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# Mounted Bezoar Stones, Seychelles Nuts, and Rhinoceros Horns: Decorative Objects as Antidotes in Early Modern Europe

Exotic materials collected, mounted, and used for their perceived magico-medicinal properties date from at least the Middle Ages. As early as the thirteenth century, poison detectors or *épreuves* (proofs) of mounted griffin's claws, "serpent's tongues," toadstones, and a host of other materials<sup>1</sup> were part of the rituals of dining, as well as rich collections.<sup>2</sup> In the sixteenth and seventeenth centuries, as European trade with the East and West Indies accelerated, so did the understanding and array of imported alexipharmic objects. Rhinoceros horns, Seychelles nuts (Maldive coconuts), and bezoar stones (formed in animal stomachs), are representative of such prized items, which became mainstays in European botanicals, travel journals, and princely collections.

Imbued with Asian folklore, these objects were procured by the most distinguished collectors in Europe and mounted at their request as curiosities. Four rhinoceros horns were listed among the contents inventoried in 1589-1631 of the Tribuna of Grand Duke Ferdinando I de' Medici;<sup>3</sup> Emperor Rudolf II's *Kunstkammer* of 1607-1611 displayed as many as twenty-eight rhinoceros horns, twenty-two bezoar stones, and eighteen Seychelles nuts;<sup>4</sup> Duke Ferdinando Gonzaga in Mantua had a whole cabinet of bezoars in 1617,<sup>5</sup> and in the late seventeenth century Cardinal Flavio I Chigi included six rhinoceros horns in his collection in Rome.<sup>6</sup> Valued as exotic marvels, these objects were even more prized, arguably, for their magico-medicinal properties, particularly as antidotes to poison.

Despite the plethora of primary sources about rhinoceros horns, Seychelles nuts, and bezoar stones as magico-medicinal, the emphases in recent discussions have been primarily stylistic.<sup>7</sup> Nevertheless, in the 1990s, some scholars, building on seminal earlier works, addressed the perceived intrinsic properties of select mounted magico-medicinal materials during the early modern period.<sup>8</sup> A series of recent publications concerning the culture of collecting also discuss these materials.<sup>9</sup> They succinctly explore the impetus behind the ruling elite's desire for wondrous objects and the complex relationship between *artificialia* and *natu*-

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*ralia* in burgeoning curiosity cabinets. Other scholars have placed the materials in the province of the history of science.<sup>10</sup>

Reliance on primary sources from the history of medicine within an art-historical context is largely absent, however. Yet these sources not only provide important insight into the function of such magico-medicinal materials, but also frequently hold the key to the seemingly random iconography of the mounted items. Firsthand accounts in travel journals, as well as early modern herbals, botanicals, and lapidaries, reveal contemporary conceptions and form the basis for a better understanding of the appearance of extant mounted bezoar stones, Seychelles nuts, and rhinoceros horns.

### Bezoar Stones

A concretion resembling an onion formed in the stomach of animals, which "Nature hath created there, for our health a remedie of our evils,"11 bezoar stones were considered a potent remedy for such diverse ailments as plague, worms, melancholy, madness, malignant fevers, the pains of the womb, and, above all, poison.<sup>12</sup> Penetrating Europe after the twelfth century, knowledge of this supposedly medicinal stone was transferred via Arabic sources.<sup>13</sup> It was through heightened trade between Europe and the East and West Indies, however, that direct knowledge and the importation of these stones proliferated in Europe. As a result, they became ubiquitous in the prescriptions of physicians and the inventories of the rich and famous in the early modern period. The stone was so popular during the sixteenth and seventeenth centuries that it gave its name to the pale beige color of some of Queen Elizabeth I's garments ("Iteme one rounde gowne of Beasar colour");14 so precious that it was considered a jewel (for example, when James I was asked to send jewels to Spain in 1623 he included two bezoar stones<sup>15</sup>); and so widespread that it entered English drama. For instance, in Ben Jonson's Every Man out of His Humour of 1599, a poisoned victim asks, "Body o' me, a shrewd mischance. Why had you no unicorn's horn nor bezoar's stone about you?"16

Bezoars reportedly originated in creatures ranging from the reddishyellow he-goats of Persia to cows, sheep, monkeys, and apes from Malacca to the New World. These animals were capable of producing more than one stone at a time (the Spanish physician Nicolás Monardes noted the stones were "set in order after another, like unto button holes, in a coate").<sup>17</sup> Writing almost a hundred years later, the French merchant Jean-Baptiste Tavernier described how in Golconda, peasants "run both hands under the belly of the goat and beat the paunch along both sides, so that all the stones fall to the middle thereof, and they then estimate exactly, by touch, how many bezoars are in it."<sup>18</sup> Created in many shapes, sizes, and colors, with the larger and heavier stones the most valued and the color olive the most desired, bezoars taken from monkeys and the mountain goats of the East Indies were the most prized. They were most esteemed as antidotes to poison.

Since the eleventh century, Islamic physicians such as Avicenna (Ibn Sina) had promoted the bezoar stone as efficacious against poison. In 1248 the Islamic scholar Ibn al-Beithar explained, "It is an antidote against poisonous animals and plants, against bites and stitches; the powder, in a dose of twelve grains taken, retains from death and drives out the poison by sweat." It should be worn "in the form of a necklace or signet ring or chewed in the mouth."<sup>19</sup> In the same years, the writer Otharid ibn Muhammad al-Hakeb asserted, "The bezoar stone is useful against Scorpion venom. To this purpose one closes it in a gold ring . . . [engraved with the image of a scorpion when] . . . the moon stands in the mark."<sup>20</sup> In addition, Arab tradition held that bezoar stones not only cured venomous ailments but also assuaged violent fevers and strengthened the heart when weakened by grief. They were prescribed daily as a healthy preventative.

All these medieval Arabic beliefs concerning bezoar stones permeated early modern European medical practice. For example, bezoars were continually used to quell fevers throughout the seventeenth century. The Spanish Jesuit priest José de Acosta remarked in 1604, "in Spaine and Italie we have seene admirable effects of this stone against the tabordete,"21 a kind of fever, and Charles Jacques Poncet taught an Ethiopian emperor the effects of the bezoar stone "which I always made use of with great success in intermitting fevers, as the Emperor and two of the princes his sons experienc'd."22 A powerful purgation according to Arab scholars, bezoars supposedly lowered fevers by stimulating perspiration, a belief echoed by the English royal apothecary John Parkinson in his Theatrum Botanicum, a herbal of 1640: "this bezar stone is [used] ... to provoke sweate, and thereby expel evill vapours from the heart and vitall spirites."23 The Jesuit missionary Jeronimo Lobo, while traveling through India in the 1620s, used the bezoar stone along with bloodletting to reduce his fever through induced perspiration.<sup>24</sup>

Arabs and subsequently Europeans originally attributed the perceived magico-medicinal properties of bezoar stones to celestial influence. The Florentine Neoplatonist Marsilio Ficino was important in transmitting this notion in his *Three Books on Life* (Florence, 1489). He argued that "the stone which the Arabs call bezoar [a word he defines as "liberating from death"] . . . initially got from Jupiter its power against poison,"<sup>25</sup> and "not only if they are taken internally, but even if they touch the flesh, and, warmed thereby, put forth their power, they introduce celestial force into the spirits by which the spirits preserve themselves from plague and poison."<sup>26</sup> Moreover, echoing Otharid ibn Muhammad al-Hakeb's assertion that the bezoar stone was an antidote to scorpion venom, Ficino explained: "as soon as under the celestial Scorpion [the bezoar] receives the figure of that one above, it is said to obtain forthwith a perfect force against scorpions which can communicate to mastic or to frankincense."<sup>27</sup>

A century later, however, the bezoar stone was largely perceived as an antidote to poison not through celestial force but through its ability to remove poison by sympathetic attraction. That is, bezoars were allegedly able to draw pestilential poisons out of the body and into themselves because they were composed of potent, poisonous herbs. As Acosta noted during his mission to Peru:

Amiddest which venomous hearbes there is one very well knowne of the Vicuna [a horned animal native to Peru] by a naturall instinct, and of other beasts that ingender the Bezoar stone which eate this hearb, and by meanes of thereof they preserve themselves from the poisoned waters and pastures; and they say that this hearb the stone is compounded in the stomacke, whence it drawes all the vertue against the poison and other wonderfull effects.<sup>28</sup>

Acosta argued that bezoars lacking this special, venomous herb were impotent. Monardes concurred: animals with bezoars "bredde in the playne groundes, are not so good nor have any Medicinall vertues because the beastes are not maytayned by those healthfull herbes, whereby these stones are ingendered."<sup>29</sup> John Fryer, during his trip to India with the East India Company in the 1660s, described these herbs as "like Saffron and Hermodactyls on which the Goats (or Sheep) feed."<sup>30</sup>

Finding bezoars in the bellies of herbivores, the majority of the learned elite in sixteenth- and seventeenth-century Europe ascribed their power to the animals' diet of special herbs. In a lesser tradition, however, the stone was identified as a potent, congealed stag tear. According to Thomas Nicols in his lapidary of 1652, some early modern thinkers such as Martinus Rulandus (1532-1602):

taketh the Bezoar for the congealed tears of a Deare. The Eastern Deare he saith in the Spring time are wont to search the caverns for serpents, which when they find, they are wont to snuff them up into their nostrils and thus purge themselves of their annuall distempers; which so soon as they have snuffed up or eaten, strait way they flie to the rivers or waters, and in them overwhelm themselves to the very head, so long, as till they perceive the power and force of the venome of the serpents which they have taken to be overcome: In this season by the power and force of the venome, their eyes shed forth abundance of tears which are coagulated and congealed about them; these coagulated dryed tears Martinus Rulandus calleth the Bezoar, that soveraign medicine and antidote against all poisons.<sup>31</sup>

Originating from an Eastern myth spread via Isidore of Seville, stag tears/bezoar stones were deemed especially beneficial for those suffering from melancholy. As Winfried Schleiner argues in her article "Jacques and the Melancholy Stag," this association with the melancholic resulted from the belief in the cold and dry nature of the stag, which corresponded with the cold and dry melancholic humour of black bile.<sup>32</sup> Thus the bezoar stone, through its mutual sympathies with the humour, could allegedly exercise a cure.

The prevailing connection between bezoars and melancholy is evident in an anecdote concerning Duke Albrecht Friedrich of Prussia. When he was diagnosed as having "heavy, depressed, sad, and deep melancholy thoughts along with heavy temptations," his wife, Duchess Maria Eleanore, tried to procure a bezoar stone through her cousin Emperor Rudolf II, since these stones were "supposed to be excellent and useful for all kinds of diseases."<sup>33</sup> Additionally, Duke Johann Wilhelm of Julich Cleves was prescribed cooling drinks, which included a bezoar stone, probably powdered, among other things, for his "hypochrondriacal melancholy,"<sup>34</sup> and Rudolf II, known as the "Saturnine," used the stone to combat his depression.<sup>35</sup>

As a powerful medicine capable of extracting melancholic and venomous vapors, bezoar stones were used both externally and internally. In 1558, in his *Magia Naturalis*, the influential Neapolitan scholar of natural and physical science Giambattista della Porta advised taking the bezoar stone not only in wine but hanging it "about the neck nigh to the heart . . . against the plague."<sup>36</sup> John Parkinson also recommended the outward application of the bezoar stone: "the pouther thereof put on the place that is bitten by any venomous creature, doth free them from danger of death and likewise put into a plague sore that is opened, it doth the like."<sup>37</sup> Pieces of bezoar stone were also grated and put into healing

drinks, as the sixteenth-century Florentine merchant Francesco Carletti described it to Grand Duke Ferdinando I de' Medici:

Indians use the bezoars without breaking them up or pulverizing them, but merely by rubbing them on a stone moistened with a little water. Then they remove little pieces in the manner that by order of Your Highness, I showed to your physicians . . . And then they drink that water, incorporated into which remains that which has been taken from the stone without ruining it . . . . Thus what remains can be kept whole and not be broken. And it is consumed only little by little in the quantity desired, and according to the need.<sup>38</sup>

# The Iconography of Bezoar Mounts

As a supposed magico-medicinal material, bezoars were commonly fashioned like other precious, prophylactic stones: as amulet rings or pendants. Queen Elizabeth I of England and King Eric XIV of Sweden both wore bezoars set in silver finger rings; the early fifteenth-century Castilian prince Don Enrique de Villena described bezoar stones as among the kind of rings that an esquire carver at the table of his lord should wear "against poison and infected air";<sup>39</sup> and the 1413 inventory of Jean, Duc de Berry, listed a bezoar stone pendant "hanging from three little gold chains." No such bezoar stone rings are extant, but there are pendants of bezoars, with mounts ranging from crude wrought iron to elaborate designs of filigree.<sup>40</sup>

The filigree examples may have been popular not only for the fashionable technique but for the openwork pattern, which was possibly perceived as allowing a better transmission of the healing power of the stone to the flesh. Gold filigree was also a common mount for larger bezoar stones, particularly in Spain and Portugal.<sup>41</sup> Stones with more elaborate mounts were probably used in the manner described by Carletti: they were kept intact and displayed fancifully when not in use. For example, Francesco I de' Medici at his death in 1587 owned a "Bezoar stone the size of an egg with gold decoration around it and its little bell."<sup>42</sup> The addition of the bell presumably worked in conjunction with the bezoar to dispel evil vapors and/or the evil eye.<sup>43</sup> Moreover, when in 1617 Duke Ferdinando Gonzaga requested that a bezoar stone be sent to him, he asked for the one mounted in gold in his cabinet of bezoars, which he kept not for his needs but the needs of his friends.<sup>44</sup>

The bezoar of about 1650 now in the Schatzkammer in Munich was likely used in a similar fashion (Fig. 1). Mounted in white enamel, set off

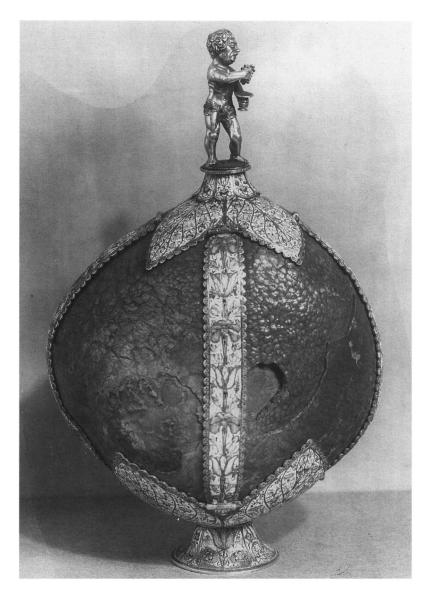


FIGURE 1

Mounted bezoar stone, with gold and enamel, c. 1650, German. Height 21.2, diameter 7.8 cm. Bayerische Verwaltung der Staatlichen Schlösser, Gärten und Seen; Schatzkammer, Residenzmuseum, Munich.

with exuberant, colorful flowers and foliage, the stone is topped with a figure of Bacchus clad in green enameled grape leaves. Holding a cluster of grapes in one hand and a goblet in the other, the god of wine and his accoutrements probably refer to the common preparation of bezoars in wine as a medicament. For example, Thomas Nicols noted that a man "who belonged to the Emperour . . . [was] cured by the onely use of Bezoar taken in the quantitie of five grains in a spoonful of wine,"<sup>45</sup> and Giambattista della Porta suggested that "four grains of it in powder, taken in wine, is good against the plague."<sup>46</sup> As the uneven layers of the stone

and the presence of the Bacchic figural mount suggest, this bezoar was possibly shaved off into wine for such medicinal purposes.

In another seventeenth-century example of a mounted bezoar, at the Kunsthistorisches Museum in Vienna (Fig. 2), both the medicinal use and the provenance of the stone may be reinforced by the setting. Here, the bezoar is mounted on the foliate branches of a gold tree, beside which stands a pig, and atop a base of tortoise shell. The pig probably indicates the animal origin of the stone, and the tree may signify the "wild bezoar tree," mentioned in the 1698 account of "Some Indian Plants" by James Petiver, apothecary of the Royal Society, sent to Samuel Brown, a surgeon at Fort Saint George. Citing the doctor Paul Hermann's *Horti Academici Lugduno-Batavi Catalogus* of 1687 as a reference, Petiver wrote that "the leaves [of this plant] taken inwardly are an antidote against the biting of a Mad Dog."<sup>47</sup>

Arab physicians had ascribed this particular medicinal virtue to the bezoar stone since at least the thirteenth century. The belief endured in the sixteenth and seventeenth centuries, as attested by Mateolo Senense, annotator of the Greek physician Pedanius Dioscorides (c. 40-c. 90), who wrote that it was "good for the bite of any mad dog or other animal."<sup>48</sup> Perhaps the leaves of this tree were thought to be the medicinal herbs producing the powerful bezoar, thus giving the tree its name. Indeed, the Dutch traveler John Huyghen van Linschoten wrote that "it is thought these stones [bezoars] doe grow in the mawes of sheepe, and galles of Hogges by vertue of the grasse (or hearbes) whereupon they pasture and feed."<sup>49</sup> It is precisely this process, whereby an elevated product of exotic medicine is created from a pig's digestion of a curative leaf, that the mount appears to illustrate.

As these examples demonstrate, the iconography of such decorative objects often reflects contemporary magico-medicinal knowledge of the stone. Far from being arbitrary, motifs such as the tree and pig frequently reveal contemporary understandings. Underscoring the limitations of a strictly formalist, stylistic approach, the fruits of the analysis of bezoar stone mounts are also germane to the decoration of Seychelles nuts.

#### Seychelles Nuts

Around 1598 Linschoten considered the Seychelles nut or Maldive coconut:

More esteemed than all the nuttes in India, for that they are good against all poison, which are verie faire and great, and blackish: I

saw some that were presented unto the vice roy of India, as great as a vessel of two canes [Indian] measure, and cost above three hundred Pardawen, which were to [be] send [sic] unto the King of Spaine. $^{50}$ 

Consisting of a double nut weighing up to fifty pounds,<sup>51</sup> Seychelles nuts, unlike bezoar stones, were unknown in Europe before the increased presence of enterprising Europeans in the East Indies during the sixteenth and seventeenth centuries. Replacing coconuts<sup>52</sup> as the foreign nut of choice among collectors, Seychelles nuts entered European collections as exotic wonders with magical prophylactic powers. Indeed, Queen Catalina of Portugal apparently "sent for this Coquo [coco] every year" for medicinal purposes.<sup>53</sup> Emperor Rudolf II had eighteen in his *Kunstkammer* of 1607-1611;<sup>54</sup> and King Gustavus Adolphus of Sweden received a collector's cabinet from the city of Augsburg in 1632, which included a mounted but detachable Seychelles nut as its crowning glory.<sup>55</sup>

In 1768 Europeans traced the provenance of Seychelles nuts to palm trees growing on two small islands in the Seychelles archipelago, from which they periodically washed up on the shores of the Maldive Islands. During the sixteenth and seventeenth centuries, however, their origin was uncertain to both Europeans and the Maldive people. By tradition, Maldive natives believed the nuts came from a tree growing in the depths of the sea and inhabited by a monstrous bird called a Garuda or, similarly, from a tree growing in the navel of the ocean on a sunken bank guarded by dragons.<sup>56</sup> After European traders and physicians came into contact with these natives, they brought back this local lore to Europe along with examples of the prized curiosity.

For example, when Carletti returned from the East Indies, he recounted to Grand Duke Ferdinando de' Medici I that Seychelles nuts

grow in the depths of the sea off those [Maldive] islands and from there are thrown up on the shore, where they are found .... [I]nside, they have a pith that, though it looks the same [as a coconut], is very different in flavor and not at all good to eat, though it is excelling against poison and malignant fevers. It is held in great esteem among the Maldive people .... I bought six ounces of these so-called Maldives in Goa .... I have experimented with it, and have found it of good effect. I removed fragments of it by rubbing it on a stone with a little water ... in the Indian way.<sup>57</sup>

The belief in the marine origin of the nut (also known as *coco-de-mer*) was alive a century later through widely disseminated writings such as



#### FIGURE 2

Mounted bezoar stone, with gold, seventeenth-century, Vienna(?). Height 17.8 cm. Kunsthistorisches Museum, Vienna. those by the botanists Carolus Clusius (Charles de l'Écluse), Exoticorum libri decem: Quibus animalium, plantarum, aromatum ... (Antwerp, 1605) (Fig. 3); Willem Piso, De Indiae utriusque re naturali et medica libri quatuordecim ... (Amsterdam, 1658); Jacobus Bontius (Jakob de Bondt), Historia Natural et Medicica Indiae Orientalis (Amsterdam, 1658); and Georg Rumphius (Georg Eberhard Rumpf), Herbarium Amboinense (Amsterdam, 1693). Although Rumphius questioned the arboreal provenance of the nut (since no one had found a trace of this great palm along the coasts), he did not doubt its aquatic origin.

John Parkinson was skeptical, however:

In my judgment if the truth might be searched exactly, by stout and not timorous persons, by religious not superstitious, as most of the Indians are, and by judicious and industrious men, and not weaklings, and fooles, the tree beareth these fruites would be found to grow on the land, whether Continent or Island is no matter.<sup>58</sup>

To disprove the claim for the nuts' aquatic origin, he suggested:

the King or some of the Naturalls, or else some Christians, or others in those parts make choyse of the freshest they could finde of these nuts, and to put both divers of them at sundry times into the ground, to see whether they would not sprout forth, and spring, for it is probable... and [thus] take away all other doubts and fables, whatsoever are forepassed.<sup>59</sup>



#### FIGURE 3

Coccus de Maldiva, argento inclusius, engraving, c. 1605. From Carolus Clusius (Charles de l'Écluse), Exoticorum libri decem: Quibus animalium, plantarum, aromatum... (Antwerp, 1605), bk. 7. Yet despite his distrust of "superstitious, weak fools," Parkinson wrote that the kernel and shell of the nut were "generally held to be good against poisons of all sorts and pestilential diseases."<sup>60</sup> Whether taken in powdered form, in a drink "wherein a peece of the kernel hath beene steeped,"<sup>61</sup> or by drinking out of a cup consisting of the shell, Seychelles nuts allegedly cured colic, palsy, dropsy, and other diseases of the head, nerves, and sinews; many believed it even allayed the pains of childbirth.

The physician Augerius Clutius was the most prominent to argue that such travail was remedied by the nut, writing in his treatise *Nux Medica Maldivensis* (Amsterdam, 1634). Parkinson countered that Clutius was "bold to publish the sundry cures he performed hereby, that is, both the nut and shell . . . especially in the sore and tedious travailes of child birth."<sup>62</sup> In 1658, Piso, the personal physician to the governor of Dutch Brazil, perhaps influenced by Clutius's findings, also prescribed the nut to ameliorate childbirth sufferings, and in 1663 the English physician John Peachie spoke likewise, when he was asked by a London doctor "what Specifick I have observed in the Indies to be most Effectual against difficult Labour in Women, which amongst us in Europe sweeps away so many people."<sup>63</sup> Also echoing Clutius's opinion, Peachie explained:

When I traveled to Spain, they used to call it the Egyptian Midwife, I suppose only by way of Allusion to the speedy Delivery of the Hebrew Women by their Means . . . . For my own particular, I can truly say, that I have experienced it to be admirable in that Case, if I may believe the good Women in our Countrey, and particularly one famous Midwife, who hath gotten great Reputation by the use of it.<sup>64</sup>

The Seychelles nut was, however, most revered as an antidote to poison. For example, in 1552 João de Barros, a leading Portuguese humanist and chronicler of Portuguese expansion, wrote "experience shows that the inner husk of this is much more efficacious against poison than the bezoar stone;"<sup>65</sup> writing ten years later, Garcia da Orta was skeptical and preferred bezoar stones as a remedy for poisonous ills, but he acknowledged that he "heard many persons worthy of credit say that it is very good as an antidote to poison."<sup>66</sup> According to John Ovington, Piso asserted "there is no Alexipharmick [that] goes beyond the Maldive coconut . . . . [It is] . . . consecrated by a certain Priviledge of Nature to the support of Life . . . which made Rudolphus, a certain Roman Emperor, understanding its excellence, purchase it at the price of Four Thousand Florens."<sup>67</sup> Although the price is probably apocryphal,<sup>68</sup> Rudolf II did own one of the largest collections of Seychelles nuts in the early modern period, which grandly reflected their popularity among sixteenth- and seventeenth-century collectors.

# The Iconography of Seychelles Nut Mounts

Once brought to Europe, Seychelles nuts, according to Parkinson, "may be cut into two long boatelike cups, to be edged and footed with silver, and as everyone please or else each of them again cut into two other, to be bordered with metal, the lower brims to be raised therewith, and the holes stopped, as it pleaseth everyone to doe."<sup>69</sup> Carolus Clusius, in his ten-volume botanical work of 1605, illustrated a silver-mounted example. In his copperplate engraving, the nut forms the body of a serpent-tailed bird (Fig. 3). Clusius apparently received the nut from a Jacques Garrett of London, "being taken by us in a great Carracke (a large ship) of the Portugals, coming from the East Indies, which was fourteen inches long and seven broad."<sup>70</sup> Although the object resembles, as scholars have noted, contemporary works of rock crystal<sup>71</sup>—particularly those produced in the Saracchi workshop in Milan—it may also reflect the legends emanating from the East Indies.

One version of the legends is recounted by the Italian voyager Antonio Pigafetta, one of the eighteen survivors of Ferdinando Magellan's expedition. In 1522 he described the origin of the nut:

beyond Java Major... there is an enormous tree named *Campanganghi*, in which dwell certain birds named Garuda, so large that they take with their claws, and carry away flying, a buffalo or even an elephant, to the place of the tree .... [T]he fruit of this tree is called *Buapanganghi*, and is larger than a watermelon .... It was understood that those fruits which are frequently found in the sea came from that place.<sup>72</sup>

As late as 1693 Georg Rumphius repeated a similar indigenous myth, and, as noted above, another version contended that dragons guarded the Seychelles nut palm. With its strange combination of feathered wings, long, imbricated tail, and dauntingly sharp fangs and claws, the creature that Clusius reproduced may be a conflation of the Garuda and a guarding dragon. Unfortunately, no Seychelles nut similar to the fanciful design of Clusius's spouted vessel has survived.

A testament to their rarity, there are only six extant mounted nuts from the sixteenth and seventeenth centuries.<sup>73</sup> One example is the spouted vessel of about 1575-1600 from the *Kunstkammer* of Archduke Ferdinand II at Ambras, now in the Kunsthistorisches Museum in Vienna (Fig. 4). Originally crowned with a swan,<sup>74</sup> the mount includes a heart-shaped cover with a band of laurel leaves framing embossed waves teeming with sea monsters, shells, aquatic plants, and a pair of swans. At one end, a pouring spout protrudes from the mouth of a silver-gilt zephyr, and strap-mounts adorn both sides of the nut (Fig. 6). Each mount consists of a grimacing, half-draped female figure terminating in serpent-like limbs and crowned by a bat with outstretched wings. Snakes coil around her shoulders and nip at her breasts; at her groin is a doglike head with long, shaggy ears, and, beneath her twisted limbs, an owl is perched between a pair of volutes on a palm frond.

On the underside of the nut and supporting it is a cup with embossed waves inhabited by sea monsters and plants surrounding pairs of sea gods and nereids. In Figure 5, a nymph embraces a horned sea god riding two sea monsters, the one on the left with fruit or perhaps pearls atop his head. On the opposite side of the cup, a nymph raises a crab above her head while a sea centaur reaches for it. Hoofed monopods serve as brackets between the cup and the baluster-shaped stem of scrolled strapwork and grotesque masks of lion's heads styled in the manner of Hercules's attribute. The two-tiered base continues the aquatic motif of embossed waves with sea creatures including turtles, as well as birds and palms.

Although the mount of this nut with its waves and sea creatures at first glance seems to reflect the legendary marine origin of the Seychelles nut,<sup>75</sup> closer scrutiny reveals a more specific iconography. For example, on the cover, base, and particularly on the cup, the tops of palm trees poke out of the sea—undoubtedly referring to the Malay myth of the nut originating from a palm tree with "fronds rising above an abyss in the Southern Ocean."<sup>76</sup> On the cup, these trees with emerging fronds are scattered throughout the composition and are surrounded by ferocious sea monsters—a probable reference to the monstrous guardians of the tree.

The strap-mounts, which may derive from the designs of Jan Vredeman de Vries,<sup>77</sup> probably also allude to the antidotal powers ascribed to the nut. For example, the bat and owl terminating the female figure are attributes of Night or, perhaps more pointedly, of her mother, Death.<sup>78</sup> The owl, since the time of Pliny, was an evil omen, "a funeral bird,"<sup>79</sup> or, as Chaucer wrote in the "Legend of Good Women" in 1385, "that prophete is of wo and myschaunce."<sup>80</sup> This belief in the owl as a harbinger of evil was still strong in the sixteenth century as King Henry proclaimed in Shakespeare's *Henry VI*, "The owl shriek'd at thy birth, an evil sign."<sup>81</sup> Archetypes of discord, night, and death, the bat and owl



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FIGURE 4 Seychelles nut mounted as spouted vessel, with embossed silver gilt, c. 1575-1600, probably Southern Germany, Augsburg(?). Height 41, greatest width 34.3 cm. Kunsthistorisches Museum, Vienna.



were included in the witches' "charm of powerful trouble" in *Macbeth*. Coupled with the biting serpents, which in Cesare Ripa's *Iconologia* represent "conscience, which gnaws at the soul that has sinned," the term, grimacing like an apotropaic gargoyle flanked by ominous symbols, possibly warded against the fatal mischief of others.

Rare and therefore a luxury afforded only by the richest, all six extant Seychelles nuts are formed as a spouted vessel or container for liquid and mounted with decoration alluding to that magico-medicinal function.<sup>82</sup> For it was known that in the East Indies "drinking out of the Cup made of the Shell . . . [is] look[ed] upon as a Preservative against all Diseases, and a Means to keep themselves in a sound and healthful state."<sup>83</sup> It seems evident that these objects were not purely decorative.

#### Rhinoceros Horns

In a manner similar to Seychelles nuts, rhinoceros horns were also commonly fashioned into magico-medicinal containers for liquid. As late as 1773 the Swedish traveler Carl Peter Thunberg remarked during his voyage through the Cape of Good Hope:

The horns of the rhinoceros were kept by some people not only as rarities, but also as useful in diseases and for the purpose of detecting poison. As to the former of these intentions, the fine shavings of the horn, taken internally, were supposed to cure convulsions and

FIGURE 5 Detail of mount on the underside of Fig. 4.



FIGURE 6 Detail of strap-mounts in Figure 4.

spasms in children. With regard to the latter it was generally believed that goblets made of these horns, in a turner's lathe, would discover a poisonous draught that was put into them, by making the liquor ferment till it ran quite out of the goblet. Such horns as were taken from a young rhinoceros calf were said to be the best and the most to be depended on. Of these, goblets are made which are set in gold and silver and made presents to Kings, people of distinction, and particular friends, or else sold at a high price, sometimes at the rate of fifty rix[six]-dollars a goblet.<sup>84</sup>

Although written in the eighteenth century, this description of rhinoceros horns as collectible rarities capable in the form of goblets of protecting against or detecting poison, frequently mounted in precious metals, and given as gifts among the elite, generally characterizes their form and function in sixteenth- and seventeenth-century Europe. As the horn was commonly adorned with motifs relating to the lore of the rhinoceros, it is worth examining contemporary knowledge of the beast before moving on to its horn.

Known since antiquity through the games of Pompey the Great and other ancient spectacles, the rhinoceros throughout the early modern period was famous through such classical sources as Pliny and the first-century poet Martial.<sup>85</sup> Thanks to these classical authors, the rhino developed a reputation as an intrepid beast able to overthrow the most ferocious adversaries, particularly the bear and elephant. Pliny reports that before a rhinoceros fought an elephant at the games of Pompey, it "gets ready for battle by filing its horns on rocks, and in the encounter goes specially for the belly, which it knows to be softer."<sup>86</sup>

When the rhinoceros made its first appearance in Europe since antiquity, in 1515, as a gift for King Manuel of Lisbon, the monarch planned a battle between the rhino and an elephant, undoubtedly inspired by Pliny's account. A Portuguese artist sketched the animal then and sent this to Albrecht Dürer in Nüremberg "for wonder's sake." The woodcut Dürer subsequently executed (Fig. 7) includes a translation of the Portuguese letter he received concerning the spectacle. It reads:

It was in the year 15(1)5, on May 1st, they brought our King of Portugual at Lisbon such a beast alive from India, which they call a Rhinoceros . . . . It has in front on its nose a strong sharp horn, and when the beast comes at the elephant to fight him, it has always first whetted its horn sharp against the stones and runs at the elephant with its head between his forelegs, and rips him up where his skin is thinnest, and so kills him. <sup>87</sup>

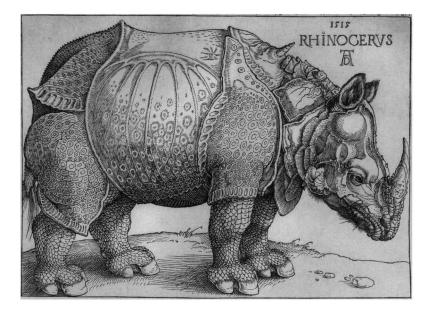


FIGURE 7 Albrecht Dürer, *Rhinoceros*, 1515, woodcut,  $24.8 \times 31.7$  cm. British Museum, London.

Consisting of an armorlike body, scaly legs and feet, and a fictitious spiral dorsal horn, Dürer's anatomically incorrect rhinoceros and its accompanying text of 1515 set the standard for contemporary representations and notions of this creature for the next two hundred years.

The notions concerning the perceived antidotal power of the rhinoceros horn, however, were borrowed from the legends of another horned beast: the mythical unicorn. Since at least the fourteenth century the so-called unicorn horn (actually the tusk of a narwhal and sometimes a walrus) was believed to be a sovereign remedy for poison as well as contagious ailments such as the plague; and when Europeans began encountering the rhinoceros and its horn at home and abroad, many mistakenly took the beast's horn for that of the unicorn. This confusion was compounded by European contact with natives in the East Indies and China, who for centuries ascribed magico-medicinal powers to the rhino horn. For example, when the English merchant Sir James Lancaster traveled to the East Indies in October 1592, he recorded:

Now we sent commodities [gilt armor, halberds, and "shirtes of maile"] to their king [of the island of Junkseylon—today Phuket, Thailand, also formerly Salang, off the west coast of the Malay Peninsula] to barter for ambergriese and for the hornes of abath [rhinoceros], whereof the beast which hath one horne onely in her forehead, and is thought to be the female unicorne, and is highly

esteemed of all the Moores in those parts as a most soveraigne remedie against poyson.  $^{88}\,$ 

Even when recognized as distinct from one another, the rhinoceros horn and the unicorn horn were considered by many as medicinally interchangeable. Grand Duke Ferdinando I de' Medici, in a letter dated June 15, 1591, requested two ampules of anti-poison and anti-worm oil as well as some rhinoceros horn since he did not have any unicorn horn.<sup>89</sup> In 1611, when Eleanora de' Medici suffered from hemorrhaging in an apoplectic fit, she imbibed what was purportedly the powdered horn of a unicorn and a rhinoceros.<sup>90</sup>

Like the bezoar stone, rhinoceros horn was supposedly efficacious against poison thanks to the special herbs in its composition. This belief possibly stems from China: since the fourth century, as the Chinese writer Ho Kung averred, the horns were antidotal because the rhino ate poisonous plants and trees,<sup>91</sup> which enabled it to break the power of poison through its venomous sympathy. This explanation was still given credence in the East and subsequently in the West in the sixteenth and seventeenth centuries, and may underlie remarks made by Linschoten in 1598:

It is to be understood, that all Rhinocerotes are not a like good, for there are some whose hornes are sold for one, two, or three hundred Pardawes the peece, and there are others of the same colour and greatness that are sold but for three or foure Pardawes, which the Indians know and can discerne. The cause is that some Rhinocerotes, which are found in certaine places in the countrie of Bengala have this vertue, by reason of the hearbes which that place only yeeldeth and bringeth forth, which in other places is not so, and this estimation is not onely held of the horne, but of all other things in his whole body.<sup>92</sup>

As a result of Eastern belief in its antidotal qualities, horns were fashioned into drinking vessels in China, as Carletti noted in 1599:

[Natives] carry many nose-horns of the rhinoceros, an animal of which their region is full. And they believe that if they make a vase from these horns and then drink from it, it has the virtue of purifying—or, to say it better—of overcoming the force of the poison that may be in—the drink, so that the poison loses its power.<sup>93</sup>

It is in this form, as a protective goblet, that many rhinoceros horns entered elite European collections.

# The Iconography of Rhinoceros Horn Mounts

Attributed to Nikolaus Pfaff, Rudolf II's cup and cover of 1611 in the Kunsthistorisches Museum in Vienna is a spectacular example of such a goblet (Fig. 8). Crowned with the silver-gilt head of a monstrous creature, which contains a fossilized shark's tooth, or so-called "serpent's tongue," and boasts the tusks of an African warthog, this cup is carved of horn with simulated coral branches and insects and faces emerging from them. The mounts at the base of the cover and cup include *style rustique* snakes, lizards, spiders, crayfish, and beetles cast from specimens in the manner of the great Nuremberg Mannerist goldsmith Wenzel Jamnitzer.<sup>94</sup>

As Elisabeth Scheicher succinctly argues, the decoration of this object may embody notions of India, the exotic source of the horn.<sup>95</sup> For example, Pliny considered coral the jewel of the Indians, and the doglike faces emerging from the stem possibly relate to dogheaded people, which according to such classical authors as Megasthenes, Pliny, and Strabo were also one of the wonders of India. Perhaps celebrating this country's rich and bizarre splendors, the motifs may also symbolize the elemental, malevolent forces used to ward off similar energies. From the "serpent's tongue," which, according to Rudolf's physician Boethius de Boodt, "many people make much of for its supposed power against poisons and for keeping off the Evil Eye,"<sup>96</sup> to the carved "coral" branches, a material also renowned as a protective charm against the evil eye, to the manacing face crowning the goblet, this cup is alive with apotropaic imagery.

Decoration alluding to the foreign origin of these horns and their alleged alexipharmic virtues is also evident in a south German carved cup and cover from the mid-seventeenth century in Figure 9. Featuring a female figure as a finial, the cup proper is carved with a variety of animals; the stem consists of a scantily clad Venus and Adonis, and it terminates with a base of carved sea creatures including a dolphin and a walrus. In *Kuriositäten Antiquitäten* (1966), Eugen von Philippovich characterizes the decoration on the cup as a random mixture of motifs, and he contends there is no connection between the land animals, sea creatures, and the romantic couple. Thus, he concludes these pieces may have originated separately in a workshop and have been arbitrarily put together.<sup>97</sup>

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#### FIGURE 8

Attrib. to Nikolaus Pfaff, Rhinoceros horn goblet, with African warthog tusks and silver gilt, before 1612, Prague. Height 49.7 cm. Kunsthistorisches Museum, Vienna. If a tightly coherent iconographic program is lacking, however, one thing is certain: the majority of the motifs seem to relate to the theme of the rhinoceros. For example, there is an obvious connection between the rhino and the animals featured on the cup proper, which are appropriately exotic beasts. The creature on the right is presumably an elephant, the rhino's notorious foe. Moreover, Adonis wears an outfit of feathers, a costume frequently used to represent the New World or exotic lands and thus an allusion to the rhino's distant origin. Additionally, the combination of land animals on the cup proper and sea creatures on the base may reflect the affiliation of the rhino's Indian origin with the fecundity of the country and the element water.<sup>98</sup>

Furthermore, Adonis and Venus are particularly appropriate decoration. In Ovid's *Metamorphoses*, when Cupid's arrow causes the goddess to fall in love with Adonis, she becomes "more like Diana than like Venus, Bare-kneed and robes tucked up. She cheers the hounds [and] hunts animals."<sup>99</sup> She warns Adonis to hunt only the more timid creatures and stay away from the "force of lightning [which] is in the wild boar's tusks." Scorning her caveat, however, Adonis soon goes after a passing wild boar. As a result, the beast "came charging at the hunter, who feared, and ran, and fell, and the tusk entered deep in the groin,"<sup>100</sup> thus ending his life. An association between the wild boar and the rhino may be implied in this mount. The ubiquitous belief in the rhino as a fierce predator ready to kill with his horn is paralleled in this ancient poem.<sup>101</sup>

More pointedly, the base of Rudolf II's cup includes a walrus, positioned with its tusks at the middlemost point of the composition, directly centered below the figures of Venus and Adonis. Probably based on Dürer's 1521 pen and ink drawing of a walrus now in the British Museum, this image reflects the association of the two creatures as exotic curiosities. (Dürer probably sketched his walrus from a stuffed head in a chamber of wonders during his visit to the Netherlands.) In fact, a pickled walrus head and a stuffed rhino could both be seen in Leo X's papal collection.<sup>102</sup>

The prominent motif of the walrus may also allude to the purportedly antidotal material of the cup. Walrus tusks were often straightened out and spuriously sold as the magical unicorn's horn.<sup>103</sup> For example, in 1598 the doctor Giles Fletcher acknowledged that "some use the powder of it [the walrus] against poison, as the Unicornes horn. The fish that weareth it is called a morse, and is caught about Pechora."<sup>104</sup> André Thevet, historian and cosmographer to François I, reportedly witnessed



#### FIGURE 9

Rhinoceros horn cup and cover, with silver, seventeenth-century, Southern Germany. Height 48.8 cm. Württembergisches Landesmuseum Stuttgart. the transformation of walrus tusks into unicorn's horn on an island in the Red Sea.  $^{\rm 105}$ 

As the lore of this material attests, the horn, stones, and nuts discussed here were not simply wondrous exotica, objects fashioned into art, but richly adorned safeguards against poison. A rhino horn goblet turned on a lathe for the Emperor Rudolf II in Prague even included the inscription "The cup of the sublime Rudolph II, which protects against poison."<sup>106</sup> As magico-medicinal objects, rhinoceros horns may have been ceremoniously used in Europe, as they were in China. For according to an Italian Jesuit missionary in Tongking (today's Tonkin, the greater part of north Vietnam), whence the Chinese frequently imported rhinoceros horns:

The gravest mandarins of China, for greater splendour and pomp on the tables they set before their guests at the banquets do not give bowls of glass to drink from, but only cups, worked with graceful carvings, of the hard horn of this animal [the rhinoceros] esteeming that wine drunk in these will make men drink more freely and with the more enjoyment that he who drinks therefrom is free from all suspicion of poison.<sup>107</sup>

Moreover, in 1697 the Italian writer Lorenzo Magalotti also recorded that the Chinese elite drank from "rhinoceros horn, either smooth or worked with carving, with gold mounts enriched with jewels."<sup>108</sup>

# Conclusion

Travelers' tales of the use and efficacy of rhino horn, Seychelles nuts, and bezoar stones lend credence to the thesis of their primarily alexipharmic virtues, which undoubtedly stimulated collectors' interest in procuring, mounting, and using these objects for their own prestige and protection against malevolent forces in turbulent times. For example, in 1689 the English traveler John Ovington wrote:

Upon the coast of Africa, in the time of the Sale of [an English merchant's] cargo there, the King's son of the Place was poysoned to that degree, that his Skin was bloated and swollen upon him like a Bladder: He presently betakes himself for a Remedy to the Maldive Coco-nut, several of which are found there. This he rubbed upon a hollow stone, containing five or six spoonfuls of Water, till the Water was well tinctur'd by it; and in the same manner rubb'd a piece of Rhinoceros Horn, and then drank the water off. And repeating this Medicine for three or four Days, the Humours sensi-

bly asswaged, and in that time were all drawn off by so powerful a Purgation, that though it had rack'd and examin'd every part of his body, he recover'd in that short space of time . . . . I brought one of these Coco-nuts with me from Suratt, which was graciously accepted of by the late Queen [Mary II], of Glorious and Immortal Memory.<sup>109</sup>

Francesco Carletti noted the magico-medicinal properties and preparation of bezoar stones abroad, and once home in Florence in 1607 he instructed Grand Duke Ferdinando de' Medici's physicians "by order of Your Highness." Carletti undoubtedly informed Ferdinando I of Asian beliefs in the potency of rhino horns, and he may have given the Grand Duke one of the four rhinoceros horn objects surviving in Ferdinando's collection.<sup>110</sup> The merchant John Lancaster received (undoubtedly along with a litany of its virtues) two bezoar stones "very faire" as a diplomatic gift from a Sumatran king to Queen Elizabeth I;<sup>111</sup> and John Ovington observed during his stay in India that the belief in rhino horns, as the "Antidote against all poysonous draughts," was so strong with the English, that "a former President of ours at Suratt . . . exchang'd for a cup made of this Horn a large capacious Silver Bowl of the same bigness."<sup>112</sup>

Cities closely involved in overseas trade must have been full of these stories, which certainly aided traders in selling their wares<sup>113</sup> and undoubtedly influenced the fashioning of these items. At the confluence of contemporary firsthand accounts, classical sources, and Eastern and Western magico-medicinal beliefs, the adornment of these materials frequently reflects the perceived intrinsic nature of these exotic "magical" objects and may even have enhanced their supposed powers at the time. Connecting the elite with distant lands, these items also underscored the collectors' own status, wealth, and erudition. For although by the end of the early modern period these materials waned in importance medicinally, they continued to endure as mounted marvels, exotic specimens, and trophies of ambitious merchants and affluent collectors. 1. For an introduction to a plethora of "antidotal" materials used in the Middle Ages and the Renaissance, see Odell Shepard, *The Lore of the Unicorn* (London, 1930), 127-54.

2. E.g., as recorded in the thirteenth-century Brevarium attributed to the Spanish physician, astrologer, and alchemist Arnal or Arnau de Villanova (c. 1235-1312): "Certain nobles and barons, when they eat, keep on the table the horn or else the tongue vessel of a serpent in a vessel on a piece of bread, and it is said that if any poison is set before it on the table, it at once begins to sweat"; quoted in Ronald W. Lightbown, Secular Goldsmiths' Work in Medieval France (London, 1978), 29-30.

 Giovanna Gaeta Bertelà, ed., La Tribuna di Ferdinando I de' Medici: Inventari 1589-1631 (Modena, 1997), nos. 308, 695, 787, 943.

4. Rotraud Bauer and Herbert Haupt, "Das Kunstkammerinventar Kaiser Rudolfs II, 1607-1611," Jahrbuch der Kunsthistorischen Sammlungen in Wien 72 (1976).

5. Letter from August 25, 1617, from Ferdinando Gonzaga to Caterina de' Medici. Faccia che il [Giulio or Lorenzo] Campagna mi mandi una pietra bezare orientale di quelle legate in oro che sono nel scrittorio de bezari che ne tengo di bisogno non per me ma per amici. Archivio di Stato di Firenze, Archivio Mediceo del Principato, vol. 6109, n.p. (entry 7046 in the Medici Archive Project's "Documentary Sources" data base) (hereafter AsFi, MdP 6109 [MAP Doc Sources 7046]).

 Giovanni Incisa della Rocchetta, "Il Museo di curiosità del Cardinal Flavio I Chigi," Archivio della Società Romana di storia patria 20 (1967): nos. 220, 479, 486, 589, 598, 752.

7. See Wilfried Seipel, ed., Exotica: Portugals Entdeckungen im Spiegel fürstlicher Kunst- und Wunderkammern der Renaissance, exh. cat. (Vienna: Kunsthistorisches Museum, 2000); Prag um 1600: Kunst und Kultur am Hofe Kaiser Rudolfs II, exh. cat., 2 vols. (Vienna: Kunsthistorisches Museum, 1988); Eliska Fucikova, ed., Rudolf II and Prague: The Court and the City, exh. cat. (Prague: Prague Castle, 1997); and Hugh Tait, Catalogue of the Waddesdon Bequest in the British Museum, vol. 3, The Curiosities (London, 1991).

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9. Oliver Impey and Arthur MacGregor, eds., The Origins of Museums: The Cabinet of Curiosities in Sixteenth- and Seventeenth-Century Europe (Oxford and New York, 1985); Joy Kenseth, ed., The Age of the Marvelous, exh. cat. (Hanover, N.H.: Hood Museum of Art, Dartmouth College, 1991); Elisabeth Scheicher, "Zur Ikonologie von Naturalien im Zusammenhang der enzyklopädischen Kunstkammer," Anzeiger des Germanischen Nationalmuseums und Berichte aus dem Forschungsinstitut für Realienkunde (1995): 115-25; and Lorraine Daston and Katharine Park, Wonders and the Order of Nature, 1150-1750 (New York, 1997).

10. E.g., Hermann Fühner, "Bezoarsteine," Janus 6 (1901): 317-21, 351-56, provides a chronological sequence of citations from medieval Arabic sources regarding the medicinal use of bezoar stones, and includes an excellent bibliography of European primary sources concerning the bezoar stone. R. van Tassel, "Bezoars," Janus 60 (1973): 241-56, provides a chemical analysis of bezoar stones as well as brief historical data. Martha Baldwin, "Toads and Plague: Amulet Therapy in Seventeenth-Century Medicine," Bulletin of the History of Medicine 67, no. 2 (1993): 227-47, details the medicinal use of similar materials against the plague.

11. Nicolás Monardes, Joyfull Newes of the Newfound World: Where in are declared the rare and singuler vertues of diuers and sundrie herbs, trees, oyles, plants, & stones with their applications, as well to the vse of Physicke, as Chirugery: which being wel applied, bring such present remedy for all diseases, as may seeme altogether incredible: notwithstanding by practice found out, to be true. Also the portrature of the sayde herbes, very aptly described: Englished by John Frampton . . . (London, 1580), fol. 99.

12. According to the research of Andrew A. Benson at the Scripps Institution of Oceanography in San Diego, Calif., bezoar stones may in fact remove both the toxic forms of arsenic arsenate, and arsenite from solutions in which they were immersed. Arsenite binds to sulfur in the protein of partially digested hair in the stones. In effect, the animal hair can act as a chemical sponge for arsenite. See Thomas H. Maugh II, "Speaking of Science: It isn't Easy Being King," *Science*, n.s., 203, no. 4381 (February 16, 1979): 637. 13. Van Tassel, "Bezoars," 123. For early Arabic sources concerning the bezoar stone, see also Fühner, "Bezoarsteine," 351-56.

14. Stowe Inventory, 1600, item 26:29, in Janet Arnold, *Queen Elizabeth's Wardrobe Unlock'd* (Leeds, 1988), 273. This inventory also includes "one petycoate of beasar colour," as item 63:108, p. 304.

15. "One great Bezar stone, sett in gould, which was Queene Elizabethe's, with some unicorne's Horne, in a paper; and one other large Bezar stone, broken in pieces." Robert Lemon, "Warrant of Indemnity and Discharge to Lionel Earl of Middlesex, Lord High Treasurer, and to the Other Commissioners of the Jewels, for having delivered certain Jewels to King James the First, which were sent by his Majesty into Spain, to the Prince of Wales and Duke Buckingham, dated July 7, 1623," Archaeologia 21 (1827): 153.

16. Quoted in Henry Yule and Arthur Coke Burnell, Hobson-Jobson: A Glossary of Colloquial Anglo-Indian Words and Phrases, and of Kindred Terms, Etymological, Historical, Geographical and Discursive (1886; London, 1903), 91.

17. Monardes, Joyfull Newes, fol. 99.

18. Jean-Baptiste Tavernier, *Travels in India*, trans. Valentine Ball (Paris, 1676; New York, 1889), 147.

19. Ibn al-Beithar, quoted in Hermann Fühner, "Bezoarsteine," *Janus* 6 (1901): 353.

20. Otharid ibn Muhammad al-Hakeb, quoted in Fühner, "Bezoarsteine," 353.

21. José de Acosta, The Natural and Moral History of the Indies, trans. Edward Grimston (1604; New York, 1932), 294.

22. Charles Jacques Poncet, The Red Sea and Adjacent Countries at the Close of the Seventeenth Century as Described by Joseph Pitts, William Daniel, and Charles Jacques Poncet, ed. Sir William Foster (London, 1949), 131.

23. John Parkinson, Theatrum Botanicum: The Theater of Plantes or an Universall and Compleate Herball... (London, 1640), 1590. Parkinson served as an apothecary and herbalist to James I and Charles I. The Theatrum was the most comprehensive botanical encyclopedia of its time.

24. Jeronimo Lobo, *The Itinerario of Jeronimo Lobo*, trans. Donald M. Lockhart (London, 1984), 4.

25. Marsilio Ficino, *Three Books on Life*, trans. Carol V. Kaske and John R. Clark (Binghamton, N.Y., 1989), 301.

26. Ibid., 327.

27. Ibid.

28. Acosta, The Natural and Moral History, 293.

29. Monardes, Joyfull Newes, 99.

30. John Fryer, A New Account of East India and Persia in Eight Letters, Being Nine Years Travels Begun 1672 and Finished 1681 (London, 1698), 212.

31. Thomas Nicols, A Lapidary or History of Pretious Stones: With Cautions for the Undeceiving of All Those That Deal with Pretious Stones (Cambridge, 1652), 181.

32. Winfried Schleiner, "Jacques and the Melancholy Stag," English Language Notes 17, no. 3 (March 1980): 175.

33. H. C. Erik Midelfort, Mad Princes of Renaissance Germany (London, 1994), 88.

34. Ibid., 118.

35. Marie-Christiane Maselis, Arnout Balis, and Roger H. Marijnissen, *The Albums of Anselmus de* Boodt (1550-1632): Natural History Painting at the Court of Rudolph II in Prague, trans. Alastair Weir (Ramsen, Switz., and Tielt, Belgium, 1999), 18.

36. Giambattista della Porta, Natural Magick (London, 1658), 545. There are extant amulets of bezoar stones illustrated in Liselotte Hansmann and Lenz Kriss-Rettenbeck, Amulett und Talisman: Erscheinungsform und Gerschichte (Munich, 1966), figs. 273, 275-78.

37. Parkinson, Theatrum Botanicum, 1590.

 Francesco Carletti, My Voyage around the World, trans. Herbert Weinstock (1594; New York, 1964), 196.

39. Don Enrique de Villena, quoted in Ronald W. Lightbown, *Medieval Jewellery* (London, 1992), 96.

40. Maria Luisa of Orleans had two bezoar stones encased in gold filigree and Kurfürstin Anna of Saxony had a bezoar in a "little gold wire basket of fine work." Anon., Princely Magnificence: Court Jewels of the Renaissance, 1500-1630, exh. cat. (London: Victoria and Albert Museum, 1980), 54. Many different kinds of bezoar pendants are illustrated in Hansmann and Kriss-Rettenbeck, Amulett und Talisman; see figs. 273, 275-78. 41. Examples of such extant bezoar stones mounted in filigree are illustrated in Rotraud Bauer, ed., *Die Portugiesen in Indien: Die Eroberungen Dom João de Castros auf Tapisserien, 1538-1548*, exh. cat. (Vienna: Kunsthistorisches Museum, 1992), and Seipel, *Exotica*. See also the large bezoar pendant (16.2 cm) enclosed in filigree with four black champlevé enamel plaques with the coat-of-arms of the duke of Alva, one of Emperor Charles V's generals, illustrated in *Princely Magnificence*, fig. 21.

42. The inventory is reprinted and translated in Anna Maria Massinelli, *Treasures of the Medici* (New York, 1992), 232.

43. Bells had been incorporated into amulets since antiquity; note, e.g., the many phallic amulets with bells from the first century A.D. discovered in Pompeii and Herculaneum. In the early modern period, bells were used as protective amulets in portraits of children. See, e.g., the portrait by Hans Mielich (1515-1573) illustrated in Hansmann and Kriss-Rettenbeck, *Amulett und Talisman*, fig. 738. Southern Italians still sell bells and horseshoes adorned with bells to avert the evil eye.

44. Letter from August 25, 1617, from Ferdinando Gonzaga to Caterina de' Medici. Faccia che il [Giulio or Lorenzo] Campagna mi mandi una pietra bezare orientale di quelle legate in oro che sono nel scrittorio de bezari che ne tengo di bisogno non per me ma per amici. AsFi, MdP 6109 (MAP Doc Sources 7046).

45. Nicols, A Lapidary, 182.

46. Della Porta, Natural Magick, 545.

47. James Petiver, "An Account of Some Indian Plants, etc., with Their Names, Descriptions and Vertues; Communicated in a Letter from Mr. James Petiver, Apothecary and Fellow of the Royal Society; to Samuel Brown, Surgeon at Fort St. George," *Philosophical Transactions (1683-1775) of The Royal Society 20 (1698): 330.* 

48. Garcia da Orta, Colloquies on the Simples and Drugs of India, trans. Sir Clements Markham (1563; London, 1913), 365.

49. John Huyghen van Linschoten, The Voyage of John Huyghen Van Linschoten to the East Indies, ed. Arthur Coke Burnell, 2 vols. (1598; London, 1935), 1: 75.

50. Ibid., 144.

51. Today, the Seychelles nut is considered the heaviest seed in the world.

52. Coconuts came from the East Indies and, after the discovery of the Americas, from the New World as well. In early inventories they are referred to as "India nuts." From the late thirteenth or early fourteenth century, coconuts were already being mounted in Europe. For discussion of these mounted medieval objects, see Lightbown, *Secular Goldsmiths' Work*, 58-59. Coconuts were not quite as rare as other exotic materials and declined in value in the sixteenth century. See Philippa Glanville, *Silver in Tudor and Early Stuart England* (London, 1999), 325. For a general discussion of coconuts, see also Rolf Fritz, *Die gruppe von Kokonuss in Mitteleuropa*, 1250-1800 (Mainz, 1983).

53. Da Orta, Colloquies, 145.

54. Bauer and Haupt, "Das Kunstkammerinventar," nos. 283-92.

55. For a color illustration of this cabinet, see Monica Riccardi-Cubitt, Art of the Cabinet (London, 1992), pl. 19. For further information, see Hans-Olof Boström, "Philipp Hainhofer and Gustavus Adolphus's Kunstschrank in Uppsala," in The Origins of Museums, ed. Impey and MacGregor, 90-91.

56. Yule and Burnell, Hobson-Jobson, 230.

57. Carletti, My Voyage, 225.

58. Parkinson, Theatrum Botanicum, 1599-1600.

59. Ibid.

60. Ibid. Parkinson nonetheless offered the caveat that Carolus Clusius and others were not completely convinced.

61. Ibid.

62. Ibid.

63. John Peachie, Some Observations Made upon the Maldiva Nut: Shewing Its Admirable Virtue in Giving an Easie, Safe, and Speedy Delivery to Women in Child-bed Written by the Physician in the Countrey to Dr. Hinton at London, 1663 (London, 1694), 3.

64. Ibid., 6-7.

65. João de Barros, quoted in Yule and Burnell, Hobson-Jobson, 230-31.

66. Da Orta, Colloquies, 145.

67. John Ovington, A Voyage to Surat in the Year 1689 (1696; London, 1929), 157-58.

68. Rudolf Distelberger, "Die Kunstkammerstücke," in Prag um 1600: Kunst und Kultur am Hofe Kaiser Rudolfs II, exh. cat., 2 vols. (Vienna: Kunsthistorisches Museum, 1988), I: 440. See also Tait, Catalogue of the Waddesdon Bequest, 56.

69. Parkinson, Theatrum Botanicum, 1599-1600.

70. Ibid.

71. Tait, Catalogue of the Waddesdon Bequest, 58.

72. Antonio Pigafetta, quoted in Yule and Burnell, Hobson-Jobson, 230.

73. Schatzkammer of the Deutsches Ritter Ordens, Vienna; Grünes Gewölbe, Dresden; two in the Kunsthistorisches Museum, Vienna; Chancellor's Room of the University of Uppsala, Sweden; and the British Museum, London. See Tait, Catalogue of the Waddesdon Bequest, 58.

74. The spouted vessel was described in an 1821 inventory with a decapitated swan finial, and by 1885 the swan was officially recorded as lost. Tait, *Catalogue of the Waddesdon Bequest*, 53.

75. This supposed marine origin also led to the acquisition of these nuts as representative of the element water in cosmographically organized collections. For a discussion of the origin of this system of collecting and Seychelles nuts within it, see Elizabeth Scheicher, "Zur Ikonologie von Naturalien im Zusammenhang der enzyklopädischen Kunstkammer," Anzeiger des Germanischen Nationalmuseums (1995): 115-25.

76. Yule and Burnell, Hobson-Jobson, 230.

77. See the engraving of terms now in The Metropolitan Museum of Art illustrated in Janet S. Byrne, *Renaissance Ornament Prints and Drawings* (New York, 1981), 70.

78. Sarah Carr-Gomm, Dictionary of Symbols in Western Art (New York, 1995), 45.

79. Pliny the Elder, *Historia Naturalis*, trans. Harris Rackham, 10 vols. (London, 1940), 10: 72.

80. Chaucer, quoted in Timothy B. Schroeder, Art of the European Goldsmith (New York, 1983), 57.

 Shakespeare, quoted in Faith Medlin, Centuries of Owls in Art and the Written Word (Norwalk, Conn., 1967), 37.

82. Even the nut crowning the Uppsala cabinet of about 1625-1631 was detachable and according to the merchant Phillip Hainhofer held a quart of wine; Hans-Olof Bostrom, "Phillip Hainhofer and Gustavus Adolphus's *Kunstschrank* in Uppsala," in

The Origins of Museums, ed. Impey and MacGregor, 96.

 Peachie, Some Observations ... 1663, 6.
Peachie is quoting John Parkinson in a pamphlet to another physician.

84. Carl Peter Thunberg, quoted in Lady Margaret Evans, "Carved Cups of Rhinoceros Horn," Connoisseur 87, no. 357 (May 1931): 297.

85. See Marcus Valerius Martialis, *The Epigrams of Martial: On the Spectacles*, trans. Walter K. C. Ker (London, 1919), 17.

86. Pliny, Historia Naturalis, 8: 53.

87. Written on Dürer's drawing; translated in Campbell Dodgson, "The Story of Dürer's Ganda," in *The Romance of Fine Prints*, ed. Alfred Fowler (Kansas City, 1938), 46.

88. Sir James Lancaster, The Voyages of Sir James Lancaster to Brazil and the East Indies (1591-1603; London, 1940), 14.

89. Letter June 15, 1591, from Ferdinando I de' Medici to unspecified recipient. Subito ricevuta la lettera di V.S. Ill. ma ho comandato che siano mandate a Roma in mano del Sr. Card. Le dal Monte [Francesco Maria del Monte] due buone ampolle d'olio contra veleno et contra vermi, et del corno di bada, che dell'unicorno non n'ho. AsFi, MdP 280, fol. 58 (MAP Doc Sources 7323).

90. Report of c. February 1611. AsFi, MdP 2951, n.p. (MAP Doc Sources 5428).

91. Richard Ettinghausen, *The Unicorn* (Washington, D.C., 1950), 112.

92. Linschoten, The Voyage, 1: 10.

93. Carletti, My Voyage, 181.

94. The comparison is also made by Archduke Géza von Habsburg in idem, *Princely Treasures* (New York, 1997), 125.

95. Scheicher, "Zur Ikonologie," 121-23.

96. Boethius, quoted in Shepard, The Lore, 129.

97. Eugen von Philippovich, Kuriositäten Antiquitäten: Ein Handbuch für Sammler und Liebhaber (Braunschweig, Germany, 1966), 460-62.

98. Scheicher, "Zur Ikonologie," 121-23.

99. Ovid, Metamorphoses, trans. Rolfe Humphries (Bloomington, Ind., 1955), 251.

100. Ibid., 257.

101. The unknown designers of this cup used Ovid's poem as a source because it was familiar to erudite collectors. Also, there is evidence that in the early seventeenth century people saw a parallel between the ferocity of the boar with his tusks and the rhino with its horn. E.g., in another early seventeenth-century carved rhinoceros horn cup, now at the British Museum (illus. in Tait, *Catalogue of the Waddesdon Bequest*, 3), boar imagery is prominent: the cup depicts Meleager in high relief presenting the head of the Calydonian boar to Atalanta (again, the story comes from Ovid and parallels contemporary notions of the rhinoceros).

102. Colin Eisler, Dürer's Animals (London, 1991), 275. In fact, the stuffed rhinoceros in Leo X's collection was the same rhino originally at the court of King Manuel of Lisbon, which inspired Dürer's popular woodcut. When the Portuguese ruler sent the live creature to the Pope (undoubt-edly to reenact another classical battle, this time with the Pope's elephant), it drowned off the Italian coast and was subsequently stuffed.

103. Shepard, *The Lore*, 132-33. In fact, Richard Ettinghausen argues that it is actually the tusks of the walrus and/or narwhal that catalyzed the belief in the antidotal powers of horns in Muslim countries. Ettinghausen, *The Unicorn*, 122.

104. Giles Fletcher (1598), quoted in Shepard, *The Lore*, 133.

105. Shepard, The Lore, 133.

106. Fucikova, Rudolf II, 495.

107. P. Giovanni Filippo de Marini (1665), quoted in Ronald Lightbown, "Oriental Art in Italy," *Journal of the Warburg and Courtauld Institutes* 32 (1969): 261.

108. Quoted in Alvar González-Palacios, Objects for a Wunderkammer, exh. cat. (London: Colnaghi Gallery, 1981), 130.

109. Ovington, A Voyage to Surat, 158-59.

110. Bertelà, La Tribuna, items 308, 695, 696, 943.

111. Lancaster, The Voyages, 115-16.

112. Ovington, A Voyage, 159.

113. E.g., while in Madrid, Rudolf II's agent tried convincing the emperor to purchase such materials by stressing their potential to protect against poisons. Fucikova, *Rudolf II*, 474.