3)

**Pozrieť záznam: 0 23**

**Autor & Názov**

Autor:

Názov (preferovaný):

Inv. číslo:  Prírast. číslo:  Stav záznamu:

**Základné informácie** | Súvisiace diela | Záznamy diela | Životný cyklus | História | Kolekcie | Aktivity | Práva

Organizácia:  Kurátor:

Výtvarný druh:

Vecný popis:

Datovanie:

Materiál:

Technika:

Aktuálna lokácia:  Upravenie:

Vlastník:

Miery:

Značenie:


Spracovanie:  Kategória:

Pôvodnosť:  Typ zbierky:

Integrita:

Poznámka:

**Primárny obrázok**



Picture 1 – item registration

**Pozrieť Metadáta Digitálneho záznamu**

**Základné údaje**

Názov:

Popis:

Organizácia:

Autor:  Subjekt:

Kvalita:  Kategória:

Datovanie:  Uložil:

Meno súboru:  MIME typ:

☒ Primárny obrázok

**Tech. údaje**

```
<mix:mix xmlns:mix="http://www.loc.gov/mix/v10" xmlns:basic="http://www.eea.sk/cedvu/basic#"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:dm_desc="http://www.eea.sk/cedvu/digitalmetadata#"
  xmlns:vra="http://simile.mit.edu/2003/10/ontologies/vraCore3"
  xmlns:util="http://java.com.eea.cm.sng.metadata.MetadataExtractor"
  xmlns:jhove="http://hul.harvard.edu/ois/xml/ns/jhove"
  xmlns:sng="http://www.sng.sk/cedvu#"
  xmlns:rdi="http://www.w3.org/1999/02/22-rdf-syntax-ns#"
  xmlns:rts="http://cosimo.stanford.edu/sdr/metsrights/"/>
<mix:BasicDigitalObjectInformation>
  <mix:ObjectIdentifier>
    <mix:objectIdentifierValue> SNG-0_1290-0.jpg</mix:objectIdentifierValue>
  </mix:ObjectIdentifier>
  <mix:fileSize>85605</mix:fileSize>
```

**Autorské práva**

Vlastník:

Typ:  Licencia:

Popis:

Picture 2 – metadata about digital record

Pozriete pohyb diela: 77/2012

Základné | Diela a dokumentácia

Vytvorené	ehorvathova (17.5.2012 15:30:13)	Zmenené	vhergott (16.11.2012 14:05:57)												
ID Výpožičky	77/2012	Organizácia	Slovenská národná galéria, SNG												
Typ výpožičky	Interná výpožička	Učel výpožičky	Kultúrno-vzdelávacia aktivita												
Udalosť	prednáška	Kontaktná osoba	Ludiková Zuzana												
Vypožičavateľ	Slovenská národná galéria, SNG	Spresnenie													
Lokácia	SNG - Zvolen, Zámok	Spresnenie													
Začiatok výpožičky	16.5.2012	Koniec výpožičky	16.5.2012												
Predpokladaný koniec	31.5.2012	Predĺženie výpožičky													
Začiatok vystavenia		Koniec vystavenia													
Stav výpožičky	Ukončená	Stanovisko UZ	Jozef Kajan												
Podmienky výpožičky															
Súvisiace dokumenty	<table border="1"> <thead> <tr> <th>Dokument</th> <th>Číslo</th> <th>Popis</th> <th>Poznámka</th> </tr> </thead> <tbody> <tr> <td>Príkaz na vydanie zbierkových predmetov z depozitára</td> <td>77/2012</td> <td></td> <td></td> </tr> <tr> <td>Protokol o prevzatí a vrátení zbierkových predmetov</td> <td>k 77/2012</td> <td></td> <td></td> </tr> </tbody> </table>			Dokument	Číslo	Popis	Poznámka	Príkaz na vydanie zbierkových predmetov z depozitára	77/2012			Protokol o prevzatí a vrátení zbierkových predmetov	k 77/2012		
Dokument	Číslo	Popis	Poznámka												
Príkaz na vydanie zbierkových predmetov z depozitára	77/2012														
Protokol o prevzatí a vrátení zbierkových predmetov	k 77/2012														
Poznámka															

Help Zavrieť

Picture 3 – loan record about lending the item for some event

Currently CEDVU comprises records about more than 170 000 collection items.

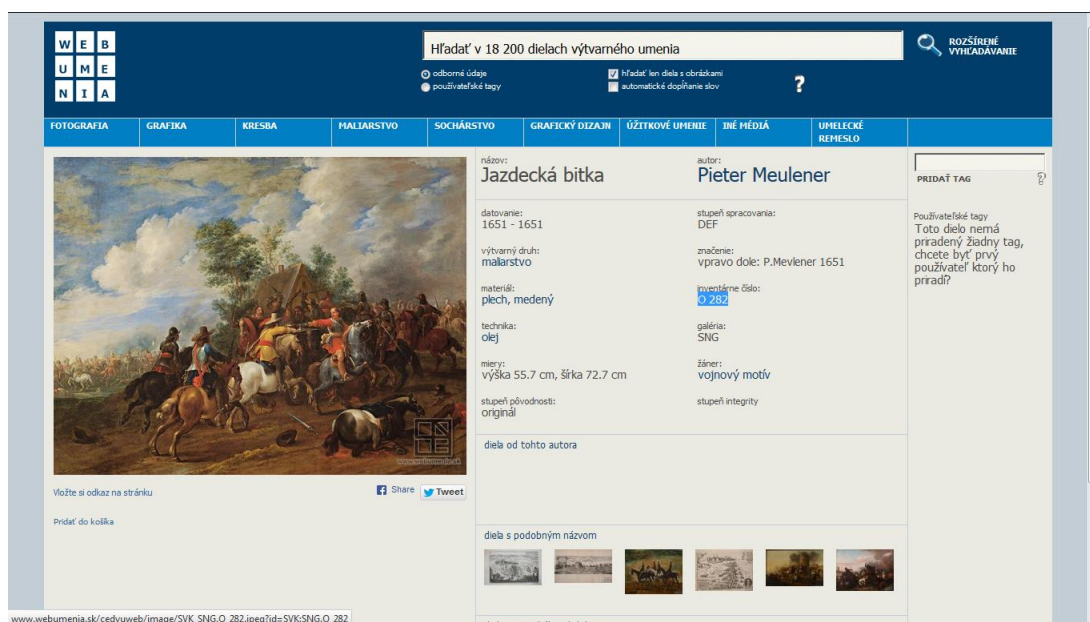
The advantage is one can extract any part of data and use it or transform it easily into others systems or platforms. This was for example the case of Europeana portal ([www.europeana.eu](http://www.europeana.eu)) where is presented cultural heritage from European countries.

Although technologies improve rapidly museums and galleries can't skip certain phases of database's evolution, otherwise they would be stuck in "beta" version forever trying to keep up with newest trends and aps. The challenge SNG faced while developing SW was the integration of all existing systems and the consolidation of syntactic (data structure) and semantic levels (thesauri and authorities). SNG documentation is not just about the artworks, but it also includes archive fund, publications, experts' papers, curators' commentaries etc.

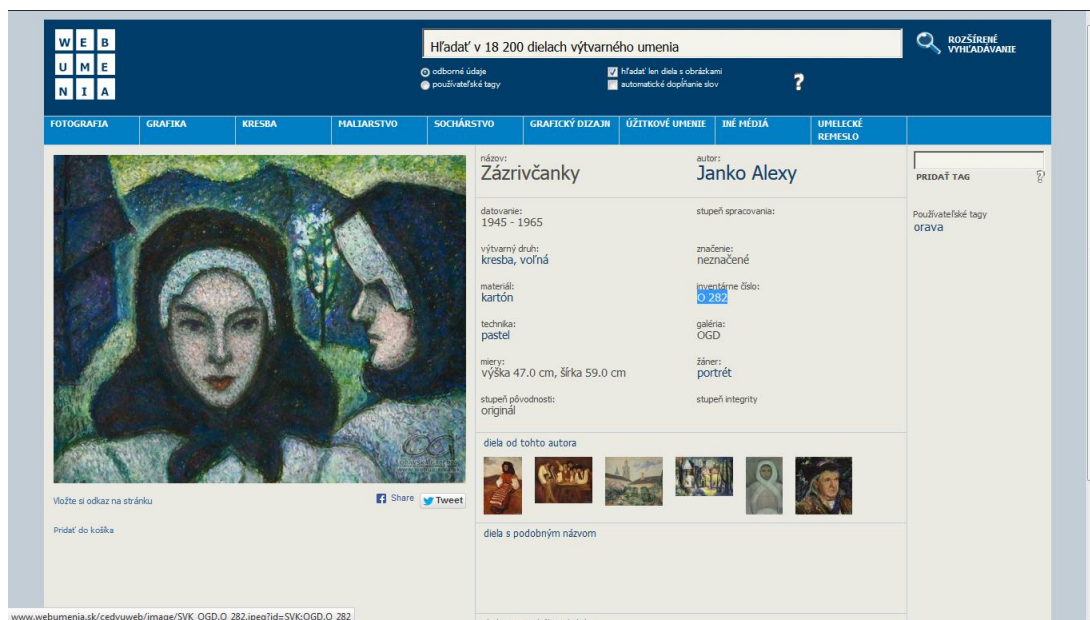
CEDVU is a great tool for collections data but with the expansion of the digital world a complex and systematic digital strategy needs to be formed on the level of the whole government department as well as on the level of respective institutions. Council of Galleries in Slovakia naturally expects that SNG will be the mover in this area and will then spread the experiences and practices among the others.

One of the most important things in collection management tool like CEDVU where we have more providers of digital content is the designation of object in order to identify where does it come from and what it is. Many galleries labels collection items by inventory numbers started with the certain letter referring to art technique such as O = painting (Obraz in Slovak), K = drawing (Kresba in Slovak) or G = graphic (Grafika in Slovak). This letter is followed by the number given in gallery in a row, for example O 282. Basically one can find an item labeled with the inventory number O 282 in many galleries in Slovakia (Pic. 4). Therefore the items must be marked with more specific data:

Code of a gallery – three letters – example SNG; Number of photos – sometimes there are more shots of one item occasionally with specific marks like s-if there is stamping or signature, d-for detail, r-reverse side, f-if it includes a frame; Type of derivative and Date.



Picture 4 – same inventory number in two different galleries



## Digital Age and Collections Management

In September 2011 SNG submitted a proposal for the national project Digital Gallery funded by European Union with three main objectives:

1. To build up a digitizing workstation
2. The expansion of database system
3. Digitizing selected collection items in the amount of 100100 items

Digitizing collections is the final step for having complex database tool for collection management. SNG would not be able to implement this project without having solid and complex database – CEDVU - where the only part missing was high res superior digital image. Digital image must be always stored in its master version for possible later use and

conversion into requested format. Derivatives of the master image are used for various purposes like publishing, printing, presenting by clipping it off, coloring, sharpening a detail and so on.

The vulnerability and one of the weaknesses comes when institutions think digitization is all about the conversion of an analog object into the digital master and relevant derivative. The point of digitizing fine art starts with the use of created digital content. To make a web page full of digital images is one thing, but the real challenge is to create collection data models for online collections that would implement collection documentation effectively and at the same time reflecting the knowledge environment it offers. In other words, museums and galleries should focus on providing expert and scholarly information considering fragmentary, arbitrary and plural nature of object interpretation [4]. Contrary, experts from Rijksstudio (Rijksmuseum, Amsterdam, NL) lay stress on visual part of online collections saying that museums and galleries usually fail to make it more than just a database of all items with mainly administrative purpose while the aesthetic aspect is restrained. The artworks are shown as small thumbnails with various restrictions limiting users to enlarge image and fully enjoy the pleasure [3].

SNG identified four groups of audience: curators and researchers, collections managers and registrars, educators and marketing people, and finally general public. Each group has different expectations from the online access to the database therefore it is hard to satisfy all of them at once with just one tool. After placing a question what content should be provided and in what manner in order to cover all requests SNG decided to go the similar way as most of western museum do – offering two different web pages. One regular web page showing and presenting activities, program, exhibitions, contacts, events and so on, and the other web page based on CEDVU presenting online digital images of all collection items. The second web page however counts with the support of legislation in the area of author's rights; the whole Author's Act needs to be amended since it hasn't changed in complex since 2003. Before it is done SNG would not be able to cover the full potential of modern and attractive online images catalogue.

## **Future Vision**

We live in global environment where virtual life is becoming an equal version of our real life. Due to the lack of time to meet face to face or due to other reasons people started to communicate via social networks or emails or by other technological device. It is very common to share information and post it as “public” without even realizing who can read it. No wonder the need for universal language is even stronger. Bilingual version of provided information should be a minimal standard, using a national language and English. This is one of the weaknesses of CEDVU. Currently it only provides data in Slovak language while limiting its huge potential of users worldwide.

This brief view of collection management system in SNG can be closed with the vision and dream how CEDVU should look like in the future: visual database full of high res images providing hyperlinks to other images by tagging many categories. Browsing would be like never-ending exhibition ride in a funny and entertaining way. Possibly including more senses than just visual pleasure – sounds, stories, etc. because even learning without knowing about art can fun!



## Literature

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Special thanks to my colleagues PhDr. Jana Bahurinska, Mgr. Michal Čudrnak and Vladimír Hergott who were the innovators and visionaries and who help to move things forward.

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