

Relationships

Relationships between people are non-material by themselves. While some concepts of relationships, such as the family, are immediately recognizable, most kinds of relationships are not traceable through any clear-cut reason. Friendships or relationships between the provider of a service and his or her clients happen coincidentally. They are often determined by the places people are located at when they begin but they are not necessarily formed. While we consider two children of the same parents to automatically have a relation of siblingship, two people who happen to stay in the same city at the same time may become friends—but they may also never come to know each other. On the other hand, it is more likely that some kind of relationship between two people develops if they are in the same city than if they are not.

For tracing relationships of historical people, written documents offer the most obvious documentation of people's relationships. A letter links two persons; its contents provide hints at the kind of relationship they shared. In all kinds of written documents, third persons may be referenced, signalling that the author at least knew of those referenced and deemed them, their acts, or their writing important enough to be referenced. If the written



material has been digitized, these different types of links between people can be found and showcased with relative ease.

A less commonly used but astonishingly valuable provider of information on relationships between people can be museum objects. In the following, a sample implementation and showcasing of this finding—developed in the context of museum-digital—will be discussed.

Museum-digital

Museum-digital is a web project focused primarily on the digitization and online publication of museum objects. As of October 2017, there are 509 participating museums in Germany with some 94000 publicly available objects. There is now also a Hungarian version, with 77 participating museums with some 82000 objects along with several other international ones. As has been stated in Uncommon Culture before (Rohde-Enslin, 2011), the museums on museum-digital aim to provide high quality data.

After several improvements on the technical side of the web page over the last two years, new features were to be planned. The

Networks of people are made traceable by allowing a navigation through clicks on the people's names.

development of people to people pages is one of these new features, based on the basic concept of events.

The Basis: An Eventbased Data Model for Digitizing Museum Objects

Essential for developing the people to people pages at museum-digital was the event-based data model used for object information at museum-digital (roughly following standards such as LIDO). Events serve to store information on what happened with a given object, and by whom, when, and where something pertaining to the object was done. For example, a sculpture may have been conceptualized, created, sold, etc.; all at a given point in time, a given place, and by a given person.

It is this event information that is used for linking two people via museum objects.

People to People Relationships at museum-digital

The people to people pages at museum-digital describe the relations of a given person (or institution). First, all events linked with a person are selected—each linked with an object. Then, all other events linked to those objects are selected in case they contain information on any person besides the one the user searched for. Thus, linkages between persons are uncovered via objects. Networks of people are made traceable by allowing a navigation through clicks on the people's names.

As each event carries information on what happened, people to people relations can be grouped by these. In the current implementation, relationships between people are first grouped by the event type. Second, objects are grouped according to the people or institutions the selected one is linked with.

In figure one, a subset of the available relations of Martin Luther are displayed. Luther was portrayed on objects, on which the first six people of the second column were also portrayed. Katharina von Bora, his wife, was portrayed together with Luther on five objects, whereas the other five listed persons were displayed with him on only one object. The last visible person linked with Luther, Lucas Cranach the Elder, painted or created objects Luther was portrayed on or created the printing plate or reference for such objects. Finally, Cranach was also portrayed on an object together with Luther.



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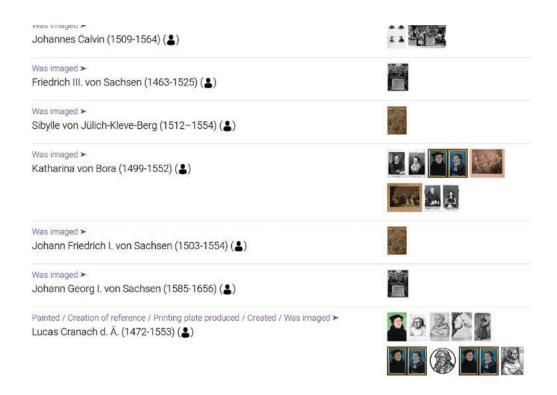


Fig. 1. An example of a people to people page: people and objects on which Martin Luther was portrayed

The last grouping—by the people Luther is linked with—obviously blunts the information in this case, as it is not visible anymore whether Cranach was most often portrayed on the same objects with Luther or if he was the creator of many objects Luther was portrayed on. Also, without this blunting, it would become apparent that von Bora was portrayed together with Luther much more often than Cranach. On the other hand, it helps to show that



the relationship between the two was well documented—through Cranach's own creations—and relatively close when compared to Luther's relationships with the first six persons in the example respectively.

A second example serves to show that the concept is also useful when working with written documents. In figure 3, people and institutions who published or co-authored texts written by Johann Wilhelm Ludwig



Gleim are listed. Thus, basic information uncovered through common text analysis can also be uncovered if the texts are viewed as objects, using the tools this perspective provides.

Figure 4 shows Gleims relationships through letters. A large number of letters received by Gleim were written by Justus Friedrich Wilhelm Zachariae. Anna Louisa Karsch, however, not only wrote but also sent letters to him. This way, the large number of event types serves to give very specific information. Differences in the availability of data or users' input behaviour may explain why none of Zachariae's letters was also marked as sent by him. On the other hand, this specificity may prove useful in determining the processes involved in Gleim's and Zachariae's correspondence.

Advantages and Limitations

The sample implementation just shows one option for using the basic concept of tracing

Fig. 2. Lucas Cranach the Elder, Double portrait of Martin Luther and Katharina von Bora. Colletion of the Museum im Melanchthonhaus Bretten. <u>https://www.museum-digital.de/nat/index.php?t=objekt&coges=59735</u>





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| Published ➤ Christian Friedrich Voß (Verlag) (匙) | |
| Published ➤ Gotthold Ephraim Lessing (1729-1781) (♣) | |
| Published ➤ Waisenhausbuchhandlung Braunschweig (♣) | |



Fig. 3. People and institutions who published and co-authored works written by Johann Wilhelm Ludwig Gleim

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| Written / Sent ➤ Anna Louisa Karsch (1722-1791) (♣) | |
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Fig. 4. Letters received by Gleim







Fig. 5. Johann Heinrich Ramberg, portrait of Johann Wilhelm Ludwig Gleim, 1789. Gleimhaus, Halberstadt

relations between persons through events and objects. When compared to using written documents for tracing people's relationships, this concept is applicable to a much wider range of objects. It also offers a comparatively fine-grained glimpse at people's relations.

Additional information may later be added both as search parameters and immediately visible outputs. Were a user to search for Sir Stamford Raffles, a British colonial officer and founder of Singapore, the majority of the objects and relations found would



Fig. 6. George Francis Joseph, portrait of Sir Thomas Stamford Bingley Raffles, 1817. National Portrait Gallery, London

most likely be from his later times. Raffles was, however, also Lieutenant General of Java from 1811 until 1815—an important episode of the history of Indonesia. Given the event-based data structure necessary for implementing the concept, an easy to implement next step could be search options for a person's relationships with other people as traced via objects based on time or place.

The main limiting factors lie with the initial aggregation of the data used for tracing





people's relationships through objects: obviously, the objects need to be digitized first. Second, the availability of many event types may lead to less consistent data. As the example detailed above shows, Cranach was noted to have both painted and created objects displaying Luther. While the more specific painting is expressly preferred in case both are equivalent, data providers define the event types and rules differently. Given the number of different event types, such overlapping definitions may be more likely to happen with objects than in the case of written documents. The need to check the data manually before drawing conclusions on people's relationships may thus be comparatively higher in some cases.

Disregarding its limitations and challenges, the concept of tracing people's relations

through objects in an automated way can already be described as fruitfully complementing more traditional methodologies. It shows that objects in fact carry important and extremely detailed information on people's history. It may also be further advanced in the future by considering additional data, which has been collected to follow the underlying concept of the event in an object's history.

Bibliography

LIDO—Lightweight Information Describing Objects: The international harvesting standard for museums. (2009) Gordon McKenna, Stefan Rohde-Enslin, Regine Stein. Roma, Ministero per i Beni e le Attività Culturali. Available also at <u>http://www.athenaeurope.org/</u>

Rohde-Enslin Stefan (2011). *Museum-digital*. Uncommon Culture vol. 2 no 3/4.

