Tribal lays and the history of the fingerprint

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There are nine and sixty ways of constructing tribal lays,
And-every-single-one-of-them-is-right!
Rudyard Kipling, *In the Neolithic Age* (1895)

CANTI TRIBALI E LA STORIA DELL'IMPRONTA

Dopo una breve spiegazione dei modi differenti in cui un tipografo generava varianti all'interno di una edizione fatta sul torchio manuale, il saggio descrive la tradizione dell'«impronta». Lo scopo comune di tutti questi strumenti è quello di facilitare il riconoscimento di varianti di stato o di emissione, nonché di identificare agevolmente esemplari danneggiati come appartenenti a una determinata edizione. Esistono due procedure diverse. La prima consiste nel rilevamento di parole o di caratteri da punti fissi all'interno dell'edizione: esempi sono il sistema di Robert Steele nella Bibliotheca Lindesiana *(1913), i repertori di incunaboli che trascrivono la prima riga del secondo fascicolo (in particolare il* Gesamtkatalog*), e l'impronta LOC, ideata da John Jolliffe, che riporta sedici caratteri da quattro luoghi differenti. La seconda rileva la posizione della segnatura rispetto al testo nella riga finale della pagina soprastante, come nel catalogo STCN e nel «Bibliographical profile» recentemente ideato da Douglas Osler. I tre principali sistemi (LOC, STCN, Osler) vengono applicati ai casi rappresentati dalla contraffazione della* princeps *delle* Prose *di Pietro Bembo (1525) e alle edizioni cinquecentesche del* Morgante *di Luigi Pulci, di cui un elenco si trova in appendice. La valutazione dell'impronta LOC, che è stata ingiustamente criticata, deve tenere conto del fatto che fu concepita per essere utilizzata in un ambiente elettronico, come quello del Censimento delle edizioni italiane del Cinquecento, in cui si è rivelato un descrittore utilissimo per ordinare e reperire nuclei di voci, mentre altri metodi, essendo più soggettivi, rivelano limiti nell'abbinamento con il computer. La conclusione è che l'impronta, qualunque sia il sistema adottato, rappresenti uno strumento indispensabile della catalogazione moderna.*

The place, the time, the audience, all constitute an irresistible temptation, resisting temptation has never been one of my better virtues, and therefore, also because the epithets seem appropriate and right, let me begin with a resoundingly declamatory: Friends! Romans! Countrymen! No matter how banal, this perfect opening allows me to carry on and say that I come not to praise the Fingerprint, nor to bury it. And, unlike Mark Antony, I shall stick closely to the agenda that has just been outlined. The aim of this paper is to furnish a brief comparative survey of a number of different, sometimes rival, sometimes complementary, devices that can be loosely grouped under the denomination: Bibliographical Fingerprint. The need to obtain proper information about the settings of type from within the body of early-printed artefacts, both as a way of recognising these books and as a means of discovering variants, was first expressed well over a century ago. More recently, but still fifty odd years ago, Fredson Bowers remarked that 'If we are sincere in desiring to record the true details by which to identify books, let us deliberately describe books as if they had no title-leaves', i.e. as purely material objects, and the implications of this statement still have to be worked out fully by later generations of scholars, especially those in the field of cataloguing early-printed books.[1] After a survey of the history of these various systems, this paper attempts a comparison between three devices that are actually being applied in present day catalogues and bibliographies. The first is used in a broad international context, albeit with a concentration of interest in Italy and in Germany; the second is employed in two specialist bibliographical projects in the Low Countries; and the third is to be found in the work of an individual scholar constructing a repertory of legal imprints.

The existence of rival systems brings us to the fact that partisanship has been a dominant feature of the discussion rotating around the Fingerprint as a concept and as a device. Part of this tendency is undoubtedly due to advocacy by the propugnators of the various methods, since, even in an atmosphere as rarified as hand-press book cataloguing, a touch of salesmanship, in which one's own product is good and other products are marked out as inferior, inevitably creeps in. It serves little purpose to enter into the merits of these various criticisms, claims and counterclaims, partly for reasons of space, partly because much of it is irrelevant to the application of the Fingerprint in a modern bibliographical context. A willingness to indulge in rational comparison is thus essential to understand the present paper. Like many people who have grown up with a particular way of doing things, one always prefers a familiar devil, since both its virtues

and its defects are known. When a different way is proposed, it is all too easy to adopt a mother-in-law attitude and refuse to contemplate any alternative of any kind, not because the other system is intrinsically good or bad, but simply because it is different from what we have always been used to doing. What has never been proposed, and in retrospect the omission appears a surprising one, is a thorough comparison between different ways of constructing Fingerprints, including their application to the description of the same books. This paper will therefore explore a certain number of case studies on this basis, with conclusions that might prove surprising to some.[2]

The nature of the *querelle* surrounding Fingerprints[3] has disguised one significant fact that the architects of large cataloguing projects ought to take into account. Once people have got into the habit of using them, they are very reluctant to stop using them. I confess that, whenever I have to compare a printed book to its catalogue description, the Fingerprint is usually the first item I check, if available, as a first step towards establishing the identity of the edition. While most of the attacks on the concept and on the use of Fingerprints derive from scholars who are not involved in cataloguing as a day-to-day activity, many experts in the field of hand-printed books, whatever system is being touted, are united in their positive view of such devices. In other words, though opinions might well differ about the efficacy of one Fingerprint system with respect to another, doing without them is an option few genuine professional users are willing to consider.[4]

Having now, in truly Shakespearian fashion, expressed our darker purpose, it behoves us to define the two basic questions that are being asked, i.e. what do Fingerprints do and do they really work? Before embarking on this quest for the siege perilous, a brief explanation of the technological features of early printing methods might help neophyte readers to understand how books produced on this mechanism can transform themselves into a bibliographical maze. (For other readers this explanation may prove old hat and therefore I invite them to jump forward to the next paragraph.) Books printed with hand-set type are never produced all in a piece at one single moment in time; they are created instead through a series of typographical units called formes. To print a sheet of paper on both sides, two formes were usually employed. While the forme was under the press, at any moment the work could be stopped and alterations made to the text. Renaissance printers in particular worked with a very small supply of letterpress, so that the intervals between a forme being set, the proofs

being pulled and corrected, and the print-run itself were necessarily tight.[5] If however, while the forme was being printed, an error was noticed or an improvement to the text was requested, it was a simple task to stop the press for a few minutes, make the required change and resume work. The sheets with the earlier and less correct reading – in bibliographical parlance a *state* – were not discarded but distributed among the copies.

This technical possibility of halting the impression in order to modify the forme constituted, however, a potentiality that by the end of the fifteenth century and increasingly through the course of the sixteenth-century printers learnt to exploit in a creative fashion, not just in order to provide a more correct text, but also in order to manipulate the way a book addressed itself to a public of readers and purchasers. One favourite trick was to alter the date on the title-page or in the colophon: in the edition of Bembo's *Rime* published by Giolito in Venice, some copies have 1569 [Fig. 1] and some have 1570 [Fig. 2].[6] Love of truth constrains me to introduce a further complication, or the fact that the edition is in two parts, since the poems are followed by a separate rhyme-concordance, which has its own title page and on which the same typographical artifice has been employed. Worse still, the person who a little under five centuries ago in the Giolito warehouse assembled the copies was wholly careless about matching 1569 part I with 1569 part II and likewise 1570 part I with 1570 part II and therefore procreated in roughly equal proportions four bibliographical combinations, i.e. 1569 [I] + 1569 [II], 1569 [I] + 1570 [II], 1570 [I] + 1569 [II], 1570 [I] + 1570 [II]. The outcome is a sad puzzle and, as in the children's song where a kingdom is lost for the want of a horse-shoe nail, here, if not wholesale loss, mild havoc ensues from the manipulation of a couple of pieces of lead: ensues, that is, if we do not adopt the viewpoint of the makers of these books and recognise these variants as no more than ordinary administration in the production of an edition.

Instead of considering such manoeuvres as vile, we need to understand how up to the eighteenth century the publishing trade was dominated by a single profession, that of the bookseller. People might be printers, they might be publishers, but they all sold books and their prime common concern was to find stratagems that would make it easier to push their merchandise across the counter.[7] Changing the year on the title-page, as described above, allowed a printer, who was also a publisher, who was also and above all a bookseller, to pass mutton off as lamb, giving the impression that a book printed up to twenty-four, thirty-six or even forty-eight months ago, had come freshly off the presses. Returning to Giolito,


RIME
DI M. PIETRO
BEMBO.
TRATTE DAL PROPRIO
ORIGINAL DI LVI:
ALLE QVALI S'E AGGIVNTA VNA
tauola di tutte le desinenze sotto le lettere
uocali insieme co' uersi interi;
CON OGNI ACCVRATEZZA
corrette & riuedute per Thomaso Porcacchi.
IN VINEGIA APPRESSO GABRIEL
GIOLITO DE' FERRARI.
M D L X I X.
RIME
DI M. PIETRO
BEMBO.
TRATTE DAL PROPRIO
ORIGINAL DI LVI:
ALLE QVALI S'E AGGIVNTA VNA
tauola di tutte le desinenze sotto le lettere
uocali insieme co' uersi interi;
CON OGNI ACCVRATEZZA
corrette & riuedute per Thomaso Porcacchi.
3252
IN VINEGIA APPRESSO GABRIEL
GIOLITO DE' FERRARI.
M D L X X.

FIGURES 1 & 2 Two issues of Bembo's *Rime* with variant dates (1569 and 1570). (Florence, Biblioteca Nazionale Centrale)

who was extremely fond of manipulating dates in this fashion, in 1565 he issued a voluminous tome containing the translation into Italian of Dio Cassius. Not being unduly optimistic about its bestseller potential, the date on the title page was changed three times to read 1566, 1567 and 1568. In all events his pessimism was justified, since, after his death in 1578, his heirs, seeking to clear the warehouse, reissued the residual copies employing the same trick, because copies can be found with dates 1584, 1585 and 1586.[8]

A touch of artifice in presenting the information on a title-page could also signify changing the name and the mark of the printer/publisher. At times this took the form of a simple sharing: for instance, if we continue

to look at Giolito as a constant practitioner, his edition of Bede in 1543 was co-published with the heirs of his cousin Stagnino, so that the title-page variously reads 'Venetiis, apud Gabrielem Iolitum de Ferrariis, 1543' or 'Venetiis, sub signo sancti Bernardini, 1543', while the colophon, with even greater variety, has 'Venetiis, apud Gabrielem Iolitum de Ferrariis de Tridino Montisferrati, 1543', or 'Venetiis, sub signo sancti Bernardini, 1543', or 'Venetiis, apud Gabrielem Iolitum de Ferrariis de Tridino Montisferrati characteribus Bernardini Stagnini sibi accomodatis, 1543' (some copies have 'sibi concessis').[9] Two variants in the sheet containing the title page and four in the colophon, giving a total of eight potential combinations, might reduce a temperamentally inclined librarian or literary scholar to tears, but true bibliographers will be exhilarated rather than daunted by the prospect. At times the alterations were made on an even more impressive scale: the 1584 edition of the works in Latin of Saint Augustine was published in Venice in eleven volumes, each of which has six variants, rotating the names and marks of the consortium formed by Franceschi, Giunta, Sessa, Valgrisi and Zenaro (the latter obtained a further variant with the name of the bookshop at the 'sign of the fountain').[10] Again this sort of manipulation, infinitely small in typographical terms, can engender bibliographic and catalographic chaos unless we learn to see it for what it was, a rationale for marketing books, in which the cost of a large, expensive, slow-selling edition was split between six publishing outlets, each of which required a block of copies with their own name on the title-page.

What bibliographers call 'standing type' was an extremely rare phenomenon up to the eighteenth century,[11] which also saw the introduction of stereotyping. But accidents and miscalculations were commonplace, so that sheets which had been printed off were discovered to have omissions or errors that could only be remedied by resetting them *ab initio*. In more precise terms, when type was reset, five possible causes are usually at the root of the problem.[12]

1. A forme was broken up before the press-run was completed, probably because it was dropped while being taken off the press for correction or to make way for another more urgent piece of work. Instances are rare, though many certainly still have to be recognised, since only one of the formes used to print the sheet was involved and it was reset in exactly the same fashion.[13]
2. A shortfall took place in one or more sheets in the original press run. The printer therefore reset the sheet from the first state of the same

and, since an adequate number of copies were already available, the operation of integrating the missing sheets was performed when the printing shop had some slack on its hands, in some instances quite some time after the original impression.[14]

3. The print-run was increased after part of the edition had been run off. This decision meant that the printer had to go back and reset the previous gatherings in order to complete the total number of copies. Since in the sixteenth century preliminaries were often the last sheets to be printed, the resetting was thus concealed in the body of the book.[15]
4. A change was made to the text, either to improve a reading, to correct an error or, alternatively, to suppress something. Examples are legion.
5. Old sheets are reissued as new, as took place in 1584 with the already mentioned Giolito edition of Dio Cassius. This process involved substituting the entire title page, usually by reprinting the whole sheet, but in the Renaissance it can also involve the replacement or the elimination of a colophon. Examples again are too numerous to list.

The history of analytical bibliography in the course of the twentieth century has been largely about finding variants such as these and making sense of them.[16] Before we discuss Fingerprints proper and their application to the detection of variance, it is necessary to point out a fallacy common to all the systems shortly to be described. Quite simply, as has been explained above, since every forme used to print a book represents a distinct physical unit, unless we devise a control method capable of checking every single one of them, which would be impossible to apply, there is no guarantee that the Fingerprint will chance on the telling difference in an edition. It has to be seen therefore as a trip-wire or an alarm-bell, which plays on the likelihood that a printer seeking to manipulate the appearance of an edition will follow a certain typographical route, for instance changing the preliminaries of an edition.

Our bibliographical thinking always has to take account of the fact that the physical difference is still a sign that has to be interpreted and understood. To take a further Shakespearian parallel, as the drama in *Othello* moves towards its climax and as the hero's certainty of Desdemona's unfaithfulness grows, Othello torments himself with the symbols of his invisible cuckoldry, crying out that 'a horned man's a monster and a beast', to which Iago blandly replies that 'there's many a beast then in a populous city, / and many a civil monster' (IV, 1). The excruciating pun, quite

possibly the worst in the whole of English literature, encapsulates the dilemma of not a few bibliographers and cataloguers of printed artefacts: face to face with the faithlessness of the material object, we are all cuckolds, whether real or imaginary is up to how we interpret the evidence. In Shakespeare's story the hankerchief, given by him to Desdemona as a gift and stolen by Iago to implicate her, tells Othello that something is amiss: the material object is, so to speak, performing its appointed task; the hero's reading of the evidence, however, vitiated by Iago's malice, goes awry and thus precipitates the final tragedy. If bibliography is not to find itself in a similar bloody shambles, it has to ensure that material evidence and the signs pointing to that evidence are correctly interpreted.

An all too common complaint about Fingerprints, for instance, is that they do not tell the user what is happening. Of course they don't. They only tell you that something might be happening. An alarm will often go off for no apparent reason; it may be a breath of wind or the cat; but it may also be a six-foot masked intruder with a kalashnikov and evil intentions on your jewellery. When it goes off, the only safe policy is to get out of bed and look. When installing an alarm, only a fool does not recognise that a clever or a lucky burglar might nevertheless circumvent the system. This does not mean that the alarm is a failure; it simply means that no system is completely secure. The fact remains that a house protected by an alarm system will always be safer than a house without one.

A second deeper misapprehension relating to Fingerprints is that bibliographical investigation somehow requires them in order to uncover variant settings or to establish that two apparently different settings are in fact one and the same. Behind this misconception there may be a residue derived from claims made for such devices in the period when they were first experimented and introduced. Experience has since made it clear that fingerprints function in quite a different manner, though no wise researcher will neglect to keep an eye on the Fingerprint as a trip-wire that, if triggered, sometimes draws attention to fascinating bibliographical conundrums. Bibliographical analysis and description in fact has a series of thresholds: these go from the short-title format, in which only the most essential data is given and in which only the variants affecting the presentation of the edition receive mention, to a full-scale collation employing an optical collator, in which even minute differences, such as damage to type, are described.[17] If all published books were to undergo the same extensive bibliographical investigation as has been meted out to the Shakespeare *First Folio* of 1623, devices such as Fingerprints would be redundant. But

the truth is that expert bibliographers are few and far between (and miserably underpaid), that printed artefacts are widely dispersed, that libraries hold an enormous quantity of books, often in a damaged condition, that are poorly described or have not been described at all, and that the number of editions printed still awaiting investigation beggars all understanding. When we talk about Fingerprints therefore, the emphasis should not be on a be-all-and-end-all instrument, but on a very simple and even primitive finding and sorting tool.[18]

In any survey of the Fingerprint as a bibliographical instrument, the three main considerations have always been the universality of the application, the facility of understanding, and the rapidity with which it can be applied: in other words no system stands any chance of success unless it is easy to understand, quick to use and makes obvious sense. A Fingerprint therefore has a primary purpose: it has to act as a recognition code identifying a specific edition (or group of editions) without confusing it with others.[19] It has a double secondary purpose: it has either to *conjoin*, i.e. recognise that, though two books might appear different in terms of the date or the printer/publisher named on the title-page (and/or in the colophon), it is nonetheless the same edition; or it has to *separate*, i.e. distinguish two books, which ostensibly are the same, but which in their typographical settings are somehow divergent. For a Fingerprint to be efficacious, therefore, it has to perform these tasks and it also has to be able to express itself through a clear and unambiguous system of annotation. Experience of Fingerprints employed in on-line catalogues in recent years adds a further important requirement: it should be possible to use the Fingerprint, in whole or in part, as a short cut to finding a particular edition, without having recourse to other data.

When we talk about the need for the Fingerprint to be universal in its application, this also has to signify an instrument that works equally well in the hands of very different users. It is one thing for an individual bibliographer or for a small group of scholars, united in a circumscribed project, to conceive a method and a notation that suit their particular and private needs; it is quite another to produce a universal, all-purpose device, one which can be useful to specialists at one level and at another be employed by cataloguers, who have only a limited knowledge of the problems posed by the edition produced on the hand-press, but who nevertheless have to furnish a description of the book they have in front of them. In the first case both the method and the relative notation can be subtle, even arcane; in the second, the simpler the better.

As any inquiry into the history of Fingerprints rapidly establishes, two essential procedures and principles have been suggested over time, as follows:

1. *The placing of particular words, letters, or symbols on particular pages*. The earliest reference to such a usage, as a way of distinguishing different typographical settings, appears in 1893 in an article by the Oxford librarian and bibliographer, Falconer Madan, who suggests 'the mention of the first words of page 11 (and occasionally 101 or 501) to identify imperfect copies and to separate different issues'.[20] Two useful observations can be made in this context: first, on a purely practical level, Madan, who was aware of the cataloguing difficulties encountered in libraries over a century ago, also sees the device as a way of identifying damaged copies;[21] second, the fixed points suggested are all a certain distance into the body of the book: in the hypothesis of an edition with the structure A–Z^8 and paged from the beginning, p. 11 corresponds to f. A5^r,[22] while p. 101 falls on f. G3^r. In a later contribution of 1908, Madan suggested that 'for identification of imperfect copies, or varieties of editions [...] give the first (or last) two or three words of pp. 11, 111, 1111, or on signn. C1^r, Cc1^r.[23] Again it is worth emphasising how the recommended points are materially well inside the artefact and thus have a better chance of surviving in the event of a copy being damaged.

A couple of years later, in the bibliography of royal proclamations that forms the fifth volume of the *Bibliotheca Lindesiana*, Robert Steele provided the first practical example of a Fingerprint, albeit not under that name. His method consisted essentially in three/four fixed points: these were the last word of the first line of the text of the document; the word at the lower right-hand corner of the large initial woodcut letter, which is always included as the *incipit* of the text of the proclamation; the last word of the first line of the second leaf, if present; and the last word of the last complete line of the text, independently of the page on which it was to be found.[24] What is, in deference to its origin, termed 'Steele notation' has subsequently found its way into the electronic bibliography, conceived by Robin Alston and known originally as the *Eighteenth-century Short Title Catalogue* (ESTC), now subsumed into the much larger *English Short Title Catalogue* (which also enjoys the acronym ESTC). Steele's *modus operandi* is based of course on the fact that the documents concerned are often devoid of precise typographical information, though reliance can usually be placed on the date of the proclamation, and are also simple in

structure, since they consist for the most part in no more than a couple of leaves.[25] Although it chooses whole words rather than a fixed number of symbols, the method prefigures much in the subsequent LOC Fingerprint and the inventors of the latter system were certainly aware of this precursor.

Not mentioned in the critical debate so far, but certainly relevant, is the practice of the *Gesamtkatalog der Wiegendrucke* (GW), from the first volume published in 1925 up to the present day, of transcribing the first line of the second gathering in large books (and a suitable equivalent in shorter books), though the method itself is older and seems to go back to the catalogues drawn up around the turn of the century by Marie Pellechet. The bibliographical criterion, perhaps because judged obvious, has not received – to my knowledge – any discussion. This simple device is surprisingly effective, not only for identifying damaged copies, but also as a rudimentary sorting mechanism for editions reprinted on a line-by-line basis. Again it should be pointed out that the method derives from the experience of the scholars who conceived the project. Not only are incunabula generally lacking in title-pages and other paratextual paraphernalia, but when reprints are set in type there is a greater variety in the employment of abbreviations, even when a previous model is being closely followed. This method therefore, which works less well when applied to a later period (see the examples in the Appendix), is fully effective within the time-scale represented by the fifteenth-century book.

The final and best known stage in this particular application is the LOC Fingerprint, thought up by John Jolliffe (1930–85), as part of a pioneering automated cataloguing project. LOC stands for London-Oxford-Cambridge, which in the strange parlance of the English *STC* catalogue really signifies the British Library, the Bodleian Library and Cambridge University Library.[26] After a series of trials and experiments in the course of the seventies, a trilingual manual of instructions and a valuable selection of images with practical examples were published in 1984.[27] For those not familiar with the Fingerprint, its principal feature is that it consists of a sixteen-character set taken from four separate points in the book described. The *first* group is made up of the last two symbols, including punctuation, from the last line and the last two from the penultimate line of the first printed recto following the title-page. The *second* group is constructed in the same fashion, as far as the choice of symbols is concerned, and is taken from the fourth following recto, not counting any blank leaves. The *third* group follows the same principle in terms of its

construction and comes from the first recto numbered 13; if there is more than one such page, an arabic numeral prevails with respect to a roman one;[28] if there is no recto numbered 13, the choice falls on 17 (again with arabic prevailing over roman in the case of more than one sequence); if there is no recto numbered 13 or 17, or if the leaves/pages are unnumbered, the group is taken from the fourth recto following that provided by the second group. For the *fourth* group a variation is introduced, since it takes the *first* two letters from the last line and the *first* two from the penultimate line of the verso of the leaf/page used for the third group.[29] A series of subordinate rules prescribe solutions for situations where the layout of the page poses a complication, such as columns (always take the left-hand one), text surrounded by commentary, lines with only one symbol, symbols with abbreviations or not in the usual character set, and so on. Other rules govern situations such as very short texts, where the Fingerprint simply backs up, since, even with items printed on a single page, it is always necessary to fill in the whole sixteen-character set. The Fingerprint is completed with three other elements: a symbol placed in round brackets indicating the provenance of the third group (3 = 13, 7 = 17, C = counted), the date of the edition, and a further symbol, again in round brackets, indicating how that date is formulated in the book or has been arrived at (R = roman, A = arabic, are the most usual solutions).

What precisely happens therefore when a LOC Fingerprint is taken? Experience shows that it has a kind of scatter-gun effect and that the four groups tend to behave in quite different ways. Even though the groups are not linked to the signing system, as happens in other methods, it is unusual for all four groups to fall within the same gathering.[30] If we presume that a book has a structure of the kind a^8 A–Z^8 and that it is numbered by pages from A1 onwards, the groups providing the Fingerprint will be found on ff. $a2^r$, $a6^r$, $A7^r$, and $A7^v$; if the preliminaries are less than four leaves in extension, the second group shifts into the main body of the book. In terms of Renaissance publishing, when something happens, the preliminaries are usually altered by an insertion or a *cancellans*, while the main text is left unchanged: in the Fingerprint this shows up as a difference in the first group and sometimes in the second, whereas the third/fourth remain the same. Experienced users of the LOC Fingerprint will confirm that, when variance occurs within an edition, this is the commonest pattern.

The second method involves two slightly different procedures, which we shall treat separately.

2a. *The position of the whole signature with respect to the word above it*. Rather curiously, but perhaps not unsurprisingly, the genesis of this method can again be traced back to Falconer Madan, or at least he deserves the credit for being the first to mention it in print. In the already cited 1908 article, after describing the fixed word method, he continues: 'It may be noted that the readiest method of distinguishing a reprint from a reissue, is to note the exact position of the signatures on a few pages in relation to the letters of the text immediately above them. A re-printer never adheres precisely to the usage of the original edition'.[31] In 1975, in the introduction to his *English verse, 1701–1750*, David Foxon described his own particular bibliographical method in the following terms:

> Soon afterwards I heard Fredson Bowers read a paper to the Bibliographical Society on his bibliography of the Restoration drama, in which he described his technique of comparing as many copies as possible of each edition with a control copy on microfilm. The points that impressed me most were the number of unrecorded variants, issues and even editions which could be found only by personal examination of multiple copies, and his argument that the more copies a bibliographer has examined, the more safely can his descriptions be condensed. It became clear to me that though my catalogue could not provide full bibliographical descriptions, any attempt to produce a reliable work must involve seeing as many copies as possible myself and not relying on published catalogues or other second-hand sources. As a check against concealed editions, reset sheets, and reissues I decided to adopt Falconer Madan's practice of recording the position of signature letters relative to the text above them, a method of identification I had already come to trust and one which was far cheaper and easier than the use of microfilm. Needless to say, it cannot provide the precision of Bowers' technique, and the user of this catalogue will soon become irritated by the frequency of notes like 'apparently a reimpression' or 'sheet apparently reset' which are based on the evidence of the signatures.[32]

While Foxon modestly described his work as 'not a descriptive bibliography but a short-title catalogue with frills', there is no doubt that it had a certain influence on contemporary descriptive practice and theory, especially among those unwilling to adhere to the Bowers paradigm. From our point of view it is important to emphasise that it is the work of a single scholar, in full control of his material and with ample opportunities to check copies in different libraries. His catalogue does not, however, furnish the readings obtained from the books described, so the all-important question of finding an adequate system of notation remained unresolved.[33]

Foxon's basic method was taken up and transformed into a notation instead in a significant cataloguing enterprise, begun in the 1970s as the

Short Title Catalogue of the Netherlands (STCN) or the Dutch retrospective bibliography for the period 1540–1800. Author of the adaptation, some time around 1971, was the bibliographer and father of the project, Johan Gerritsen; it was revised by the editors of the STCN to take account of computer-based cataloguing in 1982, while a summary of the method and the basic rules were published in English in 1986.[34] The project rests on a collaboration between institutions, coordinated by the Koninklijke Bibliotheek in The Hague, comprised within a small geographical area and able to call on the services of a team of expert cataloguers. In terms of numbers, in 2006, the file contained some 130,000 titles. The criteria of the STCN catalogue are applied also in a smaller, sister project, the *Short Title Catalogus Vlaanderen* (STCV), which describes the seventeenth-century books printed in Flanders and which in 2006 had reached a total of some 5,500 editions.

Essentially the STCN Fingerprint works as follows. Each group is formed by transcribing the letters immediately above particular signatures, including punctuation and spaces between words (rendered with a dollar sign [$]). The signatures used are the first and the last of separately signed preliminary, principal and postliminary material: this has the consequence that the number of groups can be as high as six and as low as one, though by far the commonest options are four and two. The groups of the Fingerprint are preceded by a code which gives the year and the format of the book (i.e. 150104, signifies a quarto printed in 1501).

In terms of assessing this device as a working tool, several of the observations made above about the distribution of the groups in the LOC Fingerprint hold true also for the STCN one. The most important selection differences are, first, that the distinction between the preliminaries and the main body of the book is made more precise and, second, that at least one group comes from the end of the book. On the other hand, short texts, texts with a single printed signature, and texts without printed signatures, such as proclamations, clearly pose a problem if this method is to work on a universal basis. The solution for books without signatures consists in transcribing the text in the penultimate line placed above the prepenultimate word in the last line; but there is just a touch of desperation in the suggestion, which is not without risks. Not only can uncertainty exist about what precisely defines a word (the placing of hyphens in vernacular texts often poses ambiguities), but there is also the danger of the third word from the end of the line turning out to be a Latin superlative and thus being too long for comfort.

2b. *The position of the first letter of the signature with respect to the word above it*. Employing the same basic principle as Foxon and the STCN Fingerprint, but referring exclusively to the position of the first symbol in the signature with reference in the line above it, are some solutions practised by individual scholars. In 1965 William B. Todd published an article describing the history of the eighteenth-century English periodical, *The Gentleman's Magazine*.[35] The bibliographical problem was caused by the success of the journal, which meant that the early issues had to be reprinted several times, either from standing type, or from a new composition. In order to allow scholars to distinguish between the different settings, Todd transcribed the word above the first signature in each gathering, italicising the letter directly above the first letter in the signature. Again some observations are necessary. The system is proposed in the context of an in-depth bibliographical research derived from the examination of multiple copies and is not proposed as a way of finding variant settings, since Todd's descriptions are already based on a considerable amount of data and observations not included in the text of the article. Since the variant readings are known, any ambiguities in the notation – for instance, signatures that chance to fall in the same position – can be clarified by further explanation. With respect to the functions of the Fingerprint defined above, Todd's method consists primarily in a shorthand reporting notation rather than in a finding device.

Much the same procedure reappears in the published and ongoing research of Douglas Osler, who is a bibliographer specialising in the history of European legal imprints at the Max Planck Institut für Europäische Rechtsgeschichte in Frankfurt. In an article of 1999, unfortunately published in an obscure set of Italian conference acts, Osler furnishes an accurate and intelligent, if strongly polemical, survey of extant Fingerprint methods.[36] He contests both the effectiveness of the LOC Fingerprint, especially where it has to distinguish between one or more close resettings, and the abstruse character of the notation required by the STCN Fingerprint. He baptises his alternative method as the 'Bibliographical Profile'. It consists in indicating the position of the first character in the signature, separated by means of two diagonal slashes, underneath a word in the last line. The groups chosen are the first and last of separately signed preliminaries (also of postliminaries, if present) and the first signature of the first two and of the last two gatherings in the main sequence. The number of groups can rise therefore to at least eight in the case of a large and complex book. No suggestions are made about how to deal with short texts and

texts devoid of signatures: this disinterest probably reflects the bulky character of most legal writings and the fact that small items do not play a significant role in Osler's bibliographical project. Since the *magnum opus* still has to appear, it has not yet been possible to see the method in operation on a large scale, but a sample is provided by a recent short-title listing of a collection of legal imprints in Florence.[37] As far as evaluating the method goes, one obvious advantage is that it is not dauntingly bibliographical. When some specialist curators were asked to take the 'Bibliographical Profile' for books that had been seen for this research, but for which this device had not been noted, a couple of them remarked on the simplicity of the method with respect to other Fingerprints.

At this point in our survey we have three rival and distinct propositions, which collectively sound more like a headache than an effective way of cataloguing books. Rather than wasting time in abstract pros and cons, a better idea of the working of each system can be gathered by seeing them applied to real items. Let us start with a relatively unproblematic case: the edition of the *Morgante* by Luigi Pulci published in Venice by Comin da Trino in 1550 (the colophon has the same date). There are copies of the same book with 1551 on the title-page, so we have the trivial, but delightful, bibliographical pursuit of establishing whether this is yet another case of an Italian printer modifying the date while the forme concerned is going through the press. The edition is in a quarto format and has a collational formula *–2*^{8} A–2A^{8} 2B^{6}.[38] In both versions the LOC Fingerprint reads:

meer .13. e.e, VlGl (3) 1550 [or 1551] (R).

The groups come from ff. *2^{r}, *6^{r}, A7$^{r/v}$, so both the preliminaries and the body of the book are being verified. The total length of the Fingerprint is 23 characters. The STCN Fingerprint reads:

155004 - a1 *2 $8.col : a2 2*4 $ - b1 A1 e : b2 2B3 e$parte.

This might sound like gibberish, or just Dutch, but it makes perfectly good bibliographical sense. After the year and the format (with a possible variant 155104, due to the change of the date on the title-page), the hyphen introduces the first indicator (a1) with a reading taken from f. *2^{r}; it is followed by a punctuation sign (: [colon]) and by the second indicator (a2), giving the last signed preliminary, which falls at f. 2*4^{r} (which happens to be a space between two words, rendered with the dollar sign [$]); the third (b1) and fourth (b2) indicators fall respectively at ff. A1^{r} and

at 2B3^{r} (in the latter the final full stop is part of the reading). The STCN Fingerprint convincingly establishes what was already a strong suspicion on the basis of the LOC Fingerprint, i.e. that the two versions represent no more than an infinitesimal alteration of state on the title page. It is nearly twice as long and contains 42 characters. The 'Bibliographical Profile' employs six groups to describe this book and reads:

*2 car./ /8 2*4 car./ 1/26 A fron/te/. B2 co/no/sca 2A2 f/ue/. 2B2 past/o/re.

This requires relatively little comment or interpretation, apart from a note about the fact that, since the text is in verse, quite often a signature does not have a word above it and therefore, in three instances, the reading has not been taken from the first leaf in the gathering.[39] While this shows the flexibility of the system on the one hand, on the other it could lead to divergences in the selection of the group. Whatever the choice, the outcome is lengthy, with a total transcription of 64 characters.

It should by now be obvious that the principal source of strength, and also of weakness, of the STCN Fingerprint and, to an even greater extent, of the 'Bibliographical Profile', is that both have been conceived in terms of a dominant purpose, i.e. to separate editions reset on a line-by-line basis and, less frequently, to draw attention to the fact that different states or issues belong to the same edition. Let us therefore see them in action with a test case that has already caused embarrassment to Italian bibliography. Early in 1526 Pietro Bembo angrily complained that his *Prose della volgar lingua*, published only the previous September, had been pirated by another, unknown publisher. The whole matter remained mysterious until 1976, when the piracy was first identified.[40] There is no question that this sixteenth-century counterfeit is a skilful piece of deception, good enough to deceive an EDIT16 still in its teething phase, which in the letter 'B', published in 1989 (the first real volume of the project, since the letter 'A' issued in 1985 had a provisional status and was republished in 1990), failed to distinguish the piracy from the original edition.[41] This setback rested very much on the inability of the LOC Fingerprint to separate two very similar typographical settings. It seems only just and proper therefore to unleash other methods on the problem: here for instance are the original and the counterfeit as rendered by the STCN Fingerprint:

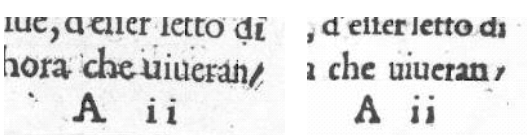
Original: 152502 – b1 A2 che$ui : b2 Q3 PVN
Counterfeit: 152502 – b1 A2 e$uiu : b2 Q3 PVN

And here they are according to the 'Bibliographical Profile':

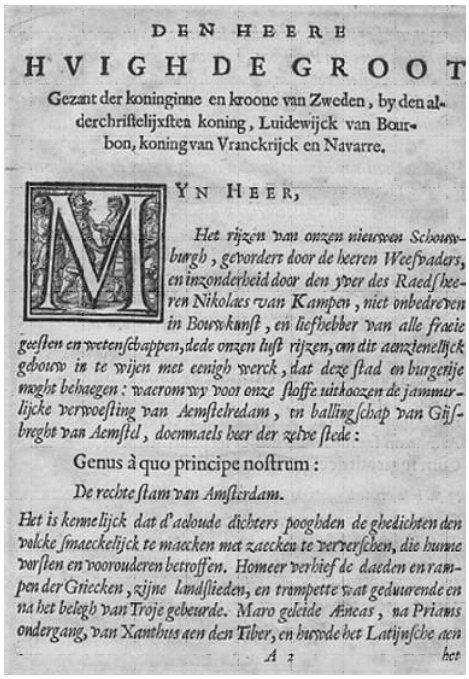
Original: A2 /c/he B qual/ /tempo P lum/e/ Q eti/an/do
Counterfeit: A2 ch/e/ B q/ua/l P lume/ t/ene Q / et/iando

When the two opening signatures are placed side by side, the difference between the two settings is obvious even to untrained eyes [Figs 3–4]. To all intents and purposes this case demonstrates the superiority of signature-position methods, at least in circumstances such as these, though it does also draw attention to a weakness in the STCN procedure. Any bibliographer reading the above would not conclude that these are necessarily two different editions, since the second group, that taken from f. Q3*r*, is the same in both cases. It of course often happens that, when an edition is reset on a line-by-line basis, especially if the intent is to counterfeit an original, the signatures fall in the same position. If we take the Bembo piracy as an example in this sense, scrutiny of the edition as a whole shows that in 10% of instances the signature is in exactly the same position and in another 30% it is very close, enough in some cases to give the same reading. For the STCN Fingerprint to take only two groups constitutes therefore, as Douglas Osler has duly pointed out, an element of risk and does not guarantee a safe outcome.[42]

The second problem with using a system based on the signature is nicely exemplified by an illustration on the STCN website, explaining their Fingerprint, which provides an example from a 1637 edition of Vondel. The text accompanying the illustration states that the reading is ',$en', since 'the letter r before the comma and the space after "en" are not entirely above A2, and are therefore left out' [Fig. 5]. Is it? to my eye the 'A' of the signature is covering the final 'r' in the word 'Tiber' (and therefore the reading should be 'r,$en'). Is it? isn't it? does it really matter? The point is that in this situation some people will do one thing (include the 'r') and some will do another (leave it out).[43] Again random tests on sixteenth-century books suggest that this dilemma is going to raise its ugly head in



FIGURES 3 & 4 Signature position in the first edition and a counterfeit edition of Bembo's *Prose* (1526). (Udine, Biblioteca Civica, and Reggia Emilia, Biblioteca Panizzi)



DEN HEERE

HVIGH DE GROOT

Gezant der koninginne en kroone van Zweden, by den alderchriſtelijxſten koning, Luidewijck van Bourbon, koning van Vranckrijck en Navarre.

MYN HEER,

Het rijzen van onzen nieuwen Schouwburgh, gevordert door de heeren Weefvaders, en inzonderheid door den yver des Raedſheeren Nikolaes van Kampen, niet onbedreven in Bouwkunſt, en liefhebber van alle fraeie geeſten en wetenſchappen, dede onzen luſt rijzen, om dit aenzienelijck gebouw in te wijen met eenigh werck, dat deze ſtad en burgerije moght behaegen: waerom wy voor onze ſtoffe uithoozen de jammerlijcke verwoeſting van Aemſtelredam, in balling ſchap van Gijſbreght van Aemſtel, doenmaels heer der zelve ſtede:

Genus à quo principe noſtrum:

De rechte ſtam van Amſterdam.

Het is kennelijck dat d'aeloude dichters pooghden de ghedichten den volcke ſmaeckelijck te maecken met zaecken te verwerſchen, die hunne vorſten en voorouderen betroffen. Homeer verhief de daeden en trampen der Griecken, zijne landſlieden, en trompette wat gedurende en na het belegh van Troje gebeurde. Maro geleide Æneas, na Priams ondergang, van Xanthus aen den Tiber, en huwde het Latijnſche aen

A 2 het

FIGURE 5 Signature position on A2[r] in Vondel, *Gysbreght van Amstel*, 1637. (STCN website)

some 5–10% of cases.[44] I also noticed that in my own trials, admittedly as a bumbling novice, of the STCN Fingerprint, readings quite often changed slightly when I went back to the book a second time or looked at another copy. In a controlled bibliographical environment, such as the STCN project, which explicitly follows the rule that, if there is the slightest doubt, leave it out, it is possible to reduce subjectivity to a minimum; in a freer environment, such as the Italian census, which depends a great deal on the contribution of relatively unskilled cataloguers in remote centres, or in any large collective catalogue without a controlling hub (such as OCLC, the French CCFR, or the Italian SBN *Libro Antico*), subjectivity runs amok, as the experience of the LOC Fingerprint has duly and dutifully shown.

Any and every evaluation of the Fingerprint, any Fingerprint, has therefore to draw not on what is exceptional, but on what is average. Returning

therefore to the issue of a systematic comparison between opposing methods, a test was conducted on the progress of a single text over a period of a hundred years, from the beginning of the sixteenth to the beginning of the seventeenth century. In the first instance the choice was a wholly random one, dictated by having available a short-title listing of the editions of the *Morgante*, constructed for other reasons, so that it became possible to hit a maximum number of birds with a minimum number of stones.[45] A secondary reason, one looking for a worst case scenario, did however insinuate itself: since Pulci's poem is written in octaves, the rigidity imposed on the page lay-out by the verse structure, together with the limited possibilities existing in Italian for final syllables in rhyme, made it probable that the LOC Fingerprint would perform badly and that the STCN Fingerprint would do well. Twenty-five editions of the text are known to be extant between 1502 and 1606, though others were certainly printed and have been entirely lost. The full listing appears in the Appendix: it includes for each edition, as well as the basic physical structure (format, cartulation or pagination, collational formula), the first line of the second gathering of the text (as in GW), the LOC Fingerprint, the STCN Fingerprint, the 'Bibliographical Profile', and, where I have seen the book myself, idiosyncracies in the type-setting (or 'Earmarks').

The heart of the comparison naturally rests on the LOC and STCN Fingerprints, so here is a summary of the results obtained. Where the reading is identical to that found in another edition, it is highlighted in italics.

LOC: ioio toto nono egse (3) 1502 (R)	STCN: 150208 - b1 A2 ghie : b2 &4 ebil$
LOC: ioio toto toto acac (C) 1507 (R).	STCN: 150708 - b1 A2 inghi : b2 &4 lebil$c
LOC: e.te e:ce o.to ilin (C) 1508 (R).	STCN: 150804 - b1 a2 ce$e. : b2 [rum]4 ti$ti
LOC: o.do dodo toto ioOr (C) 1510 (Q).	STCN: 151004 - b1 A2 con$lei. : b2 2B5 di$R
LOC: tete ree. o.to ilin (C) 1515 (R).	STCN: 151504 - b1 a2 ice. : b2 [rum]4 electi
LOC: tete e:e: toto acac (C) 1517 (R).	STCN: 151708 - b1 a2 l$feli : b2 [cum]4 $pulci
LOC: tete rara riri dier (C) 1518 (R).	STCN: 150804 - b1 a2 ta$pe : b2 u5 do$l
LOC: a.a: o.o: a.za MaDa (C) 1521 (R).	STCN: 152104 - b1 A2 e,o$c : b2 2B2 ta:e$ic
LOC: tete rere toto acac (C) 1522 (R)	STCN: 152208 - b1 a2 iel$fel : b2 [cum]4: de$pu
LOC: tete rere toto acac (C) 1525 (A)	STCN: 152508 - b1 A2 $felice : b2 2B4 use$del$pul
LOC: tete e,re o.o, vnta (C) 1530 (A)	STCN: 153008 - b1 A2 el$felic : b2 2A4 fiorita
LOC: tete i,ni nana Brre (3) 1530 (R)	STCN: 153008 - b1 A2 e$ve : b2 2B4 [signed 2B2] arti
LOC: a,a, o.o, a.a, mada (C) 1532 (R)	*STCN*: 153204 - b1 A2 red : *b2 2B2 asuapa*
LOC: e.te coe- a.ea L'Ve (3) 1534 (R)	STCN: 153408 - b1 A2 ritta$p : b2 2B2 $l'altrasi
LOC: o.io e.re o.to vnta (C) 1537 (R)	STCN: 153708 - b1 A2 ciel$fe : b2 2A4 l$suo$Mart
LOC: a,a, o.o, a.a, mada (C) 1539 (R)	*STCN*: 153904 - b1 A2 e,o$cre : *b2 2B2 a$sua$pa*
LOC: tete nini nana Brre (3) 1541 (R)	STCN: 154108 - b1 A2 onne : b2 [cum]4 $tore
LOC: l-la a.a; i.ri ChDi (3) 1545 (R)	STCN: 154504 - b1 A2 one$del : b2 2B4 hebe.
LOC: uera i.i, o.o. TuDi (3) 1546 (R)	STCN: 154604 - a1 *2 on$tut - b1 A1 n : b2 2B4 ,$e$fede.
LOC: tete nini tete epsi (C) 1549 (R)	STCN: 154908 - b1 A2 e$ver : b2 [cum]4 e$Dio

LOC: meer .13. e.e, VlGl (3) 1550 (R)	STCN: 155004 - a1 *2 $8.col - a2 2*4 $: b1 A1 e : 2B3 e$parte.
LOC: a.a, moo, a.za mada (C) 1552 (R)	STCN: 155204 - b1 A2 ce,o$c : b2 2B2 suapa
LOC: tete nini tete epsi (C) 1560 (Q)	STCN: 156008 - b1 A2 e$verr : b2 [cum]2 ia$fed
LOC: e,ta 70Me 0.0, EmMo (3) 1574 (R)	STCN: 157404 - a1 +2 suo$: a2 +4 ista$ - b1 A1 $: b2 2B2 $.
LOC: e,n- 70Me 0.to EmMo (3) 1606 (R)	STCN: 160604 - a1 *2 otti : a2 *4 [signed +4] alista. - b1 A1 $: b2 2B2 eo$.

In all honesty the sterling performance of the LOC Fingerprint, in a test deliberately weighted against it, was something of a surprise. On three occasions it gives pairs of identical readings, but otherwise it separates the editions into manageable units. As was predictable, STCN did a better job on the whole, although in one case the second group is the same. Obviously the 'Bibliographical Profile', as can be seen from the Appendix, was entirely successful in distinguishing the different settings.

We seem to be heading towards a univocal solution, one in which the 'Bibliographical Profile' is going to be by *force majeure* and public acclamation recommended for universal adoption. I have a troubling suspicion, however, that this conclusion will not have experienced early-book practitioners dancing for joy in the aisles. The reasons are obvious: on average it is twice as long and twice as cumbersome as the STCN Fingerprint and some three to four times longer than the LOC Fingerprint;[46] it requires careful transcription and, where the position of the symbol is uncertain, no two cataloguers are going to render it consistently in the same fashion. Is this outcome so very necessary? Experience teaches that look-alike editions form a small percentage of total book output and that they are best dealt with through traditional bibliographical inquiry. The easiest way to tell the counterfeit edition of Bembo's *Prose* from the original is to look at the colophon: in the genuine *princeps* the last two words read 'le stampino', while the pirate reprint has an erroneous 'la stampino'. This last difference is what I call – with thanks to Paul Needham, who has suggested this useful term[47] – an 'Earmark', i.e. an idiosyncratic difference, in this case an error in the text, that clearly distinguishes two different typographical settings. It is a simple enough task for the two editions of the *Prose* to compile a list of Earmarks that distinguish them apart. The principal characteristic of an Earmark is that the variants have to be known and based on careful comparison, i.e. it is a pure descriptor: this fact obviously separates it with respect to the trip-wire principle which lies at the heart of the Fingerprint.

For all its virtues, the 'Bibliographical Profile' is akin to going out always with an umbrella, even on a fine day. Of course an unexpected

thunderstorm might blow up and catch one unawares, so that proponents of the umbrella-ever-with-one theorem can have the vicarious satisfaction of sometimes being right, but for most of the time it is an encumbrance. As has already been remarked, when we employ a Fingerprint, whatever the system, we should always bear in mind the difference between *finding* and *reporting*. The true function of a Fingerprint is to discover, it is not to describe. Of course, if a group of the Fingerprint serves also as an agile shorthand for separating divergent settings, all the better, but to some extent this signifies that it is undergoing a metamorphosis into an Earmark. The simple truth is that there are always going to be cases in which the inherently mechanical nature of the Fingerprint fails to distinguish. This percentage of failure needs to be built into the system and indeed failure is a something of a misnomer. All that is necessary, in awkward cases, after appropriate analysis, is to introduce a further distinction in the form of an Earmark. From this point of view the 'Bibliographical Profile' provides a very convenient notation and its wider adoption could be urged for this reason. The proviso is of course that this would nevertheless regard a small number of difficult instances, in which bibliographical research has established that a problem exists and is seeking a means to communicate it.

If any long-suffering reader, especially one truly practised in handling the LOC Fingerprint, has endured so far in this article, rather than just slamming the volume down on the table and turning on the TV, it is to be presumed that, far from being convinced, they are probably seething with rage at the devious, underhand manner in which I have skipped around the most important issue. Similar displays of obtuse irrelevance have, however, been typical of much of the critical debate surrounding Jolliffe's brainchild, ever since it first appeared, so that, having to some extent explored the misconceptions lurking in the undergrowth, we can turn the whole question on its head in a final triumphal coda, or even *fandango*.

The fundamental characteristic of the LOC Fingerprint is that it was conceived for exploitation in an electronic environment. This fact may be banal or obvious, but for the most part it is so banal and so very obvious that most critics have failed to notice it or to appreciate its innate significance, since it is not an optional extra but an absolute value. The Procrustean bed formed by the sixteen-character grid and by the rules dictating what those symbols are going to be are governed by the circumstance that no computer can think for itself and therefore all subjective elements have to be ruled out. When we remember that this instrument was thought up

some thirty years ago, when the few computers available were primitive, expensive, inefficient monsters, it reveals – to my mind – the extraordinarily prescient quality of its construction.

If we look at the history of the LOC Fingerprint, today it is almost forgotten in its country of origin, although – a bit like Margaret Thatcher – nothing better has taken its place. Its failure to catch on, after initial enthusiasm, owes more perhaps to the atmosphere of cutbacks and cost-paring characteristic of that era than to rational bibliographical considerations, but its fortunes were certainly not helped by John Jolliffe's sad and untimely death in March 1985. Its most significant setback had come a few years earlier, with the decision not to include it in the entries being drawn up by the British Library for the ESTC, although, rather inconsistently, the same project was willing to take extant examples of Steele notation on board.[48] This defeat led to its gradual abandonment in other libraries, including its main British promoter, the National Library of Scotland, and subsequently to its disappearance from analogous French projects. Whether one feels that these decisions were wrong or right, it should be pointed out that no cataloguing project in the English-speaking world has made provision for an alternative method, with the consequence that virtually all descriptions of artefacts printed on the hand-press now available, for instance in the COPAC network, offer little more than a transcription of the title-page and some, often inadequate, structural indications.

History is not written by the vanquished and the LOC Fingerprint came near to extinction. Indeed it would have disappeared entirely or been remembered only as a strange and somewhat premature experiment, were it not for another event that took place. The publication in 1981 of the sixth and final volume of the Italian *Indice Generale degli Incunaboli* (IGI), of which the first had appeared in 1943, freed the ICCU in Rome, at the time directed by Angela Vinay, to tackle the problem of the oft-announced and long-awaited census of the country's sixteenth-century books. The obstacles faced by the central Italian bibliographical agency have been enumerated on other occasions, so we can summarise them here as too many books, too many small collections, too few large collections, and too little expertise. An additional problem was represented by the fact that most of the largest holdings of Italian books of the period are not to be found in Italy, especially if we consider the Vatican as another country, where things are done very differently. The wide dispersion of artefacts meant that, unlike the parallel and slightly earlier German project, the

VD16, which concentrated primarily on the holdings of two exceptional collections, Munich and Wolfenbüttel, the Italians were constrained to pay attention to minor libraries, many of them holding rare and sometimes unique items. Just to provide a thumb-nail sketch of the technical situation, it has recently been estimated on the basis of the Pollard and Redgrave STC catalogue that, in a count of sixteenth-century English books, the British Library holds approximately 60% of the total, rising to almost 80% if the Bodleian is also taken into consideration; a similar calculation applied to Italian books in Italy, based on the first two printed volumes of the EDIT16, suggests that the country's two principal collections, the National Central Libraries of Florence and Rome, each hold about 25% of known extant output; combined they reach a little over 40% (according to its *Short-title catalogue of Italian books*, published in 1958 and updated in 1986, the British Library possesses something closer to 35% of the same). Into the bargain, only about fifteen thousand books are recorded as printed in the British Isles in the sixteenth century: a total which is more or less equalled by the first three letters of the Italian census, so the sheer number of items to be dealt with is much, much higher.[49]

Angela Vinay was that rare combination in any field of learning of a visionary endowed with a robust sense of practical matters and the plan she conceived fully expressed her character.[50] It had two basic parameters: it had to include as many libraries as possible (participation was and still is on a voluntary basis: the initial total was 550, it has now risen to 1350) and it was going to be computerised. What certainly caught Vinay's attention was Jolliffe's plan to conduct the LOC project with staff trained in recording Fingerprints but untrained in everything else. In a preliminary phase of this scheme only Fingerprints would have been taken and matched up with those in the database. Once found, the relevant records were to be compared with the books in question and, once the identity of the editions had been determined, a location could be added to the Fingerprint or a new record created, if necessary. Though, after much planning, the LOC project fell by the wayside, Jolliffe's basic idea was applied to the Italian census, with a series of modifications to take account of the high number of libraries involved. In a preliminary phase, on a letter-by-letter basis, descriptions were extracted from extant published sources and a number of libraries catalogued their holdings of the said letters in order to furnish a skeleton listing. The resulting print-out was posted to all the libraries in the project, who checked their own holdings, marked on the print-out the books they owned,[51] and sent it back to the ICCU. In the larger collections

items not registered in the print-out were described and sent for insertion in the data base; for smaller ones, without a trained cataloguer *in loco*, alternative solutions were found. If one looks at the cataloguing manual drawn up at the time for the census,[52] much of the volume is taken up with the instructions relating to the Fingerprint, while in the subsequent published entries the device dominates the description of the physical book, to the extent that, together with the abbreviations for the libraries owning copies, it sometimes seems as if the tail is wagging the dog. Even today, few people seem to realise how courageous, far seeing and far reaching that decision was.[53]

Over the course of a quarter of a century the EDIT16 – nowadays splendidly directed by Claudia Leoncini, who has been with the project from the beginning – has stuck to its guns. The census, which continues to expand at a steady rate, stands at some 56,000 records, corresponding, if we take account of variant states and issues, to well over 50,000 editions. It is difficult to say how many books this represents, since multiple copies are commonplace in Italian libraries[54] and the census does not track these, but something in the order of half a million appears a reasonable estimate. The success of the LOC Fingerprint in EDIT16 meant that from the beginning it was also employed in the sister *Libro Antico* project launched by the Servizio Bibliotecario Nazionale (SBN, to some extent the ICCU under another name and also conceived by Angela Vinay). This huge online catalogue includes both Italian and foreign books from the sixteenth up to the nineteenth century (with 1830 given as a rough cut-off date). SBN *Libro Antico* operates on the basis of a complex sharing, swapping, and sometimes squabbling relationship with EDIT16, so far as the two mandates overlap, and scholars are therefore advised to check both sources when seeking information about a specific edition. In 2006 SBN *Libro Antico* comprised some 550,000 records: duplicate entries are commoner than in EDIT16, but this figure corresponds probably to half a million editions and represents some 1,300,000 copies. Virtually all the records in EDIT16 include the LOC Fingerprint (or will have it added as soon as possible), as do the vast majority of those in SBN *Libro Antico*. The positive results enjoyed in these two large-scale national projects means that in the interim the LOC Fingerprint has been employed in numerous local networks, such as the Tuscan *Libri Antichi In Toscana* (LAIT), and in several hundred published catalogues and other forms of scholarship, referring above all to the holdings of minor libraries.[55] Outside Italy it is now being used in the German VD17 project.

This survey of what is really happening allows us to answer better some of the recurrent objections to the LOC Fingerprint, for instance the frequency with which mistakes are made.[56] In several of the critical discussions the question of human error has been made to loom large, but in reality it has two distinct aspects. Mistakes do not occur because the basic principles of the Fingerprint are wrongly conceived or are difficult. As Jolliffe was fond of saying, these can be written on a postage stamp and cover well over 90% of instances, so that habitual cataloguers rarely, if ever, need to make reference to the manual.[57] Mistakes occur, when they occur, because the LOC Fingerprint is an all-purpose device and some early-printed artefacts are extraordinarily intricate. What on the other hand most experienced Italian cataloguers, especially those used to working with EDIT16 and SBN at their fingertips, will readily admit is that Fingerprint errors often prove to be 'transparent'. In other words, even though a mistake might have been made, it is easy for someone with the book in hand to see what has happened and thus not to be misled. On one occasion, a number of years ago, a rare edition of Petrarch printed in Venice by Lazzaro de' Soardi in 1511 was checked against an unrecorded copy. The description available in EDIT16 had been provided by a minor collection and, in part due to the awkwardness of the *civilité* typeface, in part due to failure to read the manual properly on the part of the person who drew up the entry, seven of the sixteen characters in the Fingerprint were wrong. Nevertheless there was no doubt that it was the same book and the same settings of type. This first answer partially anticipates the second: the geography and the history of Italian libraries, especially in the EDIT16 project, often mean that there has not been a choice between expert cataloguers and inexpert cataloguers; it has been a choice between inexpert cataloguers or no cataloguers at all. From this point of view a higher percentage of error, than that which would occur in a project concentrated on a small number of collections with expert personnel, as in the STCN catalogue, is an acceptable price to pay. What other participants in CERL have certainly noticed is how in the sphere of the early-printed book, under the aegis of EDIT16 and similar projects, Italy has gone from being a backward province to a world leader.

In March 2000 EDIT16 went online, allowing users to explore the whole archive, even in a very unfinished state. It also meant that it was possible for an external user to exploit the LOC Fingerprint in the electronic setting for which it was originally conceived. Though SBN *Libro Antico* from its inception has allowed Fingerprint searching to be conducted, it

only provides a single field for this operation, so any hunting for a particular group finds a large amount of clutter. EDIT16 deploys a much cleverer interface, in which searching is conducted on the basis of specific groups, making the instrument more precise. Skilled (or, more simply, like myself, lazy) users swiftly learnt to summon up known books by inserting one or more groups of the Fingerprint and nothing else. For instance, if I type in the first group 'meer', four entries appear, all with this same set of letters in this one group; if however I add the second group '.13.', the only entry to appear is that for the *Morgante* of 1550 (or 1551) described above.[58]

As in all electronic media, searching through the Fingerprint produces a certain amount of 'noise', but useful noise. It can be helpful for a researcher to discover that a series of editions of the same text share the same, or much the same Fingerprint, showing that they were all set on a line-by-line basis. Much criticism of the LOC Fingerprint has nevertheless focused on this fact, without trying to assess the real proportions of the problem. A test was therefore conducted on what I term my personal 'Penelope's web', or the catalogue of books in the library of San Gimignano, so called because every time it is nearly finished we start all over again.[59] It is a typical, if remarkable, Tuscan hill town with thirteen medieval towers, 7400 inhabitants, millions of tourists, 1600 sixteenth-century books and 32 incunables. It is therefore a reasonable sample of what a cataloguer encounters in a library of this sort. In the autumn of 2005 the Fingerprints in our catalogue were verified against those of EDIT16. The search was conducted with the *first* and the *fourth* groups separately, totalling the number of hits and subsequently comparing the Fingerprint in its entirety. Part of the collection was excluded for one reason or another: foreign books, books with Greek or other characters the search engine does not recognise, short documents such as *bandi*, books not yet in EDIT16 or not yet provided with a Fingerprint, and also, where more than one Fingerprint was included in the description – i.e. for books in two or more parts – only one, usually the first, was tested. The final total was just under a thousand checks (984 to be precise) and, therefore, with respect to the 56,000 records in the data base, something less than 2% of the whole was verified. Obviously a systematic cross-check uncovered discrepancies, obliging us to look at the book in San Gimignano again. In some cases a mistake had been made, which was corrected; in others we became aware of a variant state of the edition; and in others still the check discovered a transparent error in the EDIT16 description, especially for the newer entries in the latter half of the

alphabet, to which the attention of the ICCU was duly drawn. Once the chaff had been winnowed out in this fashion, the outcome was as follows.

NUMBER OF HITS	1	2	3	4	5	6	7	8	9	10	11
1 gr.	146	128	73	72	54	38	39	28	15	29	18
4 gr.	139	126	87	76	66	51	45	32	23	41	24
All	848	99	24	10	2		1				

NUMBER OF HITS	12	13	14	15	16	17	18	19	20	20+	
1 gr.	11	14	14	21	12	12	14	12	12	224	
4 gr.	25	19	12	15	11	21	7	9	10	146	
All											

Like the chessboard of the Chinese emperor, employing a basic character set of some fifty symbols (the search engine, as yet, does not distinguish upper and lower case), a single group of the Fingerprint in theory offers more than six million possible combinations. Obviously these are much reduced by the conventions of language and of spelling, so that certain groupings occur with a greater frequency. In terms of finding a specific target, using the first or fourth group on its own, in 15% of hits the one edition concerned came up; if two groups were used together (typing in a whole Fingerprint for a search is a waste of effort), a single hit was obtained 86% of the time. As far as the problem of recognising 'texts' in a typographical setting goes, the significance of this result for anyone contemplating harnessing the LOC Fingerprint to a large-scale cataloguing project hardly requires comment. Especially when allied to a sophisticated interface, such as that provided by EDIT16, in terms of its primary function – that of *finding* – the device is economical, rapid and effective. Since the four groups are autonomous, a miss on one, for whatever reason, simply means that a search can be done with another, something that is an absolute boon for anyone seeking to recognise a damaged or incomplete book, whose identity as a text is not known.

What however about the 137 instances in the above sample of 984 editions, so 14%, in which the fingerprint, even compared in its entirety, produced more than one hit: in 99 cases two; in 24 three, in 10 four, in 2 five, and in 1 seven? Is this, in the words of Douglas Osler, a 'catastrophic

failure'? On analysis one can hardly agree, since most prove to be variants. With the necessary proviso that, while considerable efforts have been made to establish the truth about these editions, including checks in libraries holding further copies, some of these entries may conceal as yet unfathomed complexities, the break-down appears as follows.

SAME EDITION	
Change of date on the title page or in the colophon	40
Change of date on the title page or in the colophon and reissue with further variant states[60]	1
Change in the name of the publisher on the title page or in the colophon	31
Change in the title in course of printing	1
Collective / separate issues	7
Reissue	4
Other variants within the edition	2
TOTAL	86
DIFFERENT EDITIONS	
Two editions	32
Two editions with changes in the date or in the name of the publisher	7
Three editions	6
TOTAL	45
DUPLICATE ENTRIES	6
TOTAL	137

In 45 cases therefore the Fingerprint is the same for two or more editions.

If we accept that this is a representative sample of a collection of extant sixteenth-century books, it puts the difficulties posed by line-by-line reprints in this period in a less worrying perspective, since it involves less than 5% of our total sample.[61] As has been noticed, the two other systems evaluated here, the STCN Fingerprint and the Bibliographical Profile, have both been conceived with this problem as their overriding concern. In order to absolve the task of separating look-alike editions, however, these devices sacrifice not only the brevity and speed of the LOC Fingerprint, but also its ability to recognise groups of editions as the same text. Is it so difficult therefore to envisage employing the LOC Fingerprint at a primary level as a sorting device, with the further option, in one case in ten

or twenty, of employing an Earmark at a secondary level in order to distinguish two or more look-alike editions? As has been implied or stated over and over again in this article, and therefore it is useful to state again, the final analysis of different or seemingly different settings of type can only be conducted by direct comparison. No matter how sophisticated a Fingerprint happens to be, at the end of the day it has to be deemed untrustworthy, unless it is backed up by other procedures. We have therefore to learn to use Fingerprints not just wisely, but also well.

Having summoned the spectre of computer friendliness from the deepest abyss, some assessment of the STCN Fingerprint's electronic workability appears only fair and just. Though it has not been possible to carry out a trial on a sample of books as above, two factors do seem to limit its effectiveness, especially when it is compared to the LOC Fingerprint. First, as has been mentioned, there is an element of subjectivity in way readings are taken, whereas computers notoriously dislike variables. Anyone searching for a particular edition on the basis of the Fingerprint may therefore have to try different combinations in order to bring up the desired entry. Second, the individual groups are not of a fixed number of symbols, which again impairs the efficiency of the search mechanism. It quite often occurs that groups are formed of only one character, so that the prospect of searching a large database on this basis is not a gratifying one. At the other extreme, especially where the final signature in a large book is concerned, groups can contain as many as 8–10 symbols (including the dollar sign which marks a space). Again, in the context of geographically-delimited, high-quality bibliographical projects such as STCN and STCV, these difficulties can be kept under control; but they pose a question about the applicability of the STCN Fingerprint in large-scale, more open projects, in which the quality of the work is inevitably going to oscillate.

As a final remark, in matters of computer friendliness, the situation of the Bibliographical Profile can be defined in relatively few words: it ain't, it can't and it won't.

At this juncture a conclusion becomes desirable and, as in the children's game, it is Paper, Scissors, Stone, where none of the three objects prevails over the others. There is no *best* system or, rather, *best* is defined by empirical factors and by the nature of the problem to be tackled. The decision about what Fingerprint should be employed rests on a sliding scale or, if you prefer, it is akin to buying a motor-car. The LOC Fingerprint is an all-terrain vehicle, such as a four-by-four, which will do the

basic job, which can go just about anywhere, but which has limits at the top end of the scale. The STCN Fingerprint is a high-quality saloon car, which will always get you where you want with precision and comfort, as long as you do not ask it to do things it was not intended to do. The 'Bibliographical Profile' is best compared to an expensive sports car: it performs one task in an exceptional fashion, but otherwise is costly in terms of the daily commuter run. To have all three in the garage would be nice, but perhaps extravagant, so at some point we may have to choose, after a careful comparison of their respective performances and capabilities. Overleaf therefore is a table, extended to include Steele notation, the GW procedure and Earmarks, which travesties the Michelin system by awarding one to five stars (where the criterion is not relevant, no stars are awarded).

What recommendations for the future, if any, can be made on the basis of such a past? If the present paper (and thus the present writer) sits on the fence, at least as far as choosing between systems goes, it is firmly convinced that Fingerprints are here to stay and that they should be consistently adopted in the cataloguing of rare books in libraries. It also wishes to break a lance on the windmill-like snootiness of some unnamed and unnameable early-book specialists in the English-speaking world, who shrug Fingerprints off as a Continental eccentricity. Totalling the various projects described here, the number of hand-press books, counted as editions, to which a Fingerprint has been applied, is over three-quarters of a million and rising steadily. Not to know how to write a Fingerprint in order to communicate information and, worse, not to know how to read a Fingerprint in order to understand information implies therefore serious deficiencies in professional preparation.

History is full of inventions moreover that were developed for one purpose and ended up being used in a slightly different way or in quite a different way altogether. One recent example is the drug Viagra, which was originally developed to improve blood circulation; researchers only discovered its amatory uses when the men, to whom it had been given for clinical trials, asked if they could keep the pills. To some extent this paper is about wanting to keep the pills, since, though Fingerprints were conceived in the eighties by scholars thinking that they could also be deployed to find textual differences, which has happened, but not on the scale anticipated, they have revealed unexpected strengths as sorting mechanisms and as means for navigating through very large data bases. The use

	Steele Notation	Transcription of the 1st line of the 2nd gathering (GW)	LOC	STCN	Bibliographical Profile	Earmark
Brevity (number of characters in the transcription)	***	**	*****	****	**	
Computer friendliness	*	*	*****	***	*	
Number of points checked	**	*	***	**	****	*****
Time required for compilation	***	***	*****	****	***	
Ability to recognise variants in date or in the name of the publisher belonging to the same edition	**	**	****	****/*	*****	*****
Ability to distinguish between two editions reset line-by-line	*	*	**	****	*****	*****
Ability to describe short texts or texts without signings	*****		*****	***	**	****
Ability to find variants in the preliminary gathering	***		****	****	****	
Clarity of basic principles	****	*****	****	****	***	
Absence of subjective factors	****	*****	*****	***	**	
Universality of the application	***	**	*****	***	**	*****
Completeness of the manual and of the instructions	*		****	**	**	

we make of them in the future will have to explore these possibilities in greater depth.

One useful project, that CERL would be the ideal organisation to undertake, would be to revise and bring together the rules regarding both the LOC and the STCN Fingerprints, also with a view to obtaining their formal recognition as international standards on the part of the IFLA and

other organisations. Serious scholars of bibliography are not going to worry about having more than one Fingerprint standard on hand, as long as it is possible to find out what each one signifies. The availability of texts specifying the rules for the different systems today represents something of a problem: the 1984 English-French-Italian manual for the LOC Fingerprint has long been out of print, while non-Dutch speakers seeking delucidation about the STCN Fingerprint have to look up an article of 1986 (nowadays available on-line). Neither situation can be considered satisfactory. Above all it is necessary to take the whole Fingerprint question out of the limbo to which it has been consigned, at least as far as the critical discussion in the English-speaking world is concerned. We have to accept that, as with Kipling's tribal lays, there can be more than one way of constructing Fingerprints and that a plurality of systems, instead of an embarrassment, could prove to be a richness.*

* From its inception this research owes a considerable debt of gratitude to Brian Hillyard of the National Library of Scotland, who has provided much information about the background of the LOC Fingerprint and alerted me to the existence of earlier prototypes. I am also grateful to Jan Bos, editor of the STCN Catalogue, for his advice and comments. Thanks are also due for information and opinions to Robin Alston, Claudia Leoncini, Paul Needham, Douglas Osler, Nicolas Petit, David Shaw and Marina Venier. I wish to thank for carrying out checks on my behalf: Helen Carron of Emmanuel College Library, Cambridge, Luisa Corsa of the Biblioteca Nazionale Marciana, Martine Lefèvre of the Bibliothèque de l'Arsenal, Anna Manfron of the Biblioteca Comunale dell'Archiginnasio, Stephen Parkin of the British Library, Nicolas Petit of the Bibliothèque Nationale de France, Lucia Sardo of the Biblioteca della Fondazione Cini, and Francesca Tamburlini of the Biblioteca Civica 'Vincenzo Joppi'. For the right to reproduce images I thank the Biblioteca Riccardiana, the Biblioteca Nazionale Centrale di Firenze, the Ministero per i Beni e le Attività Culturali, the Panizzi Library in Reggio Emilia, the Biblioteca Civica 'Vincenzo Joppi' and the STCN Catalogue.

NOTES

1. F. Bowers, 'Purposes of descriptive bibliography, with some remarks on methods', *The Library*, s. v, 8 (1953), pp. 1–22: 10, repr. in F. Bowers, *Essays on bibliography, text and editing*, Charlottesville, 1975, pp. 111–134. See also the discussion in G. T. Tanselle, 'The recording of American books and the British bibliographical tradition' [1985], in G. T. Tanselle, *Literature and artifacts*, Charlottesville, 1998, pp. 157–185: 177.
2. This comparison is not going, however, to treat a number of important Fingerprint-related issues, such as their recognition as international standards. Furthermore, for reasons of space and of personal competence, it is not going

to look at the inclusion and function of Fingerprints in a MARC format, nor at their workings inside the CERL database, where the files not only come from a myriad of different cataloguing sources, but also apply different criteria to Fingerprints, so that, where included, they can be found in half a dozen different fields.

3. Much of this discussion, invariably without any attempt to compare alternative procedures, has centred on the Italian census of sixteenth-century books conducted by the Istituto Centrale per il Catalogo Unico (ICCU) in Rome, of which more is said below. The published version, with the title *Edizioni italiane del XVI secolo* (commonly abbreviated as EDIT16), comprises in the principal sequence five volumes, covering letters A (1985 provisional version, republished 1991), B (1989), Ca–Ch (1993), Ch–Cz (1996), and D (2005). Volumes describing printed music were issued as a separate listing, first in 1994 (A–C) and again, for the whole alphabet, in 1999. The online version, accessible from March 2000 on the site of the Italian Servizio Bibliotecario Nazionale (SBN) site, lists entries in a single sequence with the abbreviation CNCE (Censimento Nazionale Cinquecentine: Edizioni). The launch of the project in the early eighties was celebrated by an international seminar *Libri antichi e catalogazione. Metodologie e esperienze*. Atti del seminario di Roma, 23–25 settembre 1981, a cura di C. Leoncini e R. M. Servello, Roma 1984, which contains a brief paper on the LOC Fingerprint by the French scholar, Edith Bayle (*L'Empreinte et son utilisation*, pp. 84–85). In 2006, twenty-five years of the project were reviewed in a further seminar: *Il libro italiano del XVI secolo: conferme e novità in Edit16*, of which the acts will be published in the not too distant future, including a paper by myself that, among other things, looks at a specific instance of Fingerprint use and abuse (see note 12 below). My own connection with EDIT16 began with a review of the first volume in *The Library* (s. VI, 9, 1987, pp. 181–184), but I have made frequent references to the peculiar character of Italian libraries, as well as to the distribution of early Italian printed books in global terms, in a series of introductions to catalogues. Since these writings, as far as the present essay goes, contain a certain amount of *déjà vu* and *déjà dit*, for the convenience of the reader, I list them as follows: 'Appunti per una logica del catalogo delle cinquecentine', in Biblioteca Panizzi, *Le cinquecentine della Biblioteca Panizzi*. Catalogo, a cura di E. Zanzanelli–V. Prattisoli, Reggio Emilia, 1995, pp. xi–xxiv; 'Appunti per un'esperienza di catalogo', in *Le cinquecentine della Biblioteca Medicea Laurenziana di Firenze*, a cura di S. Centi, Roma, 2002, pp. xi–xvi; 'Il cappuccino, la principessa e la botte', in A. Grassi–G. Laurentini, *Incunaboli e cinquecentine delle biblioteche dei Cappuccini di Toscana*, Firenze, 2003, pp. 7–39; 'Il vivo Mattia Pascal', in *Catalogo degli incunaboli e delle cinquecentine della Biblioteca Comunale di San Gimignano*, a cura di N. Harris, San Gimignano, in print, II, pp. 11–27 (an abbreviated version has also appeared in *Biblioteche oggi*, XXIII, n. 2, marzo 2005, pp. 35–43). Significant references to the EDIT16 also appear in: 'Biblia, ovvero l'ottimismo bibliografico', *La Bibliofilìa*, 103 (2001), pp. 181–200.
4. The use made of the LOC Fingerprint in EDIT16 has been strongly criticised by Enrico Garavelli, many of whose observations on individual cases are

interesting, but whose approach, as well as betraying a strong bias, contains several contradictions. In particular he writes: 'Non intendo, ovviamente, pronunciarmi sull'utilità dell'impronta in biblioteca per l'identificazione e la schedatura di un libro, o ai fini della compilazione di un catalogo a stampa o di una bibliografia, questioni che sono già state oggetto in passato di accese discussioni da parte degli specialisti; le domande che mi propongo di affrontare in questo lavoro riguardano semplicemente la possibilità di utilizzare con qualche profitto i dati forniti dall'impronta nel contesto di un'operazione filologica, nell'accezione più vasta del termine' ('Appunti sull'«impronta»: catene di edizioni, riproduzioni facsimilari, apografi', *Aevum*, 70, 1996, pp. 625–636: 626). Though claims were certainly made for the Fingerprint as a device capable of uncovering textual variants when it first appeared (but part of this, as I say here, may have consisted in 'salesmanship'), most scholars nowadays would consider the question outmoded, so much of Garavelli's reasoning consists, as Italians say, in the *scoperta dell'acqua calda*. On the other hand, if his purpose is to assess the Fingerprint as a textual instrument, one wonders why his examples are drawn extensively and exclusively from the Italian census, which just happens to be a catalogue. Replies to some of Garavelli's observations have been made by Rosaria Campioni ('Osservatore da un altro pianeta: Conor Fahy e il censimento delle edizioni italiane del XVI secolo', in *Bibliografia testuale o filologia dei testi a stampa? Definizioni metodologiche e prospettive future*. Convegno di studi in onore di Conor Fahy. Udine, 24–25–26 febbraio 1997, a cura di N. Harris, Udine, 1999, pp. 205–211) and by myself, first in a web text *Analytical bibliography: an alternative prospectus*, published on the site of the Institut d'histoire du livre in Lyon (http://ihl.enssib.fr), which was first issued in 2002 and extensively revised in 2004, as well as in 'Il cappuccino, la principessa e la botte'. One of the principal promoters of Garavelli's original article, Edoardo Barbieri, has recently come to his defence, in the introduction to the three-volume *Incunaboli e cinquecentine della Fondazione Biblioteca S. Bernardino di Trento*. Catalogo, a cura di C. Fedele e A. Gonzo, Trento, 2004. Although his remarks contain nothing new from a technical point of view, Barbieri takes the opportunity to launch an attack on Italian cataloguing and Italian librarianship in a wider sense, when he writes that 'il vero problema della catalogazione, sono i catalogatori: chi abbia qualche esperienza in giro per l'Italia sa quante volte ci si imbatte in bibliotecari, anche generosamente attaccati al patrimonio antico della loro biblioteca, assolutamente impreparati anche solo a rilevare la fascicolatura di un volume. Allora il vero problema è che, anziché preoccuparsi della formazione adeguata di personale adatto alla catalogazione del patrimonio antico, si è preferito percorrere la strada, all'apparenza più facile e meno onerosa, della proposta, come soluzione del problema dell'impronta, una panacea che avrebbe dovuto, sotto l'ombra protettiva delle "magnifiche sorti e progressive" dell'informatica, risolvere tutti i problemi. Ora ci si accorge che non è vero' (1, p. xxvi). If the ICCU had taken this path, it is certain that the census would never have got off the ground. Barbieri's strictures constitute, to my mind, a serious misrepresentation of much that has happened in Italy over the past twenty-five years, where the census has acted as a precursor of the

ongoing electronic revolution. While the launch of the EDIT16 was akin to jumping in the deep end without knowing how to swim, today the only legitimate judgement on the project is not only that it is an extraordinary success, but also that it has proved a fundamental learning experience, as is shown by the large number of catalogues to have appeared in recent years as 'spin-offs' of the initiative. Apart from the purposeless display of technophobia, few of the other arguments advanced here stand up to serious scrutiny. For instance, while no one will disagree that a collational formula (I presume that this is what is meant by the term 'fascicolatura') is an important descriptive element, to ask a cataloguer, working often on the basis of a single copy, to include it is to open a can of worms besides which the Fingerprint pales into insignificance. As Fredson Bowers made crystal clear many years ago, most early printed artefacts are simple to describe, a few are awkward, and a very few are downright impossible (F. Bowers, *Principles of bibliographical description*, Princeton, 1949, p. 38). When such difficulties arise, they invariably involve some complexity in the collational formula and can be resolved only through diligent study of multiple copies in different libraries, as for instance happens to be the case for the first book printed at San Gimignano, the *De cardinalatu* of Paolo Cortesi in 1510, where the physical structure can only be described as nightmarish (see S. Centi-N. Harris, 'Per il *De cardinalatu* di Paolo Cortesi: la copia "ideale", gli esemplari e i messaggi occulti', in *Catalogo degli incunaboli e delle cinquecentine della Biblioteca Comunale di San Gimignano*, II, pp. 29–50). In the presence of line-by-line reprints, collational *formulae* are also of little help in distinguishing between editions, since the reprint almost invariably reproduces the structure and signatures of its model. The list of the editions of the *Morgante* available in the Appendix clearly shows that variations are more common in the Fingerprints than in the collational formulae.

5. D. McKitterick, *Print, manuscript and the search for order, 1450–1830*, Cambridge, 2003, p. 189, shows how this situation changed in the eighteenth century, when, for example, proofs were sent from London to the philosopher David Hume, living in Edinburgh. Even if the swiftest postal systems of the age were used, the round journey still required the printing shop to keep the same formes standing for a period measured in days rather than in hours.

6. EDIT16 B-1260, CNCE 5076 (1569); B-1263, CNCE 5079 (1570). The printed version also lists an edition of 1568 (B-1259): this is however a ghost in which a copy of the earlier edition of 1562 (with variants 1563 and 1564) has been retouched in manuscript.

7. See N. Harris, 'Nicolò Garanta editore a Venezia 1525–1530', *La Bibliofilìa*, 97 (1995), pp. 99–148.

8. See the remarks by S. Bongi, *Annali di Gabriel Giolito de' Ferrari da Trino di Monferrato stampatore in Venezia*, Roma, 1890–97, II, pp. 204–205; EDIT16 D-1737 to 1740 (original issue), D-1741 to 1743 (reissue); CNCE 17208 (1565), 17209 (1566), 17210 (1567), 17212 (1584), 17213 (1585), 17214 (1586).

9. Bongi, *Annali di Gabriel Giolito*, I, p. 47, does not draw attention to the existence of variant states, but the case is illustrated in Harris, 'Il cappuccino,

la principessa e la botte', pp. 31–32, with images of the variant colophons (figg. 13–17). See also EDIT16 B-967 to 969; CNCE 4785, 4786, 4784.

10. See Harris, 'Il cappuccino, la principessa e la botte', pp. 33–34, who also reproduces the six variant title-pages for the first volume of the edition (figg. 5-10); CNCE 3445 ([al segno della Fontana]), 3446 (Zenaro), 3447 (Franceschi), 3448 (Sessa), 3449 (Varisco), 3450 (Giunta).

11. Standing type involved formes that had been set and printed off, but were not immediately distributed, being kept intact for a longer period of time. See the article by W. B. Todd cited below at note 35.

12. Not included in this listing, though there would be ample reason for doing so, are variants created by the folding or the placing of sheets of paper within an edition. Since the hand-press book was always made up of distinct sheets, it often happens that copies are typographically identical but structurally diverse, because the constituent parts have been assembled in a different fashion. When this was due to an error on the part of the binder, no account needs to be taken of the fact in the bibliographical description, apart from a note in the area dedicated to the characteristics of the copy; when however there is a genuine ambiguity in the structure of the book, more than one solution becomes possible. One example is provided by the *De institutione reipublicae libri nouem* by Francesco Patrizi, published in Paris by Galeot Du Pré in 1518: the book is in a folio format and contains in some copies a single leaf with a dedication by Jean Savigny dated 22 November 1518. The placing of this leaf is left to the whim of the binder, but unless a cataloguer is careful about the fact, the LOC Fingerprint can change significantly. Just to give an example, while the Fingerprint for the book, which does not take account of this sheet, reads: n-o, i.ex t,li grEr (3) 1518 (T), placing it, quite reasonably, after the title-page, gives: rii-i.As t,li grEr (3) 1518 (T). Another instance is provided by the *Tractatus de irregularitatibus* by Paolo Borgasio, published in Venice in 1574, which contains 56 unnumbered pages of index, signed a–g4. In EDIT16 the Fingerprint is given as: o-um 840. erne esci (3) and the paging as: [64], 460 p. (EDIT16 B-3225; CNCE 7085); in the SBN *Libro Antico* network, based on a copy in the Biblioteca Nazionale Centrale di Roma, it appears as: o-um tau- erne esci (3) 1574 (R) and the paging as: [8], 460, [56] p. It does not require a special bibliographical genius to understand that the gatherings containing the index in one case have been placed at the beginning of the book and in another at the end. Garavelli, 'Appunti sull'«impronta»', p. 627, cites a further instance described in a book by Marielisa Rossi, involving an edition published at Treviso in 1598, in which a gathering containing the index has a variety of positions, so that the Fingerprint 'genera codici differenti, proponendo come apparentemente diversi due esemplari della medesima edizione'. Again one wonders why this should be taken as a proof of the unreliability of the device, since surely it is performing its appointed task by drawing attention to the presence of an anomaly, but Garavelli's *parti* is very much *pris*. When an edition seems to present numerous variant forms, what can also occur is that expert bibliographical analysis determines that one situation is 'right' and others are

'wrong', as is the case, for instance, with the *Vaticinia* of Girolamo Giovannini published in Venice in 1600, where the various copies furnish divergent Fingerprints, of which only one can be deemed correct, see N. Harris, 'L'ammiraglio, il cane e i *Vaticinia*', in *Il libro italiano del XVI secolo*, in print. Without labouring the matter, it should be noted that it took an examination of some ten copies in different libraries, before the key detail – a variant state in a *cancellans* sheet introduced in the preliminaries – was noticed, making it possible to understand what the printer intended to do and thus what the configuration of the 'ideal copy' should be.

13. One interesting example involves the inner forme of sheet A in the *Dialogo contra i poeti* by Francesco Berni in 1526, see Anne Reynolds, 'The earliest editions of *Dialogo contra i poeti* by Francesco Berni (1497–1535)', *Bulletin du bibliophile*, 1996, pp. 341–360, and her critical edition of the same text (New York, 1997). An example can also be found in the 1546–47 edition of the *Orlando Innamorato*, where in the sixth book of the continuation by Nicolò degli Agostini the whole outer forme of gathering y has been reset; cfr. N. Harris, *Bibliografia dell'«Orlando Innamorato»*, Modena, 1988–91, I, p. 173.

14. B. S. Vamey, 'Luca Pacioli's *Scuola perfetta*: a bibliographical puzzle', *Gutenberg Jahrbuch*, 1974, pp. 110–116; N. Harris, 'Nine reset sheets in the Aldine *Hypnerotomachia Poliphili* (1499)', *Gutenberg Jahrbuch*, 2006, pp. 245–275.

15. One well known example is the Gutenberg Bible, in which the first gatherings exist in two different settings; another is the first edition of the *Divina Commedia* printed at Foligno in 1472, see E. Casamassima, *La prima edizione della Divina Commedia: Foligno 1472*, Milano, 1972, which does not however provide an sufficiently precise analysis of the typographical situation. Another instance is provided by the first volume of the works of Saint Bonaventure printed in Rome in 1588–96, where only the last two gatherings, containing the index and the colophon with date 1596 come from the same setting of type, see Harris, 'Il cappuccino, la principessa e la botte', pp. 36–39. See also the example of the Roman *Catechismus* of 1566 described below in note 42 below.

16. P. Needham, 'The 1462 Bible of Johann Fust and Peter Schöffer (GW 4204). A survey of its variants', *Gutenberg Jahrbuch*, 2006, pp. 19–49: 42: 'It is a commonplace among bibliographers that any two copies of a given printed book may differ typographically and therefore textually. One might almost, even, define bibliographers as being that set of people who know this is the case, and why'.

17. An excellent history of optical collators is now available in S. E. Smith, '"The eternal verities verified": Charlton Hinman and the roots of mechanical collation', *Studies in bibliography*, 53 (2000), pp. 129–161; and, '"Armadillos of invention": A census of mechanical collators', *Studies in bibliography*, 55 (2002), pp. 133–170.

18. The LOC Fingerprint has been employed in a number of purely bibliographic projects, in particular by J.-F. Gilmont, *Bibliographie des editions de Jean Crespin, 1550–1572*, Verviers, 1981, and by J. Jolliffe, *Draft bibliography of Lausanne and Morges imprints 1550–1600*, Oxford, 1981. While Jolliffe's choice of the technique

requires no explanation, it is interesting to note that, in recent years, Gilmont has expressed reserves about its utility, writing that 'Après avoir été parmi les premiers à l'utiliser dans la bibliographie de Crespin, je doute aujourd'hui de l'intérêt de l'empreinte. Il aurait fallu que la collaboration tentée par les initiateurs du système suscite plus d'échos. Seule l'élaboration d'une base de données accumulant les empreintes par centaines de milliers aurait pu rendre la technique efficace' (*Le livre & ses secrets*, Genève – Louvain-la-Neuve, 2003, p. 121). This statement implies, however, that the author has not observed the scale of the Fingerprint presence in the Italian EDIT16 and SBN *Libro Antico* catalogues. Some years later the LOC Fingerprint was deployed within my *Bibliografia dell'«Orlando innamorato»*, as well as in successive articles of descriptive bibliography (see, for example, 'Nicolò Garanta', 1995), albeit with an important distinction. For reasons stated above, i.e. a Fingerprint cannot guarantee that it will find all, or even any, of the variant settings in an edition, I do not believe that these devices serve any fundamental purpose where in-depth bibliographical analysis is applied. Their inclusion on the other hand represents an act of courtesy with respect to anybody drawing up a description for other purposes, since it also implies that the readings given by the Fingerprint have been checked against multiple copies. It is a self-evident consequence that, where the Fingerprint is affected by a divergent setting and throws up a variant reading, a bibliographer has the solemn duty not only to record the difference, but also to explain the physical and typographical reasons for the existence of the same.

19. For the concept of 'edition' (and the subordinate concepts of 'issue' and 'state'), the best exposition remains the second chapter in Bowers, *Principles of bibliographical description*, pp. 37–113. Readers familiar with Italian can find an excellent discussion also in C. Fahy, 'Edizione, impressione, emissione, stato', in his, *Saggi di bibliografia testuale*, Padova, 1988, pp. 65–88.

20. F. Madan, 'On method in bibliography', *Transactions of the Bibliographical Society*, 1 (1893), pp. 91–106: 96. On the figure of Madan (1851–1935), see R. J. Roberts in the *Oxford Dictionary of National Biography*, 36, Oxford, 2004, pp. 56–57.

21. This same point is indicated, on the part of an expert and highly practised cataloguer, as one of the most helpful services provided by the LOC Fingerprint, see Z. Zanardi, 'Criteri di compilazione', in *Bibliotheca Franciscana: gli incunaboli e le cinquecentine dei frati minori dell'Emilia-Romagna conservate presso il Convento dell'Osservanza di Bologna*, a cura di Z. Zanardi, Firenze, 1999, p. xxviii.

22. It is just worth pointing out that in the LOC Fingerprint (see below), the second group would come from this very same page: i.e. in a book with this structure and this paging, the four groups required by this device would be taken on pp. 3, 11, 13 and 14.

23. F. Madan, 'Degressive bibliography', *Transactions of the Bibliographical Society*, 9 (1908), pp. 53–65: 59. See also his, 'The duplicity of duplicates', *Transactions*, 12 (1914), pp. 15–20.

24. *Bibliotheca Lindesiana. Vol. V. A bibliography of royal proclamations of the Tudor and Stuart sovereigns and of others published under authority, 1485–1714, with a historical essay on their origin and use*, Oxford, 1910–13, I, pp. xxxiii–xxxiv. Since the placing of the words remains approximate, the method is not wholly effective: for instance nn. 1697–98, recognised as separate editions on the basis of the coat-of-arms, both give the same reading, i.e. 'attend same departeth'.

25. Recent examples of Italian catalogues, in which the LOC Fingerprint is applied to similar small-scale documents are: G. Bertoli, *Leggi e bandi del periodo mediceo posseduti dalla Biblioteca Nazionale Centrale di Firenze*, Firenze, 1992, and *Bononia manifesta: catalogo dei bandi, editti, costituzioni e provvedimenti diversi, stampati nel XVI secolo per Bologna e il suo territorio*, a cura di Z. Zanardi, Firenze, 1996.

26. For the English *STC*, see: *A short-title catalogue of books printed in England, Scotland & Ireland and of English books printed abroad 1475–1640*, compiled by A. W. Pollard and G. R. Redgrave, London, 1926. The second edition, revised and enlarged, begun by W. A. Jackson and F. S. Ferguson, completed by Katharine F. Pantzer, is in three volumes (1976–91). As the introduction diligently explains: 'In the entries the Atlantic Ocean is represented by a semicolon. Up to five locations on each side have been listed with a view to geographical distribution. The prime British locations are: L, O, C, D, E; and the American F, HN, HD, N, NY. In STC geography Australian and New Zealand libraries appear on the American side' (2nd ed., vol. I, p. xlix). The five privileged British symbols stand for the British Library, the Bodleian Library, Cambridge University Library, Trinity College, Dublin, and the National Library of Scotland; the American ones for the Folger Shakespeare Library, the Huntington Library, Harvard University (Houghton Library), the Newberry Library, and New York Public Library. The acronym thus derives from this bibliographical habit, though it appears impenetrable to users not familiar with this marvellous repertory.

27. As Brian Hillyard explains in a paper in this same volume, Jolliffe experimented at length with different versions of the Fingerprint, while a four-character version was recommended by John Feather, see *Tests on the use of the 'Fingerprint' in library catalogues: a report submitted to the British Library Research and Development Department*, Oxford, 1977. The decision in favour of the actual sixteen-symbol grid seems to have been influenced by the input of French researchers, especially Edith Bayle of the Institut de Recherche et Histoire des Textes (IRHT), which forms part of the larger Centre National de la Recherche Scientifique; for an up-to-date French viewpoint, see the entry by Jean-François Maillard, in *Dictionnaire encyclopédique du livre*, II, Paris, 2005, pp. 50–51. In particular the IRHT took upon itself, with the collaboration of the NLS, the publication of the 1984 trilingual manual *Fingerprints, Empreintes, Impronte*, which has proved the main vehicle for the diffusion of knowledge about the LOC Fingerprint and which includes, in the second part, a very useful set of examples illustrating problem cases. A German version appeared in 1992 (*Fingerprints. Regeln und Beispiele*, Berlin, 1992) and the text has also

been translated into other languages. A newsletter was issued in two numbers under the aegis of the IRHT: *Nouvelles des empreintes*, nn. 1 (1981), 2 (1985); a third number was added in 1994 by the ICCU in Rome. Information about the Fingerprint can also be found in the newsletter *Il corsivo*, produced by the ICCU to accompany the census: first series, 1–6 (1982–88), second series, 1–3 (1991–99).

28. Since the practice of numbering preliminaries in roman and the main body of the text in arabic crept in towards the end of the sixteenth century, this has the practical consequence of ensuring that in most cases the third/fourth groups are taken from a leaf in the main body of the publication.

29. This rule ensures that, except where half-sheet imposition is being used, the Fingerprint checks both the inner and outer formes of a determined sheet.

30. In theory, in the case of a book with a structure A–Z^8 and paged from the beginning, the Fingerprint would fall on pp. 3, 11, 13, and 14, or $A2^r$, $A6^r$, $A7^r$, and $A7^v$, but in fact Renaissance books with such a structure are not common. By the time pagination began to substitute cartulation on a large scale in the second half of the sixteenth century, the majority of books were being published with at least one gathering of preliminaries. From this point of view it is worth remembering that Jolliffe was a specialist of French printed books of this same period and, not surprisingly, this is material with which the LOC Fingerprint seems to work particularly well.

31. Madan, 'Degressive bibliography', p. 59. This remark is cited as 'a very useful suggestion' in D. F. Foxon, *Thoughts on the history and future of bibliographical description*, Los Angeles–Berkeley, 1970, p. 18.

32. D. F. Foxon, *English verse 1701–1750. A catalogue of separately printed poems with notes on contemporary collected editions*, Cambridge, 1975, p. vii. On the figure of this librarian and bibliographer (1923–2001), see J. McLaverty, 'David Foxon. Humanist bibliographer', *Studies in bibliography*, 54 (2001), pp. 81–113. The Bowers lecture referred to was 'Purposes of descriptive bibliography', 1953. In it Bowers describes how, in the preparation of his bibliography of Restoration drama, he travelled with a library of microfilms, which served as control copies: 'Every copy of every play which I record is compared page by page against my control microfilm by checking its salient typographical features to ensure that the typesetting of each page is the same as in my control and that it is printed from the same imposition. [...] This method of comparison is not only, curiously, faster than the conventional way of comparing copies against one's notes, but it is to the highest degree more accurate. I need hardly say that in this process I have been able to discover reimpositions, partial resettings, new closely reprinted editions, and miscellaneous variants to an astonishing number and to an extent which, according to my experience, would have proved impossible by any other method' (pp. 5–6). In a note he adds: 'As for speed, with practice ones learns quickly to flick one's eye down the page, comparing the copy in one's hand against the film image for identical alignment and composition of headline in relation to the type-page, one or two prominent typographical peculiarities in the type-page itself including alignments, and the

alignment of any signatures. Different impositions are most readily detected by comparing the relation of the running-title or of the headline pagination to the type-page'.

33. Foxon, *English verse*, p. xi: 'Apart from what is regularly printed in the catalogue, I recorded three things: the watermark of the paper and the size of any uncut copy, the position of a number of signature letters relative to the last line of the text above them, or press-figures when they were present; and the pages on which printers' comments appeared. [...] The signature positions made it possible to identify concealed editions or to suggest that so-called editions were from the same setting of type as their predecessors. I have come to regret that I have not been able to make this information available so that unknown issues might be readily identifiable when they appear'. One meaningful nod in this passage is to the significance of 'press-figures' or the practice of English compositors of the eighteenth century, but seemingly little known on the Continent, of including a number or a symbol in the forme to identify their own work (see K. Povey, 'A century of press figures', *The Library*, s. v, 14, 1959, pp. 251–273).

34. P. C. A. Vriesema, 'The STCN Fingerprint', *Studies in bibliography*, 39 (1986), pp. 93–100. A brief explanation, accompanied by helpful illustrations and by fuller bibliographical references, can also be found on the STCN website.

35. W. B. Todd, 'A bibliographical account of *The Gentleman's Magazine* 1731–1754, *Studies in bibliography*, 18, 1965, pp. 81–109.

36. D. J. Osler, 'The identification of edition in early printed books', in *Rare law books and the language of catalogues / I libri giuridici antichi ed il linguaggio dei cataloghi*. Proceedings of the Conference at Certosa di Pontignano, Siena, 26–29 October 1997, eds. M. Ascheri–L. Mayali, Siena, 1999, pp. 23–40. The sources cited as inspiring Osler's device do not include Todd, but rather the classic bibliographical manuals of R. B. McKerrow, *An introduction to bibliography for literary students*, Oxford, 1927, p. 181, and P. Gaskell, *A new introduction to bibliography*, Oxford, 1972, p. 313. Writing in an antediluvian epoch before photocopies, McKerrow in particular lists eight different methods that can be applied to distinguish settings of type that cannot be compared visually and, even in our xerox-facile day, these pages are well worth reading (pp. 181–183).

37. *Catalogue of books printed before 1601 in the legal historical section of the Biblioteca di Scienze Sociali dell'Università degli Studi di Firenze*, compiled by D. J. Osler, Firenze, 2005. In this particular example the Bibliographical Profile appears in a limited number of entries as a means of distinguishing a variant setting already known in most cases to the author through his larger project. There has to be a flaw, however, in any thinking that applies a Fingerprint selectively, i.e. only as a way of describing cases that have already been recognised as divergent. Such a limited use excludes one of the device's fundamental purposes, that it should act as a safeguard that is triggered by a discrepancy in another copy. If readings are not provided in blanket fashion for all the books in a collection, what happens in those instances where a variant exists but the

cataloguer is not aware of it? How are variant settings to be discovered if the Fingerprint is not part of the standard of description from the very first moment?

38. A fuller description appears in the Appendix. The complete listing of editions and of copies can be found in N. Harris, 'Sopravvivenze e scomparse delle testimonianze del *Morgante* di Luigi Pulci', in *Paladini di carta. Il modello cavalleresco fiorentino*. Atti del convegno (Firenze, 8–9 maggio 2003), a cura di M. Villoresi, Roma, 2006, pp. 89–159. A version will also appear in «Rinascimento», 2006. The survival rate of editions of chivalric romances are examined in N. Harris, 'Statistiche e sopravvivenze di antichi romanzi di cavalleria', in *Il cantare italiano fra folklore e letteratura*. Atti del convegno internazionale, Landesmuseum Zürich, 23–25 giugno 2005, a cura di M. Picone e L. Rubini, in print.

39. According to Osler's conventions, when the group is taken from the first leaf in a gathering, only the latter is indicated; where another leaf is taken, the actual leaf number is provided. The first group taken from the preliminaries also reveals a small problem in the notation, due to the fact that the first letter of the signing falls in the space between two words. Here the STCN convention of representing a space with an abstract sign (dollar) appears distinctly useful.

40. O. Castellani Pollidori, 'Sulla data di pubblicazione delle *Prose della volgar lingua*', *Archivio glottologico italiano*, 61 (1976), pp. 101–107, repr. in Castellani Pollidori, *In riva al fiume della lingua. Studi di linguistica e filologia (1961–2002)*, Roma, 2004, pp. 92–96. A good up-to-date summary of the critical discussion, as well as a list of copies of the original and of the counterfeit, can be found in the critical edition of Bembo, *Prose della volgar lingua. L'editio princeps del 1525 riscontrata con l'autografo Vaticano latino 3210*. Edizione critica a cura di C. Vela, Bologna, 2001, pp. lvii–lxiv.

41. Though the SBN *Libro Antico* catalogue in 2005 showed that it was aware of the distinction between the two editions (albeit without actually going to the next logical step, that of writing distinct entries, which would of course require all the libraries concerned to look at their copies again), the online EDIT16 only distinguished between the original (CNCE 4997) and the counterfeit (CNCE 62770) at the end of the same year, when the content of the present research was made known to the ICCU. The episode illustrates the importance of communicating scholarly research in an intelligible fashion directly to the EDIT16, since, given the vast amounts of data coming every day into the offices there, opportunities to cast an eye over what is happening, even in closely related fields, are relatively few and far between.

42. Osler, 'Identification of edition', p. 35: 'When recording signature positions to identify edition I have come across many cases where one or two signatures are by chance in almost precisely the same position in line for line resettings, particularly in the case of small formats where there is little room for manoeuvre. The rule has always been safety in numbers. In my opinion, recording only two signatures means introducing an unnecessary element of risk'. An

instructive example from this point of view is provided by the Roman *Catechismus* published in folio by Paolo Manuzio in 1566, with a structure: A^2 B–2I^6. The LOC Fingerprint reads: s,a- t.er s.tu opfi, but in some copies the third and fourth groups have ' s,tu quha' (in the published EDIT16, C-4031, erroneously given as 's.tu quhe'). The STCN Fingerprint reads: 156602 – b1 A2 rnat : b2 2I3 $Past. The 'Bibliographical Profile' gives: A2 Gube/r/natoribus B1 fluctua/nt/es 2H1 or/e /meo 2I1 radici/tu/s; but in the same copies with the divergent reading of the LOC Fingerprint, the B gathering reads 'fluct/ua/ntes'. Due bibliographical analysis shows how gatherings B–H exist in two different settings, so that the most plausible explanation is that printing began from gathering B and went ahead for a good 42 sheets, when it was decided to increase the print-run. This entailed resetting and reprinting the variant gatherings in order to make up the short-fall (what bibliographical analysis still has to establish is which is the original and which is the reset version). As far as doing a *post mortem* on the Fingerprints goes, it should be noted that, though three of the LOC groups fall in reset pages (i.e. ff. B4*r* and C1*r/v*, while A2*r* is the same setting), one of them so to speak fails to ring the alarm; the STCN misses the target entirely, confirming the argument that sometimes two groups are not enough; and the 'Bibliographical Profile' only catches one of the reset sheets. Again it would be extremely misleading, in my opinion, to talk about the 'failure' of one or more systems. What should be emphasised, if anything, is how once the Fingerprint has drawn attention to the presence of an anomaly, proper bibliographical method has in any case to step in, not just to identity the extent and nature of the variant, but also to explain what caused it.

43. In this respect actual STCN practice differs from that outlined in Vriesema's 1986 article, where the instructions state: 'The piece of text appearing above the prescribed signature is recorded, i.e. those characters that fall wholly or virtually wholly within the prescribed limits. ("Virtually wholly" means: where it is impossible to decide whether the character does or does not fall wholly within the limit' ('The STCN Fingerprint', pp. 98–99; see also Osler, 'The identification of edition', p. 36). Jan Bos, the present editor of the STCN catalogue, kindly informs me that the above principle generated too great an oscillation in the data, so that it was abandoned in favour of the 'if in doubt, leave it out' principle. While the project is obviously in its rights to modify practice in the light of experience, it reinforces the need for an up-to-date, authoritative version of the rules involved.

44. A further connected and likewise insidious problem, which, even if rare, has the potential to cause minor upsets, is that a signature can shift or be shifted in the course of printing. One example is the unsigned and undated edition of the *De uersuum scansione* by Sulpitius, once considered an incunable [IGI V, p. 124; ISTC is00858000], but probably produced in Venice some time around 1505. In a copy in the Biblioteca Comunale at San Gimignano, the 'A' of the first signature is under the space between two words (STCN: i[n]$uo [or i[n]$uoc]; 'Bibliographical Profile': i/ /uocales); in the image available in the IISTC on Cd-Rom, taken from a copy in Lisbon, a gap has opened in the signature, shifting the first letter a good millimetre to the left (STCN:

$i[n]$uo; 'Bibliographical Profile': / i/ uocales), a trivial change perhaps, but enough to sow a doubt in the mind of the beholder.

45. See note 38 above. My original intent was to compare the performance of a poetic text with that of a prose counterpart, such as Boccaccio's *Decamerone*, over the same period; but reasons of time and opportunity nipped the project in the bud. I hope however to complete the survey in the not too distant future.

46. In the sample descriptions taken from Pulci's *Morgante* displayed in the Appendix, in the editions of 1530, 1541, 1549 and *c*. 1560, the 'Bibliographical Profile' catches the word 'commiserabilmente' for the last group. The question that needs to be raised therefore is whether it is strictly necessary to transcribe the whole word. A more convenient form of transcription might limit the characters to the letters preceding and following the slash marks, i.e. instead of 'commisera/bi/lmente', 'commiserab/i/lmente', 'commiserabilme/nt/e', and 'commiserabilment/e/', the readings could be distinguished as 'a/bi/l', 'b/i/l', 'e/nt/e', and 't/e/'.

47. Needham, 'The 1462 Bible of Johann Fust and Peter Schöffer', p. 45. Needham employs the term also in a previous article: 'Concepts of paper study', in *Puzzles in paper. Concepts in historical watermarks*, eds Daniel W. Mosser, Michael Saffle and Ernest W. Sullivan II, London–New Castle, 2000, pp. 1–36: 16. It is interesting that Vriesema, 'The STCN Fingerprint', p. 96, discussing the problem posed by a sequence of look-alike Vondel editions, advises that: 'To enable the user of the catalogue to compare any copy with the STCN entry to establish its identity, each entry has an additional note giving a textual variant peculiar to that edition'. Since the indication of the 'textual variant' involves prior knowledge, to all effects and purposes it is an Earmark.

48. R. Alston and M. J. Jannetta, *Bibliography, machine readable cataloguing and the ESTC*, London, 1978, p. 36. A personal account of the project is available in R. C. Alston, 'The history of ESTC', *The age of Johnson*, 2004, pp. 269–329.

49. Harris, 'Il cappuccino, la principessa e la botte', pp. 13–15.

50. On the figure of Angela Vinay (1922–90), see the collection of essays *Angela Vinay e le biblioteche: scritti e testimonianze*, Roma, 2000, which contains biographical information and a list of her publications.

51. Each library had its own alphanumeric code, in which the letters designated the *provincia* where the library was to be found (for instance, in Florence FI11 stands for the Biblioteca Riccardiana, FI12 for the Biblioteca Medicea Laurenziana, FI13 for the Biblioteca Nazionale Centrale, and FI17 for the Biblioteca Marucelliana). It should be remembered that in Italy at the time car number-plates employed the same letters, so the code appeared less arcane than it does today.

52. *Censimento delle edizioni italiane del XVI secolo. Manuale per la compilazione della scheda*, Roma, s.d. [1979]; seconda edizione riveduta e ricorretta, 1987. In Italy the rules were published also by L. Baldacchini, *Il libro antico*, Roma, 1982, pp. 147–155.

53. In the early stages of the EDIT16 variants in date or in the name of the printer/publisher introduced on the title-page and/or in the colophon were usually allowed to engender separate entries, since, in the experimental status of the project, this eased the task of bibliographical administration. It meant however that the 'conjoining' function of the Fingerprint was left very much to the understanding of the reader. It should be noted, on the other hand, that both in the online version and in the last volume to be published ('D' in 2005), an increasing number of entries have been brought together on the basis of the edition. If on the one hand this tendency can be attributed to a greater facility in the acquisition of images for the purposes of comparison and analysis, on the other it marks the steady growth in expertise that has been a major feature of the project.
54. The Biblioteca Nazionale Centrale di Firenze, for example, has no less than eight copies of the first edition of Bembo's *Prose*, though it has only a single copy of the counterfeit.
55. This wealth of small and medium-scale catalogues, often applied to libraries owned by Italian cities, which often go hand-in-hand with ambitious electronic networks, is a major feature of Italian library culture, see Harris, 'Appunti per una logica'.
56. Osler, 'The identification of edition', p. 30.
57. From this point of view the ESTC claim (see note 48 above) that inserting the Fingerprint would have required too much time and work does not stand up to examination, since, in my experience, it needs only a minute to take it from an average book, including keyboarding, and a matter of seconds to check it.
58. In fact, since the combination of symbols forming the second group is a much less common one, the quickest way of finding this particular edition is to use the second group on its own, and go straight to the book we are looking for. Of course, with practice, users of the EDIT16 database become adept at spotting which of the four groups in a particular situation presents the least usual grouping of symbols and use it to find the book required.
59. Publication is, optimistically, announced for the end of 2006, see *Catalogo degli incunaboli e delle cinquecentine della Biblioteca Comunale di San Gimignano*, a cura di N. Harris, San Gimignano, in course of publication.
60. This is the already mentioned example of the 1565 Dio Cassius, published by Giolito (see note 8 above), with four variant dates in the original and three in the reissue, that gives a total of seven hits.
61. It is, on the other hand, right to object that in the seventeenth and eighteenth centuries the proportion of such books seems to rise (see Olser, 'Identification of edition', p. 29), though until precise samples are analysed, as here, it is impossible to gauge the scale of the problem.

APPENDIX

Editions of Luigi Pulci, *Morgante*, 1502–1606[1]

*Venice, Giovanni Battista Sessa, 1502
8°, 1092 [i.e. 192] c.; A–Z^{8} &^{8}
Second gathering: [B1*r*] 'Dimi al danese caro imbasciatore'
LOC Fingerprint: ioio toto nono egse (3) 1502 (R)
STCN Fingerprint: 150208 - b1 A2 ghie : b2 &4 ebil$
Bibliographical Profile: A2 beli/ng/hieri B pau/ig/lione Z ilr/e/gno & go/g/na
Earmark: f. 11 is numbered with a Roman numeral 'xi'; f. 18 is numbered '28'; the sequence ff. 110–192 is numbered 1010–1092.
Vatican City, Biblioteca Apostolica Vaticana, Ferraioli V.5498

*Venice, Manfrino Bono da Monteferrato [Manfredo de Bonelli], 20 May 1507
8°, [192] c.; A–Z^{8} &^{8}
Second gathering: [B1*r*] 'Dimi al danese caro imbasciatore'
LOC Fingerprint: ioio toto toto acac (C) 1507 (R)
STCN Fingerprint: 150708 - b1 A2 inghi : b2 &4 lebil$c
Bibliographical Profile: A2 bel/in/ghieri B p/au/iglione Z /il/ & /go/gna
Earmark: signing P3 has an Arab numeral; on f. Q4*v*, col. b, last line, the word 'il' has slipped into the lower margin; f. Q5*r*, col. b, last line, space catches ink '| si risco[n]tra'; gatherings Y–Z are signed in lower case.
Florence, Biblioteca Nazionale Centrale di Firenze, Magl. 22.B.8.4
London, British Library, G.10687

*Venice, Iacopo Penzio, 15 February 1508
4°, [208] c.; a–z^{8} &^{8} [cum]^{8} [rum]^{8}
Second gathering: [b1*r*] 'Dimi al Danese charo imbasciadore'
LOC Fingerprint: e.te e:ce o.to ilin (C) 1508 (R)
STCN Fingerprint: 150804 - b1 a2 ce$e. : b2 [rum]4 ti$ti
Bibliographical Profile: a2 cie/l/ b padi/g/lione [cum] mo/rt/o [rum] / d/oma
Venice, Biblioteca della Fondazione Cini, Lib. ill. 492 (lacks ff. a3–6, a8, d2–g2, g8, l1, m1–8, o1–q8)

1. Entries include the place of publication, the name(s) of the printer/publisher, and the date in normalised form, followed by the format, the pagination/cartulation, and the collational formula. The Fingerprints are given in the order LOC, STCN, 'Bibliographical Profile', and are followed by the transcription of the first line of the second gathering of the text (as in GW) and by an Earmark, for those editions I have examined in person. Steele notation is not included because the scale of the publication is not suitable to the system concerned. The description is completed by an indication of the copy/copies used.

*[Florence *c.* 1510–20]
4°, [202] c.; A–2A^{8} 2B^{10}
Second gathering: [B1*r*] 'Rispose alle parole grate Orla[n]do'
LOC Fingerprint: o.do dodo toto ioOr (C) 1510 (Q)
STCN Fingerprint: 151004 - b1 A2 con$lei. : b2 2B5 di$R
Bibliographical Profile: A2 /c/on B co/r/tese 2A Roncisu/a/lle 2B hercul/e/
Paris, Bibliothèque Nationale de France, Rés.p.Yd.13 (lacks f. 2B10, which may have had a colophon)

*Venice, Alessandro de Bindoni, 10 March 1515
4°, [208] c.; a–z^{8} &^{8} [cum]^{8} [rum]^{8}
Second gathering: [b1*r*] 'Dimi al danese charo imbasciadore'
LOC Fingerprint: tete ree. o.to ilin (C) 1515 (R)
STCN Fingerprint: 151504 - b1 a2 ice. : b2 [rum]4 electi
Bibliographical Profile: a2 fe/l/ice b padigl/io/ne [cum]3 cont/as/si [rum]2 liberar/lo/
London, British Library, G.10738 (lacks [rum]8)

*Venice, Alessandro de Bindoni, 26 March 1517
8°, [200] c.; a–z^{8} &^{8} [cum]^{8}
Second gathering: [b1*r*] 'Dimi al danese charo imbasciadore'
LOC Fingerprint: tete e:e: toto acac (C) 1517 (R)
STCN Fingerprint: 151708 - b1 a2 l$feli : b2 [cum]4 $pulci
Bibliographical Profile: a2 cie/l/ b padi/g/lione [et] n/ō/piāse [cum] lam/o/glie
Earmark: signing 02 appears as '2 o'.
Frankfurt, Stadts- und Universitätsbibliothek, IL 1930/590
Roma, Bibliotea Angelica, Z.LVI.31 (lacks ff. b1–6)

*Milan, Giovanni da Castiglione for Giovanni Giacomo da Legnano and brothers, 27 February 1518
4°, [162] c.; a–t^{8} u^{10}.
Second gathering: [b1*r*] '¶Et questo mio cōpagno che e gigāte'
LOC Fingerprint: tete rara riri dier (C) 1518 (R)
STCN Fingerprint: 150804 - b1 a2 ta$pe : b2 u5 do$l
Bibliographical Profile: a2 scrip/t/a b /m/orte t2 su/a/ u2 /g/li
Florence, Biblioteca Nazionale Centrale di Firenze, Landau Finaly 260

*Venice, Guglielmo da Fontaneto, 20 July 1521
4°, [196] c.; A–2A^{8} 2B^{4}
Second gathering: [B1*r*] 'che non sa quello che beneficio sia,'
LOC Fingerprint: a.a: o.o: a.za MaDa (C) 1521 (R)
STCN Fingerprint: 152104 - b1 A2 e,o$c : b2 2B2 ta:e$ic
Bibliographical Profile: A2 dic/e/ B piang/ē/do 2A /p/ene 2B fig/li/

Earmark: f. G1 is unsigned; at f. T1*r* the running title reads 'Vigesimoquarrto'; at f. T3*r* the running title reads 'Vigesimoquartto'; f. Y4 is signed X4.
Florence, Biblioteca Nazionale Centrale di Firenze, Pal. E.6.5.26

*Venice, Alessandro de Bindoni, 30 April 1522
8°, [200] c.; a–z^{8} &^{8} [cum]^{8}
Second gathering: [b1*r*] 'Dimi al Danese charo imbasciadore'
LOC Fingerprint: tete rere toto acac (C) 1522 (R)
STCN Fingerprint: 152208 - b1 a2 iel$fel : b2 [cum]4 de$pu
Bibliographical Profile: a2 /ci/el b padi/g/lione & n/o /piase [cum] m/og/lie
London, British Library, 11426.b.56

*Venice, Francesco Bindoni and Mapheo Pasini, June 1525
8°, [200] c.; A–2B^{8}
Second gathering: [B1*r*] 'Dimmi al danese caro imbasciadore'
LOC Fingerprint: tete rere toto acac (C) 1525 (A)
STCN Fingerprint: 152508 - b1 A2 $felice : b2 2B4 use$del$pul
Bibliographical Profile: A2 / f/elice B pa/di/glione 2A /fa/r 2B /la/
Earmark: at f. G2*r* the running title reads 'Udecimo'.
Vatican City, Biblioteca Apostolica Vaticana, Capponi V.791
Vicenza, Biblioteca Civica Bertoliana, A.7.1.41

*Venice, Francesco Bindoni and Mapheo Pasini, June 1530
8°, [192] c.; A–2A^{8}
Second gathering: [B1*r*] 'Dimmi al Danese, caro imbasciadore,'
LOC Fingerprint: tete e,re o.o, vnta (C) 1530 (A)
STCN Fingerprint: 153008 - b1 A2 el$felic : b2 2A4 fiorita
Bibliographical Profile: A2 ci/el/ B padi/gl/ione Z2 i/l c/orno 2A /t/utto
London, British Library, 686.d.33

*Venice, Nicolo d'Aristotile detto Zoppino, 1530 (colophon: 1531)
8°, 198, [2] c.; A–2B^{8}.
Second gathering: [B1*r*] 'Quãdo Morgãte vede il suo signore'
LOC Fingerprint: tete i,ni nana Brre (3) 1530 (R)
STCN Fingerprint: 153008 - b1 A2 e$ve : b2 2B4 [signed 2B2] arti
Bibliographical Profile: A2 /n/e B cerc/a 2A commiserab/i/lmente 2B pi/u/
Earmark: f. 2B4 is signed 2B2.
Paris, Bibliothèque de l'Arsenal, 8°.B.L.6858 (lacks f. 2B8)

*Venice, Giovanni Antonio Nicolini da Sabio and brothers, 1532
4°, [196] c.; A–2A^{8} 2B^{4}
Second gathering: [B1*r*] 'Che non sa quello che beneficio sia,'
LOC Fingerprint: a,a, o.o, a.a, mada (C) 1532 (R)
STCN Fingerprint: 153204 - b1 A2 red : b2 2B2 asuapa

Bibliographical Profile: A2 /cr/ede B /n'/andaua 2A p/en/e 2B /c/orrotta
Earmark: ff. c3–4 are signed in lower case; at ff. D6*v*, F6*v*, F8*v* the running title reads 'cANTO'; at f. L7*r* the running title reads 'XVI' instead of 'XVII' and at f. M5*r* 'XXI' instead of 'XVIII'.
Florence, Biblioteca Nazionale Centrale di Firenze, Magl. 22.B.5.2

*Venice, Guglielmo da Fontaneto, 10 July 1534
8°, CXCVI c.; A–2A^{8} 2B^{4}
Second gathering: [B1r] 'Quãdo Morgãte vede il suo signore'
LOC Fingerprint: e.te coe- a.ea L'Ve (3) 1534 (R)
STCN Fingerprint: 153408 - b1 A2 ritta$p : b2 2B2 $l'altrasi
Bibliographical Profile: A2 sc/ri/tta B cer/ca/llo 2A com/e /batte 2B m/e/
Chantilly, Bibliothèque du Musée Condé, VIII.B.49

*Vinegia, s.n. [Francesco Bindoni and Mapheo Pasini?], 1537
8°, 192 c.; A–2A^{8}
Second gathering: [B1*r*] 'Dimmi al Danese, caro imbasciatore,'
LOC Fingerprint: o.io e.re o.to vnta (C) 1537 (R)
STCN Fingerprint: 153708 - b1 A2 ciel$fe : 2A4 l$suo$Mart
Bibliographical Profile: A2 /c/iel B pad/i/glione Z /co/rte
2A credessi/ /Carlo
Earmark: at f. H4*r*, col. B, line 29, a space catches ink '|del nome'; at f. 2A2*v*, the running title reads 'CAZTO' (i.e. with a turned 'N').
London, British Library, G.10688

*Venice, Domenico Zio and brothers, 1539
4°, [196] c.; A–2A^{8} 2B^{4}
Second gathering: [B1*r*] 'Che non sa quello che beneficio sia,'
LOC Fingerprint: a,a, o.o, a.a, mada (C) 1539 (R)
STCN Fingerprint: 153904 - b1 A2 e,o$cre : b2 2B2 a$sua$pa
Bibliographical Profile: A2 dic/e,/ B a/n/daua 2A futur/e/ 2B corro/t/ta
Earmark: at ff. B3*r*, B4*r*, B6*r* the running title reads 'IIII' instead of 'III', at f. O5*r* 'XXI' instead of 'XX', and at P8*r* 'XXII' instead of 'XXI'.
Florence, Biblioteca Nazionale Centrale di Firenze, Pal. E.6.5.25

*Venice, Agostino Bindoni, 1541
8°, 195, [5] c.; A–Z^{8} &^{8} [cum]^{8}
Second gathering: [B1*r*] 'Qua[n]do Morga[n]te vede il suo signore'
LOC Fingerprint: tete nini nana Brre (3) 1541 (R)
STCN Fingerprint: 154108 - b1 A2 on$ne : b2 [cum]4 $tore
Bibliographical Profile: A2 n/on/ B cerc/al/lo & commisera/bi/lmente
[cum] assa/i /
Earmark: at f. C7r in the running title 'QVINTO' the 'V' is upside down; f. 92 is numbered '91'; f. 96 is numbered '69'; f. 128 is numbered '228'.
Vatican City, Biblioteca Apostolica Vaticana, Capponi V.790

*Venice, Girolamo Scotto, 1545
4°, 192 [i.e. 202] c.; A–I^{8} K^{10} L–2B^{8}
Second gathering: [B1*r*] 'O ueramente che sotto altro inganno'
LOC Fingerprint: : l-la a.a; i.ri ChDi (3) 1545 (R)
STCN Fingerprint: 154504 - b1 A2 one$del : b2 2B4 hebe.
Bibliographical Profile: A2 compassi/on/e B ce/nt/ro 2A2 co/lp/e 2B gr/eg/ge
Earmark: f. D2 is signed D3, f. K4 is signed k3; f. K5 is signed K4; f. V3 is signed V4. The sheet signatures at f. T3*r* and f. V3*r* read 'Mog. mag.'.
Florence, Biblioteca Nazionale Centrale di Firenze, Magl. 3.2.185

*Venice, Comin da Trino di Monferrato [at the sign of the Palm tree], 1546 (colophon: 1545)
4°, [4], CXIX [i.e. CXCIX], [1] c. = 204 c.; *^{4} A–2B^{8}
Second gathering: [B1*r*] 'Padiglioni, e trabacche, e pennoncelli,'
LOC Fingerprint: uera i.i, o.o. TuDi (3) 1546 (R)
STCN Fingerprint: 154604 - a1 *2 n$tut - b1 A1 o : b2 2B4 ,$e$fede$.
Bibliographical Profile: *2 co/n/ A fr/on/te B Bruno/r/o 2A ricor/se/ 2B sogna/ /.
London, British Library, C.19.c.24; 83.e.28
Oxford, Bodleian Library, Mortara 825

*Venice, Bartolomeo detto Imperatore, 1549
8°, [200] c.; A–Z^{8} &^{8} [cum]^{8}
Second gathering: [B1*r*] 'Quando Morgāte vede il suo signore'
LOC Fingerprint: tete nini tete epsi (C) 1549 (R)
STCN Fingerprint: 154908 - b1 A2 $verr : b2 [cum]4 e$Dio
Bibliographical Profile: A2 n/e/ B cerca/ll/o & commiserabilment/e/ [cum] /d/egno
Earmark: in gatherings I–Q S–& the signing of the second leaf has a final 'j'.
Vatican City, Biblioteca Apostolica Vaticana, Rossiana 6355
London, British Library, 11427.b.56 (lacks ff. [cum]7–8)
Oxford, Bodleian Library, Vet.F1.f48 (lacks ff. [cum]7–8)

*Venice, Comin de Trino di Monferrato, 1550 [or 1551] (colophon: 1550)
4°, [16], 197, [1] c.; *–2*^{8} A–2A^{8} 2B^{6}
Second gathering: [B1*r*] 'Rispose a le parole grate Orlando,'
LOC Fingerprint: meer .13. e.e, VlGl (3) 1550 (R)
STCN Fingerprint: 155004 - a1 *2 $8.col : a2 2*4 $ - b1 A1 e : b2 2B3 e$parte.
Bibliographical Profile: *2 car./ /8 2*4 car./ 1/26 A fron/te/. B2 co/no/sca 2A2 f/ue/. 2B2 past/o/re
Earmark: ff. E3 and R3 are signed respectively 'E lij' and 'R iji'; at ff. F1*v*, F3*v*, G1*v*, the running title 'CANTO' lacks a space between the final letters; ff. 165 and 186 are numbered respectively '173' and '178'.
Florence, Biblioteca Nazionale Centrale di Firenze, Magl. 3.2.223 (with date 1550; lacks M2.7); Rin. P.425 (with date 1550; lacks ff. A1, 2B6)

*Venice, Giovanni Padovano, 1552
4°, [196] c.; A–2A^{8} 2B^{4}
Second gathering: [B1*r*] 'Che non sia [sic!] quello che beneficio sia,'
LOC Fingerprint: : a.a, moo, a.za mada (C) 1552 (R)
STCN Fingerprint: - b1 A2 ce,o$c : b2 2B2 suapa
Bibliographical Profile:
Parma, Biblioteca Palatina, BB.6.26472
Venice, Biblioteca Nazionale Marciana, 89.C.125

*Venice, Alessandro da Vian, s.a. [*c.* 1560]
8°, [196] c.; A–Z^{8} &^{8} [cum]^{4}
Second gathering: [B1*r*] 'Quando Morgāte vede il suo signoř'
LOC Fingerprint: tete nini tete epsi (C) 1560 (Q)
STCN Fingerprint: 156008 - b1 A2 e$verr : b2 [cum]2 ia$fed
Bibliographical Profile: A2 n/e/ B cera/ll/o & commiserabile/nt/e 2B /d/egno
Cambridge, Emmanuel College Library, 323.7.92 (lacks ff. T1–8, [cum]4)

*Florence, Bartolomeo Sermartelli, 1574
4°: [16], 390, [2] p.; +^{8} A–2A^{8} 2B^{4}
Second gathering: [B1*r*] 'Padiglioni, e trabacche, e pennoncelli,'
LOC Fingerprint: e,ta 70Me 0.0, EmMo (3) 1574 (R)
STCN Fingerprint: 157404 - a1 +2 suo$: a2 +4 ista$ - b1 A1 $: b2 2B2 $.
Bibliographical Profile: +2 /s/uo +4 Arpal/i/sta A2 viu/e i/n B Br/u/noro 2A r/om/ore 2B /d/i
Earmark: f. 203 is numbered 103.
Florence, Biblioteca Nazionale Centrale di Firenze, Nencini 2.3.3.15; Nencini F.7.3.23; Rin. P.429

*Florence, Bartolomeo Sermartelli e fratelli, 1606
4°, [16], 390, [2] p.; *^{8} A–2A^{8} 2B^{4}
Second gathering: [B1*r*] 'Padiglioni, trabacche, epennoncelli,'
LOC Fingerprint: e,n- 70Me 0.to EmMo (3) 1606 (R)
STCN Fingerprint: 160604 - a1 *2 otti : a2 *4 [signed +4] alista. - b1 A1 $: b2 2B2 eo$.
Bibliographical Profile: *2 /m/otti *4 [signed +4] Arp/a/lista A2 ch/i v/iue B ciascu/n/ 2A ro/m/ore 2B /R/e
Earmark: ff. *2-3 are signed +; f. G1 is signed C1.
Florence, Biblioteca Nazionale Centrale di Firenze, Magl. 19.4.79; B.29.2.21