

From Manuscript to Print: Tracing a Technological Revolution in the Collections of New College Library

*This article is derived from an outline for a display created for New College schoolboys and their teachers,
and notes for a related presentation*

Introduction

It has been stated many times, not least in *New College Notes*, that the college library is fortunate to own a magnificent collection of materials, from manuscripts to early printed books to modern materials, ranging in date from the eleventh century to the present day. Herein lie many tales, including item histories traceable through provenance information and, indeed, several mysteries, fascinating items held in the collection with no tangible evidence as to how, or when, they were acquired by New College.

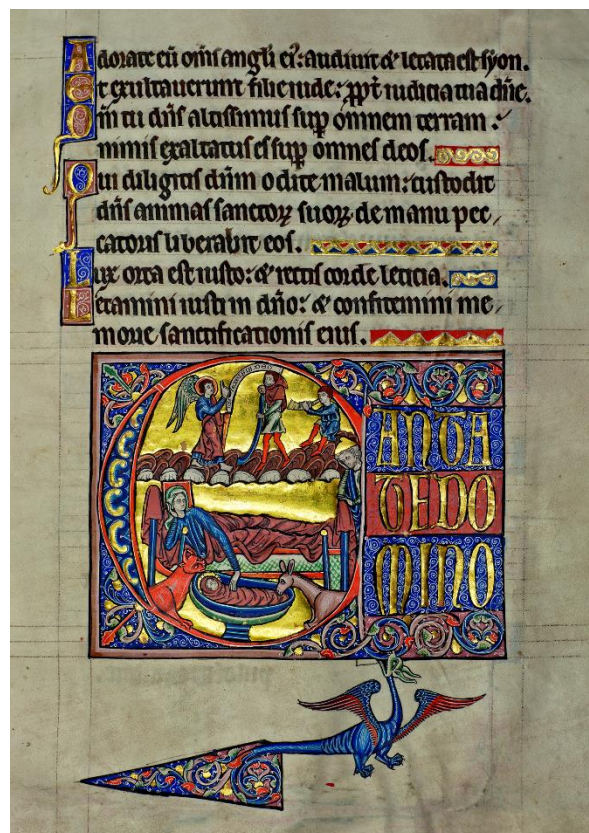
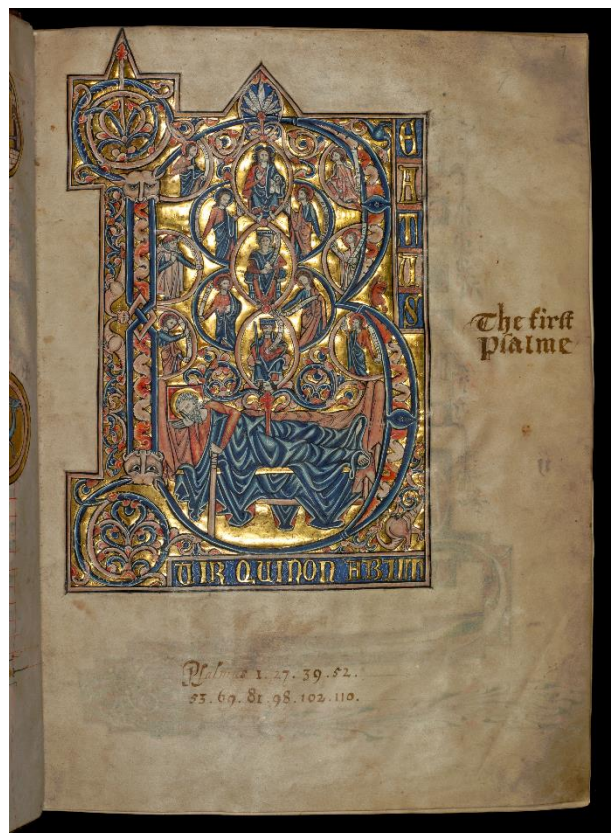
It is possible to use such a wealth of materials to illustrate other stories. The transition from an era of hand-produced manuscript items to the modern age of mass-produced printed books was a crucial development, heralding the modern era of human history, and the process may be traced in items held in the New College collection.

The manuscript

The term ‘manuscript’ derives from the Latin word for hand, ‘manus’, and so is used to describe materials written and illustrated entirely manually, without mechanical aid. Until the late Middle Ages (the fourteenth-fifteenth centuries) the pages, or leaves, of these items were usually made of vellum, derived from animal skin, often specifically calf. Paper, in widespread use in China by the third century, did not enter general use in Europe until around the thirteenth century. The first paper mill was recorded in Spain in the 1150s, while the first permanent mill north of the Alps was established in Nuremberg in 1390; the earliest known in England was not founded until as late as about 1490.

Decoration, as an aesthetic touch, was included in many manuscripts of the medieval period, in the form of (sometimes quite elaborate) initial letters at the beginning of, and within, text, borders or marginalia, and illustrations. Such flourishes and enhancements to the text reached their apogee in the form of the ‘illuminated’ manuscript, an item which features the use of gold and/or silver leaf as a component of the illustrations.

The library possesses a number of exceptionally fine examples of such manuscripts, displaying extraordinary skill, richness, and attention to fine detail in the artwork, and in the application of the leaf. New College MS 322, one of the true jewels of the collection, is a psalter created at the workshop of William de Brailes, which was located in Catte Street in Oxford in the mid-thirteenth century, where he was active between the years 1238 and 1252, illustrating bibles, psalters and books of hours.



New College Library, Oxford, MS 322, f. 7r and f. 97r



New College Library, Oxford, MS 322, f. 67r [detail]

New College MS 65 is an Anglo-Norman translation of the Book of Revelation, the St John Apocalypse, which was produced between approximately 1300 and 1310.



New College Library, Oxford, MS 65 f. 81v



New College Library, Oxford, MS 65 f. 41r [detail]

So the manuscript, an individually produced, handwritten, and illustrated item, requiring many man hours to complete, was effectively the only form of book available—in many cases, an expensive item, beyond the reach of the majority of the population, not many of whom, in any case, would have been able to read it. The fifteenth century, however, saw the introduction of a new invention that would have an indelible effect on the world.

Johannes Gutenberg and the Printing Press

Born in the German city of Mainz around 1400, Johannes Gensfleisch zur Laden zum Gutenberg was a blacksmith and goldsmith. In 1439–40, he invented a new process for mass printing using moveable type, that is, individual pieces of metal embossed with letters, which could be arranged in any desired pattern on a bed (the printing press) with ink applied and, crucially, once the printing was completed, could be reassembled in a new iteration and reused many times over. Gutenberg's new press was in operation by 1450 and, in 1455,¹ he produced the item for which he is most famous, the so-called Gutenberg Bible, of which it appears around 180 copies were created.

The printing press, and its moveable type, ushered in a new era of mass communication. Books could now be produced in much greater quantities, and in considerably less time, than had ever been possible before. The subsequent circulation of information and ideas, and the associated rise in literacy amongst the populations of the world, kick-started a revolution in the structure of human society: education and advancement would no longer be the preserve of the elite.

It has been estimated that by the year 1500, just fifty years after Gutenberg began printing, there were as many as one thousand presses operating across Western Europe.² The first book believed to have been printed in England was Geoffrey Chaucer's *The Canterbury Tales*, produced by William Caxton in 1476. Complete change did not, naturally, occur overnight however. For some time, manuscripts continued to be produced alongside the new printed books.

Incunabula

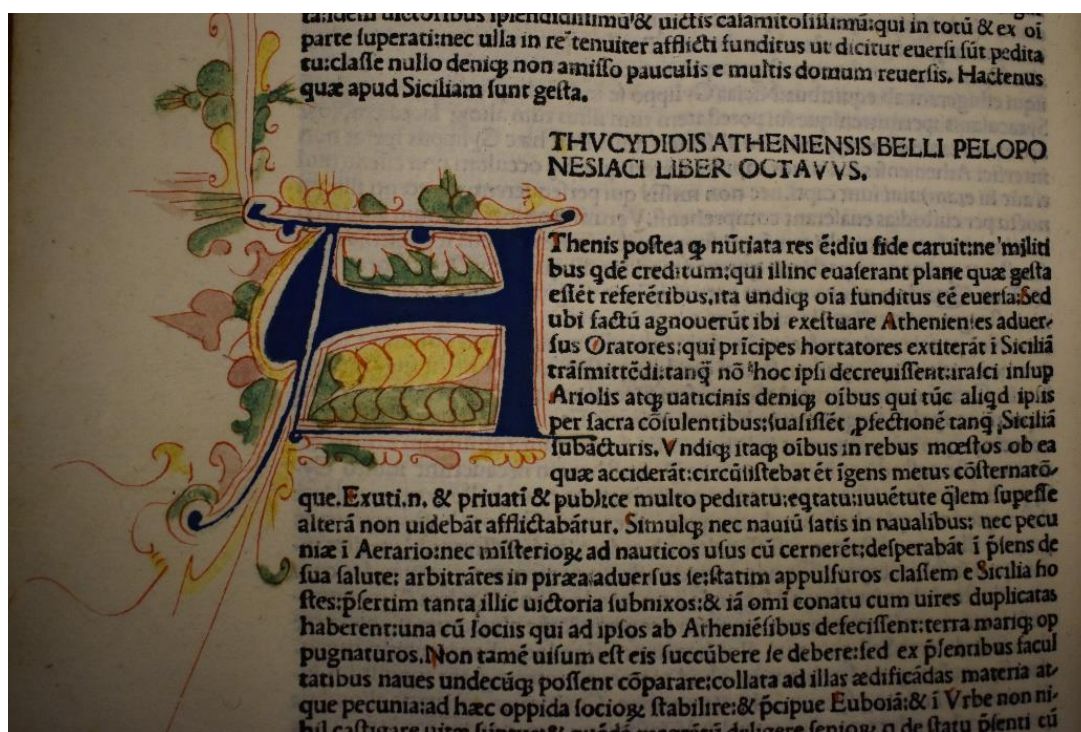
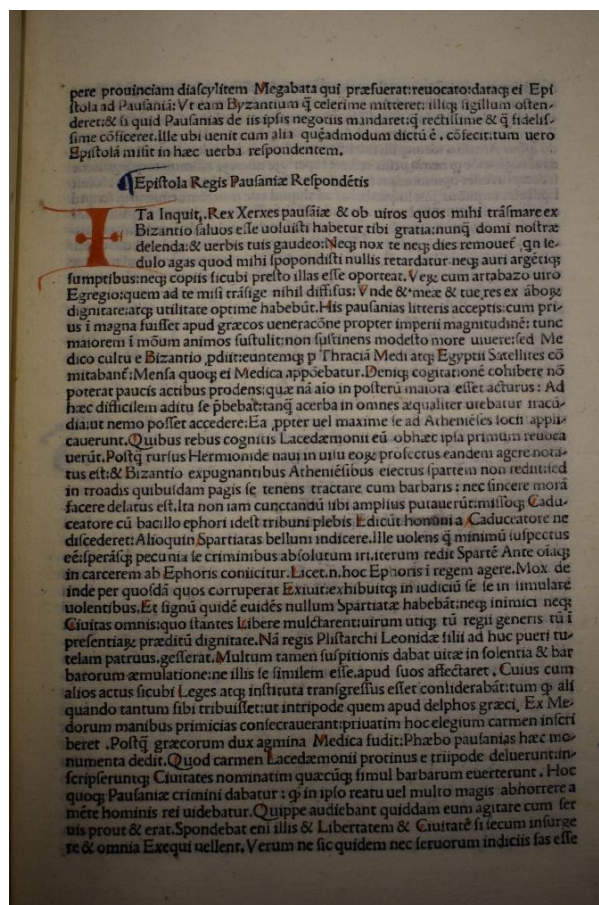
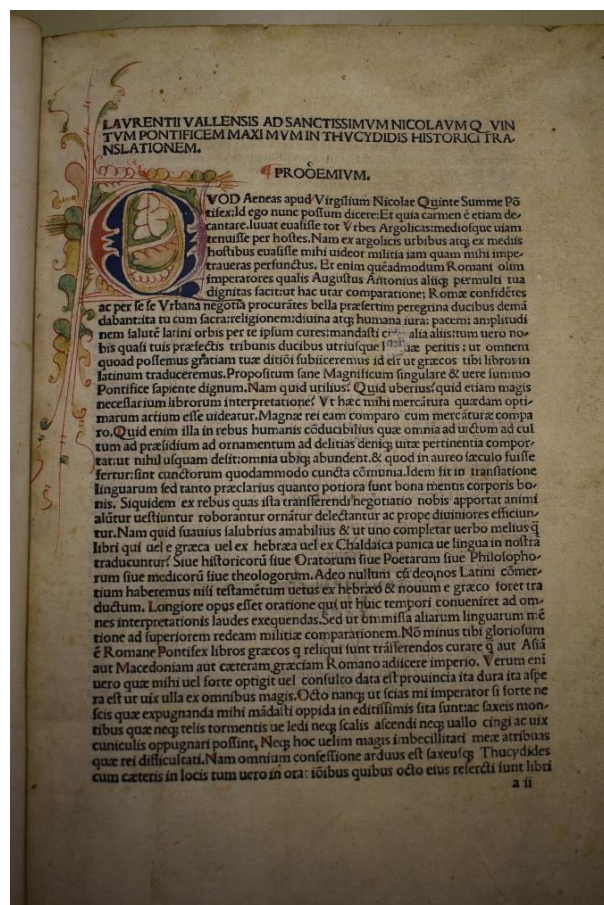
Examples of these early printed books, created between the years 1450 and 1501, are described as 'incunabula (or 'incunables')'. The name, and the rather precise time period associated with them, appears to derive from a pamphlet produced by Bernhard von Mallinckrodt in 1639 in Cologne, Germany, in which he referred to the 'prima typographicae incunabula', or, 'the first infancy of printing', the end of which he somewhat arbitrarily decided was the year 1500.

One example of such 'incunabula' in the collection of New College Library is an edition of Thucydides's *History of the Peloponnesian War*,³ printed in Treviso in Italy in approximately 1483, some thirty years after Gutenberg produced his Bible. It is immediately clear that the desire for printed books to have a similar appearance and style as that of the manuscript was of great importance for the creators and consumers. As a result, decorative coloured initials have been added manually by artists, exactly as they would have been on a manuscript. This particular book also has simpler initials appended in blue and red, along with decoration within the text, known as 'rubrication'.

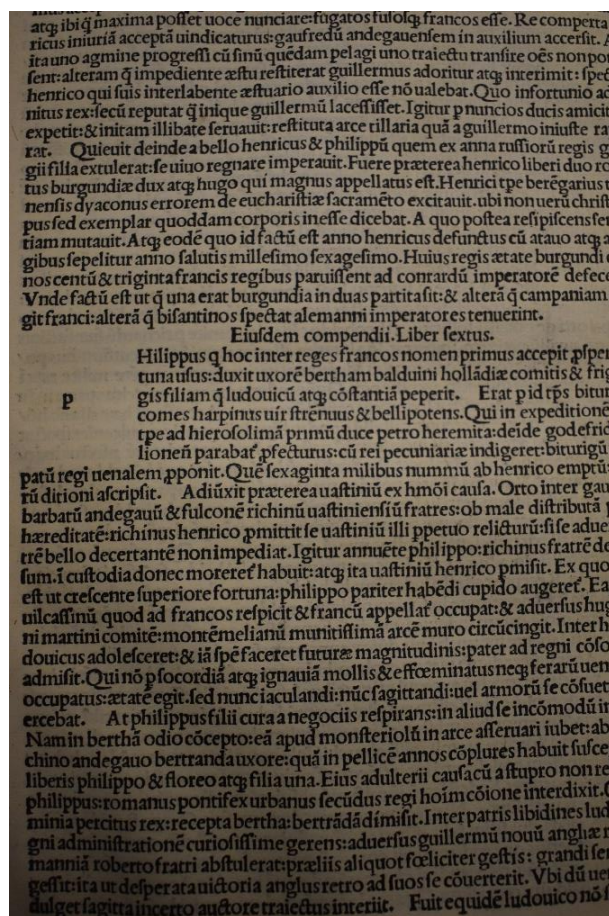
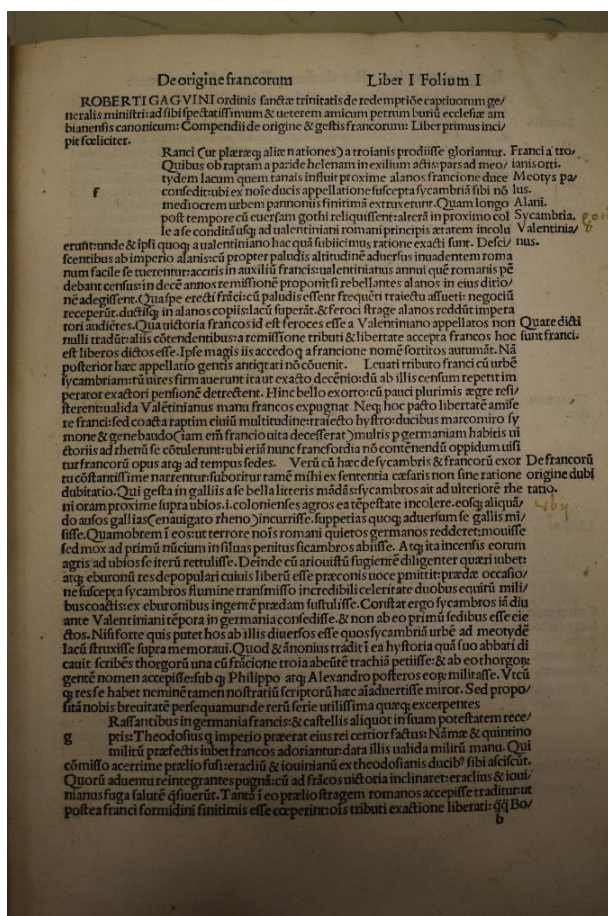
¹ This date seems to derive from a letter written, in March 1455, by the future Pope Pius II in which he claimed to have seen pages from the Bible on display in Frankfurt.

² Elizabeth L. Eisenstein, *The Printing Revolution in Early Modern Europe* (Cambridge, 1993).

³ New College Library, Oxford, BT1.38.9.



Around fifteen years later, in 1497, a history of the Franks by Robert Gaguin was produced in Lyon, France.⁴ Once again, it is a printed book but, in common with many other items in the possession of New College dating from the late fifteenth to early sixteenth centuries, it has the appearance of being unfinished. Spaces have been left blank in the page, a single small letter printed in their centre. This is a guide letter, added at the printing stage in order to tell the illustrator, to whom the pages would be passed, which letter needed to be added in colour by hand. This method was followed by the person who created the illustrations for the Thucydides noted above; in this copy of the Gaguin, no letters have been added. Already, by the 1490s, it seems to have been recognised that to wait for an artist to take time to append lettering and/or rubrication to a book that had been printed and was, effectively, ready to be sold, was only creating an inconvenient delay before it could be placed on the shelves for potential customers to purchase. Furthermore, taking into account the fact that the illustrator would need to be *paid* for his considerable contribution, it is perhaps unsurprising that the need to continue to slavishly copy the look of the manuscript came to be considered unnecessary.



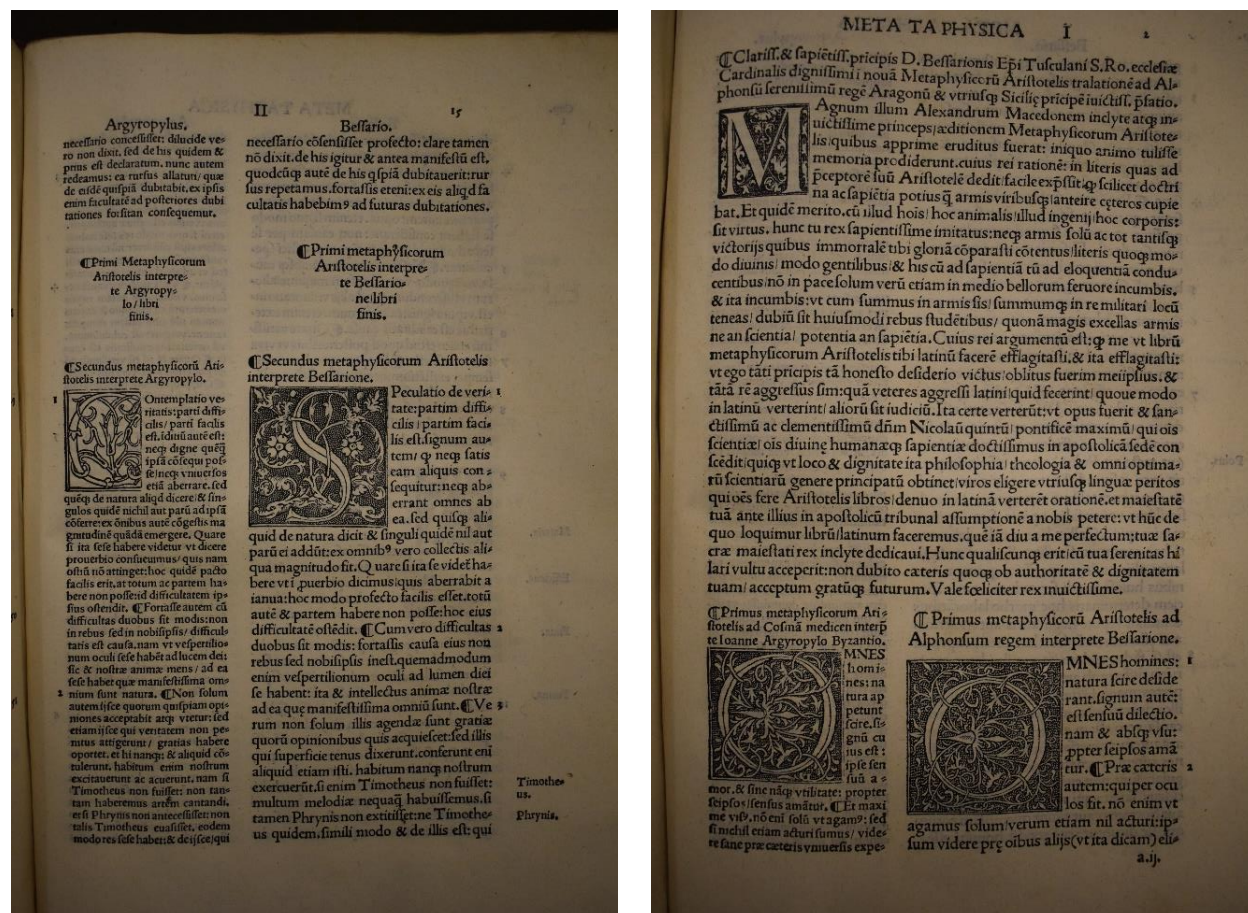
New College Library, Oxford, BT1.45.11

The Sixteenth Century

Illustration and decoration in printed items, however, did not vanish completely as printers came up with a different idea to perpetuate the tradition. This can be seen in another item from

⁴ New College Library, Oxford, BT1.45.11

New College's collection, an edition of Aristotle's works printed in Paris in 1515.⁵ The initial letters seen here, a new version of the illustrated initial utilised in manuscripts, are printed, along with the rest of the text. The letters were carved in relief on blocks of wood, which were added to the bed of the printing press and inked along with the type. Such blocks are known as 'woodcuts', and could consist of letters, decoration, or illustrations. They allowed the printers to continue to add initials or pictures to a book, with the added benefit of being reusable—a much more cost-effective method of illustration than employing the services of an artist.



New College Library, Oxford, BT3.261.11(2)

Through the course of the sixteenth century, even the desire to retain the printed initial waned. Woodcut illustrations were superseded by pictures engraved on plates of metal, such as copper, though these were still generally printed in one colour, black. There were occasional publications, however, where the use of more distinctive colours was considered to be worthy of greater effort. One such title was the *Atlas of the Counties of England and Wales*, by Christopher Saxton, printed in London in 1579.⁶ This utilised the old method of adding colour by hand to the engraved maps of the counties, as can be seen in that of Oxfordshire, and to a splendid portrait of Queen Elizabeth I.

⁵ New College Library, Oxford, BT3.261.11(2).

⁶ New College Library, Oxford, BT1.47.9. See also another article in this issue of *New College Notes*: Alexandra Plane, 'Christopher Saxton's 1579 *Atlas of England and Wales*: An Unexpected Savilian Book Among New College Library's Treasures', *New College Notes* 12 (2019), no. 6.



New College Library, Oxford, BT1.47.9—depicting Oxfordshire



New College Library, Oxford, BT1.47.9—frontispiece, with detail

By the mid-sixteenth century, the much higher production rate and cheaper costs achievable through the use of the printing press meant that the manuscript, that labour of love for a scribe and his illustrating colleagues, which on occasion could scale the heights of artistic magnificence and beauty, had been almost completely replaced by the printed book. That it had happened so comprehensively, and in such a short space of time, was a remarkable achievement.

Conclusion

The invention of the printing press by Johannes Gutenberg in the mid-fifteenth century is regarded today as one of the most important and influential developments of the last thousand years of human history. It ushered in the modern era of mass communication and education, allowing for the spread of learning to the entire population, and was a vital aid in the dissemination of the new ideas of the fifteenth and sixteenth centuries and beyond, as well as in the development of modern science.

Through the collections held by New College Library, it is possible to trace the process of how the manuscript—labour intensive and time-consuming to create and the preserve, principally, of the learned and wealthy—was superseded by the printed book—easier to produce, in much greater quantities, and available to all. While the creators of early printed material attempted to maintain continuity with the style and appearance of that which had gone before, changing techniques of production soon allowed the new format to flourish in its own right. Only now, some 600 years after Gutenberg first set up his printing press, are technologies and tastes changing once more, as the world embraces a new revolution, that of the ‘digital’ or ‘information’ age. In this era of electronic books and downloads, can the printed book survive? For its aesthetic value alone, it seems likely that some printed material (finely produced volumes of art and architecture or historical materials, or limited edition titles, for example) will continue to be appreciated. Once again, however, only time will tell.

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