The Cluster of Excellence  
**Understanding Written Artefacts**  
at the Centre for the Study of Manuscript Cultures  
cordially invites you to the workshop  

**Woodblock Printing:**  
**A Cross-Cultural Approach**  

Monday, 22 April 2024, 9:30 am – 5:15 pm CEST  
Tuesday, 23 April 2024, 9:00 am – 3:45 pm CEST  

Warburgstraße 26, 20354 Hamburg  

Organised by Michael Friedrich (Universität Hamburg),  
Arianna D’Ottone Rambach (La Sapienza),  
and Marco Heiles (Universität Hamburg)  

Registration:  
[https://www.csmc.uni-hamburg.de/en/register/workshop52](https://www.csmc.uni-hamburg.de/en/register/workshop52)
Woodblock printing (relief printing) belongs to manuscript culture. The earliest extant specimens have been found in China and are dated to the late seventh century, the technique soon spread to other regions in East and Central Asia and was used for ephemeral as well as literary texts such as Buddhist sutras or the Confucian canon. In the tenth century, woodblock printing was attested in Egypt for producing amulets. In the Latin West, it apparently emerged in the early fifteenth century for woodcuts on paper and then was used for printing entire books (block-books) including writing and images. At the same time, woodblock imprints were integrated in various ways into manuscripts and moveable-type books and have been in use until the end of the twentieth century. How this evidence from different times and places is related, is still a subject for speculation. In addition, it is rather unlikely that all these different types of artefacts were produced using the same materials and techniques as developed in China.

Whether considered as an ‘extension of manuscript culture’ or a ‘technique to print manuscripts’, woodblock printing has always played a negligible role in the history of the book, which is still mainly concerned with the Western book printed with moveable type. From Thomas Francis Carter to Elizabeth L. Eisenstein, influential authors have only devoted a paragraph or two to this technique and usually dismissed it as caused by the ‘high number of Chinese characters.’ Quite often it is associated with imprinting textiles or using stamps to reproduce patterns on various media. Thus, the specifics of this technique, its place among other technologies for the multiplication of handwritten signs and images, and the reasons why it persisted in some parts of the world, but was abandoned in others, are still largely unknown. The workshop will address these questions as well as problems of terminology.
Programme

Monday, 22 April 2024, 9:30 am – 5:15 pm

9:30 – 9:45  Welcome and Introduction

Part I: Traditions
Chair: Michael Friedrich (Universität Hamburg)

9:45 – 10:30  Bo Seung Kang (The Korean Studies Institute)
  Printing Woodblocks in Korea – History, Production Techniques and Utilization

10:30 – 11:15  Tuan-Cuong Nguyen (Sino-Nom Institute)
  Printing Woodblocks in Vietnam: The State of the Field

11:15 – 11:30  Coffee Break

Chair: Marco Heiles (Universität Hamburg)

11:30 – 12:15  Sainbileg Byambadori (National Library of Mongolia)
  Overview on the Block Printing Culture in Mongolia: Evidence of Woodblocks in Various Scripts Invented by Mongols

12:15 – 1:00  Arianna D’Ottone Rambach (La Sapienza)
  Arabic Block Printed and Latin Written Amulets: Bridging East & West

1:00 – 2:00  Lunch Break

Chair: Arianna D’Ottone Rambach (La Sapienza)

2:00 – 2:45  Stephen Mossman (University of Manchester)
  Blockbooks and Woodblocks in Books in Europe (15th and 16th Centuries)
2:45 – 3:30  Marco Heiles (Universität Hamburg)
   *Woodcuts for Amulets? Woodblock Printing on Single Leaves in Europe (15th and 16th Centuries)*

3:30 – 3:45  Coffee Break

**Part II: Techniques**

Chair: Uta Lauer (Universität Hamburg)

3:45 – 4:30  David Barker (Muban Educational Trust)
   *Registration – The Key to Printing in Colour in China, Japan and Modern Europe*

4:30 – 5:15  Chao Wang (Chinese Academy of Art)
   *An Interaction between Paper and Block: The History and Evolution of the Printing Table*

7:00        Conference Dinner

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**Tuesday, 23 April 2024, 9.00 am – 3.45 pm**

**Part II: Techniques, continued**

Chair: Darya Ogorodnikova (Universität Hamburg)

9:00 – 9:45  Ad Stijnman (Independent Scholar)
   *Materials and Techniques of Early European Woodblock Printmaking 1420–1470*

9:45 – 10:30 Nikolaus Weichselbaumer (Johannes-Gutenberg-Universität)
   *Integration of Woodcuts in the Typographic Book*

10:30 – 10:45 Coffee Break
Part III: Reflections

Chair: Jörg B. Quenzer (Universität Hamburg)

10:45 – 11:30 Daniel Lowe (British Library)
Falling between the Gaps: Re-surfacing Block Prints in the British Library’s Arabic Collection

11:30 – 12:15 Michael Friedrich (Universität Hamburg)
The Place of Woodblock Printing in Chinese Manuscript Culture

12:15 – 1:00 Julie Nelson Davis (University of Pennsylvania)
Printing the Brush: Form and Image in Early Modern Japan

1:00 – 2:00 Lunch Break

2:00 – 3:00 Chao Wang (Chinese Academy of Art)
Practical Demonstration of Chinese Woodblock Printing

3:00 – 3:45 Final Discussion
Abstracts and Contributors

David Barker (Muban Educational Trust)
Registration – The Key to Printing in Colour
Monday, 22 April 2024, 3:00 pm – 3:45 pm

An illustrated presentation describing the differing bases of taoban 套版 (fixed register) and douban 饾版 (flexible register) and their roles in late-Ming pictorial woodblock multi-colour printing of manuals and letter papers. Examples of both forms will be shown and their terminology explained relative to the parallel history of the printing table lou an 漏案, the Japanese kento 見當 けんと and modern European derivations.

Sainbileg Byambadorj (National Library of Mongolia)
Overview on the Block Printing Culture in Mongolia: Evidence of Woodblocks in Various Scripts Invented by Mongols
Monday, 22 April 2024, 11:30 am – 12:15 am

According to scholars’ findings, the earliest block carving for printing of Mongols is relevant to Kitans (approximately, 1031-1100) who were our ancestors. After establishment of the Great Mongolian Empire, the first block-print product was a bilingual dictionary of Uighur and Mongolian produced by order of Qubilai Khan during the Yuan Dynasty. From the time of Qubilai’s reign (1264-94), Mongols began to produce Buddhist and Non-Buddhist scriptures in Mongolian in block-print forms. The latest woodblock production of Mongols was the Origin of Sages (Dag yig mkhas pa’i ’byung gnas) that re-carved in 1924. Before investigation of the printing culture of Mongols, we should understand why it is described as “Mongolian”. Historically, Mongols had been composed several types of scripts such as Mongolian script (vertical), ’Phags-pa script, Todo script, Soyombo script and Vagindra script. On the other hand, Mongols adopted Buddhism from Tibet, and Tibetan Buddhism was dominant in centuries in Mongolia even today. Mongolian Buddhist monks learned Buddhism from books written in Tibetan, and Buddhist temples in Mongolia mostly chant mantras in Tibetan language. In other words, Tibetan language has been the mandatory academic language of Mongolian Buddhism. Hence Mongols created numerous blocks for printing in Tibetan language. Therefore, the block
printing culture of Mongols is a pretty broad concept that refers to blocks in all types of scripts including Mongolian, ’Phags-pa, Todo, Soyombo and Vagindra scripts, and blocks for printing in Tibetan language that created by Mongols in the Mongolian territory, and technique for producing blocks.

Historically, Mongols involved with particular materials for carving blocks of printing such as stone, bronze, copper and wood. Some scholars claim that there are evidences of stone and iron blocks for printing; however, I have not seen at least one stone or iron block in my own eyes that preserved so far. In the nineteenth century, Mongols used the technique of printing with movable type.

Arianna D’Ottone Rambach (La Sapenzia)

Arabic Block Printed and Latin Written Amulets: Bridging East & West
Monday, 22 April 2024, 12:15 pm – 1:00 pm

The Crusader period was certainly an epoch of death and diseases due to battles between Christian knights, aiming at taking control of the Holy Land, and Muslim forces, resisting to the invasion and fighting back. These centuries of wars and journeys (1095-1291), the going to the Middle East and return to Europe of crusaders, pilgrims and religious men made this period an epoch of cultural encounters, linguistic exchange, and shared material practices. The introduction in Italy, and thence Europe, of new items is exemplified, for instance, by the written amulets which were likely inspired by the block-printed amulets that circulated widely in the Islamic Middle East. One of the earliest exemplars of Western written amulets is the so-called chartula of saint Francis (see D.C. Skemer, Binding Words: Textual Amulets in the Middle Ages («Magic in History»), University Park, PA 2006, pp. 172-178). St. Francis’ chartula contains brief quotations from Psalms, the Gospels, and the Pauline Epistle and 40 divine names. It was written in 1224, that is after St. Francis’s return to Assisi from Egypt – the main region for block-printed Arabic amulets in the Islamic lands. Considering the chronology of the production of both the Arabic block-printed amulets and the Latin (hand-)written amulets, the etymology of the word “amulet” in different European languages (English, Spanish, ...), the type of texts recorded in the Islamic and Christian amulets, and other historical, material, and linguistic details, this paper aims at bridging East and West through this specific type of pseudo-religious texts that are amulets.
Michael Friedrich (Universität Hamburg)
*The Place of Woodblock Printing in Chinese Manuscript Culture*
Tuesday, 23 April 2024, 11:30 am – 12:15 pm

In Western studies of the history of the book, East and Central Asian woodblock printing has not received the attention it deserves. Beginning with Francis Carter’s *The Invention of Printing in China and Its Spread Westward* (1925), woodblock printing is usually dismissed as an anomaly caused by the large number of Chinese characters and not relevant for the history of the ‘real’ technology, namely printing with moveable type.

Woodblock imprints have been characterised as ‘printed manuscripts’ or ‘extension of manuscript culture’. Taking this observation as starting point, two types of woodblock printing will be discussed in relation to moveable-type printing in China. Finally, a new taxonomy of printing technologies will be proposed.

Marco Heiles (Universität Hamburg)
*Woodcuts for Amulets? Woodblock Printing on Single Leaves in Europe (15th and 16th Centuries)*
Monday, 22 April 2024, 2:45 pm – 3:30 pm

In his seminal monograph on textual amulets in medieval Latin Europe, Don C. Skemer suggests a continuity between handwritten and printed textual amulets (*Binding Words. Textual Amulets in the Middle Ages*, 2006, pp. 222-233). My paper challenges this thesis and attempts to analyse more closely the role that the introduction of woodcut printing in the fifteenth century had on the production and use of single-sheet media in general and textual amulets in particular. This analysis shows that many established elements of handwritten textual amulets were not adopted in print, that printed and handwritten textual amulets were obviously different, and that - in contrast to the Arabic tradition - no stable tradition of printed textual amulets developed. In my opinion, the reasons for the non-use of woodblock printing for textual amulets do not lie in its technical possibilities, but in the new dimension of publicity created by woodblock (and typographic) printing. The use and form of textual amulets were theologically controversial and could be seen as an expression of forbidden superstition and magic. Mass production of this type of written artefacts therefore seems to have been impossible, or at least only possible in a modified form.
Bo Seung Kang (The Korean Studies Institute)
Printing Woodblocks in Korea – History, Production Techniques and Utilization
Monday, 22 April 2024, 9:45 am – 10:30 am

Printing woodblocks hold a significant place in Korea's cultural heritage, shaping literature, art, and the dissemination of knowledge. This paper delves into their diverse history, types, intricate structure, production methods, alongside modern promotional efforts of printing woodblocks in Korea.

Originating in the 8th century with the Great Dharani Sutra, these woodblocks evolved into symbols of Korean documentary heritage, most notably seen in the Printing Woodblocks of the Tripitaka Koreana. They served crucial roles in reproducing texts of Confucian scholars and ancestors, as well as preserving historical records. Various types of printing woodblocks exist, each tailored to specific purposes. These purposes include printing for books, slogans and calligraphy, figures and book cover, and letter paper. Printing woodblocks are among the most common types of Korean woodblocks, following those intended for Buddhist scriptures. Typically, printing woodblocks include poems written by the author, autographs of a departed individuals, family tree diagrams, portraits of the deceased, pictures of the tomb, and more. Woodblocks for slogans, calligraphy, book cover and letters were produced in small quantities and used for specific purposes only. Generally, a woodblock can be divided into a surface where letters are engraved and end pieces which function as handles. The surface of woodblocks can be split into a surface center engraved with body, blank edge, lines, end pieces, woodblock center, page-brow and page-foot. Their durability allowed repeated use, signifying their cultural importance.

The production process of printing woodblocks involves a series of specialized techniques that have been passed down through generations. After selecting and cutting the wood, artisans season it for one to two years, then remove resin by boiling it in salt water. The woodblocks are dried for one to three years, and artisans finally finish the blocks by smoothing out the surface and adding end pieces. Once the block is fully prepared, paper with the draft text is attached to the surface, text side down, and the engraving begins. Skilled engravers start with lines and blank edges, and they can complete one woodblock within a week. After the engraving is finished, the printing process begins using ink, brushes, and paper. This labor-intensive process, which includes bookbinding, demands exceptional skill and patience. To promote the accessibility and awareness of printing woodblocks in Korea, the Korean Studies Institute initiated several projects aimed at inspiring both the public and experts. Exhibitions featuring printing
woodblocks, educational training sessions, research focusing on woodblocks in Korea, the publication of books, and the nomination to the UNESCO Memory of the World register are the key components to capture the attention of both domestic and international audiences.

Daniel Lowe (British Library)
Falling between the Gaps: Re-surfacing Block Prints in the British Library’s Arabic collection
Tuesday, 23 April 2024, 10:45 am – 11:30 am

The librarian Alexander George Ellis first documented the presence of Arabic block prints in the collection of the British Museum’s Department of Oriental Manuscripts and Printed Books (now the British Library’s Asian and African Collections department) in 1894 (Ellis, Catalogue of Arabic books in the British Museum). Yet, over a century later in the early 2000s, these enigmatic and elusive objects could not be located in the British Library’s collections (Schaefer, Enigmatic Charms). In recent years, two specimens of Arabic block prints have been resurfaced in the British Library’s Arabic collections. These are now currently the subject of a forthcoming study by Prof. Arianna D’Ottone. My presentation will focus on the place and context of these artefacts in library and museum collections. I will look at past curatorial, storage and conservation decisions that caused the examples in the British Library’s collections to be misplaced and I intend to offer some insights into the process of by which they were resurfaced. I will look at holistic and dynamic curatorial approaches for preserving and activating Arabic block prints, contextualising them within broader historical and cultural narratives and drawing on connections with the Library’s extensive holdings manuscript and printed heritage collections, as well as contemporary visual culture. In summary, Korea's printing woodblocks offer a captivating narrative of documentary heritage, craftsmanship, and innovation. Understanding their history, production, and promotion preserves this timeless art form, inspiring international experts in the field of documentary heritage and the archival studies.
Stephen Mossman (University of Manchester)
Blockbooks and Woodblocks in Books (15th and 16th centuries)
Monday, 22 April 2024, 2:00 pm – 2:45 pm

This paper will present the status quaestionis in relation to the use of the xylographic method (printing with wooden blocks) in the transformation of book production in late medieval Europe. It will discuss how the xylographic method relates to other innovations and changes in book production – the serial production of manuscripts, typographic printing, and single-sheet printing of various kinds – in the century or so after c.1430, foregrounding the notion of hybridity to explore ‘mixed media’ (chiroxylographic and xylotypographic books) as particular nodes of intersection in that process of transformation. It will draw on ongoing work undertaken at Manchester, Mainz and Erlangen-Nürnberg in the AHRC-DFG funded ‘Werck der bücher’ project that aims to set our knowledge of early printing (to c.1470) on a new evidentiary foundation across all methods. Our aim in that project with regard to xylographic book production (blockbooks) is to examine the watermarks present in the paper stocks of all surviving examples, in order to understand, in so far as paper evidence can permit, not just the chronology of blockbook production in itself, but also the extent and nature of the potential interrelationship, as documented by the use of identical paper stocks, between books printed by the typographic method, which routinely reveal the identity of their printers and the date of their production, and books printed by the xylographic method, in which that information is almost never provided.

Julie Nelson Davis (University of Pennsylvania)
Printing the Brush: Form and Image in Early Modern Japan
Tuesday, 23 April 2024, 12:15 pm – 1:00 pm

Many Edo-period printed books include illustrations that seem intended to imitate paintings or calligraphy. Some images seem so skillful that we might marvel that the image is printed, not brushed directly on the page. In this presentation, I will consider selected images that are designed to preserve in print the movement of the hand and how these seem to allude to the intentions of the artist. Through these selected examples, set within the longer history of woodblock printing in Japan, I will consider how the woodblock as matrix remained the preferred approach, how and why verisimilitude is
sought as well as interrupted. Aspects of intermedial dialogues between brush, block, baren, and paper will also be explored, and the limits of illusionism queried. Reconsidering these books as the “brush in print” further raises important issues around the status of the original and the implications of producing the famous brush in multiple.

Tuân-Cường Nguyễn (Sino-Nom Institute)

*Printing Woodblocks in Vietnam: The State of the Field*

Monday, 22 April 2024, 10:30 am – 11:15 am

In 2009, the collection of “Royal woodblocks of Nguyễn Dynasty” (阮朝木版) including over 34,000 plates of the Vietnam National Archives Center No. I was registered by UNESCO as the first “World Documentary Heritage” in Vietnam. Since then, woodblocks in Vietnam have received increasing attention. There are 2 more woodblock collections registered by Memory of the World Committee for Asia and the Pacific (MOWCAP) as Documentary Heritage in 2013 and 2016. There are 4 woodblock collections registered by the Government of Vietnam as “National treasures” in 2017-2023. Several domestic and international conferences on Vietnamese woodblocks have been organized. Many bibliographies, research books, and research articles on woodblocks have been published. This article provides an overview of the existing main woodblock collections in Vietnam, then analyzes the current state of the study of woodblocks in Vietnam from three perspectives: state management, cultural heritage preservation, and research. The article argues that the field of woodblock in Vietnam has been gradually developing with the appreciation of the government, the Buddhist community’s interest in Buddhist woodblock collections, together with the attention of scholars in heritage and traditional culture. Besides these strengths, the field of Vietnamese woodblocks shortly will need to attract more attention from international scholars, develop woodblock research from a technical perspective, and connect the woodblocks with their historical relics to develop local tourism.
Looking at the earliest European ‘woodcuts’ – i.e. impressions of inked woodblocks into which imagery is cut – shows cutting blocks for printmaking in the period 1420–1470 is not different from earlier or later woodworking manners. Cutting with knives, chisels and gauges to create sculpture or decorate planks is similar. Otherwise, the stamping of natural or human-made reliefs covered with paint onto leather, living skin or walls goes back to prehistory, with examples found with cave paintings globally. It is the combination of the two actions – on fabric, paper or parchment – that created a new invention.

A continuous development of stamping fabric with inked, cut woodblocks presumably started in north-west India c.400 BCE. The evidence is scant, but the few remaining items presumably indicate stamping fabric disseminated to China from c.200 BCE and to the Sassanian Empire from c.200 CE, appearing in Egypt in the 6th/7th century. Stamped fabric objects and written instructions indicate the process was practised in northern Italy in the second half of the 14th century, but may have arrived there from Egypt already in the 13th century. Asian and Egyptian fabric apparently was stamped with water-based inks only. Italy had a tradition of processing linseed oil by heating it with addition of pine resin, which is documented from the 8th century. Heating the oil created a so-called ‘oil varnish’, a viscous fluid suited as glue, to cover wood and metal, or to mix with a colourant to a paint. In the case of stamping fabric a local development from water-based to oil-based inks seems to have occurred. Mixtures of oil varnish and colourants used in stamping fabric, i.e. recipes for oil-based inks, are described in Italian, German and English sources from the late 14th century onward. Little, though, is mentioned about the choice of wood and nearly nothing about the tools used and the manners of cutting. For this we have to examine the few remaining blocks themselves. All of about the some hundred remaining medieval printing ink recipes are for use on fabric, except for one recipe in a Netherlandish manuscript written in 1496–98. This instructs preparing an oil-based ink for printing a woodblock on paper or parchment. In the course of the 16th century more details on tools, kinds of wood and the transfer of designs onto blocks are documented. Oil-based inks were used for stamping fabric and also for printing metal type from Johann Gutenberg’s (1395/1400–1468) invention of typography c.1440 onward. From the earliest single-leaf woodcuts of c.1420 to later 15th-century ‘block-books’ – i.e. volumes of woodcuts with both images and texts cut in the blocks – ‘water-
based’ printing inks of various recipes have been used. The differences in ink recipes indicate the parallel existence of printshops using different materials and techniques in Europe in the 15th century. Especially the use of water-based printing inks for woodcuts on paper may give clues for a particular extra-European origin of this kind of woodcut printmaking, in a manner different from stamping blocks on fabric.

Chao Wang (Chinese Academy of Art)
An Interaction between Paper and Block: The History and Evolution of the Printing Table
Monday, 22 April 2024, 4:30 pm – 5:15 pm

The traditional printing table, also known as the slotted (or divided) table allows for the art of registration, known as ‘moveable block – fixed paper.’ Each part of the printing table has its own purpose, advantageous to the printing of batches of paper. Looking at the printing table in use in the Purple Bamboo Studio, by means of the associated steps of loosening and re-tightening the pressure bar holding the paper in place, adjusting the leveling board and turning the paper on the table, being highly effective in achieving printings on two unfolded, uncut folios from the same sheet of paper. This might help explain the possible signature as well as working procedures used in publications from the Song through Ming dynasties.

The archetypal printing table has three characteristics: the open slot that conforms to the unit size of the paper, the wooden bar that regulates the corresponding thickness of the printing block up and down and the component that fixes the batch of paper at two points.

The shape of the printing table has gradually progressed through a trestle table (daban or jiaji) to a desk with drawers at both ends.

Nikolaus Weichselbaumer (Johannes Gutenberg-Universität Mainz)
Integration of Woodcuts in the Typographic Book
Tuesday, 23 April 2024, 9:45 am – 10:30 am

Woodcuts were already well-established when Johannes Gutenberg set up shop. Since woodcuts and type can be combined into one printing forme, they were an obvious pairing. This paper aims to examine the use of woodblocks in books printed with movable
type during the 15th and 16th centuries from a Western perspective. One focal point will be outlining the functions of woodcuts in early printed books, their role in the development of title pages and as printers’ devices, and their contribution as a structuring element in the layout of texts. Additionally, the paper will delve into the methods developed in early print for indexing parts of a woodblock in the accompanying textual description. A second theme will explore practices of reuse, lending, copying, and imitation, often driven by pragmatic and economic considerations. These practices, however, lead to visual traditions that can span well over a century.