December 2017

Wryly Noted-Books About Books

John D. Riley

Gabriel Books, jdriley@comcast.net

Follow this and additional works at: https://docs.lib.purdue.edu/atg

Part of the Library and Information Science Commons

Recommended Citation
DOI: https://doi.org/10.7771/2380-176X.7886

This document has been made available through Purdue e-Pubs, a service of the Purdue University Libraries. Please contact epubs@purdue.edu for additional information.
T his book is not only a history of paper, but equally, of written language, drawing, and printing. It is about the cultural and historical impact of paper and how it has been central to our history for thousands of years. Paper has changed how we communicate and even how we think and create. It is so common now that we rarely consider its history and development. This book makes that history come alive.

“Some historians think that the idea of papermaking came from felting, a practice that pre-dated weaving...” writes author Mark Kurlansky, who then goes on to define paper as “cellulose fibers that are randomly mixed in water and are deposited in sheet form.” This definition separates true paper from other writing surfaces such as bark, animal skins, or leaves. So papyrus, despite having given its name to paper, is only briefly mentioned in this history. The Chinese are credited with the invention of paper and a man by the name of Cai Lun is honored in China as its inventor, though the idea that one person discovered it is unlikely, as there was a long history of writing on materials such as silk and other woven products. Cai Lun in 105 CE “...reported to the emperor that he made paper from the bark of trees, hemp, rags of cloth, and fishing nets.” This launched paper into common usage.

It somehow seems predestined that paper would be invented in China, given the social, religious and trade practices at that time. Literacy was a basic skill for the Chinese, especially in government, where “rulers required that their underlings record everything.” Besides writing, paper was used for hats and clothes, kites and lanterns, fans and religious flags and banners. When printing was developed, first as a wood block technique, the Buddhist religion was ideally suited to adapt the technique for duplication of prayers and sutras to gain “merit.” In the tenth century, a Buddhist monk made 140,000 copies of a picture of a pagoda in China. There are records of Buddhist printings of 20,000, 50,000, or 70,000 copies. “The more copies, the greater the blessing.”

The author, Mark Kurlansky, loves detail and he likes to veer off onto side trips such as the history of newspaper cartoon strips, linotype machines, the history of watermarks, the1960s fad for paper clothing, or the 1890s fad for men’s cardboard shirt collars. He likes to show the full range of paper from postage stamps to diapers, and from bottle labels to tea bags. If you have read Cod or Salt, two of Kurlansky’s previous books, you already know that quirky historical digressions have always been his trademark. But he has outdone himself in this work and though the book lacks flow it does follow a chronological order with ample room to wander into Aztec paper making or artisan one vat fine paper making in Japan.

Another trademark of Kurlansky’s is a pointed sense of humor. When some groups advocated switching to more electronic formats to save trees, he mentions that the drive to boycott toilet paper failed because no electronic substitute has been found! But, on a more serious note, he does comment on the drive to make growing trees for paper production more responsive to ecological concerns and that the drive has yielded success with the decline in clear cutting and more sustainable practices, including recycling. Paper companies have realized that such practices are a valuable sales tool.

While the author is tracing the history of paper and its migration from China to the Muslim world and finally to Europe in the late Middle Ages he touches on such cogent details as:

The direction of writing has varied widely throughout history “...from right to left, left to right, top to bottom, bottom to top, and from the middle outward. Mayans and Aztecs wrote all over the page, with lines directing the reader where to go next. The Chinese for a time wrote in alternate lines and went back to read the skipped ones.”

In the Arab world the use of paper spread quickly because “...it was less costly, more lightweight, and more durable than papyrus and, in the interest of security, it couldn’t be altered as easily as parchment.”

“The Arabs had many uses for different types of paper. A special light, thin paper was made for messages carried by carrier pigeon and some paper was even made from cloth wrappings of mummies.” This fact points up the central place of rags in the manufacture of paper. A whole industry grew up around procuring rags for making paper. Chiffoniere is the word for rag pickers in French and is also the word for a chest of drawers that holds small pieces of clothing.

Much of the development of modern paper manufacturing occurred in Fabriano, Italy in the Middle Ages. There had been felt mills there for centuries and the transition to paper making was simply a matter of refitting the water-powered machinery to pound rags and lay paper rather than pound wool and make felt cloth. Fabriano paper was extremely durable “because paper makers worked closely with the sheep industry and sized their product with glue made from the gelatin produced by boiling sheepskins in scraps.” In Fabriano they also made the transition from parchment to paper, finding paper to be so much cheaper to produce. “Paper historians estimate that between 210 and 225 sheep had to be slaughtered to make one Bible. Cheap paper was invented in Fabriano, thanks to the development of an ingenious device: a water-powered drop hammer.” Another Fabriano invention was the wire mold for laying paper. “Fine wire mesh laid paper came to define European paper.” Another pivotal innovation in Fabriano was the watermark. Now the paper maker could ‘sign’ his work.”

The smell from paper mills has always been pungent, due to the use of old, dirty rags and ammonia for softening the fibers. In early years, human urine was the source for that ammonia. Urine collectors traveled through town collecting this valuable substance.

Gutenberg acquired his printing press from a paper mill, where it had probably been used both for pressing felt and paper sheets. “Some historians say that the press was a copy of an olive oil press or wine press, because Gutenberg came from Mainz, the heart of Rheingau wine country.”

“Venice had always been one of Europe’s most important paper trading center and quickly became the printing capital of Italy. By the beginning of the sixteenth century, when Naples had 67 printers, Rome 41, and Florence 37, Venice had 268.”

“Machine-made books and handmade paper were a tough combination. Purchasing enough paper to print Cervantes’ Don Quixote took four years to acquire the 550,000 sheets necessary, which when folded down to eight sheets yielded four million pages.” To illustrate how things had changed with the industrial production of paper, Diderot’s Encyclopedie required 36 million sheets of fine thick paper.

Because the Puritans were so keen on converting Native Americans, the first Bible printed in America was printed in 1663 in the Algonquin language. The second Bible was printed nearly a century later in English.

Rene Antoine Ferchault de Reamur, besides inventing the Celsius temperature scale, was fascinated with insects. He studied wasps and found that they built nests from wood fibers, nests which resembled paper. He produced a study of the wasp nests which helped lead to the manufacture of paper from wood pulp. In the search for materials to replace the finite supply of rags, inventors tried everything from potatoes to okra!

“When paper makers started using wood pulp to make paper they used acidic water to break down fibers. The only problem is that the acid continued breaking down the paper even after manufacture. It wasn’t until after 1970 that acid free paper was embraced.”

As you can see, Mark Kurlansky covers all aspects of paper history and manufacture. In fact his book resembles his subject: random strands of detail woven together to make a whole. If you want to read a detailed, while not truly scholarly history of paper, this would make a great introduction to a seemingly endless study.