

The e-book age has taken “the book” as we have known it to a turning point. But in fact, casting off old technologies and taking on new ones has been part of the history of the book since Egyptian times. This volume tells the story from the very beginning. These 100 books have played a critical role in the creation and expansion of books in all forms and in all that they bring: literacy, numeracy, technological progress and the expansion of scientific knowledge, religion, political theory, oppression, liberation, entertainment and more.

From inscriptions on tombs to the first writings on papyrus; from how scrolls gave way to the first bound “codex” books in Roman times; from exclusive and expensive hand-written books to the creation of movable type and the invention of printing for the masses; and from the printed book to the digital book, the ebook reader... and beyond, the history of the book is the history of civilization.

Illustrating this story are more than 250 pictures of treasured artifacts from the world’s most important historic collections.



The History of THE BOOK in 100 Books



Roderick Cave is a print historian and librarian who has worked with rare book collections and developed information science courses in libraries and universities around the world. He is the author of *Impressions of Nature: A History of Nature Printing*.

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The History of THE BOOK in 100 Books

The Complete Story, From Egypt to e-book



THE HISTORY OF THE BOOK IN 100 BOOKS

Roderick Cave and Sara Ayad

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Roderick Cave & Sara Ayad

122 THE FIFTEENTH CENTURY REVOLUTION
Woodcuts and the Emergence of Illustration

Medical Illustrations

Anatomy tutor Vesalius, a student of Titius, and first-rate woodcut and printing; the result is an anatomical tour-de-force.



1617: Manuscript by Muhammad Taqrīb al-Tawrī (The Anatomy of the Human Body). Medical illustration from a 1617 copy of a 16th-century manuscript, originally written in Dhaka before 1594. Paper, British Library.



1819: Global diagram of the human body, from a Thai massage manuscript, in folding-book format, early 19th-century. Paper, British Library.

By the 1550s, the Swiss city Basel was noted for its bold scholarly and scientific publications from printers such as Froben, with his editions of Erasmus and Oporinus. *De humani corporis fabrica* was not the only modern anatomical text, but it was the finest. Born in Brussels, Andreas Vesalius (1514–1564) taught anatomy at the university of Padua, and was famous for doing all his dissections himself—often on the corpses of executed criminals. His teaching, which relied on direct observation, advanced medical knowledge markedly by correcting ancient misconceptions. His work was assisted by the drawings of Jan Stephan Calcar, a Flemish artist and pupil of Titius. Oporinus recognized that brilliant dissection and inspired anatomical drawing also demanded the availability of woodcutters skilled enough to produce detailed and accurate blocks. The crisp, clear execution in Oporinus' printing helped turn this book into an instant success, and it remains a model of medical printing.

The impetus in medical research passed to the Islamic world after the decline of the Roman empire, through such eastern scholars as Avicenna (d. 1037), also famous in the west. Another notable book was *Taqrīb al-tawrī*, a treatise on human anatomy, by the Shiraz-born surgeon Muhammad Taqrīb al-Tawrī, and written before 1594. Following other medical writers and herbalists, such as Dioscorides (or his copyists), Mansur was providing only a simplified schema rather than the hyper-realism in the illustrations given in Vesalius' book three centuries later. For rapid learning, the simplified presentation of Mansur's crouching figure (and in the Thai massage manuscript, shown right) would have helped assimilation. Its useful treatment of the muscular system shows how much medical illustration advanced later with Vesalius.

The Thai manual of pressure points shown here, dates from the 19th century, when the folding-book format was still traditional in Thailand. The simplification in diagrammatic treatment was suitable for training massagers.

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Tracing humankind's 5,000-year quest to communicate ideas and knowledge

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A **AMATE, AMATL**—Spanish term derived from the Nahuatl name for paper (Meyan *Amat*) or bark cloth made from the bark of the fig family (especially *Ficus petiolaris*), used by the Maya and Aztec prior to the 16th-century Spanish conquest. The Mayan *amat* paper, developed around 5th century, was a more durable and better writing surface than the contemporary Roman papyrus. Used by professional scribes for the production of chronicles and record-keeping (such as inventories and accounting) *amate* retained its importance in the Aztec era. Their codices were folded, accordion-patterned. Many were destroyed by the Spanish, and approximately 500 of these survive (35 are pre-Columbian). The authenticity of these is particular—the Madrid Codex, the Dresden Codex, and the Paris Codex—are beyond doubt.

AMHARIC—a script used for writing Ethiopian books in the Ge'ez language. Written left to right (unlike other Semitic scripts such as Hebrew and Arabic), it was written with a broad reed pen with the left hand.

B **BARK CLOTH (OR TAPAI)**—the inner bark of the paper mulberry (*Broussonetia papyrifera*) and of some other tropical plants, which is stripped and then beaten to form sheets which can be used for clothing or writing surfaces. First used in southern China and Indochina, its preparation as a writing surface and clothing spread to Indonesia, and its preparation now survives only in the South Pacific, and Malaya (noted). Though in itself chemically inert, bark cloth is highly susceptible to insect or fungal attack.

BOOK OF KELLS—(Irish *Liber*) Latin manuscript, created by Celtic monks around an 800. This Gospel book contains the Four Gospels of the New Testament written with gilded initials and rubrics, and the high-point of Irish art, in illumination. Other theories ascribe from a manuscript or ceremonial purpose. Paintings found at the Apollo 11 cave in Namibia (dating from approximately 25,000–21,000 years old) may be among the earliest cave art. The earliest European cave paintings date to the Aurignacian era, some 32,000 years ago. Those in the Lascaux caves, on the outskirts of Montignac in northwestern France, date back around 17,000 years, and depict wild animals, decorated cows and their human herders (who are believed to be the creators of the rock art). Many other early cave paintings are found in the Tassili n'Ajjer mountains in southern Algeria.

CAVE PAINTINGS—paintings on cave walls and ceilings, especially those dating to prehistoric times. The purpose of the paleolithic cave paintings is not known. Evidence suggests that they were not merely decoration, and some believe that they may have been a means of communication. Other theories ascribe from a manuscript or ceremonial purpose. Paintings found at the Apollo 11 cave in Namibia (dating from approximately 25,000–21,000 years old) may be among the earliest cave art. The earliest European cave paintings date to the Aurignacian era, some 32,000 years ago. Those in the Lascaux caves, on the outskirts of Montignac in northwestern France, date back around 17,000 years, and depict wild animals, decorated cows and their human herders (who are believed to be the creators of the rock art). Many other early cave paintings are found in the Tassili n'Ajjer mountains in southern Algeria.

CINNIBAR—a pigment derived from the poisonous and mercury sulphide. Its vibrant red color was greatly prized in antiquity and manuscript decoration.

CLAY TABLETS—used in the Ancient Near East as a writing medium, especially for writing in cuneiform, throughout the Bronze Age and well into the Iron Age. Cuneiform characters were impressed into a wet clay tablet with a stylus. Modern paperbacks are technically cuneiform, but the term is usually reserved for manuscript (hand-written) books, which were produced from late antiquity through the Middle Ages.

CUNEIFORM (see also **CLAY TABLETS**)—a style of writing used especially in Mesopotamia for three millennia until about 2nd century BC. Originally a system of pictographs, the pictorial representations became simplified and more abstract as the number of characters in use also grew gradually smaller—from about 1,000 unique characters in the Early Bronze Age to about 600 unique characters in Hittite cuneiform in the late Bronze Age.

Cuneiform documents were written on clay tablets in the mid-3rd millennium BC, writing direction was changed to left to right in horizontal rows, and a saw wedge-tipped stylus was used which was pushed into the clay, producing wedge-shaped ("cuneiform") signs. These two developments made writing quicker and easier. Cuneiform writing was gradually replaced by the Phoenician alphabet during the Neo-Assyrian Empire, and by the 2nd century AD, the script had become extinct. For this reason, it had to be deciphered from scratch in 19th-century Assyriology. Successful decipherment is dated to 1857.



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269 BOOKS IN THE MEDIEVAL WORLD
Illumination in Byzantium

269 Ethiopian Bible



Ethiopian Bible

In a corner of Africa, a tradition developed of creating illuminated manuscripts bursting with vigor and energy.

This is an outstanding example of Ethiopian Bible illumination, copied from a 15th-century version, probably commissioned by Emperor Ysyaq at the end of the 17th century.

Most countries produce versions of sacred books, such as the Bible or the Koran, which typify the artistic and spiritual nature of the nation. The Ethiopians separated from catholicism and orthodox in the middle of the 5th century AD, and this is an example of their version of the sacred book. With their different language (Ge'ez) and geographical isolation, illumination took a distinct route in Ethiopia. Related to Hebrew and Arabic with their scripts written right-to-left, Ge'ez uses Amharic script and is written left-to-right. It has a sophisticated system of punctuation, with **Ⲁ** marking off a word, **ⲀⲀ** ending a sentence, and **ⲀⲀⲀ** for a paragraph.

Written on parchment or vellum prepared locally, the scribes followed local recipes for ink and used reed pens. A scribe would probably need eight months to complete a book of this length; the illuminators would take much longer. They used local (highly toxic) pigments, cinabar, vermilion, chalk, and charcoal, all from Ethiopia. Indigo was imported from India for blue. The pigments were mixed with an animal protein to form a tempera.

These Bible pictures have a vigor and energy which is very appealing. The picture of the twelve apostles connects with the twelve tribes of Israel, providing continuity between Ethiopian faith and the early church. The text, on the right-hand page, is the Synodicon, documenting the proceedings of the early church.