

IM-Archive

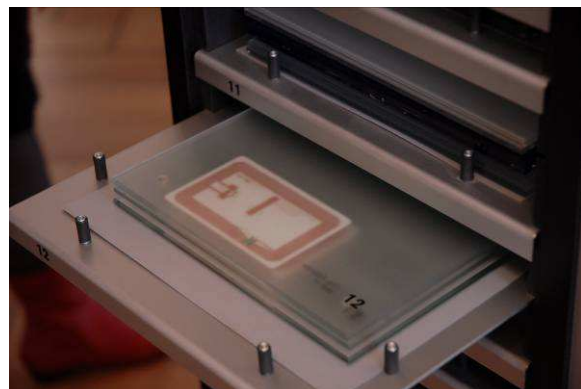
Intuitive Access to Information in the Internet and Security for Exhibition Objects



The availability of information through the internet is a matter of a few mouse clicks and keyboard entries into a search engine. But modern museums start where the search engine stops. Furthermore the experience to touch and feel real materials in the real world is more and more important. In co-operation with the Material Archive and the Gewerbemuseum Winterthur we developed an Access to Information System which takes the crucial step: the physical material in the hand of the visitor directly generates the access to information. This means that all the orientation on the website, keyboard entry of the right number or keyword is not necessary any more. The simplicity to use the physical material itself leads to an intuitive use of it and the visitor is less distracted from his research.



RFID-Work Station



RFID-Label on the Material Sample

The material samples are equipped with RFID-labels in various forms. The label is used as a data carrier which is read and written to via Radio Frequency. The chosen material is put on a reader spot beside the computer screen. As soon as the RFID tag is „seen“ by the reader it will link up to the Material Archive's data base in the internet. The specific information regarding the material is shown on the display. All information can be collected on the screen and stored with a drag and drop function in a special folder. This can either be used in the next session or be sent to an email account.

The system is compiled from a number of components (see table): RFID-labels in various forms, an RFID-Work Station with a PC and an RFID-Reader, a Data Base and Security Gates. Since the RFID-Labels contain a security information they are recognised at the gate and cause an alarm if materials are taken illegally from the room. This security function is the prerequisite to be able to let visitors take the objects in their hands. Not only the cost for the valuable material itself but also the cost to re-order it has to be estimated.

The IM-Archive System can also be used with other objects in the Museum collection. There are new options to perform the inventory work in a much faster and more effective way. It is possible that objects are borrowed like in a library. The RFID-Labels can also be used for authentication and proof of ownership (e.g. they can be integrated into the object). Quite often collections are shared amongst several Museums (special exhibitions etc.).

The IM-Archive-System can be integrated into every existing network (LAN or WLAN).

Our references are the Gewerbemuseum Winterthur, the Highschool for Technology and Architecture (HTA) in Luzern and the Sitterwerk St. Gallen.



RFID-Security Gate

Components required	
PC with screen	PC from the museum
RFID-Reader	Common stationary read / write units
Network	LAN or WLAN
Data Base	Interface to a web based data base or local data base, e.g. SQL 2005
RFID Labels on Objects	RFID-Labels in standard HF-technology
User Software	IM-Bridge to run the reader devices and the user software for tagging, maintenance and visitor use
RFID-Printer	Optional for programming and highly durable print on the RFID labels
Thermal-Transfer-Printer	Optional, for durable printing with separate programming of the labels