



Article scientifique

Article

1995

Published version

Open Access

This is the published version of the publication, made available in accordance with the publisher's policy.

Knowe Thyself. Anatomical figures in Early Modern Europe

Carlino, Andrea

How to cite

CARLINO, Andrea. Knowe Thyself. Anatomical figures in Early Modern Europe. In: Res, 1995, vol. 27, p. 52–69.

This publication URL: <https://archive-ouverte.unige.ch/unige:43016>



**The President and Fellows of Harvard College
Peabody Museum of Archaeology and Ethnology**

Knowe Thyself: Anatomical Figures in Early Modern Europe

Author(s): Andrea Carlino

Reviewed work(s):

Source: *RES: Anthropology and Aesthetics*, No. 27 (Spring, 1995), pp. 52-69

Published by: [The President and Fellows of Harvard College](#) acting through the [Peabody Museum of Archaeology and Ethnology](#)

Stable URL: <http://www.jstor.org/stable/20166917>

Accessed: 05/02/2012 05:11

Your use of the JSTOR archive indicates your acceptance of the Terms & Conditions of Use, available at
<http://www.jstor.org/page/info/about/policies/terms.jsp>

JSTOR is a not-for-profit service that helps scholars, researchers, and students discover, use, and build upon a wide range of content in a trusted digital archive. We use information technology and tools to increase productivity and facilitate new forms of scholarship. For more information about JSTOR, please contact support@jstor.org.



The President and Fellows of Harvard College, Peabody Museum of Archaeology and Ethnology, J. Paul Getty Trust are collaborating with JSTOR to digitize, preserve and extend access to *RES: Anthropology and Aesthetics*.

<http://www.jstor.org>

“Knowe thyself”

Anatomical figures in early modern Europe

ANDREA CARLINO

It might be thought that human anatomy could interest only doctors, perhaps artists, and, occasionally, philosophers, as Galen wrote. Yet this was not the case. A very broad public was eager for information about the human body, even if what it was given was often coarse and approximate. Some strange printed fugitive sheets representing the male and female human body are evidence of this, and they met with great success in many European countries from the first half of the sixteenth century on. As in certain contemporary children's books, internal organs of the human body are revealed by peeling away the figure of the trunk.¹

These sheets have not been unfamiliar to historians or bibliophiles,² although what has been written about them begs a number of crucial questions about both

their function and their possible circulation. They can, of course, be considered rough summaries of university anatomical handbooks, but they also were elaborate if crude typographical artifacts of a distinctly popular nature. The images prevail over the text, which they sum up and simplify. The role of the images is especially crucial because of the ambiguity of the social target for which these sheets were intended. As a matter of fact, the fugitive sheet became a vehicle for the transmitting of information, which was usually reserved for an intellectual elite or a specialized audience, to a much larger public.

The sixteenth-century publishers, printers, and engravers of anatomical fugitive sheets seem to have understood their role clearly. As cultural mediators, they created a genre that figuratively, as well as in terms of theme and language, broke the academic monopoly on the knowledge of anatomy. Thus, they initiated ordinary people, whose curiosity about themselves could not be satisfied by any existing class of publication, into the secrets of the human body. Through fugitive sheets, anatomical knowledge partially lost its strictly scientific connotation and was adapted to a multiplicity of often quite unexpected uses.

Paper bodies

These anatomical fugitive sheets were made up of superimposed engraved figures. They were published from 1538, mostly in Germany, but also in France, England, Holland, and Italy, and were usually woodcuts printed on two separate sheets, representing a seated man and woman. A text, in Latin or in the vernacular, was arranged around the figures, giving the names of the parts of the body together with a brief description of the organs and their physiology. What was characteristic and unusual in these sheets was that the trunk of the figures could be lifted up or peeled away. The internal organs were printed on several separate flaps of paper, cut out, and glued together so that they could also be lifted in turn. The bottom layer represented the back part of the thorax and the spine. This technique of illustration made the printed object

This research was undertaken thanks to a Jean Monnet Fellowship from the European University Institute (San Domenico di Fiesole) and a contribution from the Wellcome Trust for the research conducted in London. I would like to thank Vivian Nutton for valuable information on the use of certain anatomical fugitive sheets.

1. From my first chance discovery until the present day, I have succeeded in tracking down about forty of these images from the sixteenth, seventeenth, and eighteenth centuries. I found some of them following random searches in Italian, English, and French libraries, but the greater number are in four collections: those of the Wellcome Historical Medical Library in London, the Taubman Library at the University of Michigan at Ann Arbor, the Royal Library in Stockholm, and the Library of the College of Physicians of Philadelphia.

2. The first scholar to bring anatomical fugitive sheets to general attention was L. Choulant, *History and Bibliography of Anatomical Illustrations*, ed. and trans. M. Franck (Chicago, 1920; German ed., 1852), pp. 156–167. A systematic treatment is found in articles by L. Crummer, “Early Anatomical Fugitive Sheets,” *Annals of Medical History* 5 (1923): 189–209; “Further Information on Early Anatomical Fugitive Sheets,” *Annals of Medical History* 7 (1925): 1–5; “Check List of Anatomical Books Illustrated with Cuts of Superimposed Flaps,” *Bulletin of the Medical Library Association* n.s. 20 (1932): 131–139. These articles also take account of the copies in Crummer's own collection, which is now located in the Taubman Library at the University of Michigan at Ann Arbor. J. G. de Lint, “Fugitive Anatomical Sheets,” *Janus* 28 (1924): 78–91, gives a general overview. A basic description in catalog form but with information on the copies in London is found in F. N. L. Poynter, *Catalogue of Printed Books in the Wellcome Historical Medical Library, I, Books Printed Before 1641* (London, 1962), pp. 14–15.

virtually three-dimensional. It also meant that the internal parts of the body could be organized in a physiological system, an apparatus that could be seen as providing a functional and spatial relationship within the framework of the body.

Some of these sheets continued to be printed until the middle of the eighteenth century,³ and judging from the number of editions, must have met with a commercial success incomparably greater than any other type of anatomical treatise published during those years. Between 1538 and 1540 alone, at least fifteen different editions were published in Europe. They undoubtedly contributed more than Andreas Vesalius's *De humani corporis fabrica* to the spread of elementary knowledge about the interior of the human body, and, therefore, to the construction of a broadly shared image of the bodily self, common to a wide sector of European society.

Publishers, printers, and engravers

Strasbourg

The inventor of these sheets is uncertain, as is the place where they were first published. At any rate, two editions were printed in Germany in 1538: one by Heinrich Vogtherr the Elder at Strasbourg and one by Jobst de Negker at Augsburg (fig. 1).⁴ The

representations of the female body are identical, and both sheets have the imperial printing license at the foot of the page. Therefore, it seems probable that the right to publish these sheets was passed from one printer to another. One can suppose that Jobst de Negker handed over the rights and perhaps also the blocks of his fugitive sheets to Vogtherr, although the latter may possibly have been responsible for the original design.⁵ Indeed, Vogtherr republished them the following year, while in June 1539 Negker reengraved and issued a bilingual version of Vesalius's *Tabulae anatomicae sex* for the use of German students who might have had difficulties with Latin.⁶ The simplicity of the metaphors (the stomach described as a harbor, for instance), the elementary terminology, the emphatic graphic character, suggest that all these prints were in fact intended for a nonspecialist public. The figures of both man and woman are based on one drawing, the head being changed, as are the flaps of paper on which the thorax and the generative organs are represented. Each organ is marked in Latin, while some are reproduced a second time in the text that surrounds the main figure; there, the name is shown in the vernacular, together with a few rudimentary anatomical-physiological notes, which could be attributed to Vogtherr.

Vogtherr was a versatile character; in addition to his activity as a printer, author, and engraver actively committed to the Protestant cause, he also executed and published works on topics ranging from urology

3. The publication of anatomical illustrations with superimposed figures continued until very recent times. Some, for instance, were made in the nineteenth century by Alexander Ramsay, George Black, and Robert Knox.

4. *Anathomia, oder abconterfettung eynes Mans leyb, wie er inwendig gestaltet ist . . . eynes Weybs leyb, wie er innwendig gestaltet ist* (Strasbourg: Heinrich Vogtherr, 1538). I have not seen a copy of this pair. They are mentioned in L. Crummer, "Check List," loc. cit., p. 131. A copy of the female figure is in the University Library at Basel. A description of Vogtherr's woodcuts, possibly for this same edition of 1538, is to be found in the booklet *Auszlegung und beschreibung der Anathomii, oder warhafften abconterfettung eynes inwendigen cörpers des manns und weibes, mitt erklerung seiner innerlichen, gelider* (Strasbourg: Heinrich Vogtherr, 1539). The Augsburg edition of anatomical woodcuts bears the same title, with a few minimal differences in spelling: *Anothomia, oder abconterfettung eines Weybs leyb, wie er innwendig gestaltet ist* (Augsburg: Heinrich Vogtherr, 1538), which is currently in the Sudhoff Institut für Geschichte der Medizin, Leipzig. One hypothesis put forward by several scholars seems fairly plausible, namely that the editions of 1538, by both Vogtherr and Negker, consisted simply of the female figure and that the sheet depicting the male figure was published at Strasbourg, together with that of the woman, only in the following year. On Negker's sheet, see E. Wickersheimer, "Une Gravure Anatomique de Jobst de Negker" (1538), *Bulletin de la Société Française d'Histoire de la Médecine* 15 (1921): 114–118.

5. On the basis of the reproductions available, I could not establish with certainty whether both Negker's and Vogtherr's women were printed from the same block. A hypothesis that the design of the female figure in the Augsburg edition of 1538 should nonetheless be attributed to Vogtherr has also been put forward by F. Müller, "Heinrich Vogtherr, alias Heinricus Satrapitanus, alias the 'Master H. S. with the Cross,'" *Print Quarterly* (1987): 278. In this case, Jobst de Negker would simply have made the engraving and published the fugitive sheet. He did, in fact, sign the woodcut as Jobst de Negker *formschneider*.

6. On Vesalius's *Tabulae*, see C. Singer and C. Rabin, *A Prelude to Modern Science: Being a Discussion of the History, Sources and Circumstances of the "Tabulae anatomicae sex" of Vesalius* (Cambridge, 1946). On Jobst's plagiarism, see M. Geisberg and K. Sudhoff, *Die Anatomischen Tafeln des Jobst de Negker 1539* (Munich, circa 1928). On the plagiarists of Vesalius in general, see E. Turner, "Les six premières planches anatomiques de Vésale et leurs contrefaçons," in *Gazette Hebdomadaire de Médecine et de Chirurgie*, no. 24 (1877): 270 ff.; H. W. Cushing, *A Bio-bibliography of Andreas Vesalius* (New York, 1943); and R. Herrlinger, *The History of Medical Illustrations from Antiquity to 1600* (New York, 1970), pp. 121–131.

and ophthalmology to a manual of Renaissance ornamental motifs for the use of craftsmen.⁷ Overall, his publishing activity may be seen as a conscious expression of a desire to use printing to foster the spread of ideas and knowledge in social groups that would otherwise have been unfamiliar with the world of the book. Vogtherr's scientific texts give considerable space to illustrations and diagrams, and consist of very few pages (twelve for the one on the eye, eighteen for the anatomical one); the language is simple and is always in the vernacular, as are the texts he published on religious topics. For one of his nonsecular texts, *Eyn Schöne und Gotselige Kurtzweil eines Christlichen Lossbüchs* (which was published at Strasbourg in 1539), Vogtherr made a frontispiece in which superimposed circular figures rotate around each other on a bone pin, a woodcutting and printing device aimed at capturing the public interest, as indeed were the anatomical fugitive sheets.⁸

Nuremberg

When Vogtherr left Strasbourg temporarily in 1544 to spend a couple of years in Zurich, he probably handed the blocks for the fugitive sheets to Jacob Frölich. Frölich reprinted them the same year (fig. 2), and in 1551–52 published a Latin version, although he colored the figures to make them less austere.⁹ Hans Weygel, a wood engraver and printseller in Nuremberg, then cut new blocks, copying those of Vogtherr, even if the result was definitely inferior in quality to the original. He published them, also in color and in

7. This *Kunstbüchlein*, printed in Strasbourg in 1538, was reprinted many times right up to the beginning of the seventeenth century. In that same year and place, he published *Ein neues hochnutzliches büchlein*, a small twelve-page volume in quarto richly illustrated with woodcuts of the structure of the eye, and the text on urine, *Eyn kunstreichs warhafftigs und wolgegrundtes urteil und secret buchlin des harns*.

8. One source of information on Vogtherr is the book written by one of his descendants, F. Vogtherr, *Geschichte der Familie Vogtherr* (Ansbach, 1908). See also, F. Müller, loc. cit.

There are studies on Heinrich Vogtherr's work in woodcut (see the bibliography in Müller's article), but I have found no thorough analysis of his publishing activity in general (script, typography, engraving). When he published his article in *Print Quarterly*, Frank Müller mentioned in a note that he was preparing a thesis on Vogtherr, but I have not been able to examine it.

9. There is a copy of the edition of 1544 in the Wellcome Historical Medical Library in London, and it bears exactly the same title as the edition of 1539. The Latin edition of 1551–52 is described in L. Choulant, *History*, loc. cit., p. 159.

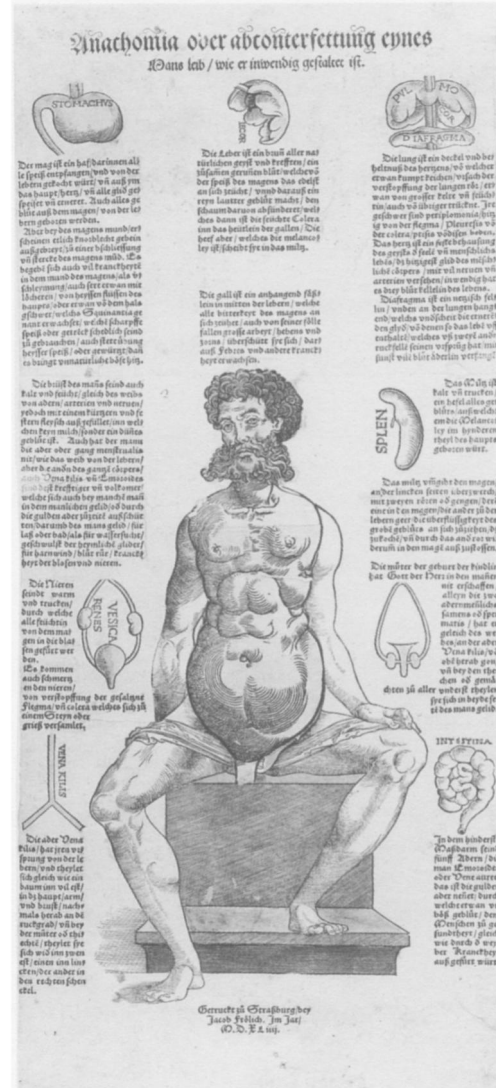


Figure 2. *Anatomical Fugitive Sheet* (man), 1544. Jacob Frölich (printer), Strasbourg. Photo: Courtesy of Wellcome Institute Library, London.

German, in 1556 and 1564. The blocks made by Weygel were then used by Matthes Rauch for yet another edition in 1584.¹⁰ Other copies of Vogtherr's anatomical sheets were printed at the end of the century by Conrad Corthuys (Frankfurt, second half of

10. The edition of 1556 is described in L. Choulant, *ibid.*, and might correspond to the incomplete copy now in the Wellcome Library (call mark 295.13). This library also has a copy of the female figure of the edition of 1564. Rauch's edition, too, is mentioned in L. Choulant, *ibid.*

sixteenth century) and Georg Lang (Nuremberg, 1588 and 1594), these latter using blocks that had also been cut by and belonged to Hans Weygel.¹¹ These later editions, too, were in the vernacular and colored.

Vogtherr's figures were not the only ones to be reproduced and circulated in the sixteenth century. From 1539 on, similar anatomical sheets with cut-out and superimposed woodcut figures and short explanatory texts began to be published repeatedly outside of Germany, almost always by publishers and engravers working for a popular market.

A pair of anatomical sheets similar to those described here were printed at Nuremberg by Hans Guldenmundt, probably in 1539, if not actually in 1538.¹² The text was in German and the small intercalated figures were identical to those published by Vogtherr, although their main subjects had one single liftable flap (the trunk) and are identifiable as Adam and Eve by the proffered apple and the fig leaves covering their genitals. Guldenmundt was a printer, publisher, and engraver who, like Vogtherr, although without his technical and graphic inventiveness and skill, published numerous booklets and fugitive sheets on popular topics, using illustrations made by the Beham brothers (Hans Sebald and Barthel) and Virgil Solis, as well as Heinrich Vogtherr. An anatomical booklet of 1539 that consists of twelve sheets, together with rough woodcuts of various organs of the thorax and abdomen engraved by Hans Weygel, provided the totally unversed reader with rudimentary information on the makeup of the human body and some simple therapies.¹³ It seems reasonable to assume that the representations of Adam and Eve had been prepared as a complement to this booklet as self-contained human figures in which the organs, independently illustrated and described, could be located.

11. Descriptions of the 1588 editions of Corthuys and Lang are in L. Choulant, *History*, loc. cit., pp. 159–160. The two Lang editions are mentioned in L. Crummer, "Early Anatomical Fugitive Sheets," loc. cit., p. 207.

12. This dating of Guldenmundt's sheets was suggested first by L. Choulant, *History*, loc. cit., pp. 156–157, then more closely argued by S. Schele, *Cornelius Bos: A Study of the Origins of the Netherland Grotesque* (Stockholm, 1965), esp. pp. 149–155.

13. *Ausslegung und beschreibung der Anatomi* (Nuremberg: Hans Guldenmundt, 1539). A text with the same title was published in the same year by Vogtherr at Strasbourg. Another edition printed at Ulm in 1541 is mentioned in Haller, *Bibliotheca Anatomica* (Hildesheim and New York, 1969), vol. 1, p. 180 (this is an anastatic of the Zurich edition of 1774, ed. G. Mann). On Guldenmundt, see Thieme-Becker, *Allgemeines Lexikon der Bildenden Künstler* (Leipzig, 1907–50), vol. 15, p. 329.

Antwerp

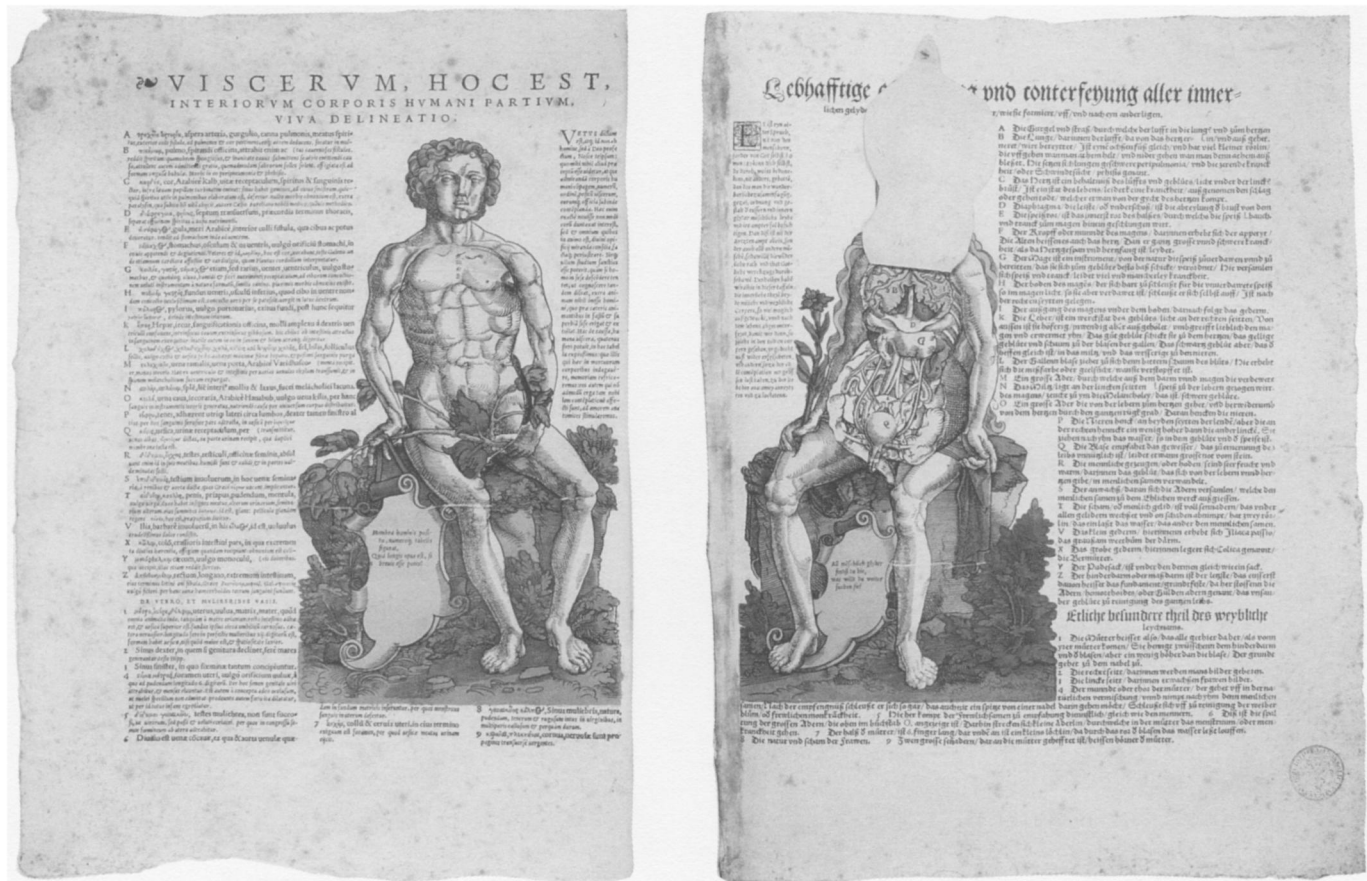
Guldenmundt's sheets were copied and engraved, this time on copper, by Cornelius Bos, an artist and printseller from Antwerp. They were published there three times between 1539 and 1540, twice in Latin and once in Flemish.¹⁴ Also in Antwerp, in all probability between 1540 and 1545, Sylvestre de Paris, an engraver of French origin and a contemporary of Bos, prepared a new pair of anatomical figures with several superimposed layers (consisting of six or seven separate flaps) that differ iconographically (at least in part) from the previous examples. Sylvestre de Paris published four editions: in French, Flemish, a bilingual Latin-German version (figs. 3–4), and a Latin edition with both figures printed on a single sheet.¹⁵

Paris, London, and Prague

Another pair of sheets, one with Guldenmundt's male figure and the other with Vogtherr's female figure, were published in Paris first by Jean Ruelle (a Latin

14. Bos's engravings were printed from two different pairs of blocks, clearly made by the same artist within a very short space of time. The two editions in Flemish (one of 1539, the other of 1540) are signed with the monogram C. B., while the Latin edition bears the information: "*Sculpsit Me, Cornelius Bosch, an. M. D. XL*" and "*Antverpiae Apud, Ioannem Crinitum, An. M. D. XL*." See S. Schele, *Cornelius Bos*, loc. cit., esp. pp. 149–155.

15. I have seen two copies of the bilingual edition of Sylvestre's anatomical sheets, unsigned and undated: one in the Taubman Library (University of Michigan), the other at the Biblioteca Apostolica Vaticana, Rome. On this edition, see L. H. Wells, "A Remarkable Pair of Anatomical Fugitive Sheets in the Medical Center Library, University of Michigan," *Bulletin of the History of Medicine* (1964): 470–476; Wells was the first to put forward the hypothesis that the male figure with the Latin text and the female figure with the German text might have been published together as part of a single edition. Wells's hypothesis is indisputably strengthened by the existence of the same pair in the Biblioteca Vaticana. The scrolls of the Flemish edition bear the typographical note: "*Geprent Tantwerpen bij Silvester van Parijs figuersnijder op de Lombaerde veste int root huys*" ("Printed at Antwerp by Sylvestre de Paris engraver of the Lombard rampart in the red house"). There is a copy of it in the U. S. National Library of Medicine, Bethesda (L. H. Wells, "The 'Sabio' and 'Sylvester' Families of Anatomical Fugitive Sheets: Note on a Pair of Sheets in the National Library of Medicine," *Bulletin of the History of Medicine* [1966]: 467–475). A copy of the French edition was found in the University Library of Mons by E. Cockx-Indestege, "Twee anatomische planodrukken met beweegbare onderdelen, uiteengeven bij Silvester van Parijs te Antwerpen (circa 1540–50)," *Scientiarum Historia* (1971): 92–102. There is no information concerning the location of the sheet with both figures and the text in Latin made known and described by L. Choulant, *History*, loc. cit., pp. 161–162.



Figures 3–4. *Anatomical Fugitive Sheets* (man and woman), ca. 1540. Sylvestre de Paris (printer), Antwerp. Photo: Courtesy of Vatican Library, Rome.

edition in 1539 and two editions in 1540, one in Latin and one in French), then by Alain la Mathonière (in French, probably in 1560), who was a *tailleur d'histoire* and printseller from the rue Montorgueil, a center of popular printmaking in Paris (figs. 5–6).¹⁶ Two London

editions in the vernacular are also known,¹⁷ and one was printed in German in Prague by Michael Peterle;¹⁸ all of these editions were copies of Guldenmundt's fugitive sheets.

16. There is a well-preserved copy of the Latin edition of 1539 by Ruelle in the Wellcome Historical Medical Library. The male figure bears the title: *Interiorum corporis humani, partium viva delineatio*; the female one: *Perutilis anatomie interiorum mulieris partium cognitio, ac earumdem situs, figura, numerus, positio, haud iniucunda cognitu*. The same library has only the female figure of the later Latin edition of 1540. The Wellcome Library also possesses a crudely colored copy of the French edition by Alain la Mathonière. A copy of the French edition by Jean Ruelle is bound with T. Geminus, *Compendiosa totius anatomiae delineatio* (London, 1545), in the Royal Library of Stockholm (see S. G. Lindberg, "Chrestien Wechel and Vesalius: Twelve Unique Medical Broadside from the Sixteenth

Century," *Lychnos* [1953]: esp. 68–71). The male figure is an exact copy of the Guldenmundt-Bos Adam, although the apple is missing.

17. They are a male figure and a female figure, belonging to two separate editions, probably published in the first half of the sixteenth century and now in the Wellcome Historical Medical Library. The female figure is accompanied by a text in English entitled *The signification of such letters, as are graven in this figure, and an attribution to Thomas Raynalde has been suggested* (London, circa 1540). (See *A Catalogue of Printed Books in the Wellcome Historical Medical Library: Books Printed Before 1641* [London, 1962], n. 290.6.) The sheet with the male figure (call mark 291.7 in the same catalog) is entitled: *The Anatomie of the inward Parts of man lyvely set fourth and dylygently* (London, circa 1545?).

18. See S. G. Lindberg, "Chrestien Wechel," loc. cit., p. 71.



Figures 5–6. *Anatomical Fugitive Sheets* (man and woman), ca. 1560. Alain la Mathonière (printer), Paris. Photo: Courtesy of Wellcome Institute Library, London.

Venice

Lastly, a pair of sheets that differ iconographically from the previous ones were published repeatedly in Venice (figs. 7–8). They were printed for the first time in 1539 in Latin, and were signed by Gianantonio de Nicolinis de Sabio, the printer, and Gianbattista Pederzani, the publisher and financier of the enterprise.¹⁹ A new Latin edition of Sabio’s figures was published anonymously in 1587, while yet another edition in Italian was produced in 1611 by Sebastiano Combi.²⁰

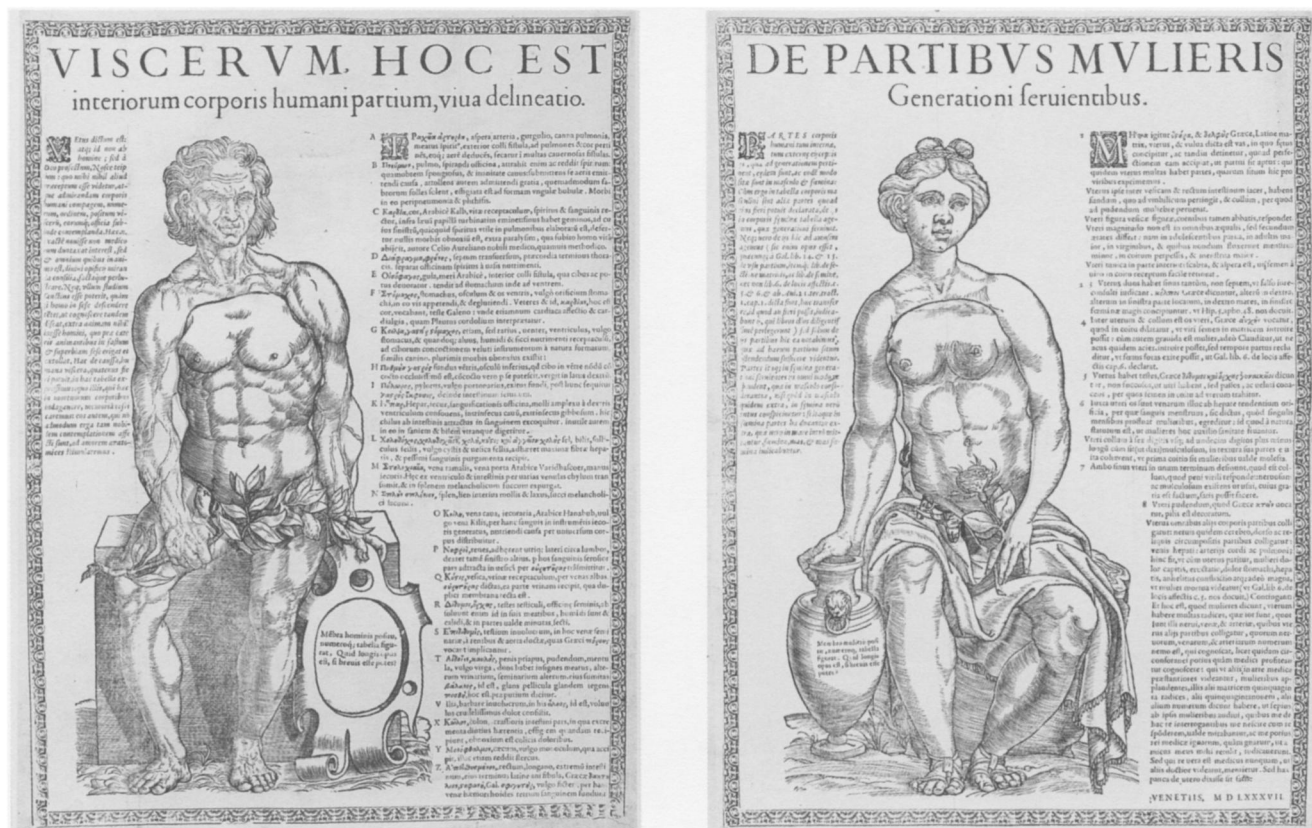
19. This edition was made known by L. Choulant (*History*, loc. cit., p. 156) and in the *Bibliotheca anatomica* of Haller (I, pp. 179, 333). It was reproduced for the first time in E. P. Goldschmidt and Co., *Catalogue 127. Medicine and Science* (London, n.d.), n. 210. See also L. H. Wells, “The ‘Sabio’ and ‘Sylvester’ Families,” loc. cit.

20. The library of the College of Physicians of Philadelphia has a copy of the edition of 1587. See W. B. McDaniel, “Two Anatomical Fugitive Sheets,” *Transactions and Studies of the College of Physicians*

Johann Schott, anatomy and death

Fugitive sheets had clearcut, recognizable iconographical and typographical features that remained unchanged for decades, despite refinements in representational techniques and the progress of anatomy during the course of the sixteenth century. Apart from the odd detail, they repeat the model laid down in the first editions of 1538. None of the authors, engravers, or publishers who were engaged in the production of anatomical sheets (including Vogtherr himself) had any specific medical training; indeed,

of Philadelphia (1939): 341–343; and by the same author, “More about ‘Eve,’” *College of Physicians of Philadelphia, Fugitive Sheets from the Library* (1962): 167–168. The female figure from the edition of Sebastiano Combi is reproduced in L. Crummer, “Early Anatomical Fugitive Sheets,” loc. cit., p. 188. For a comparative examination of the editions of Sabio and Sylvestre, see the article by L. H. Wells, “The ‘Sabio’ and ‘Sylvester’ families,” loc. cit.



Figures 7–8. *Anatomical Fugitive Sheets* (man and woman), 1587. Printer unknown, Venice. Photo: Courtesy of Library of the College of Physicians of Philadelphia.

their knowledge of human anatomy was superficial and based on a very small number of texts and images from which they derived—and suitably adapted—both their formal and scientific features. For example, the posture chosen for the main figures, particularly the female ones, is very reminiscent of the “gynaecological” position used by the author of the engravings of the *Fasciculus medicinae* of John of Ketham, a bestseller of Renaissance medicine, to display the woman’s organs, particularly the generative ones (fig. 9).²¹ That image of

the matrix, published between 1520 and 1530, had also circulated as a separate fugitive sheet.²²

The main source of information and inspiration for Vogtherr and other publishers of anatomical fugitive sheets, however, were undoubtedly the two sheets issued by Johann Schott at Nuremberg in 1517: a skeleton (fig. 10) and a dissected body (fig. 11), which he bound into Hans Gersdorff’s *Feldtbuch der Wundtartzney*, which was printed in the same year.²³

21. The first edition of the *Fasciculus* dates from 1491. It was followed, between the end of the fifteenth century and the first half of the sixteenth, by many others in Italy, France, Spain, Germany, and Holland, both in Latin and in the vernacular. It was also used as a basic manual for the teaching of anatomy in most Italian universities. On the female anatomical images of this period, see F. Weindler, *Geschichte der gynaekologisch-anatomischen Abbildung* (Dresden, 1908). It should, however, be noted that the “gynaecological” position of the uterus had already been repeatedly used in numerous late medieval manuscripts that undoubtedly inspired the author of the engravings of the *Fasciculus*.

22. The sheet bears the following title: *Tabulae de matrice mulierum et impregnatione*. There is no indication of either place or publisher. This sheet was made known by L. Crummer, “Early Anatomical Fugitive Sheets,” loc. cit., p. 208.

23. Hans Gersdorff, *Feldtbuch der Wundtartzney* (Strasbourg, Johann Schott, 1517). A loose copy of the dissected body was formerly in the Royal Library in Berlin (Soltzmann, *Deutsches Kunstblatt* [1852], n. 2, p. 19). The author of the image is Hans Wechtlin who, according to the last section of the first treatise contained in the *Feldtbuch*, made a direct copy of the corpse of a condemned man who was hung in Strasbourg in 1517 and dissected by Dr. Wendelius Hock von Brackenaw (fol. 13v).

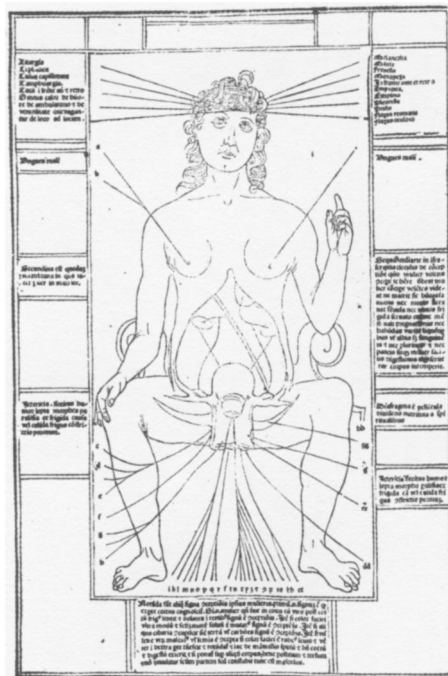


Figure 9. *Figura dela matrice*. From John of Ketham, *Fasciculus medicinae* (Venice: J. and G. de Gregoriis, 1495). Photo: Courtesy of Wellcome Institute Library, London.

The skeleton, clearly inspired by a woodcut made by the French doctor, Richard Helain, and published at Nuremberg in 1493 (fig. 12),²⁴ has the names of the bones in Latin around it and a brief moral reflection on death in German. The dissected body has a simplified arrangement of internal organs, while seven other smaller figures of the anatomy of the head are engraved around it. The names of the organs are given in German, as is the title and the text beneath the

24. In his turn, Helain copied the skeleton from an illumination in the MS. Français 19994 in the Bibliothèque Nationale, Paris, devised in 1454 by Etienne Beludet for a "barbier" (fol. 9), which contained medical works by Guy de Chauliac, Lanfranco, Jean Le Lièvre, and Hippocrates. The skeleton is on fol. 38v. On the manuscript in the Bibliothèque Nationale and Helain's print, see K. Sudhoff, "Ein Beitrag zur Geschichte der Anatomie im Mittelalter speziell der anatomischen Graphik nach Handschriften des 9. bis 15. Jahrhunderts," in *Studien zur Geschichte der Medizin* (Leipzig, 1908), esp. pp. 44–49. A 1501 edition of "Helain's skeleton," published at Leipzig by Wolfgang Stoeckel with some minor variants vis-à-vis that of 1493, is bound into the copy of the *Antropologium* of Magnus Hundt now in the British Library (*Antropologium de hominis dignitate et proprietatibus* [Leipzig, 1501] for Baccalarium Wolfgangum Monacensem). The call mark is IA. 22560 (1).

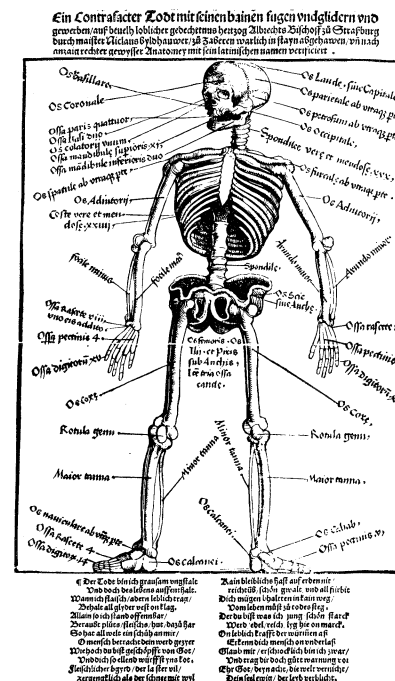


Figure 10. Johann Schott, *Skeleton*, 1517. From Hans Gersdorff, *Feldtbuch der Wundtartzney* (Strasbourg: Johann Schott, 1517). Photo: Courtesy of Wellcome Institute Library, London.

engraving. The use of small complementary figures surrounding a dominant illustration, the way in which it displays the internal parts of the body, the general form of the aperture in the trunk of the figure, and the simplified representation of the organs, all show the debt later fugitive sheets with superimposed figures owe to this image.

The *Feldtbuch der Wundtartzney* was mainly intended for a public of barbers and surgeons. The following year, in 1518, Schott republished his fugitive sheets and bound them into the *Spiegel der Artzney* of Lorenz Fries (or Phrisien), a somewhat different and more obviously popular book that offered advice and prescriptions for home treatment.²⁵ The publication of these texts and of Schott's woodcuts offers a preliminary indication that a public for such useful and simple works existed—at least in Germany. It was this

25. Strasbourg, Grieninger (or Grüninger), 1518. The book by Fries, like the illustrations, clearly met with remarkable success even if only a few months later the publisher decided to republish the *Spiegel* with the same figures, this time using blocks that he had had engraved for the new edition and not for Schott's.

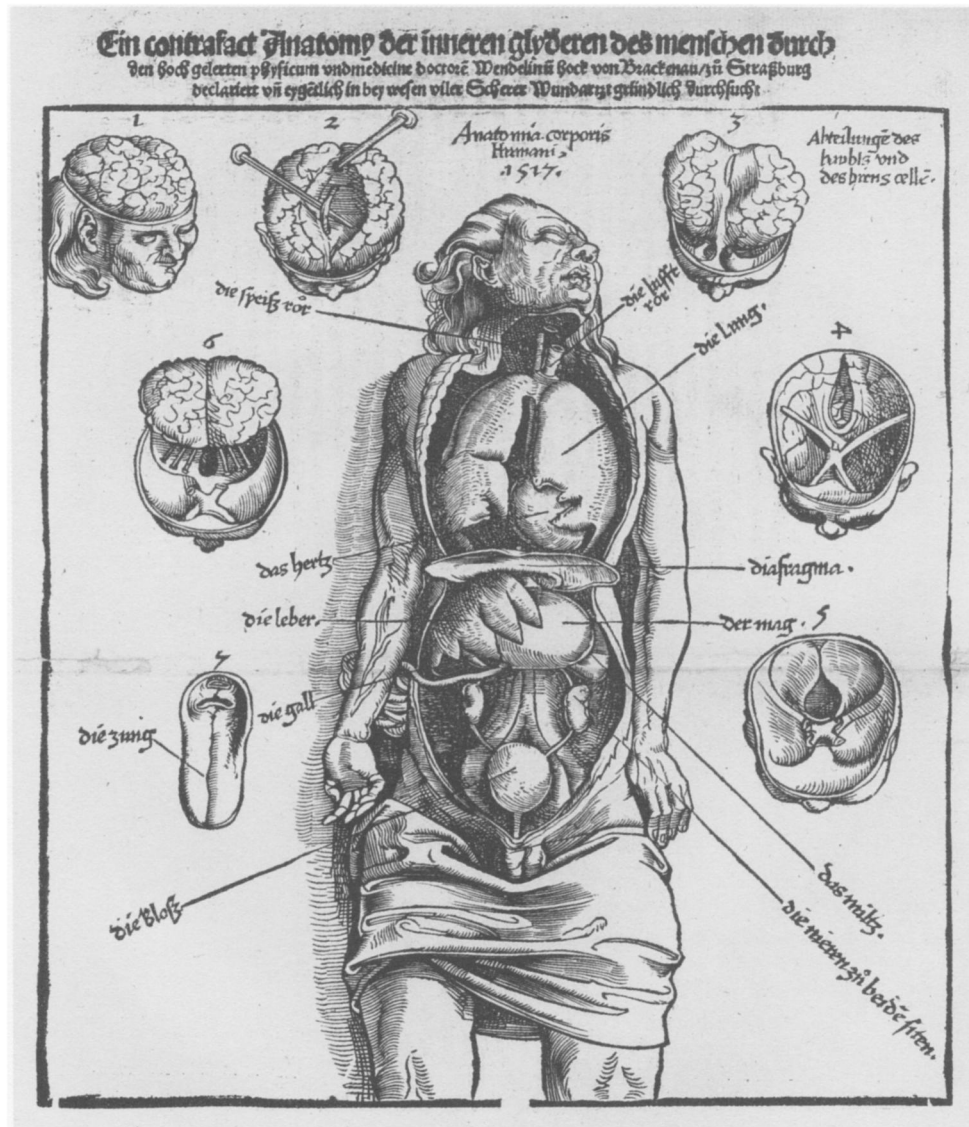


Figure 11. Johann Schott, *Dissected Man*, 1517. From Hans Gersdorff, *Feldtbuch der Wundtartzney* (Strasbourg: Johann Schott, 1517). Photo: Courtesy of The British Library, London.

same public that the publishers of the first anatomical sheets addressed, and they inevitably drew on them for many elements of their own artifacts. Schott's woodcuts mark the beginning of a typological genre obviously inspired by the *danses macabres*, which combines anatomical iconography with texts of a moral nature, thus extending the intention and the implied meaning of anatomical knowledge. This was intended for

medical practice and for the cultural grounding of natural philosophy, but, more than that, it offered matter for reflection on the meaning of life and death, and on the frailty and transience of the body as opposed to that of the immortal soul. Viewed in this way, anatomy came out of the university lecture hall to become a form of knowledge of relevance to a much broader section of society.

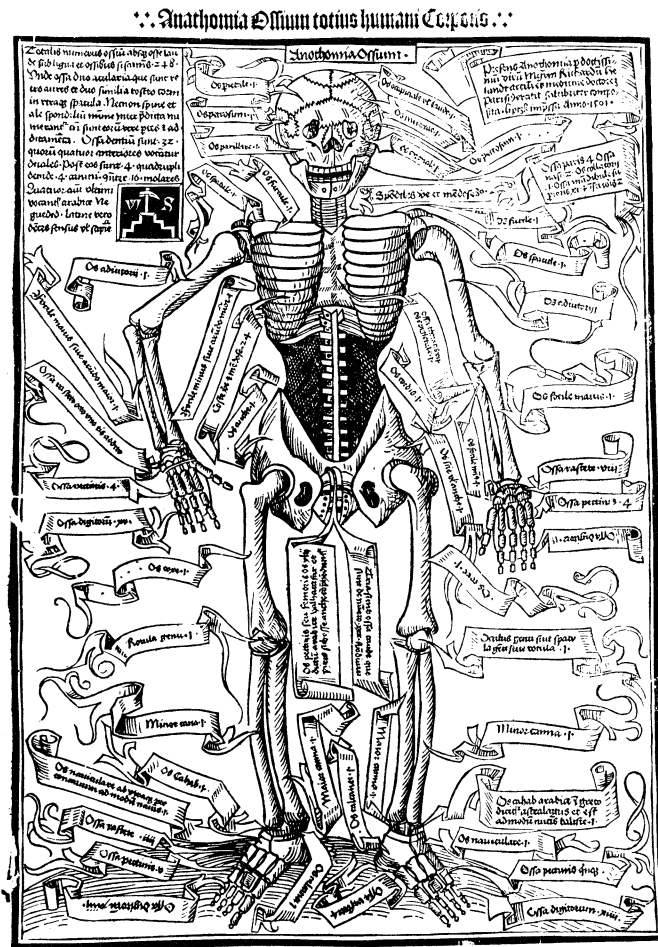


Figure 12. *Skeleton*, 1501 (1st ed. 1493). Wolfgang Stoeckel (printer), Nuremberg. From Magnus Hundt, *Antropologium* (Leipzig: Wolfgang Stoeckel, 1501). Photo: Courtesy of Wellcome Institute Library, London.

Vesalius and the fugitive sheets

In 1538, the year of the publication of the first anatomical sheets, Andreas Vesalius executed and published the *Tabulae anatomicae sex*, six loose in folio sheets. Each of them contained a woodcut and a brief caption to the side of the illustration giving the names of the parts of the body in Latin, Greek, Arabic, and Hebrew, and a few basic notions of physiology (fig. 13).²⁶ In them, Vesalius provided a simplified and

succinct account of Galenic physiology that was to be used by medical students as a graphic aid to university manuals (which normally had no illustrations). It seems highly likely that they were made to accompany the work of Johann Winther (Johannes Guinterius Andernachus) entitled *Institutionum anatomiarum secundum Galeni sententiam ad candidatos medicinae libri quatuor*, a text that was very widely circulated in the first half of the sixteenth century, especially in France, and of which Vesalius himself had edited a Venetian version in 1538, the same year as the publication of the *Tabulae*.²⁷

The dedicatory epistle that opens the *Tabulae* provides some information as to the conception, preparation, and function of these fugitive sheets.²⁸ Here Vesalius described how he did a drawing of the veins to simplify and clarify what Hippocrates meant by *κατ' ἔξιν* during one of his lectures on surgery at Padua on the treatment to be used for inflammation.²⁹ Encouraged by his audience's enthusiasm, Vesalius then decided to prepare various figures for printed fugitive sheets that might be useful to those following the anatomical dissection of corpses in medical schools. The *Tabulae* were in no sense a substitute for the direct observation of anatomical practice, nor could such figures, schemes, and diagrams enable anyone to acquire a *real* knowledge of the parts of the body.

liver with the portal vein and, separately, the male and female reproductive apparatus (pl. 1); the entire length of the vena cava (pl. 2); and the heart with the *arteria magna* (aorta) and its ramifications (pl. 3). The other three plates were designed by Johann Stephen van Calcar, who made a direct copy of a skeleton that Vesalius had reconstructed in January 1537 and used for teaching purposes. On the *Tabulae* by Vesalius, see in particular C. Singer and C. Rabin, *A Prelude*, loc. cit.; but also C. Singer, "Some Vesalian Problems," *Bulletin of the History of Medicine*, no. 5 (1945): 425–438; the pages on the *Tabulae* in M. Roth, *Andreas Vesalius Bruxellensis* (Berlin, 1892), pp. 89–94; and C. O'Malley, *Andreas Vesalius of Brussels* (Los Angeles and Berkeley, 1964), pp. 82–90.

27. This hypothesis was put forward by C. Singer and C. Rabin, *A Prelude*, loc. cit., pp. viii and xxi. Winther's book was first published in Paris by Simon de Colines, 1536. It was reprinted in Basel in the same year, followed by the already mentioned Venetian edition of 1538, the one in Basel of 1539 (reprinted in 1541), and one in Lyons of 1541. Johann Winther was one of Vesalius's teachers in Paris and the author of the first important Latin translation of *De Anatomicis Administrationibus* by Galen (Paris: Simon de Colines, 1531). His text was one of the most widely circulated compendia of Galenic anatomy of the first half of the century.

28. It is printed in the upper part of the first sheet and is addressed to the chief physician of Charles V, the Neapolitan Narciso Vertuno.

29. The practice entailed the opening of a vein on the same side of the body as the inflammation.

26. The publisher of the *Tabulae* was Bernardo Vitali. The first three figures, drawn by Vesalius himself, are anatomical-physiological diagrams rather than anatomical images proper. They represent the

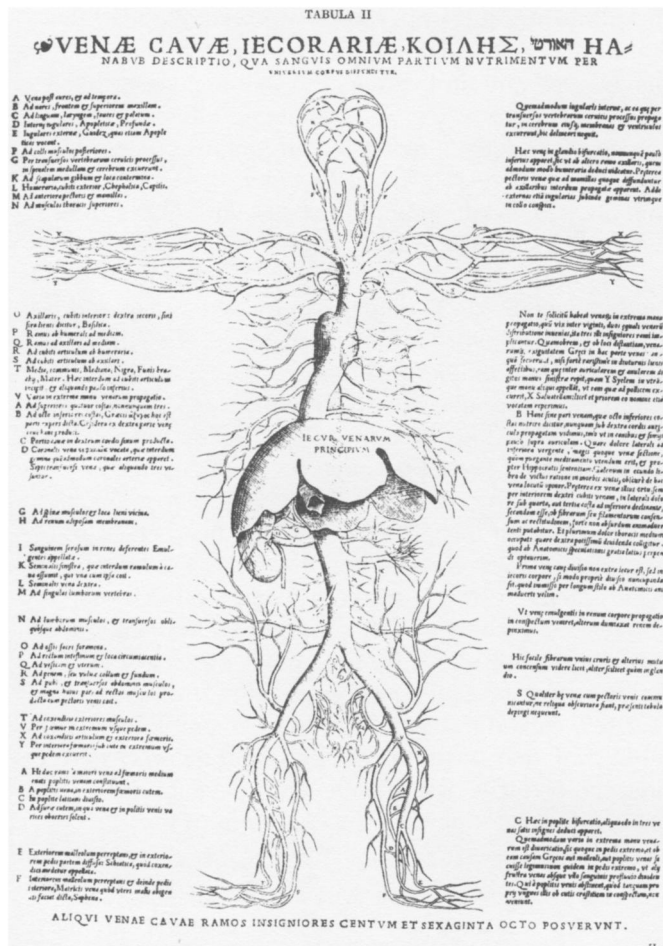


Figure 13. Vesalius, *Tabulae anatomicae sex*, *Tabula II*, 1538. Bernardo Vitali (printer), Venice. Photo: Courtesy of Wellcome Institute Library, London.

Vesalius believed that the chief function of these images was to act as a memory aid for what had been seen in the dissecting theater.³⁰ His *Tabulae* bring to mind the fugitive sheets with their folding superimpositions. Some scholars have pointed out such a connection, although they have tended to obscure the differences between the two kinds of publication.

The *Tabulae* and the *Anothomia* of Negker and Vogtherr were published at the same time; both used a typographic form that was most uncommon in works on anatomical subjects, apart from Schott's woodcuts. Some details illustrating parts of the human body seen

in the *Tabulae* were then taken up by Sabio and Sylvestre in the sheets that they issued from 1539 on.³¹ However, fugitive sheets with superimposed figures were a publishing concept wholly different from Vesalius's very academic *Tabulae*. The sheets were in the vernacular, their text is often dominated by the woodcuts, and, above all, they were intended, as has already been suggested, for nonscholarly readers—the world to which Schott's woodcuts and the booklets of Vogtherr and Guldenmundt belonged. The male and female images, although rudimentary, were attractive and striking, and provided a contrast to the tedious and severe diagrams of Vesalius that illustrated Galenic physiology. They were a game as well as a source of information, with colored figures that opened and closed, and it did not really matter that some anatomical details were vague, mistaken, or out-of-date.

The texts that accompanied these images, their sources, their construction, and their scientific content constituted a genre apart from that of the *Tabulae*, and bore little relation to contemporary research.³² The texts of Vogtherr's and Guldenmundt's sheets were all written and printed in German, without reference to the anatomical teaching of the universities or to Greek and Arabic authorities. The simple terminology and the brief descriptions precluded any learned comment. During the course of the sixteenth century, they were actually pruned and simplified in some cases, further emphasizing their popular character.³³

Nevertheless, some publishers quickly understood that fugitive sheets with superimposed flaps could, in turn, also become rivals to the *Tabulae*. Latin editions, such as the Venice ones of 1539 and 1587, or those of Sylvestre de Paris that were printed in Antwerp (in both the Latin version and the bilingual one), were clearly fashioned for a more educated audience. Parts of the diagrams were corrected, and the text was suitably modified: here, the organs of the body were designated in Greek, Arabic, and Hebrew, and references to

31. The representation of the spine and the bones of the pelvis in Sabio's illustration reveals a possible link to the skeletons designed by Calcar for Vesalius; Sylvestre seems actually to have copied the figure of the male and female urogenital apparatus from the first *Tabula*.

32. A comparison of the texts of the fugitive sheets is given in L. H. Wells, "Anatomical Fugitive Sheets with Superimposed Flaps, 1538–40," *Medical History* (1968): 403–407.

33. In Lang's edition of 1594, for example, the text was half as long as that of the edition of 1539 published by Vogtherr, and omitted the complementary figures and the description of the stomach, liver, lungs, and heart.

30. "Ad memoriam rerum confirmandam apprimere"; A. Vesalius, *Tabulae anatomicae sex*, *Tabula I*.

classical authors such as Galen and Caelius Aurelianus were made.³⁴

Reading the few lines of text contained in these anatomical sheets (despite whatever language in which they were written and published) shows that throughout the sixteenth century the meager anatomical-physiological information they offered remained entirely within the strict Galenic tradition and continued unchanged from the first editions of 1539 and 1540.³⁵ They did not register developments in anatomical research such as Vesalius's or Harvey's, as if they were locked in a stubborn conservatism all their own.

Nosce teipsum

Like the engravings, the texts resembled each other very closely, both in content and in layout. Whether in Latin or in the vernacular, they were essentially designed to supply the nomenclature for the parts shown in the figures and to give simple descriptions of their functions; in some cases, they also described their physiological relation to other parts of the body. Apart

from this object lesson, the sheets were intended to sum up a body of knowledge in a striking image. In the large scroll and on the amphora that appear in the Venetian editions, we read: "*Membra mulieris positu, numeroque, tabella figurat. Quid longis opus est, si brevis esse potes?*" ("The plate shows the female members by position and number. Why should the work be longer if it can be brief?").

The purpose of the figurative sheets was to designate and to synthesize. The images provided a map and a graphic description of human anatomy, of each single part and their mutual relation that the written or spoken word could provide only with difficulty, if at all. The images made it possible to assign a name to each component of the represented human body without uncertainty or confusion.³⁶ But were the anatomical sheets used for this alone? In the text that acts as a preface to many editions and that bears the incipit *Vetus dictum est* (It is an old saying), there are other references to show that these sheets were intended as a stimulus to reflections on self-knowledge. *Nosce teipsum* was one of the maxims of the seven sages of Greece, carved in huge letters on the temple of Apollo at Delphi, and it was very often found incorporated into the prefaces of sixteenth-century anatomical treatises, suggesting its transposition from a

34. The text common to the sheets of the Sylvestre-Bos and Sabio series is in three parts: a preface with the incipit *Vetus dictum est*; a text, entitled *Viva delineatio*, ordered alphabetically from A to Z with the names of the parts of the body and, sometimes, a brief anatomical-physiological description of the organs referred to by the letters; and a text entitled *De utero et muliebris vasis*, ordered numerically from one to nine in the same way as the previous one. In the Venice edition of 1587, the *De utero* is replaced by a longer and more scientifically accurate text entitled *De partibus mulieris generatione servientibus*, where the anonymous author actually provides bibliographical information covering works by Hippocrates, Galen, and Avicenna, from which his anatomical information is derived, thereby presupposing a reader who would be able to make use of such information.

35. The text *Viva delineatio*, in particular, published in numerous editions of the fugitive sheets, seems to have been inspired by Winther's *Institutionum anatomicarum* and may possibly have been drawn upon by Vesalius when he was working on the *Tabulae*. In 1541 Walter Ryff had prepared an anatomical atlas to accompany this unillustrated text: it consisted of nineteen woodcuts, inspired both by the tradition of the anatomical fugitive sheets and by Vesalius's *Tabulae*. The atlas, whose original title was *Anatomi. Omnium humani corporis partium delineatio*, was a great publishing success after the first Latin edition (Strasbourg: Balthasar Pistor, 1541): there were nine editions between 1541 and 1545, in Latin, French, and Flemish. We know that Winther's work, *Anatomicarum institutionum Galeni*, figured in the inventory of Cornelius Bos's property in August 1544. In 1542 Bos was working on a new series of blocks for the publication in Antwerp of Ryff's atlas. See J. Cuvelier, "Le Graveur Corneille Bosche," *Bulletin de l'Institut Historique Belge de Rome* 20 (1939): 40, n. 2; and S. Schele, *Cornelius Bos*, loc. cit., p. 154.

36. That anatomy was a discipline transmissible, above all, visually, is already attested by Aristotle in the biological works; on several occasions, he points out the impossibility of clearly explaining certain aspects of human and animal anatomy uniquely by discussion and verbal description. For more precise information and a succinct and effective exposition, he therefore refers his readers to the *Anatomical Tables* (see, for instance, *De Partibus Animalium*, 650 a 31–32, 668 b 29–31, 680 a 1–4 and *Historia Animalium*, 497 a 32, 509 b 22, 511 a 13, 525 a 9, 529 b 19, 530 a 31, 565 a 12, 566 a 15). Henri de Mondeville, a surgeon from Montpellier, was of the same opinion ("there are few things in these two sciences [anatomy and surgery] which can be communicated through discourse"). See *La "Chirurgie" de Maître Henri de Mondeville (1306–1320)*, ed. and trans. E. Nicaise (Paris, 1893), p. 754. In his notebooks, Leonardo da Vinci stresses the explanatory and descriptive virtues of images as opposed to words that are often unclear and inadequate to render the complexity of the human body: "And you, who hope to demonstrate the figure of man with words in all the aspects of his structure, put this hope from you, because the more minutely you describe it, the more you will confuse the mind of your reader and the further you will remove him from the knowledge of the thing described. . . . O writer, with what letters would you compose the entire figuration with as much perfection as does drawing here?" (See Leonardo MSS., Windsor Castle, Royal Library, fols. 19013v and 19071r.) For a modern edition, see *Leonardo da Vinci. Quaderni d'Anatomia (I–IV)*, ed. O. Vangensten, A. Fonahn, and H. Hopstock (Christiania, 1911–16). See also M. Kemp, *Leonardo da Vinci* (London, 1981), particularly pp. 270–272.

psychological to a physical and anatomical interpretation. The anonymous author of the *Vetus dictum est* is quite specific about the meaning of the divine imperative: to know oneself means to admire the composition of the human body and all its parts; to look upon the extraordinary spectacle of its functioning.³⁷ Self-knowledge, therefore, concerned all those who wanted to know the "facts and secrets of the marvelous work of God." Suggesting a further gloss on the possible functions of these sheets, the text clearly states that they were designed so that they might not be used only to "*memoriam refricare*," to refresh the memory of the person who had witnessed the dissection of a human body, but also to foster a desire for the knowledge of anatomy among those who had never previously felt such a need. The authors, therefore, envisaged a double use for these fugitive sheets—as a mnemonic device and as an invitation to self-knowledge; the two uses concerned different social and professional categories. When the texts published in Latin are compared with those in the vernacular—the former with their copious Greek and Arabic terminology and quotations from the classics, the latter with their briefer descriptions—the double purpose of the different groups becomes evident. Thus Sylvestre, Bos, and Ruelle had in mind two culturally distinct groups of readers when they published vernacular and Latin editions of fugitive sheets at the same time, associating different texts to the same images. Fugitive sheets such as those published by Sabio in Venice, where the names of the individual organs are indicated in Latin, Greek, and Arabic, were clearly to be used to locate the parts of the body. Such sheets, which were intended for students at faculties of medicine, would therefore have been prepared and published with the same aim and in the same spirit as the *Tabulae* of Andreas Vesalius: that is, for a student market, as a teaching version of an artifact that had not originally been conceived for that purpose.

The public targetted by the publishers-engravers in their vernacular editions must have been very different. No doctor, surgeon, or medical student would have

bought or used sheets that were scientifically rudimentary, and they were, therefore, of no interest to anyone with even the most elementary medical training. Moreover, the descriptions and terminology were so meager that they could not possibly have been used as a visual complement to any university manual. The public for these vernacular sheets should be sought lower down the social scale, among that broad sector of the literate population that had little or no knowledge of classical languages and very scant and confused ideas on the anatomy of the human body. This public undoubtedly included barbers. Various Italian manuals published at the end of the sixteenth century were intended for their professional training in healing and surgery required primarily lessons of manual dexterity and proof of moral and psychological rectitude for aspiring practitioners. Such texts never demand acquaintance of human anatomy or any elementary scientific knowledge. Barbers had to carry out "the orders of their Masters, the Doctors" and act exclusively under their control in every separate treatment. They were not expected to know Latin,³⁸ and it actually seems possible that some barbers were not able to read the vernacular prescriptions given to them by doctors.³⁹

There is some circumstantial evidence that barbers were part of the intended public of these vernacular anatomical fugitive sheets. Gilles Godet, a French engraver, publisher, and printseller who had emigrated to London for religious reasons, issued a single sheet with the male and female figure bearing the monogram R. S. about the middle of the sixteenth century (fig. 14).⁴⁰ It was reprinted several times both in France and in England during the next hundred years. In Godet's

37.

Vetus dictum est atque id non ab homine, sed a Deo profectum, Nosce teipsum: quo mihi nihil aliud praeceptum esse videtur, atque admirandam corporis humani compagem, numerum, ordinem, positum viscerum, eorumque officia subinde contemplanda. Haec n. exacte novisse non medicorum duntaxat interest, sed et omnium quibus in animo est, divini opificii miranda consilia, factaque perlustrare.

38. In 1588 Pietro Paolo Magni wrote: "What profit could Barbers derive from such books, written in Latin, if there are none or very few, and particularly in Italy, who have any knowledge of the Latin language?" (in his *Sopra il modo di fare i Cauterii o Rottorii a corpi humani* [Rome: B. Bonfadino, 1588], p. 2).

39. Giovanni Andrea Solia (*Pratica delle operationi delli barbieri in essecutione de gli ordini de' Sig. Medici* [Rome: G. Mascardi, 1619]) emphasized the barber's subordinate position and drew an ideal portrait of one: able, young, clean-living, modest, sympathetic to the poor, strong of hand, and resolute of mind. On p. 4, in connection with certain unfortunate adventures that had befallen him, he felt the need to specify: "And it is necessary that [the barber] should know how to read, so that he may read the Doctor's prescription, should it have been written down."

40. Attribution of this anatomical fugitive sheet to Gilles Godet is confirmed by the fact that a woodcut entitled *The anatomie of the inwarde partes of man and woman* was registered in his name,



Figure 14. *Nosce te ipsum. Knowe thyself*, ca. 1555. Gilles Godet (printer), London. Photo: Courtesy of British Museum, London.

sheet, the man has his left hand in a bowl of water so as to swell the veins and facilitate bloodletting, while the woman holds a notice with the words: "*Nosce te ipsum. Knowe thyself.*"

Various veins, those normally tapped by barbers in bleeding, are visible on the body of the man. This image is always accompanied by two other sheets

containing three texts, always in the vernacular, and keyed to the figures by numbers and letters. Two texts are devoted to the location and a brief description of parts of the male and female body; the third is called *The declaration of the letters signifyinge the principall veynes to lette bludde*.⁴¹ In this latter text, in addition

between 1562 and 1563, at the Company of Stationers of London (*A Transcription of the Register of the Company of Stationers of London, 1555–1640 A.D.*, ed. E. Arber [London, 1875], vol. 1, pp. 90a–91a). I am currently working on an article dealing with Godet's typographical activity, which is to be published shortly in *Print Quarterly*. Of the later issues, I am familiar with three Paris editions, including an undated one by Mathurin Biesmont (Bibliothèque Nationale, Cabinet des Estampes, Paris), another by Jean Gourmont of 1585 (mentioned by Choulant, *History*, loc. cit., p. 160), and one published by Michel la Mathonière in 1613; there is also a London edition by Peter Stent of 1658 (see Peter Stent, *London Printseller, circa 1642–1665: Being a Catalogue Raisonné of His Engraved Prints and Books with an Historical and Bibliographical Introduction*, ed. A. Globe [Vancouver, 1985], p. 23 and cat. no. 533).

41. Godet's fugitive sheet and the two sheets of explanatory text are bound into all the copies I have managed to see of the *Compendiosa totius anatomiae delineatio aere exarata per Thomam Geminum* of the London edition of 1559. A few years earlier, possibly in 1546, John Herford published a fugitive sheet in London, also executed by Geminus, which shows a clothed man seated on a bench with his left hand immersed in a basin of water, showing the veins used for bleeding and marked with letters from A to K. A text identical to that published by Godet for the veins is printed to the side of the figure and bears the title *A table instructive when and how a man may connyngly let bloude of all the necessary veynes . . . for all chirurgeons and barbers*. One copy, the only one known to me, is bound into the *Compendiosa totius anatomiae delineatio* (London, 1553) in the National Library of Scotland in Edinburgh. It seems clear that Goden was combining the idea of the fugitive sheet and Geminus's blood-letting iconography.

to the names of the veins to be used in bleeding, the author provides succinct and effective advice on procedure.

Yet another fugitive sheet with superimposed figures, published in Milan in 1663, offers this blend of elementary anatomical information and bleeding techniques for the use of "barbers and practitioners of Surgery."⁴² The male figure in the center of the sheet shows the veins to be used to "let blood," and text, on either side of the image, provides the captions to the letters that indicate internal parts of the body, while the numbers refer to the veins. On the lower part of the sheet is a hand with a scalpel and a vein, and instructions on making an incision.

All these modifications to anatomical sheets specifically designed to help in bloodletting suggest the public for which they were intended. Even before publishers or printers altered texts and figures for their "specialist" use, barbers and surgeons acquired them and displayed them in their shops. Some of these sheets, even the ones with modifications for the barbers, show that they were intended for an unprofessional audience. The Milanese sheet of 1663 includes an Italian translation of the *Vetus dictum est*, while the very title of the sheets published by Godet presupposes a nonspecialist reading: *The anatomie of the inwarde partes of man . . . very necessarie for Phisytians and Surgians and all other that desyre to know them selves*. Addressing the lay reader, the text on the vein ends as follows: "by the which (table) thou mayst exercise and teach thyselfe lightly and without daunger of any evyl accidentes to cutte any veyne of mans body," a clear allusion to the private, domestic, nonprofessional practice of bleeding.

Wittenberg: anatomy and religion

Such references to a general audience may be interpreted as a commonplace of commercial rhetoric used by publishers and printsellers to extend the public for their anatomical fugitive sheets. Even though the practice was rhetorical, it does not mean that it was either devious or misleading. They clearly hoped that

42. *Il vero disegno delli interiori del corpo humano, con Instruptione, e Regola per sapere bene tagliare le vene in tutte le parti del detto corpo humano secondo l'opinione de Medici antichi e moderni più famosi* is by Antonio Moneta, "Barbiero e professore di Chirurgia," published by Filippo Ghisolfi. Under the image is the signature "Cesare Laurentio fece." There is a copy in the Wellcome Library.



Figure 15. *Anatomical Fugitive Sheets (man)*, 1573. S. Gronenberg (printer), Wittenberg. Photo: Courtesy of Wellcome Institute Library, London.

their rather unusual printing exercises, which outlined the rudiments of the *fabrica* of the human body and were sold at absurdly low prices when compared with those of any book on the same subject, might prove attractive to those who had nothing to do with medicine or professional therapies. The potential purchaser might simply be responding to the moral call for "self-knowledge." Such a view is borne out by a series of editions of anatomical sheets with superimposed figures published at Wittenberg from the second half of the sixteenth century on. One of these consists of three sheets: the first represents the skeleton and the other two the images of a man and woman composed of superimposed figures with flaps. They were printed in 1573 by S. Gronenberg, "*in gratiam studiosae iuventutis, discentis elementa doctrinae*

43. As is written on the *Tabula foeminae membra demonstrans*. There is a copy of each of the three sheets in the Wellcome Library. An edition datable to around 1562 is mentioned by V. Nutton,

Anatomicae in libello de Anima" (fig. 15).⁴³ The *De Anima* quoted here is the one published by Philipp Melanchthon in 1540 and revised in 1552; it was used as a textbook by students in the faculties of medicine, philosophy, and theology. Melanchthon considered anatomy central to theological and philosophical—even to moral—speculation in the strictest sense, because it constitutes a demonstration of divine power, while it offers grounds for reflection on the topic of death and the transience of life.⁴⁴

The anatomical sheets circulating in Melanchthon's Wittenberg could, therefore, be interpreted as a visual support to his *De Anima*, while they also acted as a *memento* of all moral, philosophical, and theological notions that could be evoked by anatomy and the anatomical image. An analogous discourse about *vanitas* and the glory of God through the anatomical figure may be read in the *Catoptrum Microcosmicum* by Doctor Johann Ludwig Rummelin, published several times and in various forms and languages between 1613 and 1744 (fig. 16).⁴⁵ It provides proof, if proof is still needed, of the moral meaning of anatomy as it was read in Schott and the text *Vetus dictum est*, that it was indeed addressed to "all those who lived in fear of God" and was not bound to any practical application.

Multiple readings of the anatomical sheet

Wherever they were published, the entire body of sixteenth- and seventeenth-century anatomical fugitive sheets with superimposed figures seems to have been constructed on a single model, one prototype for all

"Wittenberg Anatomy," in O. P. Grell and A. Cunningham, *Medicine and the Reformation* (London, 1993), pp. 11–32. Gronenberg reprinted his *Tabulae* in 1589 and 1601. Two more editions of fugitive sheets were published in Wittenberg by Schönborn, probably in 1590, and another in 1625 by Johann Germanus. Interestingly enough, in all these sheets, the man is represented in the manner of Andreas Vesalius.

44. On Melanchthon, the *De Anima*, and the fugitive sheets printed at Wittenberg, see V. Nutton, "Wittenberg Anatomy," loc. cit.

45. Seven copies, each of a different edition, are now in the Library of the College of Physicians of Philadelphia: 1613, 1614, 1615, 1639, 1661, 1702, 1744. Other editions of 1619, 1632, 1660 (two different editions, one published at Augsburg, the other at Frankfurt am Main), and 1667 are in the Wellcome Library. See W. Pfeilsticker, "Johannes Rummelin," *Archiv für Geschichte der Medizin* 22 (1929): 174–188, 382–392; and W. B. McDaniel, "The Affair of the '1613' Printing of Johann Rummelin's 'Catoptron,'" *Transactions of the College of Physicians of Philadelphia* (1938–39): 60–72. A more recent work, with a complete bibliography of the work of Rummelin, is K. F. Russell, *A Bibliography of Johann Rummelin the Anatomist* (East St. Kilda, Australia, 1991).

written texts and engraved figures. This model originated in the publishing circles formed in Germany during the first years of the Reformation, which catered to a new, wider public of craftsmen, merchants, and laymen, literate but not highly educated, who read exclusively in the vernacular and learned through image rather than the printed word.

Inevitable modifications were introduced into the sheets over the years chiefly so that they could be addressed to certain specific professional groups, therapists such as barber-surgeons and even university students—yet even these were used not only as aids for some specific task such as memorizing parts of the body or as prompters for surgical procedure but also as a sort of icon. From Sabio to Rummelin, the publishers



Figure 16. Johann Ludwig Rummelin, *Catoptrum Microcosmicum*, *Visio secunda*, 1619. D. Franck (printer), Augsburg. Photo: Courtesy of Wellcome Institute Library, London.

associated scientific information to a theology of knowledge that made the human body the place of the glorification of the work of God, and the act of acquiring knowledge about it a universal imperative. Everyone was to recognize divine power and the limits of their earthly existence within and through their own bodies. This was the message of the sheets, and they had a moral value contained within the anatomical discourse that was the same in both the popular version and the learned one.

Anatomical self-knowledge was a learned theme that had its roots in Greek philosophy and in Galenic rational medicine, which was constantly echoed through Renaissance lecture halls. But it was also a theme that, suitably handled, aroused general curiosity among those who had never heard of Galen or Vesalius. That is why these sheets proliferated and circulated throughout Europe for so many decades, appealing across cultural and social distinctions. It helps to explain their enormous public and even commercial success: all that seemed required was that ingenious device of a very brief text and a striking image that was also a toy.