I

DAVID GREETHAM

A history of textual scholarship

The role of textual scholarship

Before outlining the history of textual scholarship, it is necessary to define its role in scholarship and criticism as a whole. At one point, it used to be thought that the work of textual scholars was primarily editorial (or at least proto-editorial). That is, the examination of extant documents and their lost but inferrable sources was supposed to determine accurate and reliable texts for the use of critics, historians, and all others interested in having at their disposal such a text or texts that could then be used in other, loftier pursuits. This distinction was the basis of the traditional division between the *lower criticism*, whose responsibilities were confined to the nuts and bolts of determining reliable readings (according to what sort of text was thought necessary or desirable) and the *higher criticism*, which then took these texts and subjected them to *hermeneutics* or "interpretation," including historical and aesthetic commentary, critical annotation, and so on. This basic distinction still holds in some disciplines, especially classical and biblical scholarship, which were the first two areas in which textual analysis was practiced. But in the last 100 years and more, the division between higher and lower criticism, especially in vernacular literatures, has been challenged, and textual scholarship has been increasingly regarded as inevitably having a critical component, most evidently in that sub-division known as textual criticism, but also in such apparently technical (and thus supposedly "noncritical") activities as selecting a document as the basis for a facsimile edition. The intersection and interrelationship of "science" and "criticism" in textual scholarship forms one of the major themes of the history of the discipline in the body of this essay. Nonetheless, it is still an institutional, academic, and popular reality that for many critics and readers, textual scholarship is seen at best as a "service" activity, providing the rest of the scholarly community with an authoritative text or texts, in single or multiple forms, for use in criticism and in the classroom. This is by no means an insignificant

responsibility, but perhaps especially in the electronic age, when textual "archives" are sometimes dismissively seen as simply the uncritical uploading of print or "born digital" texts on to a website, the essential critical components of selection, evaluation, emendation, and annotation of texts still need to be emphasized. All too often, even in graduate seminars, an instructor may declare that "any text will do," even in a seminar featuring popular works with a long (and variant) history of editing. And typical reviews of major editions in such publications as *The New York Review of Books* or *The New York Times Book Review* (and even *The Times Literary Supplement*) will have little or nothing to say about the actual editing, preferring to concentrate on the juicier details of the author's biography rather than how (and with what reliability) the text has been established. This situation could be regarded as an act of faith that the textual scholarship is unimpeachable, but a more perceptive understanding that editing is above all critical would make for a more judicious evaluation of both text and author. To this end, the following history seeks to record the interplay of science and art in the various areas of textual scholarship as it has evolved over the last two millennia and more.

Text as history

The history of textual scholarship is the history of history. At the very moment in each culture that documents begin to preserve the records of that culture, the issues familiar to textual scholars will appear: inscription, graphic representation, transmission, error/variant, authenticity, reception. All of these important matters are raised once the first text-producers, in whatever medium, begin to put chisel to stone, wedge to clay, stylus to papyrus, pen to paper, fingers to keyboard. To cover textual scholarship as an historical phenomenon, this account should thus properly include the identification and "editing" of potsherds (*ostraka*), cuneiform tablets (clay incised with "wedges"), graffiti (or "scratches," typically on walls), inscriptions, monumental or quotidian (*epigraphy*), coinage (*numismatics*), runes (an angular Nordic alphabet, part based on Latin, part with special symbols), pictographs (pictorial symbols representing words or phrases), and many other media containing historical evidence, possibly even the bark of certain trees (notably beech, from which the word *book* may descend, although the etymology is now questioned). All of this in addition to the more ubiquitous *diplomatics*, *paleography*, *codicology* (the bibliography of manuscripts), print (by single-piece *blocks* or, following Gutenberg, *movable type*), in the three main categories of *relief* (letterpress, in which the areas to be inked stand out above the surface, as in woodcuts), *intaglio*

(its opposite, as in *etchings*, in which the incised sections are inked), and *planographic* (which has a flat surface, with the parts to be inked treated in a chemical, photographic, or xerographic process as in *lithography*). When digitization and electronic text-production are added to this list, involving different systems of "mark-up" language and "text-encoding" as well as a huge range of graphics coding (e.g., TIFFs, GIFs, JPEGs) and audio-visual (e.g., AVI, MPEG, MP3), it becomes all-too-evident that the history of textual scholarship may include any system of marking on any surface: of such materials is "history" made.

And, given the recognition of the importance of oral transmission (with a separate chapter in this collection, Chapter 9), it could well be argued that many of these issues can occur even in a non-literate society. What parent has not told (or read) a familiar story to a young child to be peremptorily informed "that's not how it goes; it should be . . ." – in an early emphasis on the "correct" or "authoritative" text, the *textus receptus* ("received text"). In their famous study of the "lore and language of schoolchildren," Iona and Peter Opie record that one of the most persistent cultural phenomena encountered was the confidence that a child, or group of children, would assert about the "correct" text of a counting-out rhyme or other oral transmission that depended on a mini-society's recognition of the authentic (even when it could be demonstrated that there were multiple historical variants in the development of the rhyme).[1] The young oral transmitters had already encountered the major issues in textual scholarship – and had taken a stand on historical authority. Given that oral transmission is also a part of the history of textual scholarship, that history is not just the history of (literate) history, but the history of (preliterate) oral history as well. And anyone who has played the game of "Telephone" (with a message whispered to the first in a group and then whispered to the next until the "last" version of the message can be compared with the beginning) will know that variance is an inevitable part of any transmission – for good or ill.

Greek origins

The oft-cited decision of Peisistratus (560–527 BCE) to have an "official" text of Homer compiled for the Panathenea festival might be regarded as the earliest record in the West to address the variance produced by the oral recitation of the epics by the professional declaimers of verse, or *rhapsodes*. While no trace of this "official" text remains, the act of depositing a single *written* text in one location to be used as reference can obviously be seen as the beginning of a sense of mistrust as the appropriate practice of textual *criticism*, a suspicion of any claims to authenticity no matter what those arbiters in the playground might believe.

But paradoxically, while founded on a *mistrust* of the variance in the texts of the rhapsodes, the deposit by Peisistratus simply transferred to a written medium the same insecurities that had existed in the previous oral transmission. Similarly, when the Athenian orator Lycurgus (c. 390–324 BCE) did the same thing for the major Greek tragedians (Aeschylus, Sophocles, and Euripides) by placing a single copy of the works of each author in the Athenian public archives (with, again, no subsequent trace), the archived versions were not necessarily any more "authentic" than others in circulation (and performance).

These attempts to address (and arrest) variance could therefore at best arbitrarily favor one material, documentary state of text and by default to declare it to be authoritative. But what did (and does) "authoritative" mean? The inevitable connection with "author" has frequently suggested that the text to be striven for is the one that can be shown to be as close as possible to the form and expression in the author's "fair copy" – that material version last worked on by the author and intended for release into social transmission. But all of these terms and concepts ("form," "expression," "material," "intention," "version," and so on) are themselves not as transparent as we might hope, and all beg the question to one degree or another. The history of textual scholarship can therefore be seen as a series of arguments – often resulting in intellectual and scholarly and personal conflicts, even feuds – over the meaning and significance of its most important terms, from the classical period to the electronic environment of the twenty-first century.

After these early Greek gestures toward authority, the most important conceptual and methodological shift occurred in the foundation of the Alexandrian library in c. 284 BCE by Ptolemy Soter, who appointed Zenodotus of Ephesus as Chief Librarian. From the beginning, the Alexandrian library worked in exactly the opposite procedure and textual philosophy from that exemplified by Peisistratus and Lycurgus. Instead of promoting a single copy to the status of arbiter, Zenodotus and his successors began the process of the *rejection* of readings in particular documents. Initially, this rejection was inevitably founded on a speculative, conjectural interrogation of specific lines, phrases, and words that the librarian suspected of being inauthentic. Obviously, the recognition of the "inauthentic" would depend upon the reader/librarian's having a preconception of what was likely to be authorial and what not; and this preconception would inevitably derive from an examination of previous documents of the same work, an examination that underwrote the identification of the spurious in other documents. Clearly, this was circular reasoning, and it is a charge that, in one way or another, textual scholarship has never entirely escaped. Despite the technological positivism of the analytical bibliography of the

nineteenth–twentieth centuries; despite the construction of "family trees" of putative documentary relationships; despite the methodological and evidentiary rigors of the "New Bibliography" and editorial eclecticism; despite computer analyses of authorial "stylometrics"; despite the attempts to refine textual conditions to algebraic formulae, finally the textual *criticism* aspect of textual *scholarship* will to some extent depend on individual judgment, on the critic–editor's conviction that *this* reading in *this* moment is suspect and should be replaced. It may be regarded as suspect because it does not represent what the critic–editor believes is *original* intention, or *final* intention (or any stage between these two hypothetical instances), or because it does not reflect that form in which the reading became part of the *textus receptus*, the "received text" accepted by a culture as available for commentary and further transmission, whether or not it could be demonstrated that the reading had bibliographical or authorial imprimatur. It must be a rare performance of Shakespeare's *Henry V* that does not have Mistress Quickly recount how Falstaff "babbl'd o' green fields" on his death bed, even though the line is a speculative invention by the eighteenth-century editor Lewis Theobald and has no documentary authority: it just makes sense.

Analogy and anomaly

Given the circularity of argument involved in all of these editorial/textual maneuvers, how then did the Alexandrians deal with this circularity at the beginning of the history of textual scholarship in the West? The easy answer is – by more circularity – but we do have to give credit to what was a major step forward, dependent as much on the international economics of the third century BCE as on a shift in philosophy. By this time, Alexandria had supplanted any of the original Greek cities as the dominant near eastern *entrepôt*, and the formidable trading position of the city meant it became a "hub" (much like the airport "hubs" of today) through which the great bulk of shipping would pass. And the textual result of this power was the insistence that all ships had to "declare" any manuscripts they might have on board, these manuscripts then to be copied and returned. (In fact, as we might have expected, the Alexandrians seem most often to have kept the *original* and given back the *copy*.) In this way, the library began to acquire multiple copies of what claimed to be the *same* works, under a rationale that is the precise opposite of the expectations in a modern library's having multiple copies. That is, the familiar "c1," "c2" etc. on the spines of books in our libraries reflect not just the evident popularity and circulation of a work but also the assumption that each of these "c"s is identical to all the others (although many bibliographers would offer the demurral that no two copies,

even of the same print of the same edition, are truly identical, part of the rationale for analytical bibliography). For the Alexandrians, the gathering of different copies was because they *were* different, and could therefore be used to prepare lists of variant readings, in a process called *collation* (from "placing/laying side by side") for comparison. Such *collation*, now often done by computer, though requiring some human input and control, is still done today. So similitude (or at least the assumption of similitude) lies behind modern duplication in libraries; difference – and variance – behind the Alexandrians.

Despite this access to multiplicity and variant evidence, the Alexandrians did not then attempt to designate a specific copy as the most authentic, but on the contrary, tried to use the admittedly corrupt *remaniements* (the "remains" of a text) in the extant documents to reach beyond the concrete and the actual into an "ideal" form not available in any individual state. Usually called *analogy*, this process clearly had affinities with the (neo)platonism that was to dominate Alexandrian thought in the third to fifth centuries CE, and can still be seen in the textual theories of some modern critics. Thus, when G. Thomas Tanselle plangently laments that all documents are "alien, damaged here and there through the intractability of the physical" and reaches after the stasis of a lost "inhuman tranquility," he is articulating a latter-day platonic nostalgia that the Alexandrians would certainly have recognized.[2]

In practical terms, Alexandrian reconstruction according to *analogy* was characterized by such devices as Zenodotus' marking of spurious lines with an obelisk (or his transposition and telescoping of problematic Homeric lines), and the attempts by Aristarchus of Samothrace (*c.* 220–145 BCE) to remove the previous layers of conjecture by trying to isolate "good" (or perhaps "better") manuscripts for such authors as Homer, Hesiod, Pindar, Anacreon, Archilochus, and Alcaeus. But throughout, the same problems of circularity occur, as when Aristarchus tried to identify such features as consistency and decorum (on the assumption that good authors would be both consistent and decorous), and having labeled specific readings (or witnesses) as meeting these criteria, used this documentary "evidence" to adjudicate readings found elsewhere. The texts (re)constructed thus fulfilled the aesthetic predispositions of the editor.

If Alexandrian idealism and a suspicion of the concrete is still with us in the attitudes of Tanselle and others, so too is the Stoicism of the great city's rival, Pergamum in Asia Minor. The story goes that, in a trade war with Pergamum, Alexandria forbade the export of papyrus (which, it was claimed, could be made only from Nile water), thus drying up the raw materials for Pergamanian textual production. This event would not have

been remembered as bibliographically significant, were it not for the fairly well attested sequel in which Pergamum turned to animal skins (sheep, cows, and goats) as an alternative writing material, thus producing the *parchment* (i.e., "material from Pergamum") that was to dominate text-production for the next fifteen hundred years and more.

So the trade war changed the material, but what of the philosophy? Working against Alexandrian *analogy* and instead promoting the concept of *anomaly* (dependent on a Stoic acceptance of the unavoidable corruption of all worldly phenomena), the linguistically based textual scholars of Pergamum favored a careful analysis of the provenance, philological features, even the paleography and grammar, of each surviving witness. This analysis was then used to select a "best text" (warts and all) that could at least represent an actual historical moment rather than veering off into an idealism for which no concrete demonstration could be made. While none of these "best text" editions produced by Pergamanian scholarship survive intact (as do none of the Alexandrians'), but only in citations in later works, these later references and quotations in medieval scholia (commentaries) do make the procedural distinctions fairly clear (and record that the Pergamanians also extended the canon of editable literature into prose as well as poetry).

The shift of medium from papyrus to parchment is usually associated with another shift – from scroll to codex, although the latter format was more specifically identified with early Christian writings (of the patristic commentators, or "Fathers" of the Church). While relatively cheap and easy to produce, the scroll was an inherently difficult medium to consult, since a specific passage had to be found by rolling up one end while unrolling the other. The parchment *codex*, however, the folded, stitched book still familiar in most cultures, while comparatively expensive (it did, after all, require the death of an animal, reared until its skin was available) could be easily consulted, easily scraped and written over – to produce a *palimpsest* – and was peculiarly hospitable to the text-citation methods of early Christian polemic.

This introductory concentration on the Alexandrian versus Pergamanian split may be a "long preamble to a tale" but it lays out the basic features of much of the history of textual scholarship to follow. For example, Vinaver's "mistrust of texts" was to be exemplified most productively under the mid-twentieth-century Anglo-American production of "eclectic" editions not representing any specific historical document and the Pergamanian selection of, and reliance on, a "best text" reappeared under early twentieth-century theories of the French critic Joseph Bédier. It is even possible to see the now-dominant textual discourse of "social textual criticism," associated primarily with the work of Jerome J. McGann and

D. F. McKenzie, as a further rejection of Alexandrian idealism in favor of social/historical "reality." Indeed, the intervening history of textual scholarship between the classical and postmodern periods can in several ways be viewed through the lens of the Alexandria/Pergamum, platonic/aristotelian dialectic.

Enumerative bibliography

The other component of classical textual scholarship that is still important to any modern scholar is the attempt to codify, enumerate, and describe the primary witnesses, that part of the textual enterprise usually called enumerative or systematic or descriptive bibliography. Given the enormous riches of the Alexandrian library (later destroyed in circumstances that are still in dispute[3]), with somewhere in the region of 750,000 rolls accessible in pigeon-holes rather than on library shelves, this counting and describing was a formidable task. Again, we have only the references surviving in later records, as for example, the quotations recorded in Athenaeus' "conversations" in *The Learned Banqueters*.[4] But the comprehensive *Pinakes* or "tablets" of Callimachus (*c.* 305–240 BCE) aimed at including the totality of Greek documents, from the heroic and dramatic and lyrical verse to the recipes of a famed Alexandrian courtesan, compiled in a "manual" written for a daughter following in the same trade. The sole criterion was that to be recognized as an enumerable document, its language had to be Greek. The *Pinakes* was thus the forerunner of the various "national" bibliographies (for Britain, Germany, France, and the US) compiled from the sixteenth century onward and culminating in the various *Short Title Catalogues*, the *National Union Catalogue*, *WorldCat*, and the library catalogues of such national archives as the British Library, the Bibliothèque Nationale, and the Library of Congress. The linguistic restriction imposed by Callimachus would have meant, for example, that although the existence of the Hebrew Bible must have been well known to Alexandrian scholars, its text did not become an authentic "document" until after the creation of the Greek Septuagint (*c.* 300–100 BCE). It is a useful corrective to the preservation and codification efforts of Callimachus and others to note that, of the roughly 330 works of the four major Greek dramatists (Aeschylus, Sophocles, Euripides, and Aristophanes), only 43 survive in anything like a "complete" form. While some of the riches of classical, medieval, and modern literature have escaped fire and flood, to be occasionally "augmented" by the later discoveries of, for example, the Nag Hammadi gnostic gospels and the Dead Sea Scrolls, much more has been lost, in a process of accidental or deliberate destruction that

and Louvain (whose library was deliberately destroyed by the Germans in *both* World Wars) demonstrate all too well.

Late classical and biblical

But despite such losses, the concepts, methods, disputes, and media established by classical Greek textual scholarship have been carried over into medieval and modern textual activities, partly through the Roman heirs and partly through the continued Greek traditions of the Eastern Roman Empire, ending with the conquest of Constantinople in 1453. Indeed, together with the work of biblical scholars, the inheritance of classical texts and their editors informed the terms of the following vernacular scholarship. As in several other aspects of culture, Roman scholarship imitated Greek, but with a different emphasis. Initially lacking a national poet like Homer, Latin scholarship was first characterized by linguistic rather than textual analysis, with such works as Varro's *De lingua latina*, Nigidius Figulus's *Commentarii grammatici*, Verrius Flaccus's *De orthographia* and *De verborum significatu*, and Quintilian's *Ars grammatica* being typical. However, with the founding of the Palatine Library in 28 BCE and the appointment of Julius Hyginus as librarian, together with the acknowledgment of Virgil as the national poet, Latin scholarship also began to produce textual commentaries, notably Servius Honoratus on Virgil. The learning of the classical world was then passed on to medieval readers in such compendia as the seventh-century *Etymologiae* of St. Isidore of Seville, the fifth-century *Nuptiae Philologiae et Mercurii* of Martianus Capella (which became the model of the study of "liberal arts" for the next millennium), and the sixth-century *Institutiones grammaticae* of Priscian, the basic text for later work on Latin grammar.

In the meantime, the attempts at establishing the texts of the Hebrew and Greek Bibles provided another model for textual scholarship. This is a very complex history, and only the basic outline can be given here. The initial problem for the text of the Hebrew Bible is in the (editorial) vocalization, accentuation, and word-division of the consonantal Hebrew. To this day, the "standard" version of this editorial process is the so-called Masoretic text (compiled by a group of Jewish textual scholars known as Masoretes), established between the sixth and eighth centuries CE, and differing substantially from the previous Greek Septuagint translation. This divergence has been further complicated by the testimony of the Dead Sea Scrolls, which have preserved much earlier texts than those in the Masoretic tradition. This multiple evidence can have major cultural significance: for example, the four books of Maccabees (the source for the Jewish celebration of

Hanukah) were not written in Hebrew and thus do not appear in the orthodox Masoretic text, but are included in the Roman Catholic and Eastern Orthodox canon.

But the Hebrew Bible (Old Testament) is a paragon of consistency and uniformity compared to the transmission of the Greek New Testament. The work of such modern scholars as Bruce Metzger and Bart Ehrmann has demonstrated that the variance in the rival documentary traditions of even the canonical books can, for example, cast doubt on the authenticity of the ending of the gospel of Mark (and thus on the "pseudo"-Mark's account of the resurrection, the descent of the Holy Ghost and the speaking in tongues, foundational elements in many Christian churches). Even within a single book, there may be major divergences. In Acts, there are two completely different accounts of Paul's conversion on the road to Damascus, one in the first person (9.4) and one in the third (26.14ff), and only the second of these contains the mandate to go out and convert the Gentiles. Similarly, Paul's supposed strident rejection of the role of women has been shown to be a later interpolation (and does not reflect the important contributions of women in the early Church). Given the sectarian conflicts of early Christianity, this degree of "determined variation" is hardly surprising, but the force of the *textus receptus* (the "received text") has meant that many of these inconsistencies and inauthentic readings are still preserved in modern Bibles.

With this Christian sectarianism and proliferation of witnesses, the goal of producing a single authoritative text became particularly challenging and was not comprehensively attempted until Jerome's early fifth-century Latin *Vulgate*. Jerome (CE 331–420) already had the model of the *Hexapla* of Origen (d. 255 CE) before him, with its "parallel text" presentation of six different versions of the Old Testament, a method still used in modern editions of, for example, the 1805 and 1850 versions of Wordsworth's *Prelude* or the *F* and *G* versions of Chaucer's Prologue to the *Legend of Good Women*. Faced with a multiplicity that cannot yield a *single* authoritative text, Origen and some modern editors decided simply to lay out all the evidence in different columns. But the unwieldy testimony of the Christian Bible did not allow of such textual largesse. Instead, Jerome worked from multiple sources and in several stages, with the New Testament taken from Old Latin versions in consultation with the oldest Greek manuscripts available. His work on Psalms is exemplary of his eclectic and revisionary method: he produced three different redactions, the first based on the Old Latin, the second on Origen, and the third on the Hebrew instead of the Septuagint, a process that he then undertook for the rest of the Old Testament. The success of Jerome's *Vulgate* is also its liability, for with 8,000 manuscripts

the range of variance that came down through the Middle Ages and beyond was enormous.

Medieval

That Pope Damasus I appointed Jerome to produce an official Latin Bible (rather than Greek or Hebrew) was further evidence of the hegemony of Latin in the West. But what this meant was that, in an age when Latin (at least in the West) was the *lingua franca* and when very few of even the small educated class could read Hebrew or Aramaic or Greek, the task of such textual scholars as Lupus of Ferrière (*c*. 805–62) was primarily conservational rather than restorative, by trying to build up the holdings of Ferrière by loans from Tours, York, and Rome. He may indeed have used the Alexandrian system of collation (presumably without knowing it), but unlike the Alexandrians he would rarely risk a conjectural emendation, preferring to leave a blank space. This limitation was of course compounded by the monastic concentration on the copying of religious rather than pagan works. While the great task of the high Middle Ages might have been to reconcile pagan works with the revealed truths of Christianity, the fact remains that even such a learned figure as Bede (*c*. 673–735) probably derived his knowledge of the classics through Macrobius and Isidore, and the references that Alcuin of York (*c*. 730–804) makes to the classical authors (Virgil, Lucan, Pliny, Statius) in his account of the library at York were not the norm for the time. That the only extant version of Cicero's *De Republica* survives as the lower (erased) text of a palimpsest, a manuscript "overwritten" by Augustine's *In psalmos*, is vivid testimony to the relative cultural and transmissional significance of classical and Christian texts.

Despite these constraints, it would be a mistake simply to fall into the later "renaissance" critique of medieval scholarship as uncouth and barbarian. Through such movements as the Caroline reformation of handwriting (overseen by Alcuin at the invitation of Charlemagne), which created a clear yet efficient script out of the corrupt and largely illegible pre-Carolingian "national" scripts, and the programs of copying at Corbie, Liège, St. Gall, Monte Cassino, and other monastic centers, the Carolingian "renaissance" did produce the great bulk of our earliest surviving manuscripts of classical literature.

Similarly, while the standards of Alexandrian Greek scholarship slipped in the Eastern Empire, Constantinople remained an important transmitter of classical culture in Greek until the fall of the Eastern Empire to the Turks provided a counterweight to the hegemony of the Latin West through the work of such scholars as Michael Psellus (1018–78), Anna Commena

(*c*. 1110–80). While much is made of the deleterious effects on the archive of Greek manuscripts by the Turkish conquest in 1453, it is probable that the devastation of the Constantinople libraries by the Christian Fourth Crusade in 1204 was even greater, and the post-Crusade scholarship of such figures as Maximus Planudes (*c*. 1255–1305), Demetrius Triclinus (*fl.* 1305–20) and the *Paleolologi* is characterized by a shortage of the raw materials – even the parchment – on which textual scholarship is based.

The last (and lasting) contribution of Byzantine textual scholarship was to provide the early Italian humanists with what manuscript riches remained. In 1398 Jacopo Angelo was sent by Coluccio Salutati (1331–1406) and the Florentine *signoria* to go book-hunting in Constantinople for texts of Homer, Plato, and Plutarch; and in the early fifteenth century, just before the Turkish conquest, Giovanni Aurispa came back to Italy with hundreds of Greek manuscripts. Although Salutati did arrange for the Greek scholar Manuel Chrysoloras (1355–1415) to leave Constantinople for Florence (and thus to begin the first serious study of Greek in the West in 700 years), the irony is that, until the print editions of the Aldine press, these Greek manuscripts seem to have been used primarily as the basis for Latin translations rather than as independent witnesses for Greek editions. Nonetheless, Constantinople's function as a repository of Greek learning long after Greek had been lost in the West did mean that the work of the Alexandrians did find its way into late medieval Europe.

Renaissance

If the humanist movement beginning in Italy was to produce such scholarly editions as the Greek and Latin classics of the Aldine press, then there had to be a period in which the documentary output (in both preservation and copying) of the medieval repositories could be accessed and examined with some sort of bibliographical rigor. The output had been greatly increased as a result of the gradual passing of clerical (i.e., monastic) responsibility and control to commercial scriptoria, employing professional scribes, often associated with the new centers of learning in the universities. While such figures as Petrarch and Boccaccio are perhaps the best known of the humanist collectors, the earlier work of, for example, Lovato Lovati (1241–1309) provided the initial momentum. In fact, Lovato was already familiar with Catullus, Propertius, Tibullus, and Lucretius before the later humanists' claims to have recovered such authors for the first time. Similarly, Giovanni de Matociis (*fl.* 1306–20) was the first to make a successful distinction between Pliny the Elder and Younger, and Geremia da Montagnore

But Petrarch's (partial) construction of the histories of Livy showed how a careful examination of the fragments surviving in medieval repositories, through collation and correction in a traveling notebook, could begin the long editorial task of reconstruction. The exilic papal court at Avignon may have been an embarrassment and liability to the Roman Catholic church, but the documentary riches accumulated at Avignon (together with such depositories as the Chapter Library of Verona) furnished Petrarch and his compatriots Boccaccio (at Monte Cassino) and Salutati (with agents throughout southern Italy and Constantinople) with the manuscript resources that provided the raw materials for the textual study of classical authors.

This peripatetic re-discovery of the classical inheritance is best exemplified in the work of Poggio Bracciolini (1380–1459), covering several different scholarly fields. In his role as a papal secretary, he traveled all over Europe (Konstanz, Cluny, St. Gall, Cologne) and found manuscripts (of Cicero, Quintilian, Valerius Flaccus, Lucretius, Manilius, Ammianus Marcellinus) wherever he went. He also invented one of the new humanist scripts, breaking with the dense lattice work of *textura* (what we usually think of as *gothic*), to reform scribal usage toward clarity and legibility, necessary if the further transmission of the discovered texts was to proceed with anything like accuracy. Moreover, he described his various activities in a lively and engaging series of letters (which still survive) to his fellow scholars and patrons.

The activities of Petrarch, Boccaccio, Poggio and others demonstrate several important themes in renaissance textual scholarship. The triumph of humanist (roman and italic) script over textura, everywhere except in Germany and in the practice of law, showed how the evolution of inscription technologies could promote consistency, legibility, and broad international standards for transmission. The migration of witnesses from the Greek East to the Latin West showed how the fortunes of war, institutional collection practices, and the sharing of textual resources could affect the relative significance and influence of centers of learning. And the promotion of pagan literature, philosophy, science, and language studies over theological texts showed the practical, documentary effects of the "humanist" agenda of the Italian city-states (particularly Florence and its signoria). In these and other related areas, politics, military power, financial advancement, and civic pride could produce identifiable textual results.
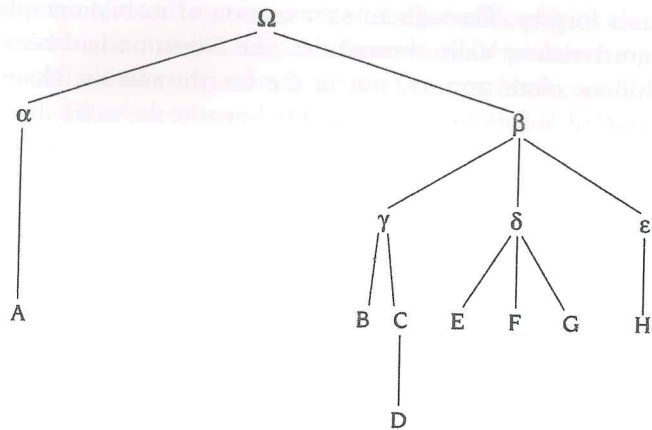
With all of this manuscript collecting and collation underway, it fell to such figures as Lorenzo Valla (1407–57) and Angelo Poliziano (known as Politian, 1454–94) to undertake what we might recognize as a philological method. Valla is best known (one might say notorious) for having exposed the *Donation of Constantine* – a document supposedly sent by the Christian Emperor Constantine to the pope and thus conferring secular power on the

papacy – as a forgery. Through an examination of its bibliographical and textual characteristics, Valla showed that the *Donation* had been written in the eighth or ninth century, not in the fourth, and the claims of the papacy crumbled before this evidence. He brought the same interrogative philology to his exposure of the "letters" between Seneca and St. Paul – another forgery – and undertook the emendation of Jerome's *Vulgate*, by reference to Greek as well as patristic texts, in his *Adnotationes in Novum Testamentum*, which Erasmus published in 1505.

Politian took Valla's scholarly principles to another level in proposing what later became known as the "genealogical" method, with a less authoritative witness descending from an inferred (or sometimes extant) version. This search for "origins" was later to fall into disrepute because of its almost mystical veneration of the *archetype* (conventionally referred to as O′ –, i.e., O prime), the earliest recoverable state of transmission; but the work of both Valla and Politian was the necessary first stage in the formulation of what developed into the scholarly discipline of *Altertumswissenschaft* (the "science" or "study" of ancient times), whereby textual, linguistic, and bibliographical features could be arranged along a linear path of historicity. The same principle was later to be used by Mabillon and the Maurists in the arrangement of scripts in an historical line of development.

Politian's devolutionary method (and rejection of the readings of later manuscripts) was later codified into an editorial principle: the *eliminatio codicum descriptorum* (the elimination of "descriptive," i.e., derived, copies as witnesses to an authorial text), and more fully developed in the genealogical models of Lachmann and Maas. The motto has been severely questioned in later periods – from those who would argue that later witnesses may still preserve or even reinvent authentic readings and those who would claim that all witnesses show a text in social negotiation and all are therefore potentially valuable, if not all for the same reasons. But the basic concept remains a foundational ideal in much contemporary scholarship, and is the *raison d'être* behind the genealogical arrangement of *stemmatics* (the *stemma codicum* or "family tree" of witnesses): see Figure 1.1, where the archetype is represented by Ω, the "inferred," i.e., non-extant, witnesses by Greek-letter sigla, and the textual "remaniements" by the Roman letters. In this stemma, B and C are presumed to share errors different from those in E, F, and G; and the witness D is a "descriptive" manuscript with no independent authority. Because it is closer to the archetype, A will supposedly be less corrupt, and thus more authoritative, than other witnesses.

Valla's interrogation of the Greek New Testament proved a stimulus to the decision of Erasmus (1466–1536) to undertake his very influential edition of both Greek and Latin versions. He was rigorous in collecting manuscripts in both traditions, but where tradition was deficient he had no

1.1 Typical stemma or "family tree" of textual transmission, showing the putative archetype, inferred (Greek sigla) and extant (Roman sigla) witnesses. Diagram by author.

qualms about providing a reading from the other. Thus, his primary Greek manuscript lacked the conclusion of Revelation, so he simply translated the Latin back into Greek. And he similarly did not hesitate from "improving" his sources where he thought intelligibility (or just good style) required. Finding some of the Latin in the *textus receptus* of Romans inelegant, he claimed "it is only fair that Paul should address the Romans in somewhat better Latin," (when, of course, Paul would in fact have written in Greek).[5] Nonetheless, Erasmus did bring a scholarly skepticism to the editing of the biblical texts, as is shown in the single passage for which the Erasmus edition encountered the most criticism: an omission that struck at the heart of Christian orthodoxy – the so-called *comma iohanneum* on the Trinity. The sentence familiar to us in the King James version and beyond, reads, at 1 John v. 7 "For there are three that bear record in heaven, the Father, the Word, and the Holy Ghost: and these three are one." This is the only biblical passage that refers unambiguously to the Trinity: the problem was that it was not in any Greek manuscript, and so Erasmus left it out, and brought down the wrath of orthodox theologians, especially Stunica, one of the editors of the Complutensian polyglot Bible, produced at the university in Alcalá de Henares (Latin *Complutum*). Erasmus did agree that if a Greek manuscript with the Trinity passage was discovered, he would reinsert it in a future edition. And, of course, in one of the greatest archival "discoveries" of the time, a Greek manuscript (especially written for the purpose in 1520 by a Franciscan friar in Oxford) was produced. Despite demurrals about the authenticity of this "discovery," Erasmus made good on his promise and reinserted the Trinity in future editions, where, with some exceptions, it remains still, a dogma based on a forgery. Indeed, no less a textual critic

than Pope Leo XIII declared in 1897 that it would be "not safe" to "deny that this verse is an authentic part of St. John's Epistle," though the papacy backtracked on this assertion in 1927.[6]

A measure of the success of Valla, Politian, and Erasmus can be seen in the confidence with which Petrus Ramus, polyglot and polymath, could assert in his famous oration of 1546 that modern scholarship had overturned medieval Scholasticism (particularly the reliance on Aristotle) and that in his time, all of the major classical authors were now available in reliable editions. It is true that the Aldine editions beginning at the very end of the previous century had often been overseen by reputable scholars (Erasmus among them), but the optimism of Ramus was more a reflection of the familiar "renaissance" rejection of the medieval than of the growth of a genuinely philological method.

Rise of philology and modern textuality

That this method was slow in coming can be measured by the later comments of A. E. Housman on the continued work of Joseph Justus Scaliger (1540–1609) on the text of Manilius, the first-century author usually credited with composition of the anonymous *Astronomica*. When the first edition appeared (1579), no reliable witnesses had yet appeared, and Housman thus notes that "the transformation which first made Manilius a legible author was the work of Scaliger's own unaided wits";[7] whereas, by the time of the second (1600) edition, the Gemblacensis collation (a manuscript "G" from the monastery of Gembloux in Brabant) had appeared, and the judgment of Scaliger's "wits" could be checked, and confirmed, against a bibliographical authority. The results were, in Housman's words, that "no critic ever effected so great and permanent a change in any author's text as Scaliger on Manilius."[8] It is precisely this combination of an identification and evaluation of bibliographical resources with a critically acute sensitivity that has been the goal of textual scholarship in its various manifestations since the Renaissance. Again, Housman can be an appropriate guide: he defined textual criticism as the "science of discovering errors in texts, and the art of removing them," although most textuists might today argue that science and art are present in both stages.[9]

The range of activity in the last four centuries is so various that it would be foolhardy to try to encapsulate this history into a few paragraphs. But there are several emblematic moments in this history that can serve to illustrate the critical issues at stake. Take, for example, the textual career of Karl Lachmann (1793–1851), generally recognized as the progenitor of the genealogical method still used in much editing today. Lachmann's reliance on very rigid bibliographical principles can be shown in his edition of Lucretius

(1850), where he claimed he could prove not only that the three major extant manuscripts all descended from a single archetype, but that this (lost) archetype was composed of exactly 302 pages, each with 26 lines. He also determined that the archetype had been copied from a minuscule original, and that this minuscule (a style using both what we would now call "capital" and "lower case" letters, though these terms are more properly applied only to print and typefaces) was itself a copy of a rustic capital text (a slightly less formal version of monumental "square capitals") from the fourth–fifth centuries. In other words, Lachmann's bibliographical research could, he claimed, show exactly where the page breaks occurred in the no longer extant archetype. But beyond the archetype he would not go, a reining in of speculation that also appears in the very influential work of his disciple Paul Maas, whose stemmatic models proceed upwards (from extant but corrupt witnesses) to the putative source(s) – until we reach the archetype, at which point reconstitution of the text is impossible. This argument is based on the assumption that later witnesses will contain more errors as the text is disseminated and that errors held in common by two or more witnesses will show that they descend in the same line. As already noted, this procedure may facilitate the "elimination" of "derivative witnesses." The irony may be that Lachmannian stemmatics may lead to an overvaluation of the *codex optimus*, or best manuscript, and provide a respectable rationalization for editorial promotion of a manuscript already favored for other reasons. The irony is that this *codex optimus*, or best text, procedure was later advocated by Joseph Bédier as an alternative to what he saw as the inherent falsification of the Lachmann method, since, as Bédier observed, stemmatics could all too often (and implausibly) lead to a binary opposition between two texts (and no more).

However, this apparently cautious approach is not observed in Lachmann's edition of the vernacular *Nibelunge Not und die Klage* (1826), for which documentary sources, almost by definition, could not be marshalled in the same way. That is, in editing a classical author, Lachmann could be bibliographically restrained, whereas he felt that the search for the Germanic *Geist* putatively to be found in the *Nibelungenlied* justified greater speculation.

And this dichotomy could previously be seen in the work of Richard Bentley (1662–1742). In his classical scholarship (for example, his 1726 edition of the Roman author Terence) he could practice a rigorous philological method, but in his notorious edition of Milton's *Paradise Lost* he convinced himself that the infelicities he observed in the printed text were the result of Milton's blindness, and his thus having to use an amanuensis, on whom all these "unmiltonic" readings – including even the ending of the

poem – could be foisted. As with Lachmann and the *Nibelungenlied*, Bentley thus gave himself *carte blanche* for conjectural emendation.

The challenge of possibly reaching beyond bibliographical evidence can be seen in two almost contemporaneous moments: in biblical scholarship, the "quest for origins" was to all intents and purposes formally abandoned when the *Einleitung in das Alte Testament* (1780–83) of Johann Gottfried Eichhorn (1753–1827) took the position that the biblical texts were no different from secular and that, because of the numerous layers of copying, it was impossible to achieve a "transcendent" or "original" text. Similarly, Friedrich August Wolf (1759–1824) argued in the *Prolegomena ad Homerum* of 1795 that the original versions of the Homeric epics were irrecoverable, again because of the multiple generations of copying. In essence, Wolf was declaring that the conservational or reconstructive agenda of Peisistratus and even of the Alexandrian librarians was untenable.

National bibliographies

Such counsels of despair (if that is what they were) did not mean that the search for "origins" (or at least for witnesses who testified to an otherwise unrecorded state of the text) did not continue, and during the nineteenth century and on into the twentieth, perhaps the greatest contributions to textual scholarship were to be found in the collecting, sorting, describing, and transcribing of a documentary history that would reflect a national patrimony. This process had already begun in the founding of what became national libraries, to replace the monastic institutions of the Middle Ages. The most famous examples are Duke Humphrey's library at Oxford, refounded by Bodley in 1610; the Lambeth library of Archbishop Bancroft (1610); Charles IV's academic library in Prague (1348); the Louvre library of Charles V (1368), combined with the Fontainebleau library of Francis I, reorganized by Guillaume Budé, to become the basis for the Bibliothèque Nationale; Pope Nicholas V's refounding of the Vatican library (1448); the institution of the Ambrosian library in Milan by Cardinal Borromeo (1609); the Medici's Laurentian library (1571); and the British Museum Library, based on the collections of Arundel, Sloane, and Cotton (with the manuscripts in what is now the British Library still bearing the names of these original collectors, just as the Rawlinson, Laud, and Douce manuscripts in Bodley carry their original identities), complemented by the Public Records Office (1838) for official government and court records. In a later period, the United States saw the founding of the New York Public Library (1895, based on the Astor, Lenox, Arents, and Berg collections); the Huntington library in San Marino, California (1919); the Pierpont Morgan in New York (1924); the Houghton

(1942) and Widener (1915) libraries at Harvard (1942); and Lilly at Indiana (1960); plus the enormous holdings of the Library of Congress (1800, destroyed 1812, refounded 1815).

The concentration of documentary records in such centers facilitated the production of national bibliographies, particularly when union catalogues of the collections were compiled, leading to the publication of national historical records. The chief examples include the *Rerum britannicorum medii aevi scriptores* (the Rolls Series, 1858–91) for Britain; the *Rerum gallicarum et franciarum scriptores* (1738–1904) for France; and the *Monumenta Germaniae historica* (1819 onwards) for Germany. More comprehensive enumerative bibliographies of specific value to textual scholars in English-language studies began with the so-called *Short Title Catalogues* (Pollard and Redgrave for 1475–1640, revised; Wing 1640–1700, revised; *Eighteenth-Century Short Title Catalogue* for 1701–1800), now all combined into the *English Short Title Catalogue* (*ESTC*) for 1473–1800.[10]

The two other types of basic materials that characterize nineteenth-century scholarship can be illustrated by the Early English Text Society and the *New* (later *Oxford*) *English Dictionary*. In fact, the EETS was founded by Frederick Furnivall in 1864 specifically to provide textual readings for the historically organized *OED*, which was also initiated by Furnivall, but did not begin the lengthy process of compiling records until the appointment of James Murray in 1878, and did not finish its first edition until 1928, with a second edition in 1989 and a third in preparation. EETS produced the first print editions of, for example, the Cotton Nero A.x. manuscript, containing the sole witness to the texts of *Pearl* and *Sir Gawain and the Green Knight* and is still publishing valuable volumes of medieval material. While some of the EETS publications can be regarded as "critical," with an editorial examination and evaluation of all significant witnesses, because of its role as producer of raw materials for the *OED*, EETS published many editions that are "diplomatic" transcriptions of specific manuscripts.

Vernaculars

This interest in, and promotion of, collecting, editing, and publication of vernacular materials was a testimony to the major shift in textual scholarship in the nineteenth century. As this brief history has shown, for over 2,000 years the great developments in textual expertise had been concentrated on transmitting the classical and biblical heritage to later periods. It is true that the activities of a printer/publisher like Caxton were responsible for producing print texts of the major English works of Chaucer, Lydgate, Malory and so on, but the great strides in editorial theory were still being

made in classical and biblical texts. The career of Lachmann embodies this distinction, given his rigorous genealogical method in Lucretius as opposed to the idiosyncratic editing of the *Nibelungenlied*. But with the combination of the growth of national libraries, national bibliographies, and the eventual introduction of vernacular studies in the curricula of research universities, the balance began to shift away from the classics and towards vernacular works.

It is undeniable that, in the early years, the study of the vernacular in the universities was modeled on classics. Indeed, there was still a suspicion of vernacular study as being mere "chatter about Shelley," so that the courses of study had to prove that they were as "difficult" as those in classics; and the major result of this inferiority complex was a concentration (in British, American, German, and French universities) on philology in the sense of historical linguistics, grammar, laws of sound changes, and so on. The linguistic bias thus meant that there was very little place for what we might recognize as literary criticism; but it also meant that the typical university student, especially at the graduate level, was expected to produce a scholarly edition as his (and later her) final exercise and admission to the academy. As current textual scholars have now recognized, this sort of project is increasingly rare, although newer aspects of textual work (for example, the growth of interest in the history of the book) have begun to emerge.

Recent Anglo-American and Continental textual scholarship is covered in the essays by Sutherland and Lernout respectively, so this account will cover only those aspects of this later period and these fields that relate to the general history of textual scholarship already laid out. For example, the "strict and pure" bibliography of Fredson Bowers, following upon the copytext theory of W. W. Greg, can be seen in part as a development of both the "difficulty" deliberately espoused by the still-new vernacular courses of study at the universities and in part as a reflection of a general late nineteenth- and early twentieth-century confidence in positivism, as both a scientific and a philosophical agenda. There are several ironies in this belief – or hope. One example of this positivism is the oft-cited address by Lord Kelvin to the British Association for the Advancement of Science in 1900 in which he stated, "There is nothing new to be discovered in physics now. All that remains is more and more precise measurement."[11] This was just shortly before Einstein's 1905 publication in *Annalen der Physik* of the four "miracle year" essays that assigned Newtonian physics to the history rather than the present of the discipline. And this assumption that all had been achieved can be paralleled by the entry for "textual criticism" in the famed eleventh edition of *Encyclopaedia Britannica* that "[a]s time goes on, textual criticism will have less and less to do. In the old texts its work will have

been performed so far as it is performable. What is left will be an obstinate remainder of difficulties, for which there is no solution or too many. In the newer texts, on the other hand, as experience has already shown, it will have from the outset but a very contracted field."[12] This confidence that there is "rien à faire" was a mark of optimism rather than Beckettian despair, but at the beginning of a century that witnessed a series of revolutions in textual studies as well as the inauguration of what has often been seen as a "great age of editing" it seems singularly misplaced, though of a piece with its time. It is a product of a belief that, given enough facts, any problem can be solved with the application of a "scientific" rigor.

Indeed, despite the disdain leveled by A. E. Housman against those German scholars who had mistaken textual criticism for mathematics, and despite the insistence of even reputable analytical bibliographers like Tanselle that textual scholarship was not a science, the desire for scientific surety continued to be a grail followed by many textuists during this period. For example, Tanselle quotes an address before the Bibliographical Society of America claiming that "Bibliography, as taught and practiced in the circle to which I address myself, ranks now equal to, if not among, the exact sciences."[13] The temptation to align textual scholarship with the physical sciences can perhaps be understood against the increasingly technological research of analytical bibliography, as for example, in the cyclotron analysis of the inks used in the printing of the Gutenberg Bible, or the stylometric analyses of Shakespeare plays. Such studies appeared to be so technical (often using a vocabulary that was comprehensible only to the initiate) that textual scholarship became associated in the minds of many academics and serious readers with a dryasdust, incomprehensible, and eminently ignorable discipline that had little to contribute to the major intellectual debates of the later twentieth century. This isolation of textual scholarship was unfortunately abetted by some of the more doctrinaire pronouncements of Anglo-American bibliographers against what is often regarded as the "monstrous regiment" of (mostly French and German) exponents of structuralist or new historicist or even post-structuralist textuality. Thus, when Hugh Amory reviewed the proceedings of a conference on *La bibliographie matérielle* (responding to Roger Laufer's question "La Bibliographie matérielle: pourquoi faire?", with its unacceptable answer, for "communication"), he then launched into an attack on everything that such "foreign" textual study stood for: "[t]he object of bibliography is just to describe books: not texts, not ideas or states of mind, not semeiotic [sic] systems or social relations, not even the Book; but books – assemblies of paper and ink and thread and glue and cloth and leather, remember?"[14] Similarly, in David Shaw's account of *bibliologie*, he made it clear that the French lack of a concern with the scientific certainties of analytical bibliography was a result of the "theoretical interests of French

literary scholars [who] notoriously tended to structuralist and its various offshoots."[15]

Intention and sociology

To balance such partisan positions, it must be admitted that analytical bibliography, when handled by a sensitive, even quirky and entertaining scholar, can be both technically rigorous and provocatively presented, as the work of Randall McLeod illustrates so well (see, for example, Chapter 7 in this volume). But the demurrals against the positivism of analytical bibliography registered by, for example, D. F. McKenzie, emphasized the importance of the "social, economic, and political motivations of publishing, the reasons why texts were written and read as they were, why they were rewritten and redesigned, or allowed to die."[16] In so doing, McKenzie charged that analytical bibliography was an incompletely historicized procedure, since the focus on *a* book as opposed to *the* book depended on "a virtuosity in discerning patterns in evidence which is entirely internal, if not wholly fictional." The enlarging of the socio-cultural context of bibliography (to include, for McKenzie, even landscape and topography), was further promoted by the work of Jerome J. McGann and others (especially in *A Critique of Modern Textual Criticism*[17]), whereby the previous concentration on authorial intention by Fredson Bowers and Tanselle was enlarged to include later *socialized* states of the text as it appeared and reappeared at different historical moments and by various agents: author's friends and relatives, publishers, editors, readers. McGann did not (as he was sometimes charged) remove authorial intention, but he regarded this so-called "originary moment" as just one in a sequence of textual negotiations.

The major shift that the McKenzie–McGann revolution in textual scholarship brought to the discipline extended much beyond the Romantic and Victorian authors that McGann had edited or the work of McKenzie in the seventeenth century. The tacit (and sometimes overt) assumption had long been that the goals of textual criticism were to restore the text to an "original," "authorial" form. Thus, the editing of medieval texts during the 1960s and 1970s was still primarily (perhaps even unthinkingly) dominated by a desire to uncover lost authorial intention in the face of what looked like the garbling of authorial composition by unintelligent and meddlesome scribes. A notorious example of the rejection of scribal involvement was the highly contentious Kane–Donaldson editions of *Piers Plowman*, which justified often highly speculative conjectures on the assumption that the author's mind and expression were so original that mere scribes would mangle the text in the act of copying – an editorial position based on the dictum that the *lectio difficilior probior est* (the more "difficult" reading is more likely

to be authorial than the "easier" one adopted by scribes).[18] During the same time, I contributed to an edition of John Trevisa's late fourteenth-century *On the Properties of Things*,[19] in which a similar attempt at the restoration of a lost authorial intention was the guiding principle, when the only "remaniements" were later scribal copies. And for that reason, just as George Kane and E. T. Donaldson rejected the evidence of two manuscripts that were felt to have been too heavily worked over by scribes, so the Trevisa editors relegated the readings found in the only paper manuscript – and one full of idiosyncratic variants, interlineations, and other marks of individual intervention – as unreliable. But since that quirky manuscript showed the work in its social circulation (in fact, was described as probably having been made by a person for his own use, not by a professional scribe), if the Trevisa text were now to be re-edited, that formerly rejected witness would probably be accorded a textual significance of a particularly valuable kind, the socialized version of an authorial text.

For similar reasons, manuscripts that were thought to be contaminated or conflated (again, showing social negotiation of a text) were usually rejected as unauthoritative during the heyday of intentionalist editing – in medieval studies as much as in any other period. As Tarrant points out, both Lachmann and Maas had been unable to deal with contaminated witnesses, an unease expressed in the formula "No specific has yet been discovered against contamination," which, as Tarrant observes, is much "starker" in the original German: "Gegen die Kontamination ist noch keine Kraut."[20] But a combination of an interest in the genetic formation and transformation of texts, together with the "sociology" of texts, meant that, in the latter twentieth century, a book like Bernard Cerquiglini's *In Praise of the Variant: A Critical History of Philology* could be seen as representing the concern among medievalists for "whatever is unstable, multiple, and precarious," which Cerquiglini, like many other textual scholars, specifically links to electronic text production, characterized as "mobile, various, and fluctuating."[21] In fact, Cerquiglini is best known for his assertion that what he calls *mouvance* (variance) is not just an accident of medieval textuality, it is its major feature: "[v]ariance is the main characteristic of a work in the medieval vernacular."[22]

The instability, multiplicity, and precariousness that Cerquiglini found in the electronic medium was perhaps the most debated feature of late twentieth- and early twenty-first-century textual scholarship. This topic is covered more fully in the essay by Kirschenbaum and Reside, but it may be useful to place the debate within this longer-range history. In brief, there were those whom Paul Duguid tellingly referred to as "liberation technologists,"[23] who saw the apocalypse in the move from print to digital transmission, and found that the very ontology of text had been changed.

These critics were all too frequently carried away by their own enthusiasms, claiming, for example, that the "revolutionary" goal of hypertext was "freeing the writing from the frozen structure of the page" and "liberating the text,"[24] which will "disempower...the force of linear print" and "blow wide open" the social limits of the codex book to "create that genuine social self which America has discouraged from the beginning."[25] While the rhetoric of the liberation technologists might have been overblown, even risible, it is undeniable that the shift from print culture to digital was as significant a change as the previous moves from manuscript to movable type, from roll to codex, and from oral transmission to written. But, given the platonism that underlay much of Tanselle's agenda, it should not be surprising that when he was co-opted to write the "Foreword" to an MLA collection on *Electronic Textual Editing*, he discounted the "hyperbolic writing and speaking about the computer age, as if the computer age were basically discontinuous with what went before," and warned that "when the excitement leads to the idea that the computer alters the ontology of texts and makes possible new kinds of reading and analysis, it has gone too far."[26]

In the second decade of the twenty-first century, it may be too soon to determine which of these two extreme views is likely to prevail (though Matthew G. Kirschenbaum has provided a good antidote, using traditional textual criticism with a technological sophistication).[27] There were equally extravagant claims made for the revolutionary nature of print, and equally passionate dismissals of its value (just as when Cardinal Giuliano della Rovere had ordered the copying back into manuscript of the offensive Wendelin Spire print edition of Appian's *Civil Wars*). But as we now know, print did not simply and suddenly replace manuscript: manuscript transmission of literature was still a favored medium long into the seventeenth and early eighteenth centuries, and calligraphic handwriting went through several important revivals during the 400+ years of supposed print hegemony. It is true that we no longer have much use for rolls (although the survival of "legal size" paper and the still-common binding of legal papers along the top, not the side, of a document bears the traces of roll inscription). And it may be that, for both price and portability, electronic readers like the Kindle, with the capacity of hundreds of print volumes in a quarter-inch thick tablet, may complement the reading of hardbound books with a new generation to whom the e-book may become the preferred vehicle. But Tanselle was surely right to at least caution that, for example, the sort of problems typified by the concepts of *analogy* and *anomaly*, first encountered by the Alexandrians and Pergamanians, will not disappear from the long history of textual scholarship. The history of history as preserved in documents of various types is thus always a balance between an acknowledgment that new materials, new methods of storage and transmission, and new critical principles will

have to be part of the textual scholar's armory, while also recognizing that certain basic principles (the role of the author, the function of the audience, the variance in texts) will continue to guide both procedures and judgments of the practice of textual scholarship. The revolutions of the codex, movable type, and electronic media simply exemplify the continual revaluation of theories and practice that textual scholarship has had to confront, so that at this point in the evolution of the discipline it is very unlikely that anyone will be able to repeat the confidence of the 1911 *Britannica* that there is almost nothing left to do.

NOTES

1 Iona and Peter Opie, *The Lore and Language of Schoolchildren* (Oxford University Press, 1959).

2 G. Thomas Tanselle, *A Rationale of Textual Criticism* (University of Pennsylvania Press, 1989), 65, 93.

3 See Luciano Canfora, *The Vanished Library: A Wonder of the Ancient World*, trans. Martin Ryle (University of California Press, 1990).

4 Athenaeus, *The Learned Banqueters*, ed. and trans. S. Douglas Olson (Loeb/Harvard University Press, 2007–8).

5 Epistle 337 in *Collected Works of Erasmus* (University of Toronto Press, 1974 onwards), 15:167.

6 Metzger, 102.

7 A. E. Housman, *Selected Prose*, ed. John Carter (Cambridge University Press, 1961), 23.

8 *Ibid*, 23.

9 *Ibid*, 131.

10 Available in simplified electronic form at http://estc.bl.uk.

11 I am grateful to Jeffrey Drouin for having provided the details of this citation. See http://scienceworld.wolfram.com/biography/Kelvin.html.

12 *Encyclopaedia Britannica*, 11th edn. (Cambridge University Press, 1911), XXVI:715. (J. P. Postgate).

13 J. Christian Bay, qtd. in Tanselle, "Bibliography and Science," *Studies in Bibliography*, 27 (1974), 55–89; at 61.

14 Hugh Amory, "Physical Bibliography, Cultural History, and the Disappearance of the Book," *Papers of the Bibliographical Society of America*, 78 (1984), 341–8; at 343.

15 David Shaw, "*La bibliologie* in France," in *The Book Encompassed*, ed. Peter Davison (Cambridge University Press, 1992), 211.

16 D. F. McKenzie, *Bibliography and the Sociology of Texts*, The Panizzi Lectures (London: British Library, 1986), 5.

17 *Ibid.*, 7. McGann, *A Critique of Modern Textual Criticism* (University of Chicago Press, 1983; repr. University Press of Virginia, 1992).

18 *Piers Plowman: The B Version*, ed. George Kane and E. Talbot Donaldson (London: Athlone, 1975).

19 John Trevisa, *De Proprietatibus Rerum*, ed. M. C. Seymour *et al.* (Oxford: Clarendon Press, 1975), 2 v.

20 R. J. Tarrant, "Latin Classical Literature," in *Scholarly Editing: A Guide to Research*, ed. D. C. Greetham (New York: MLA, 1995), 109. Tarrant cites Paul Maas, *Textual Criticism*, trans. Barbara Flower (Oxford: Clarendon Press, 1958), 31.

21 Bernard Cerquiglini, *In Praise of the Variant: A Critical History of Philology*, trans. Betsy Wing (Johns Hopkins University Press, 1999), xiii.

22 *Ibid.*, 37.

23 Paul Duguid, "Material Matters: The Past and Futurology of the Book," *The Future of the Book* (University of California Press, 1996).

24 J. David Bolter, *Writing Space: The Computer, Hypertext, and the History of Writing* (London: Erlbaum, 1991), qtd. in Duguid, "Material Matters," 73.

25 Richard Lanham, *The Electronic Word: Democracy, Technology, and the Arts* (University of Chicago Press, 1993), n. 18.

26 Tanselle, "Foreword," in *Electronic Textual Editing*, ed. Lou Barnard, Katherine O'Brien O'Keefe, and John Unsworth (MLA, 2006), 2.

27 Matthew G. Kirschenbaum, *Mechanisms: New Media and the Forensic Imagination* (MIT Press, 2008).