I

LATE MEDIEVAL HERBALS

KONRAD VON MEGENBERG, *Buch der Natur*, 14th century. Binding

1. Konrad von Megenberg (*c.* 1309–1374)

Buch der Natur, 14th-century German manuscript, perhaps compiled in Regensburg

28.5 × 20.5 cm. 332 leaves, numbered subsequently in pencil, with gouache drawings and text in German *lettre bâtarde*.

PLATES: 304 total: 163 of plants, 137 of animals, two of insects, one of minerals, one scene with mountains, all gouache drawings on paper.

BINDING: 15th-century deerskin over wooden boards with remaining brass studs and bosses on covers. Various small sheets of paper with manuscript text pasted on inside of boards.

PROVENANCE: Library of Count Erbach-Fürstenau [possibly Philipp Karl (1677–1736)].

REFERENCES: Anderson, pp. 73–81; Arber, pp. 13–14; Gottschall.

This is a rare manuscript copy of one of the first scientific encyclopaedias to appear in Europe, *Buch der Natur*, a work that enjoyed an immediate success that is reflected in its diverse publishing history. The first printed edition was produced by Johann (Hans) Bämler in Augsburg in 1475 and represented a significant event, for it was among the earliest illustrated incunabula to appear in Germany. Other editions came out within the space of a few years: Bämler reprinted the work in 1478 and 1481; a fourth edition was produced in 1481, also in Augsburg, by Johann Schönsperger; and another Augsburg edition was published by Anton Sorg in 1482. While *Buch der Natur* cannot be considered an herbal in the strict sense of the term, both the manuscript copies and printed editions were embellished with a rich sequence of botanical images, resulting in a work that bears many affinities to the typology of the herbal. In addition, the *editio princeps* contains the first instance of a botanical woodcut.

The author was a German who was born around the year 1309 in the town of Megenberg close to Schweinfurth. After studying at Erfurt, and then at the university in Paris—where he earned the title of *Magister* and taught philosophy and theology from 1329 to 1337—he moved to Vienna to serve as director of the celebrated St. Stephen's School. His career culminated in his appointment as bishop of the city of Regensburg (Ratisbon), where he died in 1374.

Some of Konrad's other writings that should be acknowledged are a small German compilation dealing with physics and astronomy, *Sphære*, from the Latin work of Johannes Sacrobosco; *Planctus ecclesiæ in Germania*, a poem written in 1337; *Speculum felicitatis humanæ*, a work from 1348 on morals; *De erroribus Begehardorum et Beguinarum*; *De translatione imperii* (On the Transfer of the Empire, 1355); *Œconomica*, a large work written between 1353 and 1363; *Tractatus contra mendicantes ad Papam Urbanum V,* a work on managing beggars; a number of biographies of saints; several historical treatises on the local history of Regensburg; and a hymn in praise of the Virgin. Konrad's writings strongly reflect his

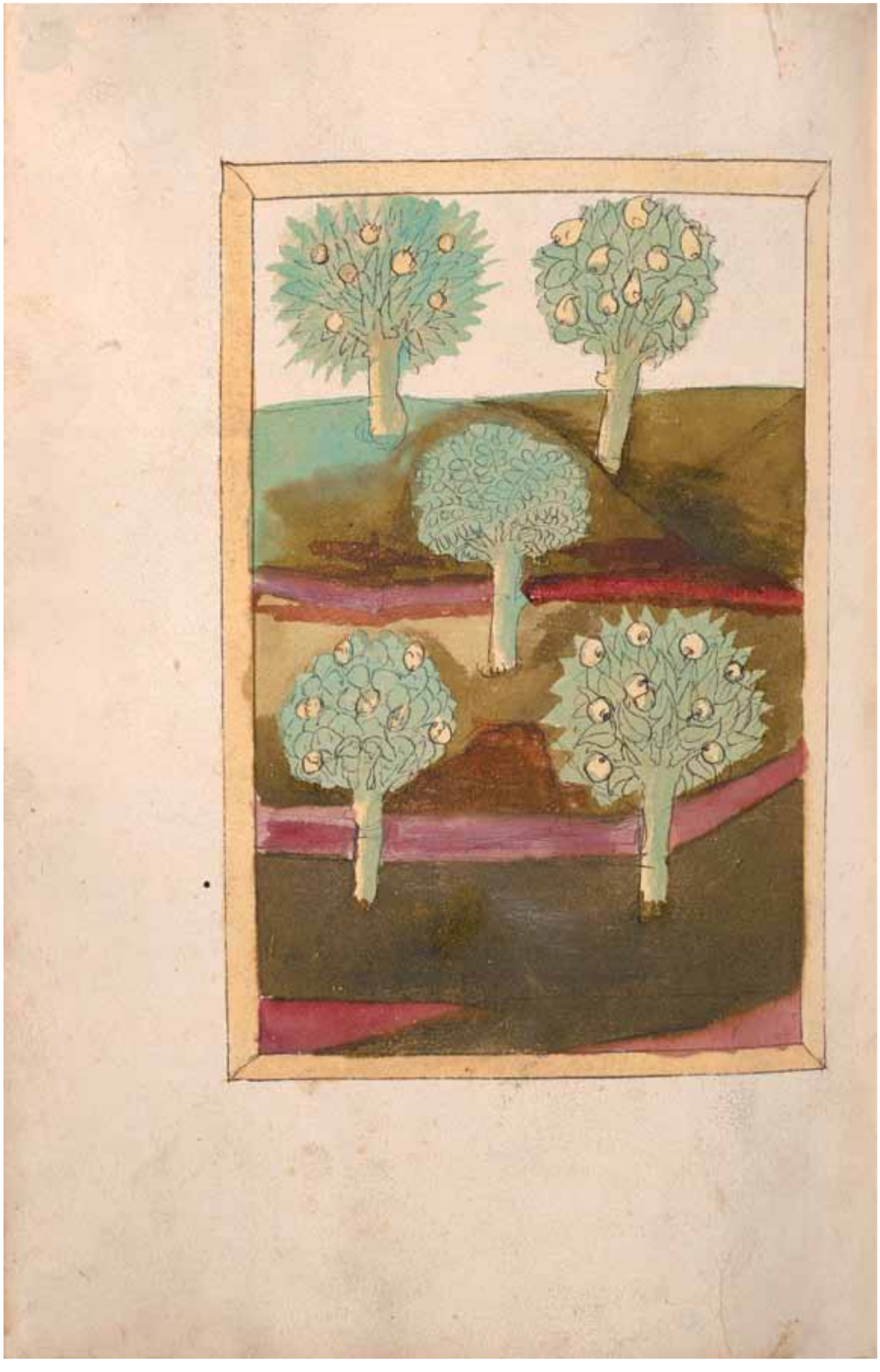
support of the pope, as against William of Occam, who questioned the Church's temporal power, as Konrad also opposed Occam's reforms of Scholasticism.

During his sojourn in Paris, Konrad translated a text on the natural sciences—*De natura rerum* by Thomas de Cantimpré—into a German dialect spoken in a region of what is today Austria and Bavaria. Thomas de Cantimpré, a student of Albertus Magnus and a Dominican friar from an area of the Low Countries that now corresponds to Belgium, lived and preached during the first half of the thirteenth century. Konrad's aim with this vernacular translations was to present the whole of human knowledge concerning the nature of things in a single volume that would appeal to a general public made up of both men and women who had no acquaintance with Latin, the language of the cultivated elite. Thomas' philosophy was based on the conviction that God manifested Himself both in the tangible aspects of the world (*res*) and in the more profound signs that could be attributed to these things (*significationes*).

Guided by this conception and using *De natura rerum* as his model, Konrad set out to compile his own encyclopaedia, *Buch der Natur*, dedicating it to 'ein gutes Freund,' perhaps a colleague at the St. Stephen's School in Vienna. Like Thomas de Cantimpré, Konrad's purpose was to conduct the reader through a study that could be apprehended by the senses toward a more exalted contemplation of the invisible and spiritual that could only be apprehended by the mind. In obedience to the duty of the Christian scientist in the Middle Ages, he sought to unveil the divine plan that lay hidden beneath the myriad aspects of the material world and to demonstrate how the physical world reflected this divine order.

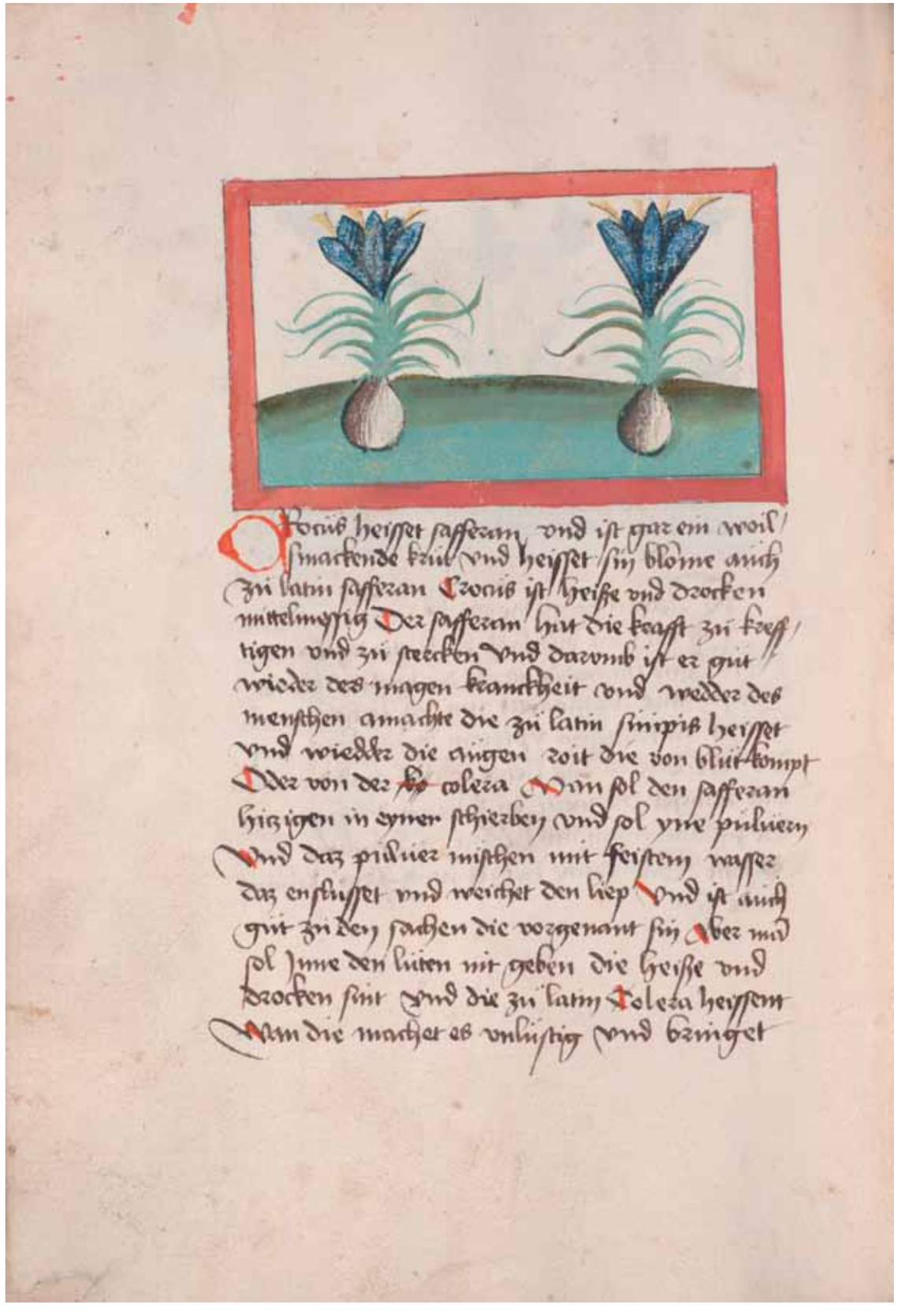
Buch der Natur is made up of a large number of short chapters. There is an extensive description of the human body, the heavens, and the seven planets, explained in accordance with the concept of the four humors that were thought to be responsible for a person's nature and physical characteristics. The humors were directly linked to the four seasons of the year, and to the four elements or 'roots of all things'—earth, fire, air, and water—as described by the Greek philosopher Empedocles. And, as expounded by the Greek physician Galen (A.D. 129–201), earth was associated with autumn and a melancholy character; fire with summer and a choleric temperament; air with spring and a sanguine humor; and finally water was linked to winter and a phlegmatic temperament. Illnesses were caused by an imbalance between these four humors, or by an excess of one of them. This theory formed the cornerstone of medieval medicine and would continue to influence the thinking of many physicians until the end of the eighteenth century.

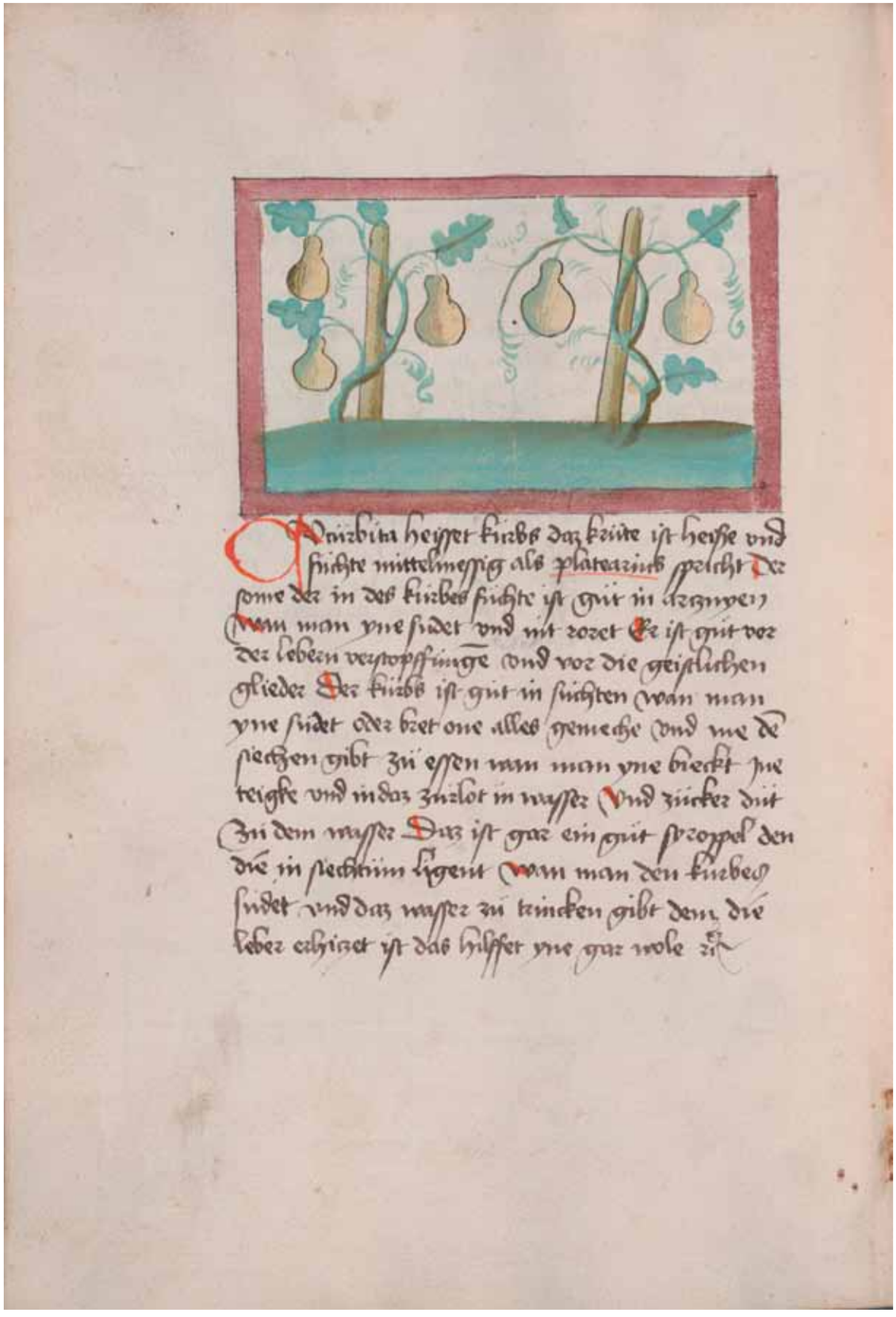
Ample space in Konrad's encyclopaedia is dedicated to animals (birds, fishes, serpents, worms, and insects) and plants and simples, but the author also discusses spices from the Orient, precious stones, minerals, and metals. The work presents an overview of the secular, popular knowledge of the period, and in many chapters begins to show a direct rather



KONRAD VON MEGENBERG, *Buch der Natur*, 14th century. Five small trees: apple, pear, hazel, cherry, and one in center unidentified, folio 194^{v}

KONRAD VON MEGENBERG, *Buch der Natur*, 14th century. *Crocus* sp., folio 246^{v}





KONRAD VON MEGENBERG, *Buch der Natur*, 14th century. Cucubits (*Cucurbita pepo*) growing on poles, folio 247v

than an *a priori* approach to the study of physical phenomena. This attitude emerged as a response to the demand for concrete knowledge on the part of a new middle class. *Buch der Natur* therefore was conceived as a veritable compendium of knowledge in a period of transition between the Middle Ages and the early modern age.

As with the other encyclopaedias of the period, the material presented by Konrad was not original, but rather was collated from many other sources, beginning with Thomas de Cantimpré's *De natura rerum*, entire parts of which he appears to have translated and transposed to his own work. Further sources that he drew upon include the works of the Greek philosopher Aristotle, the medical texts of Galen, a heritage that had been preserved by the Arabs and subsequently transmitted to medieval Europe, the 'Canon' of the Muslim physician and philosopher Avicenna, who died in 1037, and the writings of the medical school at Salerno.

Konrad's vast erudition, however, allowed him to ransack other works from late Antiquity and the early Middle Ages, such as Isidore of Seville's *Etymologiæ* (A.D. 570–636), and, for his section on animals, the celebrated anonymous work *Physiologus*. The primary sources for the chapters dedicated to plants were *De vegetabilibus* by the Dominican theologian and philosopher Albertus Magnus, who also served as archbishop of Regensburg one century prior to Konrad, and the work of Matthaeus Platerius, a physician associated with the medical school of Salerno, which flourished between the eleventh and thirteenth centuries, who is credited with a compilation of a series of pharmacological manuscripts widely read all over Europe, known by its opening phrase *Circa instans*.

Konrad was not merely a passive conduit, content to disseminate the ideas and knowledge of others. He carried out many studies of his own and was the author of various original observations on, for example, the properties of the magnet and the processes of evaporation and circulation of water, which anticipated by many years the speculations of Leonardo da Vinci and the experiments of Bernard Palissy, a French ceramist, natural historian, and designer of gardens who was active during the second half of the sixteenth century. Konrad's knowledge of botany was equally profound and much of it was clearly the fruit of direct study, for he amplified the section on plants in his encyclopaedia from the 114 described by Thomas in *De natura rerum* to a total of 173, by adding his own descriptions of fifty-nine plants.

No less than fifty-six manuscript copies of *Buch der Natur* are known to exist, and of these forty-six are illustrated, a fact that demonstrates the importance ascribed to the scientific illustration in the encyclopaedic works being written at the dawn of the modern age. Among the manuscripts that have survived, the work in the Oak Spring Garden Library is without a doubt one of the most outstanding, not only because of the pristine state of its pages and the beautifully legible calligraphy in German *lettre bâtarde*, but also

because of the sheer number of the drawings (304) and their vivid coloring and refined execution. Indeed, this is one of the most lavishly illustrated copies of Konrad's encyclopaedia extant; the exemplar at the Library of Würzburg has a mere twenty-nine illustrations and the one in Frankfurt forty. The library at the University of Heidelberg owns two manuscript copies of *Buch der Natur*, one of which is embellished with sixty-one illustrations and the other 304. The latter is therefore the only exemplar comparable to the work described here in terms of the magnificence of its visual component.

In the Oak Spring Garden Library manuscript we find interspersed throughout the text 163 vignettes of plants, 139 of animals, and one of a mineral; sometimes two images appear on a single page. The drawings, set off by frames in alternating colors, are quite lively and convincing. The plants are almost always portrayed in a realistic setting—growing out of the ground or, in the case of aquatic species, floating in the water. Sometimes their roots are also shown, perhaps in the interests of scientific documentation and to help physicians and naturalists identify the plant.

The unknown artist has applied his dense colors with great skill and appears to have based his drawings on the direct study of nature rather than merely relying on the codified and repetitive imagery of the contemporaneous herbal.

2. Herbal Manuscript, *Italian School* (*c.* 1425)

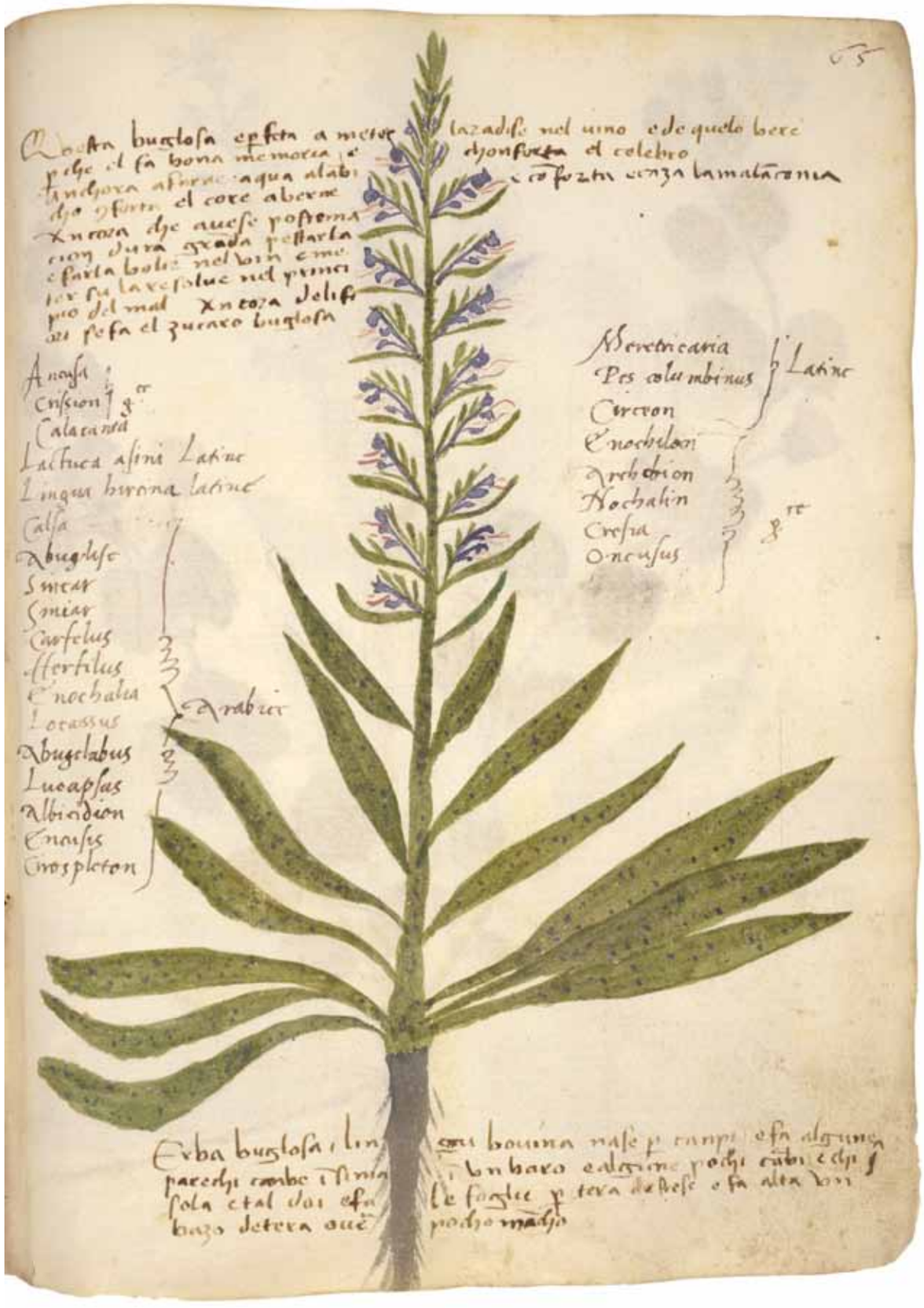
28 × 21.3 cm. 121 leaves of plants with manuscript text in early Italian and Latin, including a manuscript index of the drawings; five blank leaves.

PLATES: 116 watercolors of various plants, some with pencil and ink, all on paper.

BINDING: Contemporary vellum, which was subsequently re-backed in old vellum.

PROVENANCE: Leaf 117 states that the manuscript belonged to a member of the Paradiser family of Trisoz, in the Austrian Duchy of Carniola. Christoph Ruaber (1466–1536), son of Helena Paradiser who served in the courts of Maximilian I and Ferdinand I, is also mentioned.

THE HERBAL represented an essential tool for physicians, pharmacists, and herbalists who gathered or cultivated their own plants for the treatment of patients. This manuscript, which was compiled sometime during the first quarter of the fifteenth century, constitutes a typical example of an herbal that might have belonged to such a practitioner. Works of this kind were in use all over Europe and given their purpose, which was one of paramount utility, they would continue to be in great demand even after the invention of the printing press.



ITALIAN SCHOOL,
An herbal, circa 1455.
Viper's bugloss
(*Echium vulgare*),
folio 65r

HERBAL MANUSCRIPT (*c.* 1425)

The writing in this manuscript seems to date to the first quarter of the fifteenth century. A later annotation in Latin (fol. 117) suggests that the herbal belonged at one time to a member of the aristocratic Paradiser family of Trisoz, in what was formerly the Austrian Duchy of Carniola. The text also mentions Christoph Ruaber (1466–1536), a son of Helena Paradiser who held important positions at the courts of Maximilian I (1459–1519) and Ferdinand I (1452–1516). These manuscript herbals served during the late Middle Ages as veritable manuals of practical medicine. Their text and images were usually mechanically copied from earlier works of the most varied provenance, drawing upon the traditions of both the classical and Arab civilizations. The contents, however, were often integrated with glosses and personal observations by the successive owners, who introduced additions and corrections that were the fruit of their own concrete experiences.

This herbal, with its somewhat miscellaneous organization, evidently served as a working tool for a series of diligent medieval scientists, for in addition to the extensive notes of the original author it contains annotations in Latin and Italian, added at different periods by subsequent owners of the book. The alphabetical index that closes the work was drawn up at some later date. The vocabulary employed does not provide any clear clues as to the provenance of the author, although it is possible that he originally came from the central-northern part of Italy.

Like many other herbals painted in Italy during this period (analogous works include MS. 106 in the Botanical Library of the University of Florence, MS. 1591 in the Museo Provinciale d'Arte di Trento, and MS. 1161 of Joppi Library in Udine), this manuscript consists of a series of botanical drawings executed in a markedly geometricized style, the artist sometimes incorporating anthropomorphic elements from medieval herbal lore. The plants presented are species that were common to the Italian peninsula in the fifteenth century. Each drawing portrays a specimen in a frontal view, often with its roots, in a simple gouache drawing with no shadowing. Herbals of this type generally had few artistic pretensions, but the archaic, ingenuous, and spontaneous style of the drawings lend these works great charm to modern eyes. Despite the abbreviated style of the artist, the plants can be easily identified. To aid the herbalist, each is also labelled with the name or names (usually in Italian) by which it was known, and sometimes information on its habitat—for example, 'l'herba santi pauli nascit in pratis arenosis' (the herb of Saint Paul grows in sandy soil) (fol. 13)—or recipes for its use in the preparation of simple remedies.

The manuscript opens with the illustration of a yarrow plant (*Achillea millefolium*), portrayed in the artist's characteristically schematic style. The herbalist has filled the empty spaces on the page with notes describing the plant and its properties; his scribbling sometimes strays onto parts of the drawing itself, confirming the essentially practical use to which this handbook was devoted. One of the notes informs the reader in antique

ITALIAN SCHOOL, *An herbal*, circa 1455. Flowers of *Viola* sp., folio 79^{v}

vernacular Italian that 'E' bona a persona che avesse febre terzana' (This is good for the person who has the third fever). Beneath the drawing in another, more educated hand, which recurs on many of these pages, is a notation in Latin identifying the specimen as an *achillea alias mellefolium, sive millephilon*. In some of the drawings, such as that of the narcissus (fol. 40^{r}), the artist has colored in the background around the flower with a series of rapid brushstrokes. In others, such as the mallow (fol. 40^{v}), the artist has added details of the flower, albeit somewhat loosely and inaccurately drawn. In accordance with established iconographic tradition, the mandrake plant is shown with its root in human form in fol. 44^{v}.

ITALIAN SCHOOL,
An herbal, circa 1455.
Details of various plants: top left, Lady's mantle (*Alchemilla vulgaris*); top right, Grape vine (*Vitis vinifera*); center, Belbine (*Calystegia sepium*); below, Monkshood (*Aconitum* sp.), folio 118^{v}

3. [H]ortus Sanitatis, Paris [*c.* 1500]

[*Xylographic titles with calligraphic initial L for Part Two and initial L with grotesque head for Part Three. Part One, Volume I,* a1]: Ortus sanitatis translate de latin en francois. [*Part Two, Volume II,* A1]: Le traictie des bestes, oyseaux, poissons, pierres precieuses et orines, du jardin de sa[n]te. [*Part Three, Volume II,* 3a1]: Le traictie des urines.

[*Imprint from Antoine Vérard's device, last leaf in second volume*]: Anthoine Verard humbleme[n]t te recorde ce qu['] il a il tient de toi par don por provocquer ta gra[n]t misericorde de tous pecheurs faire grace et pardon.

2° 31.7 × 22.3 cm. Three parts in two volumes. Volume I: a^8 b–z^6 &^{6} 2a–2x^6 2y^4 (-2y4) a–b^6 c^4 [582 pp.]. Volume II: A–X^6 2A–2F^6 2G^8 3a^6 3b^8 (-3b8) A^6 B^8 [394 pp.]. Numerous errors in foliation in both volumes.

PLATES: Volume I: 430 woodcuts within text; one full-page: presentation of book to prelate (on verso of title-page). Volume II: 541 woodcuts within text; four full-page: (1) human skeleton (on verso of title-page), (2) presentation of book to king on horseback with falconer scene above (preceding section on birds), (3) presentation of book to prelate—repeated from Vol. I—(preceding section on fishes), (4) apothecary shop (preceding section on urines).

BINDING: Modern red morocco; gilt tooled borders on covers; gilt tooling on spines. Manuscript annotations throughout volumes.

PROVENANCE: Bookplate of Alfred Petit in both volumes.

REFERENCES: Anderson, pp. 106–112; Arber, p. 13; Blunt & Raphael, pp. 118–119; Hunt, 12; Klebs, 52; Murray, *French* 227; Nissen 2373; Reeds, pp. 30, 185; Rohde, pp. 66–67; Shaffer.

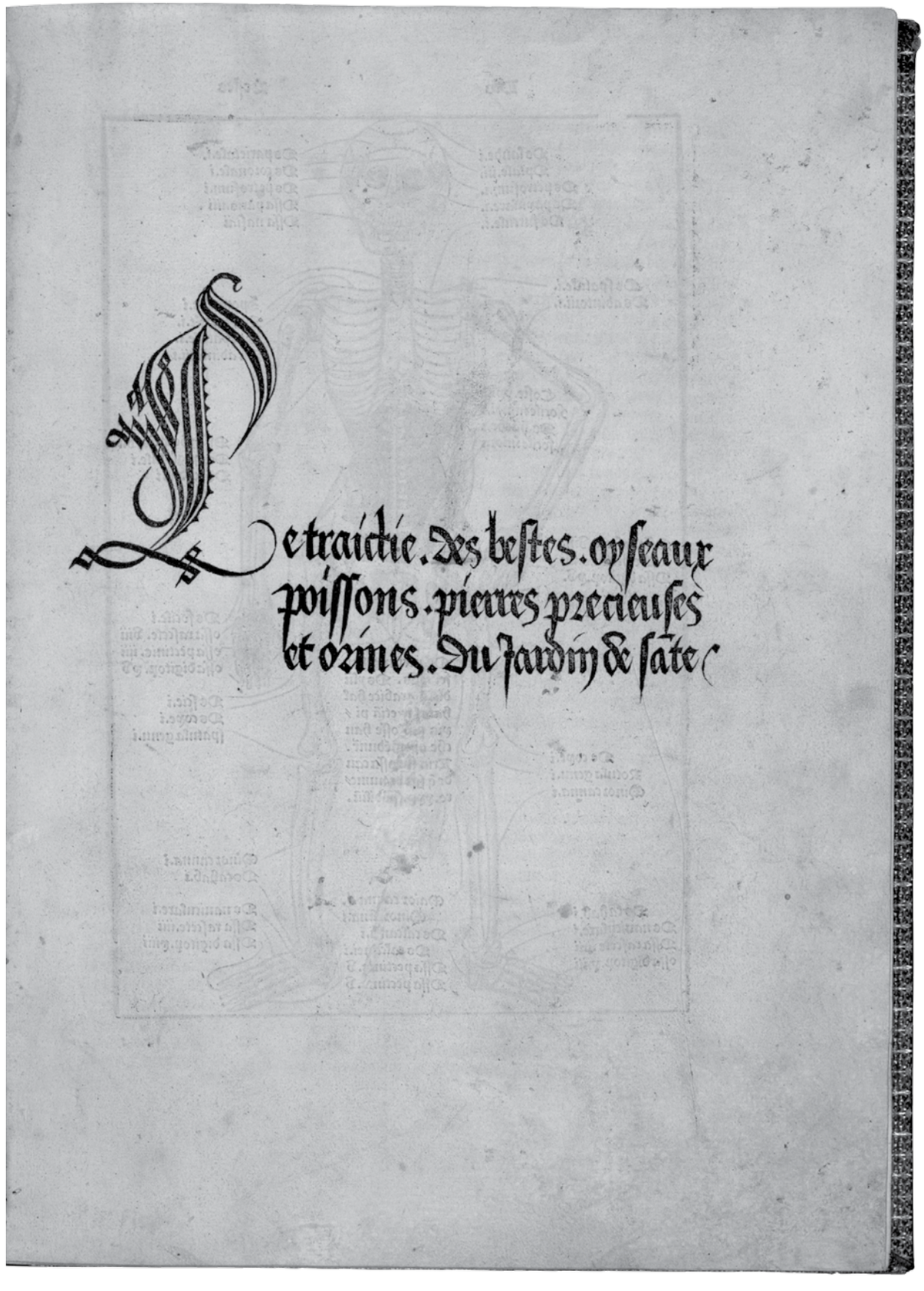
[*H*]*ortus Sanitatis*, Paris, *c.* 1500. Colophon, volume II, B 8 v

THE [*H*]*ortus Sanitatis* was one of the most celebrated early printed herbals to appear in Europe. This incunabulum was first published in Latin in 1491 by Jacob Meydenbach of Mainz and it is assumed that Meydenbach was the compiler as well as the printer; translations and new editions with various modifications—particularly of the full-page illustrations—would continue to be produced during the entire course of the sixteenth century. The Oak Spring Garden Library possesses two paragons of this important text: the fifth edition, circa 1500, printed by Antoine Vérard, which we shall examine here, and the first Italian edition of the Latin original, printed in 1511 in Venice by Bernardino Benalio and

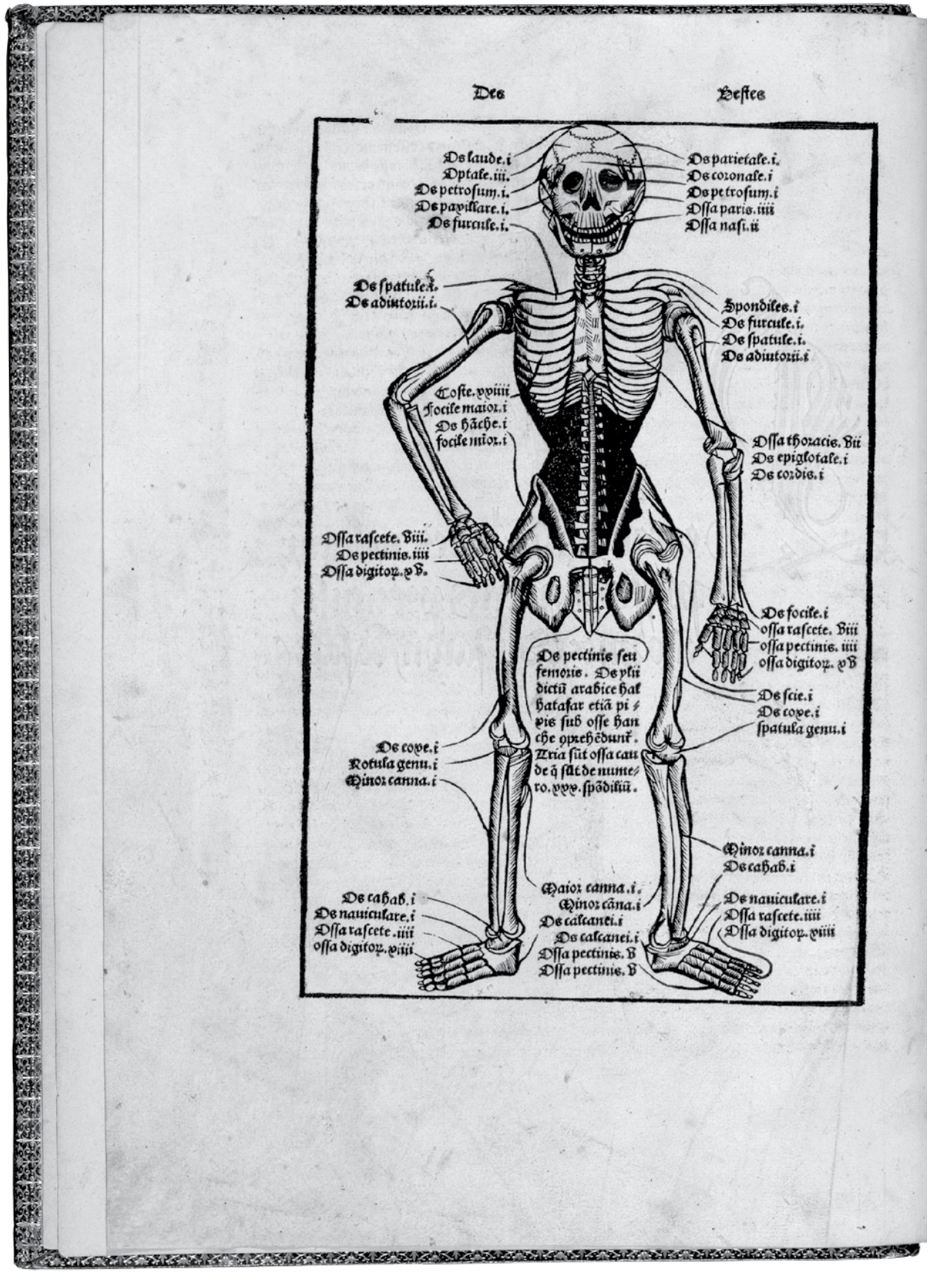
Giovanni Tacuino. The fifth edition is exceedingly rare and is the last incunabulum of the work to be printed in France, as well as being the first complete vernacular translation.

Two other important incunabula herbals, however—both issuing from the Mainz press of Peter Schöffer, successor to Gutenberg—preceded the [*H*]*ortus Sanitatis*: the small quarto *Latin Herbarius* of 1484, with an adapted medieval text and with stylized but decorative woodcuts, and the folio *German Herbarius* (*Der Gart der Gesundheit*) of 1485, with a new vernacular text and new illustrations, a portion of which, as a seminal advance, were drawn from life. The *German Herbarius* served as the author's initial model in compiling the [*H*]*ortus Sanitatis*, but the work was conceived as a considerably more extended and comprehensive medical encyclopaedia, one that described not only plants but also other natural substances that might be used to prevent or cure illnesses. Thus, for instance, the second volume of Vérard's French edition is entitled *Le traictie des bestes, oyseaux, poissons, pierres precieuses et urines, du jardin de santé,* augmenting the botanical material with a medieval bestiary of sorts, as well as with treatises on mineralogy and urinalysis. The lengthy section on medicinal plants in particular appears to have been profoundly modified with respect to the *German Herbarius*, with more than ninety plants added. Each chapter begins with a description of the plant, noting its various names (and sometimes the region where a given name was current), and concluding with a list of its *operationes,* or pharmacological properties, based on the medieval concept of the four humors or temperaments that were believed to determine a person's character and physical constitution. Indices were added as well, including therapeutical indices of diseases.

The Meydenbach edition of the [*H*]*ortus Sanitatis* distinguishes itself from the other texts of the period because it is accompanied by an extraordinarily fine set of illustrations that include seven full-page woodcuts, which were imitated in all subsequent printed editions, and nearly one thousand smaller vignettes scattered through the text. A large number were copied from the *German Herbarius*—some of them in greatly simplified form—but fully a third of the 430 botanical illustrations are original. The images appear on the page, generally without a border, beneath the chapter heading. Most of the specimens are shown cut off at the stem, although in some cases the artist includes the root, or portrays the plant growing out of the ground. One rare exception is the illustration of basil, which is depicted growing in a pot. As Agnes Arber has perceptively observed, many of the botanical images demonstrate 'a liveliness of imagination which one misses in modern botanical books.' The artist's fancy is expressed in various details, such as the tiny human figures that can be seen creeping out of the corolla of the *narcissus*, or the serpent twining through the branches of the *Arbor vel lignum scientiae* (the tree of knowledge). Other woodcuts present charming genre scenes: in the chapter on the olive, for instance, we find a laborer surrounded by large vessels filled with oil (the same image appears in the chapter on butter in



[*H*]*ortus Sanitatis*, Paris, *c.* 1500. Title-page, volume II



[*H*]*ortus Sanitatis*, Paris, *c.* 1500. Verso of title-page, skeleton with the bone names in Latin, volume II

[*H*]*ortus Sanitatis*, Paris, *c.* 1500. Basil (*Ocimum basilicum*) growing in a pot, volume 1, f 3 v

soit mys sur la teste du pacient. Le vin ou sa decoction aura este faicte vault contre la douleur de lestomach et des entrailles venans de froide cause. ¶ Lerbe mesmes cuite en vin et
D mise en emplastre destouppe et dissoult les opilations du foye et de la rate et des voyes des vrines. Elle dissoult aussi strangurie et dissurie. ¶ Elle vault aussi contre la douleur du
E ventre appellee yliaque. Et contre la douleur faicte de ventosite. Elle amayne les fleurs et menstrues. Elle ayde a lenfant conceu et mundifie la marris se il est de icelle faicte fomentacion et eschaudeement. ¶ Les tenerosites di-
F celle cuites en huille mustellin ou aumoins en huille commune et mises dessus elles font vne mesme operation et oeuure.

¶ Le. lxii. chapitre.
¶ De basilicon. Baselic.

Basilicon ou gariofilatū / ozimū signifient vne mesme chose ou signifiēt vne chose. Ozimum / lūg est gariofilatum. Aucun est commun / ⁊ aucun est plus large que les autres lequel est appelle citrarium. Ozimū gariofilatum est celluy q̄ est loue des aucteurs. Et ozimū citrarium est celluy qui est vitupere de tous. Ozimum gariofilatum est competent en medicine et lerbe ⁊ la semence. Et quant simplemēt il est mis en medicine on doit entendre la semence et puissamment en electuaires. Mais en oignemens et en emplastres lerbe est entēdue. Elle est chaulde et seiche. Et la semēce a vertus de cōstraindre ⁊ conglutiner. Laquelle chose appert en ce Car se on la mect en eaue incontinent elle se engrossist. Et fait lerbe vne conglutinosite. Par son aromaticite elle a vertus de conforter / et par ses qualites de dissouldre / cōsumer nectoyer et mundifier. ¶ Serapion au liure des aggregations au chapitre lrerengemisch Cest basilicon ou ozimum gariofilatum. Et sont ses fueilles petites / desquelles la couleur est moyenne entre rouge ⁊ blanche. Lodeur de ceste herbe est semblable a lodeur des gariofiles. Et est son trōc quadrangule duquel la couleur est cōme est la couleur de ses fueilles. Et sa semence est petite ⁊ noire. Et est cueillie au moys de iuillet. Et est chaulde et seiche en la fin du second degre. ¶ Dyascorides au chapitre ozimum. ¶ Ozimum de q̄lle vertus il est totalement entre les medicins est lopinion incertaine. Car ceulx q̄ de laucteur crisipe sont vituperez: ceulx congnoissent les vices dicelluy / et que elle est inutile a lestomach / que elle ebete les yeulx / que elle fait insanie / et q̄ elle obsite au gesier. Puis apres ilz adioustēt que broyee et mise en vng pot ⁊ couuerte dune pierre incontinent elle engēdre escorpiōs. Et mise au soleil elle cree vers ⁊ nourrist poux. Ilz cuident aussi ce estre persuase A fri. que se il conuenoit q̄ celluy iour ouquel on aura prins ozimum on estoit frappe ⁊ picque de lescorpion celluy ne pourroit estre saulue. Mais ceulx qui sont en la diuerse et vraye opinion afferment toutes ces choses estre faulses: car q̄ est mieulx il prouffite a lestomach / pource que il dissoult ses inflations. Et fait autres aydes ⁊ secours lesquelles seront selon luy dictes cy apres.

¶ Les operations du basilicque.

¶ Contre pasmoison appellee sincope et cordiaque passion q̄ est maladie enracinee au A
cueur soit donnee eaue rose en laquelle la decoction de ceste herbe basilicon aura este faicte
¶ A ceste mesme chose est bon le vin de la de- B
coction de ceste herbe auquel elle aura este vne

the second volume). The discussion of incense is illustrated with a figure holding a vessel from which the fragrant fumes of the burning resin can be seen rising into the air. The second part of [*H*]*ortus Sanitatis* is dedicated to animals and contains an even larger number of woodcuts of the same type, including many animated genre pictures.

This French edition of the [*H*]*ortus Sanitatis* is of particular interest, for it was produced by Antoine Vérard (*fl.* 1485–1512), a printer who counted King Charles VIII of France and King Henry VII of England among his patrons. Vérard printed the first typographical Books of Hours and specialized in *éditions de luxe*, often printed on vellum. His edition of the [*H*]*ortus Sanitatis* is embellished with his calligraphic woodcut titles and elaborate calligraphic initials, while the text is set in his fine *lettre bâtarde*. Its illustrations present many divergences from the original German edition and are based instead on the Strasbourg editions of Johann Prüss. The first full-page woodcut, which depicts a prelate seated in state at his desk being presented a volume by a group of learned colleagues, is unchanged. The human skeleton, however, which embellishes the verso of the title-page to the second volume, appears with legends in Latin identifying the most important bones. Toward the end of the work is another full-page woodcut depicting a scene in an apothecary's shop, where a teacher holding a pointer is lecturing on various drugs to another figure, perhaps a student. These three illustrations are of immense significance for they carry a new 'scientific' message, reflecting the commitment of the emerging science of plants and simples to the objective study of the natural world, with the aim of gaining a greater knowledge of the healing arts.

3. Hortus Sanitatis, Venice (1511)

[*Within woodcut border*]: Ortus Sanitatis. De herbis & plantis. De Animalibus & reptilibus. De Auibus & volatilibus. De Piscibus & natatilibus. De Lapidibus & in terre venis nascentibus. De Urinis & ea[rum] speciebus. De Facile acquisibilibus. Tabula medicinalis cum directorio generali per omnes tractatus.

[*Colophon, V8, verso*]: Impressum Venetijs per Bernardinum Benalium.

[*Second Colophon, 2f5, verso*]: Impressum Venetijs per Bernardinum Benalium: Et Joannem de Cereto de Tridino alias Tacuinum. Anno Domini. M.ccccxi. Die. xi. Augusti. Regnante Inclyto Duce Leonardo Lauredano Venetiarum Principe. Laus Deo.

2° 30.7 × 21.3 cm. a^8 b–k^6 l^8 m–r^6 s^8 t–z^6 $2a^6$ $2b^8$ 2c–$2e^6$ $2f^8$ 2g–$2i^6$ A^8 B–C^6 D^8 E–H^6 I^8 K–Q^6 R^8 S–T^6 V^8 2a–$2f^6$ [736 pp.].

PLATES: Three full-page woodcuts: (1) congress of doctors (verso of title-page), (2) human skeleton (section on animals), (3) doctors with urine flasks (section on urines). 1,055 woodcuts within text.

BINDING: Contemporary wooden boards half covered in blind-stamped calf, decorated with fleurons and geometric patterns, and furnished with four clasps (two on the fore-edge and one each on the head and tail), one preserved. Back board exhibits vertical break, which is repaired with contemporary string stitching. Manuscript

annotations on endpapers. Fore-edge painting of a Numidian crane, roses with stem and foliage, and a lion by Titian's nephew, Cesare Vecellio (1521–1601).

PROVENANCE: Pillone coat-of-arms drawn on inside of front cover, with label: 'Livre No. '69' de la Bibliothèque Pillone.' Bookplate: Thomas Brooke, F.S.A., Armitage Bridge.

REFERENCES: Anderson, pp. 106–112; Blunt & Raphael, pp. 118–119; Hunt 12; Klebs 49; Mortimer, *Italian* 1.238; Nissen 2,368; Shaffer.

[*H*]*ortus Sanitatis*, Venice, 1511. Fore-edge painting by Titian's nephew, Cesare Vecellio, of a Numidian crane, roses with stem and foliage, and a lion

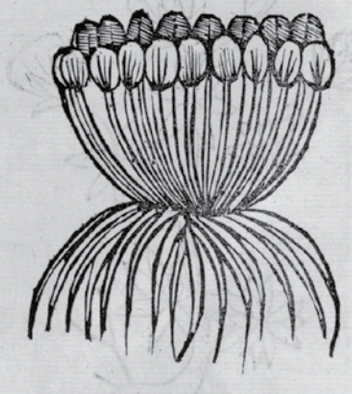
THE Oak Spring Garden Library also possesses a copy of the first edition of [*H*]*ortus Sanitatis* to be printed in Italy, which was published in Latin in 1511 by the celebrated Venetian printers Bernardino Benalio and Giovanni Tacuino. This edition was—like Vérard's—modelled upon previous ones, in particular the Strasbourg editions of Johann Prüss; the 1,055 woodcuts were certainly copied from Prüss' work, although with considerable variations. 'De facile acquisibilibus,' the second book of Galen's pharmacological work *De remediis facile parabilibus* has been added in a translation by Nicolaus de Regio.

While the human skeleton makes its appearance unmodified on the verso of the title-page to the volume on animals (even retaining some German labels of bones), the opening woodcut in the first volume and that for the *tractatus de Urinis* have been completely transformed. Rather than a professor lecturing, we find a group of colleagues engaged in a discussion regarding the plant that one of them is holding, and the group of physicians examining urinals includes a young boy holding a flask covered by a basket for safe transport. Even their attire has been modernized to fit the period of this later edition. This edition's dolphin title-page border was—in a tribute to its excellence—widely copied by other printers (see Mortimer, *Italian*, 11), and two of the full-page woodcuts are surrounded by handsome white-on-black ornamented borders.

This copy is unique because it originally belonged to the Venetian aristocrat and bibliophile Odorico Pillone and his son Giorgio, and has been decorated with naturalistic motifs painted along its fore-edge. Furthermore, the Pillone coat of arms can be found drawn in ink on the inside front cover; the only other work from their collection known to carry the family's heraldic device is conserved in the Bibliothèque

Tractatus

Capitulum.ccliij.



Entícula aque vel Lẽtigo aque. Serap.li.ag.c.gabaleb.i.lẽticula aque: ex ea eſt marina:ꝛ ex ea eſt aque dulcis:ſed illa que eſt aque dulcis eſt lẽticula que reperit ſuper aquas erecta hñs corticem viridem:ꝛ eſt rotunda ſicut lẽticula: ſilis eſt ei in figura ſua. Et repitur in lapidibus ſup aquã erecta:natãs ſuper facĩe aque. Gal.viij.ſim.far.c.facus.i.lẽticula aquatica:humide ꝛ frigide complexionis in.ij.gradu: exiſtens ſm vtrunqꝫ. ¶ Paulus cap.Stratiotis. Et eſt herba ꝛ naſcitur in ſuperficie aque ſine radice cum foliis ſimilibus ſemperuiue. Eſt autẽ virtutis redarguentis ac remordẽtis. Dyaſ. cap.de lenticula aque. Lenticula colorem viridem habens:virtus eſt ei frigida.

Operationes.

A ¶ Gal. Lenticula aque habet quid ſtipticitatis propter quod vulnera poteſt conſolidare:ꝛ vlceribus eſt vtilis: quidam autem eo ꝛ ad emorroſagias vtuntur ꝛ ad fiſtulas.

B ¶ Paulus. Potui data valet ad fluorem ſanguinis ex renibus: ꝛ cum aceto contrita: atqꝫ vt cathaplaſma adhibita.

C ¶ Dyaſ. Oẽs tumores ſpargit. Ignẽ ſacrũ extinguit:podagricis neceſſe miſcẽ:medicaminibus ſola:ꝛ cũ polẽta apponĩ ſantibus.

Capitulum.ccliiij.

I Ens. Seſ. li.ag.c.zedẽs. auc. Dyaſ. meliores ex lentibus ſunt ille que velocius maturanť :ꝛ qñ infunduñ in aqua ad mollificanduꝫ non nigreſcunt. Gal. vij.ſim.far.c. de lentibus ſm tranſla.gre. inquit. Lentes ſtipticant non fortiter:in medio vero ca.ꝛ fri.conſiſtunt:ſiccãt autẽ in.ij. gra.

Operationes.

¶ Gal.codẽ li.ꝛ ca.ſm tranſla. ara. Sapor earũ eſt ſtipticus ſtipticitate pauca:virtus lẽtis ṕma eſt media inter ea.ꝛ fri.ꝛ exiccat in.ij. gra. Et ipſa ſtringit vẽtrẽ qñ coqtur bis ꝛ picitur aqua ṕma:ꝛ aqua in qua coquuntur laxat vẽtrẽ. ¶ Et dixit Ypo.vj. epidi. q eſt tẽpata in ca.ꝛ fri.ꝛ declinat ad calorẽ parũper. Et ſignũ in hoc eſt q nõ apparet per eã qñ comeditur aut qñ moratur in ſtõ:aut qñ deſcẽdit a ventre infrigidatio corpori: ꝛ eſt cõpoſita ex ſubſtantia que ſtringit ventrẽ qñ coqtur bis:ꝛ proijcit aqua ṕma:ꝛ aqua in qua coquũtur laxat vẽtrẽ. ¶ Idẽ auc. Dyaſ. Qñ comeditur ex ea aſſidue facit obſcuritatẽ viſus:ꝛ ẽ dure digeſtionis:mala ſtomacho ꝛ accidunt ex eſu eius ſomnia mala: ꝛ eſt mala neruis ꝛ pulmoni. ¶ Et idem Serap.auct. Deſarugie. Excorticate ex his ſunt frigide: groſſe ſtrigunt ventrẽ ꝛ vrinã:ꝛ ingroſſant ſanguinem

in venis

A B C D E

[*H*]*ortus Sanitatis*, Venice, 1511. Two woodcuts: 'Capitulum. ccliij,' a member of the Bladderwort family (*Lentibulariaceae*), and 'Capitulum.ccliiij,' possibly a Lentil (*Ervum lens*), P6ᵛ

[*H*]*ortus Sanitatis*, Venice, 1511. Detail, woodcut of Adam and Eve with serpent around an apple tree (*Malus domestica*), T6ᵛ

Operationes.

¶ Vas. Eius folia in sale cõponuntur. ventrem stringunt. ¶ Radix eius venenis occurrit tussionibus ꝛ ortonoicis vrinam puocat. ¶ Folia eius cathaplasmatibus adhibita tumores ꝛ duricies spargunt. ¶ Radix eius similiter facere potest. semen eius vrinam puocat. ¶ Nefreticis ꝛ spleneticis ꝛ dolori vesice maximum presidium est: menstruis iperat. ¶ Secundinas expellit.

Capitulum cccccxxix.

Ma siue muza grece. Ex sinonomis
3 Muza est fructus paradisi: vt dicunt quidam: in quo comedendo peccauit adam. Sed alii verius dicunt ꝙ peccauit in ficu. Fertur autem muza crescere in babylonia alio quoqꝫ nomie muza ẽ opiata. Isaac. Muza est calida in medio primi gradus ꝛ humida in fine ipsius.

Nationale de Paris. The Pillones amassed a valuable library and had the edges of many of their books painted in order to enhance their beauty and value. Thus we find on this volume sketches in gouache of a Numidian crane, a trailing stem of roses, and a prancing lion. The great painter Titian Vecellio was a close friend of the family and the task of decorating the collection was entrusted to his nephew Cesare Vecellio (1521–1601). Whilst most of the volumes are embellished with classical subjects, vistas of Venice, or scenes portraying intellectuals at work in their *studioli* or conversing with colleagues, the decoration of the [*H*]*ortus Sanitatis* reflects the naturalistic themes treated in the text.

The Pillone Library, which comprised 160 works, remained in Venice until the nineteenth century, when it was acquired by the English nobleman and bibliophile Thomas Brooke. The collection was subsequently dispersed; three works can be found in the Bibliothèque Nationale de Paris, while the others are scattered among the most important libraries in the world. The volume in the Oak Spring Garden Library does not appear to be cited in Pierre Berès' study of the collection, which was published in 1957.

4. The Grete Herball (1526)

[*Title-page in red and black; first three words xylographic*]: The grete herball whiche geueth parfyt knowlege and under standyng of all maner of herbes & there gracyous vertues whiche god hath ordeyned for our prosperous welfare and helth, for they hele & cure all maner of dyseases and sekenesses that fall or mysfortune to all maner of creatoures of god created, practysed by many expert and wyse maysters, as Auicenna & other. &c. Also it geueth full parfyte understandynge of the booke lately prentyd by me (Peter treueris) named the noble experiens of the vertuous hand warke of surgery. [*Large woodcut*].

[*Colophon 2E6 verso, woodcut borders surrounding large printer's device*]: Imprentyd at London in Southwarke by me Peter Treueris, dwellynge in the sygne of the wodows. In the yere of our lorde god. M.D. xxvi. the xxvii. day of July.

2° 25 × 17.2 cm. ✠⁶–2E⁶ (-✠6 C4 N1 T5 2D6 2E3 2E4) [334 pp.].

PLATES: Woodcut on title-page, 466 woodcuts within text.

BINDING: Modern tan polished calf. Last leaf inscribed: 'Peter Treveris, a foreigner first erected a printing press in Southwark 1514 and continued till 1532. He lived at the sign of the Widows [*sic*] and printed several books for Wᵐ Rastele, John Reyner, R. Coplar[?] and others in the city of London.'

REFERENCES: Anderson, pp. 98–105; Cleveland 36, Henrey 1.15–19 and No. 168; Hunt 25; Klebs 59; Nissen 2,296; Pritzel 10,762 (*Le grant herbier*); Rohde, pp. 65–74, 207–208; Rydén.

The *Grete Herball* was the first illustrated herbal published in England. In keeping with the tradition of incunabula and works printed in the earliest part of the sixteenth century, the colophon supplies the publication detail that the book was 'Imprentyd at London ... by me Peter Treueris ... in the yere of our lorde god' 27 July 1526. The title, *The great herbal which giveth perfect knowledge and understanding of all manner of herbs and their*

gracious virtues which God hath ordained for our prosperous welfare and health ..., is quite significant, as is the fact that Treveris chose to publish his book in English. In this period all over Europe most scientific texts were written in Latin, and the appearance of *The Grete Herball* in English testifies to the practical ends for which it was intended and to the widespread interest—even among those who did not have the benefit of an academic education—in works of this type. Peter Treveris, who was perhaps German by birth, was a prolific printer between 1514 and 1532. He owned a printing shop 'in the sygne of the Wodows,' as inscribed on the colophon of this herbal, over the bridge of Southwark in London. The work was evidently very well received, for he published a completely revised version of the work in 1529; editions by other London printers appeared in 1539 and 1561. *The Grete Herball* had been preceded a year earlier by a rather more modest *Herball*, perhaps based on a medieval manuscript, that was published without illustrations by Richard Banckes. This work was quite successful and went through numerous reprintings.

The herbal published by Treveris was not original, however, since, as is stated in a note at the foot of the index, a large part of it actually consisted of a translation from the French. The bulk of the text derives from *Arbolayre* which was first printed in Besançon by Pierre Metlinger around 1487 and was re-published in Paris around 1498 as *Le grant herbier en françoys*: hence the English title. *Arbolayre* is a French version of Matthaeus Platerius' antidotarium *Circa instans* (see No. 1). The treatise on urines at the end of the text and the preface, which explains the medical aims of the work and underlines the importance of plants in the treatment of illnesses, appear to have been borrowed from the *German Herbarius* (Mainz, 1485) and Meydenbach's *Hortus Sanitatis* (see No. 3). The publisher also pays tribute to the great authorities of the past who made possible the compilation of 'this noble worke,' among them Avicenna, Matthaeus Platerius, Joannes Mesuë the Younger (an Arab physician who was active during the eighth century A.D.), Albertus Magnus, and the Franciscan Friar Minor Bartolomaeus Anglicus, the author of another celebrated encyclopaedia, *De proprietatibus rerum*, which was written sometime before 1283.

The Grete Herball opens with a splendid page bearing the title and a charming vignette on the subject of gardening. To the left a man leaning on a spade gathers grapes from a vine, while in the center another figure pours flowers from an apron into a large basket. On the right are three trees growing in a basket. A row of plants occupies the foreground: a rosebush and another flowering species, with a male and a female mandrake plant on either side. In accordance with medieval tradition the mandrakes are shown in humanized form; the female plant can be seen modestly covering her pudendum with her hands.

The text is preceded by an index or table that lists the plants in alphabetical order by their Latin and English names beginning with 'Aloe' and ending with 'Zuccaru[m].Sugre.' This is followed by a shorter index of the other substances and animals described in the

The grete herball

which geueth parfyt knowlege and vnder
standyng of all maner of herbes & there gracyous vertues which god hath
ordeyned for our prosperous welfare and helth/forthey hele & cure all maner
of dyseases and sekenesses that fall or mysfortune to all maner of creatoures
of god created/practysed by many expert and wyse maysters/as Auicenna &
other. &c. Also it geueth full parfyte vnderstandynge of the booke lately pry
tyd by me(Peter treueris)named the noble experiens of the vertuous hand
warke of surgery.

The Grete Herball, London, 1526. Title-page

The Grete Herball, London, 1526. Colophon, 2E6^{v}

text. The text ends with a glossary of terms (the exposicyo[n] of wordes obscure and euyll knowen) and an index of remedies.

The format of the *The Grete Herball* reflects that of the contemporaneous manuscript herbal and confirms the direct ties linking the first printed herbals with their illuminated predecessors. Each of the 472 chapters is preceded by a small woodcut vignette of the plant in a quadrangular frame. Like the text, these images were copied from other works, in particular the *German Herbarius,* or its first Dutch edition of 1514, and the first edition of the [*H*]*ortus sanitatis*, which appeared in Mainz in 1491. In the Oak Spring Garden Library's copy, the full-page woodcut of the human skeleton (borrowed from [*H*]*ortus sanitatis*, see No. 3) is missing. There are also occasional genre cuts of animals, landscapes, objects of work and commerce, and human activities. The woodcuts, with their simple, deeply incised outlines and sober shadowing, are striking, and the plants portrayed are quite recognizable.

The full-page woodcut on the colophon deserves particular attention. It presents the coat of arms of the publisher flanked by a 'woodwose' or 'Homo sylvestris' and his mate. The iconographic image of 'the wild man of the forest,' covered with hair and carrying a bow and arrow, was quite diffuse in France, Italy, and Germany in this period, as is demonstrated by the heraldic image which appears in the *Portrait of Oswold Krell*, painted by Dürer in 1499 and today conserved in the Alte Pinakothek of Münich. Treveris's device seems to be derived indirectly from that of the Parisian printer Philippe Pigouchet (*fl.* 1483–1515), which also pictures a wildman and woman.