In March of 1628, a Kongolese man named João Alvares Vieira denounced a healer he identified as Domingos Ambundo. This Mbundu healer resided in Luvo, some 60 kilometres north of Mbanza Kongo. Vieira described how he and his wife, Dona Maria Afonso (as well as other family members), had twice taken their ailing daughter to Domingos's hut in order to cure her illness. Domingos had prepared his home remedies by adding herbs and pieces from the *takula* tree to boiling water. He had also thrown a wooden male figure into the concoction. João Alvares Vieira, a Kongo Christian, claimed that he knew that this figure was not God and, hence, neither believed in nor respected it. Neither did he believe that it could improve a person's health. In his testimony, he labelled Domingos's healing as silliness and deception. However, he did admit to believing in the efficacy of the herbal and takula concoction that the healer had prepared. Why else would he have taken his daughter to Domingos? After all, similar remedies were widely used to cure people in Kongo at the time.<sup>1</sup>

Altogether, three witnesses testified against the Mbundu healer Domingos, corroborating João Alvares Vieira's deposition, which remains remarkable in many ways. It was one of over seventy denunciations culled in Luanda and Mbanza Kongo in the 1620s. Although only a few of these denunciations concerned African healers, diviners and sorcerers, this documentation provides a rare first-hand African account of popular healing. It shows how Kongolese Christians reflected upon the limits of acceptable religiosity over a century after Catholicism became an integral feature of the Kongo's religious landscape. Since many witnesses in these and subsequent Inquisition proceedings were local Africans, their voices offer a unique view of Mbundu and Kongo understandings of health, illness and healing. Depositions by individuals like

<sup>&</sup>lt;sup>1</sup> Arquivo Nacional da Torre do Tombo (subsequently ANTT), Tribunal do Santo Ofício, Inquisição de Lisboa (subsequently TSO/IL), Diversos, Denunciações do reino do Congo e Angola, 73r, 82r.

João Alvares Vieira complement the sources produced by European missionaries and colonial officials. Certainly, Vieira's testimony has to be placed within the context of the Inquisition as part of what Toby Green has termed 'the reign of fear'.<sup>2</sup> When João Alvares Vieira denounced the Mbundu healer Domingos, it was not only the healer whose activity was being investigated – the denouncer's faith was similarly being questioned because of his presence at an autochthonous ritual.

João Alvares Vieira's deposition reveals many common elements that can be observed in numerous other cases discussed in this book. The first is the presence of a Mbundu healer in what was obviously Kikongospeaking territory north of Mbanza Kongo. This reflects the mobility of the medical practice and of practitioners in West-Central Africa. The Inquisition documentation from later periods reveals that healers were highly mobile, and it is not surprising to find itinerant healers, whose mobility was regarded as a sign of their spiritual power. But this mobility also applied to patients, who would sometimes travel considerable distances to reach a famed healer, as Vieira and his family obviously did. It can also be observed that João Alvares Vieira's daughter was cared for by a therapy management group, consisting of parents and relatives but also slaves, who accompanied the patient to the healer.<sup>3</sup>

Second, João Alvares Vieira testified to the healing power of the *takula* tree, which was widely used and traded in West-Central Africa in this period. It was sought by Portuguese and Dutch merchants in the port of Mayumbe and exchanged for slaves in the kingdom of Ndongo as well as shipped to Brazil and Europe as a textile dye.<sup>4</sup> Vieira probably mentioned the name *takula* because he knew that Europeans also used it for healing purposes. He expected the investigating priests to regard it as a natural rather than diabolical ingredient in the healing ritual. Third, Domingos Ambundo, João Alvares Vieira and other witnesses who testified in the case were all Catholics. For example, one of the witnesses was identified as Dom Pedro, the son of Dom Ambrosio de Mendes and Dona Estefana, certainly members of the Kongolese Christian elite.<sup>5</sup> They

<sup>&</sup>lt;sup>2</sup> Toby Green, Inquisition: The Reign of Fear (Basingstoke: Macmillan, 2007).

<sup>&</sup>lt;sup>3</sup> John M. Janzen, *The Quest for Therapy: Medical Pluralism in Lower Zaire* (Berkeley: University of California Press, 1978). Chapter 1 provides further information on therapy management groups as well.

<sup>&</sup>lt;sup>4</sup> Kalle Kananoja, 'Bioprospecting and European Uses of African Natural Medicine in Early Modern Angola', *Portuguese Studies Review* 23 (2016): 45-69.

<sup>&</sup>lt;sup>5</sup> ANTT, TSO/IL, Diversos, Denunciações do reino do Congo e Angola, 61r, 69r, 82v. On Kongo elites, see, e.g., Linda Heywood and John Thornton, 'Central African Leadership and the Appropriation of European Culture', in *The Atlantic World and Virginia*, 1550–1624, edited by Peter C. Mancall (Chapel Hill: University of North Carolina

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obviously knew that the healing ritual contained suspicious elements. Similar to Capuchin missionaries who wrote at length about Kongolese rituals, João Alvares Vieira acknowledged that natural medicinals were potent cures, whereas the local deities used in the ritual had lost their potency for Kongolese Christians. They were part of a show put on by Domingos. Vieira sought to convince his interrogators that it was the healer's Catholic conviction that was questionable, not his search for a medicine to cure his daughter.

This book places João Alvares Vieira's experience in the larger context of cross-cultural medical interaction in Atlantic Africa in the early modern period. This interaction was characterised by continuous knowledge exchange between Africans and Europeans. In *Civilization and Capitalism*, Fernand Braudel commented on European expansion, pointing out that humans had already explored and exploited the whole world for centuries or millennia before the rise of Europe. Arguing that Europe neither discovered nor first explored America and Africa, Braudel wrote about the nineteenth-century explorers of central Africa, whom black Africans carried around on their backs while Europeans claimed that they were discovering a sort of New World. But in Africa, as in America, Europeans were merely rediscovering old tracks and rivers used by the indigenous inhabitants of these continents. In short, 'Europeans very often rediscovered the world using other people's eyes, legs and brains.'<sup>6</sup>

The following chapters reveal the ways in which Europeans depended on other people's eyes and brains in Atlantic Africa. Braudel's insight has come under increasing scrutiny as scholars have begun to examine how practical knowledge was embedded in local experiences.<sup>7</sup> Preserving health was a central concern in foreign environments. On their voyages through the Atlantic and Indian Oceans, Europeans faced a practical problem of preserving fresh, plant-based medicinals. One of the solutions to this dilemma was medical interaction with the peoples of Asia and the Americas. These cross-cultural exchanges were overlooked for a long time, perhaps because they were not seen as part of European medicine's

Press, 2007), 194–224; Cécile Fromont, *The Art of Conversion: Christian Visual Culture in the Kingdom of Kongo* (Chapel Hill: University of North Carolina Press, 2014).

<sup>&</sup>lt;sup>6</sup> Fernand Braudel, Civilization and Capitalism, 15th-18th Centuries, Vol. 1: The Structures of Everyday Life: The Limits of the Possible, translated by Siân Reynolds (London: Collins, 1981), 62-63.

<sup>&</sup>lt;sup>7</sup> Clifford Geertz, Local Knowledge: Further Essays in Interpretive Anthropology (New York: Basic Books, 1983); Walter D. Mignolo, 'The Geopolitics of Knowledge and the Colonial Difference', South Atlantic Quarterly 101 (2002): 56–96; Jan Golinski, Making Natural Knowledge: Constructivism and the History of Science (Chicago: University of Chicago Press, 2005).

slow development during the early modern period. However, for the Europeans travelling into new worlds, the significance of locally produced and available medicinals was undoubtedly great. Historians of science and medicine have increasingly noted these cross-cultural exchanges and highlighted their impact on 'Western' medicine. Yet, they have had very little to say about medical interaction in Atlantic Africa.<sup>8</sup> It is symptomatic of this historiography that we know much more about African healers and medical practices in the Americas than about public health in precolonial Africa.<sup>9</sup>

Medicine and natural history developed hand in hand with European colonial expansion in the Atlantic and Indian Oceans. In the Portuguese colonial world, a network of Portuguese physicians and apothecaries debated and inquired about the unfamiliar nature and debilitating fevers. As Hugh Cagle has demonstrated, encounters with new types of nature and disease led to a range of geographical imaginings. In the vast and internally differentiated intertropical world, nature and disease varied greatly.<sup>10</sup> The local knowledge of American and Asian peoples was an

<sup>&</sup>lt;sup>8</sup> Michael N. Pearson, 'First Contacts between Indian and European Medical Systems: Goa in the Sixteenth Century', in Warm Climates and Western Medicine: The Emergence of Tropical Medicine, 1500–1900, edited by David Arnold (Amsterdam: Rodopi, 1996), 20–41; Harold J. Cook, Matters of Exchange: Commerce, Medicine, and Science in the Dutch Golden Age (New Haven, CT: Yale University Press, 2007); Mark Harrison, Medicine in an Age of Commerce and Empire: Britain and Its Tropical Colonies, 1660–1830 (Oxford: Oxford University Press, 2010); Pratik Chakrabarti, Medicine and Empire 1600–1960 (Basingstoke: Palgrave Macmillan, 2014). In a 2015 overview, Mark Harrison blamed the absence of documentation on the lack of research on African medical history prior to 1800. See Mark Harrison, 'A Global Perspective: Reframing the History of Health, Medicine, and Disease', Bulletin of the History of Medicine 89 (2015): 650.

Pablo F. Gómez, The Experiential Caribbean: Creating Knowledge and Healing in the Early Modern Atlantic (Chapel Hill: University of North Carolina Press, 2017); Londa Schiebinger, Secret Cures of Slaves: People, Plants, and Medicine in the Eighteenth-Century Atlantic World (Stanford, CA: Stanford University Press, 2017). Besides the Caribbean, much of this scholarship has concentrated on Brazil, with several case studies on individual healers: Luiz Mott, 'O calunduangola de Luzia Pinta: Sabará, 1739', Revista do Instituto de Arte e cultura, Ouro Preto 10 (1994): 73-82; Alexandre Almeida Marcussi, 'Estratégias de mediação simbólica em um calundu colonial', Revista de História 155 (2006): 97-124; André Nogueira, 'Relações sociais e práticas mágicas na capitania do ouro: o caso do negro angola Pai Caetano (Vila Rica - 1791)', Estudos Afro-Asiáticos 27 (2005): 181-203; Kalle Kananoja, 'Pai Caetano Angola, Afro-Brazilian Magico-Religious Practices, and Cultural Resistance in Minas Gerais in the Late Eighteenth Century', Journal of African Diaspora Archaeology and Heritage 2 (2013): 19-39; Ramon Fernandes Grossi, 'O caso de Ignácio Mina: tensões sociais e práticas "mágicas" nas minas', Varia Historia 20 (1999): 118-131; James H. Sweet, Domingos Álvares, African Healing, and the Intellectual History of the Atlantic World (Chapel Hill: University of North Carolina Press, 2011); João José Reis, Domingos Sodré, um sacerdote africano: Escravidão, liberdade e candomblé na Bahia do século XIX (São Paulo: Companhia das Letras, 2008).

<sup>&</sup>lt;sup>10</sup> Hugh Cagle, Assembling the Tropics: Science and Medicine in Portugal's Empire, 1450–1700 (Cambridge: Cambridge University Press, 2018), 10–11.

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integral part of medical reciprocity and botanical collection.<sup>11</sup> This book argues that Atlantic Africa was not exceptional in this regard.<sup>12</sup>

Natural history was meant to serve the state and the ruling class. A typical travelling scientist was an upper-class male, who travelled from the known towards the unknown and returned relatively quickly to Europe. His successful journey was made possible by a large group of

11 Richard Grove, Green Imperialism: Colonial Expansion, Tropical Island Edens and the Origins of Environmentalism, 1600-1860 (Cambridge: Cambridge University Press, 1995); Richard Drayton, Nature's Government: Science, Imperial Britain, and the 'Improvement' of the World (New Haven, CT: Yale University Press, 2000); Londa Schiebinger, Plants and Empire: Colonial Bioprospecting in the Atlantic World (Cambridge, MA: Harvard University Press, 2004); Antonio Barrera-Osorio, Experiencing Nature: The Spanish American Empire and the Early Scientific Revolution (Austin: University of Texas Press, 2006); Júnia Ferreira Furtado, 'Tropical Empiricism: Making Medical Knowledge in Colonial Brazil', in Science and Empire in the Atlantic World, edited by James Delbourgo and Nicholas Dew (London: Routledge, 2007), 127-151; Timothy D. Walker, 'Acquisition and Circulation of Medical Knowledge within the Early Modern Portuguese Colonial Empire', in Science in the Spanish and Portuguese Empires, edited by Daniela Bleichmar, Paula de Vos, Kristin Huffine and Kevin Sheehan (Stanford, CA: Stanford University Press, 2009), 247-270; Timothy D. Walker, 'The Medicines Trade in the Portuguese Atlantic World: Acquisition and Dissemination of Healing Knowledge from Brazil (c. 1580-1800)', Social History of Medicine 26 (2013): 403-431. On the role of Africans in transmitting knowledge in the Americas, see, e.g., Susan Scott Parrish, 'Diasporic African Sources of Enlightenment Knowledge', in Science and Empire in the Atlantic World, edited by James Delbourgo and Nicholas Dew (London: Routledge, 2007), 281-310; Londa Schiebinger, 'Scientific Exchange in the Eighteenth-Century Atlantic World', in Soundings in Atlantic History: Latent Structures and Intellectual Currents, 1500-1830, edited by Bernard Bailyn (Cambridge, MA: Harvard University Press, 2009), 294-328; Pablo F. Gómez, 'The Circulation of Bodily Knowledge in the Seventeenth-Century Black Spanish Caribbean', Social History of Medicine 26:3 (2013): 383-402. For an Indian Ocean perspective, see Dorit Brixius, 'From Ethnobotany to Emancipation: Slaves, Plant Knowledge, and Gardens on Eighteenth-Century Isle de France', History of Science 58 (2019): 51-75.

<sup>12</sup> Earlier forays into medicine in Atlantic Africa include, e.g., Luis de Pina, 'Notas para a medicina indígena angolense no século XVIII', Boletim Geral das Colónias 151 (1938): 12-26; William Simon, 'A Luso-African Formulary of the Late Eighteenth Century: Some Notes on Angolan Contributions to European Knowledge of Materia Medica', Pharmacy in History 18 (1976): 103-114; Heinrich Loth, Altafrikanische Heilkunst (Leipzig: Verlag Philipp Reclam, 1984); José Pedro Sousa Dias, 'Índice de drogas medicinais angolanas em documentos dos séculos XVI a XVIII', Revista Portuguesa de Farmácia 45 (1995): 174-184; Daniel Hopkins, 'Danish Natural History and African Colonialism at the Close of the Eighteenth Century: Peter Thonning's "Scientific Journey" to the Guinea Coast, 1799-1803', Archives of Natural History 26 (1999): 369-418; Judith A. Carney and Richard Nicholas Rosomoff, In the Shadow of Slavery: Africa's Botanical Legacy in the Atlantic World (Berkeley: University of California Press, 2009); Jonathan Roberts, 'Medical Exchange on the Gold Coast during the Seventeenth and Eighteenth Centuries', Canadian Journal of African Studies 45 (2011): 480-523; Abena Dove Osseo-Asare, Bitter Roots: The Search for Healing Plants in Africa (Chicago: University of Chicago Press, 2014); Hugh Cagle, 'Beyond the Senegal: Inventing the Tropics in the Late Middle Ages', Journal of Medieval Iberian Studies 7 (2015): 1-21; John Rankin, Healing the African Body: British Medicine in West Africa 1800-1860 (Columbia: University of Missouri Press, 2015); Kananoja, 'Bioprospecting and European Uses'; Tom C. McCaskie, "The Art or Mystery of Physick" - Asante Medicinal Plants and the Western Ordering of Botanical Knowledge', History in Africa 44 (2017): 27-62.

assistants, who carried the supplies, collected specimens and participated in cataloguing them. Yet, the contributions of these assistants, including Africans on both sides of the Atlantic, have largely been overlooked until recently. In the intellectual order of European colonists, the role of non-European men and women in the production of knowledge was downplayed or ignored completely. However, the contributions of local informants can be traced in the published works, private notes and journals of European surgeons and natural historians.<sup>13</sup>

While earlier scholarship on Africa during the era of the trans-Atlantic slave trade largely focused on violence and patterns of trade,<sup>14</sup> this book takes a road less travelled. It concentrates on health, disease and medical knowledge in Atlantic Africa from roughly the early sixteenth to the early nineteenth century. The book focuses on African and European perceptions of health, disease and healing in tropical Africa. The research highlights cross-cultural medical exchanges and argues that local African knowledge was central to shaping European responses to illness. Medical interaction between Africans, Europeans residing in Africa for extended periods and Euroficans<sup>15</sup> in turn shaped natural history collections in European centres of learning, but the true value of medico-

<sup>&</sup>lt;sup>13</sup> Schiebinger, *Plants and Empire*, 46; Hugh Cagle, 'The Botany of Colonial Medicine: Gender, Authority, and Natural History across Iberian Empires', in *Women of the Iberian Atlantic*, edited by Sarah E. Owens and Jane E. Mangan (Baton Rouge: Louisiana State University Press, 2012), 174–195.

<sup>&</sup>lt;sup>14</sup> Paul E. Lovejoy, Transformations in Slavery: A History of Slavery in Africa (Cambridge: Cambridge University Press, 1983); Joseph C. Miller, Way of Death: Merchant Capitalism and the Angolan Slave Trade 1730-1830 (Madison: University of Wisconsin Press, 1988); Luiz Felipe de Alencastro, O Trato dos viventes: Formação do Brasil no Atlântico Sul (São Paulo: Companhia das Letras, 2000); José C. Curto, Enslaving Spirits: The Portuguese-Brazilian Alcohol Trade at Luanda and Its Hinterland, c. 1550-1830 (Leiden: Brill, 2004); Marcus Rediker, The Slave Ship: A Human History (New York: Penguin, 2007); Roquinaldo Ferreira, Cross-Cultural Exchange in the Atlantic World: Angola and Brazil during the Era of the Slave Trade (Cambridge: Cambridge University Press, 2012); Toby Green, The Rise of the Trans-Atlantic Slave Trade in Western Africa, 1300-1589 (Cambridge: Cambridge University Press, 2012); Mariana P. Candido, An African Slaving Port and the Atlantic World: Benguela and Its Hinterland (Cambridge: Cambridge University Press, 2013); Randy J. Sparks, Where the Negroes Are Masters: An African Port in the Era of the Slave Trade (Cambridge, MA: Harvard University Press, 2014); Arlindo Manuel Caldeira, 'Angola and the Seventeenth-Century South Atlantic Slave Trade', in Networks and Trans-cultural Exchange: Slave Trading in the South Atlantic, 1590-1867, edited by David Richardson and Filipa Ribeiro da Silva (Leiden: Brill, 2015), 101-142; Linda M. Heywood, Njinga of Angola: Africa's Warrior Queen (Cambridge, MA: Harvard University Press, 2017); Daniel B. Domingues da Silva, The Atlantic Slave Trade from West Central Africa, 1780-1867 (Cambridge: Cambridge University Press, 2017).

<sup>&</sup>lt;sup>15</sup> George E. Brooks, Eurafricans in Western Africa: Commerce, Social Status, Gender, and Religious Observance from the Sixteenth to the Eighteenth Century (Athens: Ohio University Press, 2003).

botanical knowledge lay in its applicability to frequent health concerns among those who lived and settled in Atlantic Africa.

Early modern Africa has often been characterised as a 'white man's grave'. Until advances in tropical medicine in the late nineteenth century, a hostile disease environment hampered European colonisation of Africa.<sup>16</sup> Yet, before that Europeans had been active on the Atlantic and Indian Ocean coasts of Africa for over four centuries. West-Central Africa, in particular, served as a major source of slaves for the Portuguese in the southern Atlantic. In comparison to India and Brazil, however, the Portuguese presence in Angola was demographically small. Some came in service of the crown or the Church. Others sought quick profits from the slave trade, while the colony also served as a penal colony to which criminals were forcefully transported.<sup>17</sup> All these men – and considerably fewer women – had to find ways to recreate their lives in Africa, including finding efficacious remedies for foreign diseases.

Following Hippocratic environmentalism rather than Galenic humoural theory, Europeans often explained disease in Africa, and elsewhere in the Atlantic world, by referencing environmental and climatic factors.<sup>18</sup> African disease causation, in turn, was divided into natural and social aspects, with Africans making a distinction between so-called diseases of God and diseases of man. While the social dimension - diseases thought to be caused by human action, witchcraft or the breaking of taboos - has gained wide currency among scholars of African religions, this book contends that Africans and Europeans found common ground in natural explanations for disease. The search for remedies in Africa led many Europeans to rely upon local Africans who had knowledge of healing plants. Therefore, the answer to the dilemma of healing tropical diseases required a turn to systematic bioprospecting to learn the uses of African natural medicine. Although the term bioprospecting was not coined until 1992, it refers to an old practice, namely drug development based on medicinal plants and traditional knowledge from the 'biodiversityrich' regions of the globe.<sup>19</sup>

<sup>&</sup>lt;sup>16</sup> Philip D. Curtin, 'The White Man's Grave: Image and Reality, 1780–1850', Journal of British Studies 1 (1961): 94–110; Philip D. Curtin, Disease and Empire: The Health of European Troops in the Conquest of Africa (Cambridge: Cambridge University Press, 1998).

 <sup>&</sup>lt;sup>17</sup> Gerald J. Bender, Angola under the Portuguese: The Myth and the Reality (Berkeley and Los Angeles: University of California Press, 1978), 59–64; A. J. R. Russell-Wood, The Portuguese Empire, 1415–1808: A World on the Move (Baltimore and London: Johns Hopkins University Press, 1998), 58–64.

<sup>&</sup>lt;sup>18</sup> Suman Seth, Difference and Disease: Medicine, Race, and the Eighteenth-Century British Empire (Cambridge: Cambridge University Press, 2018).

 <sup>&</sup>lt;sup>19</sup> Cori Hayden, When Nature Goes Public: The Making and Unmaking of Bioprospecting in Mexico (Princeton, NJ: Princeton University Press, 2003), 1.

The commercial search for exotic medicines, dyestuffs and foods outside Europe was common in the early modern era, and many Europeans valued the knowledge of indigenous Africans, Americans and Asians.<sup>20</sup> Yet, European interest in African medicine has often been treated as a phenomenon that only began in earnest in the second half of the nineteenth century.<sup>21</sup> Although historians have long recognised the pioneering contributions of Portuguese physicians in the understanding of tropical diseases, Atlantic African natural medicine, especially in the early modern period, has received scant attention compared to India and Brazil.<sup>22</sup> Yet, similar to what took place in India and Brazil, the Portuguese had been interested in local medical practices and ingredients in Angola ever since they first settled there.<sup>23</sup> Moreover, as the third and fourth chapters of this book argue, the Portuguese were not the only ones interested in African healing knowledge; the same also applies to other Europeans who were active in Atlantic Africa.

- <sup>21</sup> Helen Tilley, Africa as a Living Laboratory: Empire, Development, and the Problem of Scientific Knowledge, 1870–1950 (Chicago: University of Chicago Press, 2011); Helen Tilley, 'Global Histories, Vernacular Science, and African Genealogies; or, Is the History of Science Ready for the World', Isis 101 (2010): 110–119; Deborah Neill, Networks in Tropical Medicine: Internationalism, Colonialism, and the Rise of a Medical Specialty, 1890–1930 (Stanford, CA: Stanford University Press, 2012); Markku Hokkanen, 'Imperial Networks, Colonial Bioprospecting and Burroughs Wellcome & Co.: The Case of Strophanthus Kombe from Malawi (1859–1915)', Social History of Medicine 25 (2012): 589–607; Osseo-Asare, Bitter Roots.
- <sup>22</sup> Charles R. Boxer, *Two Pioneers of Tropical Medicine: Garcia d'Orta and Nicolás Monardes* (London: The Hispanic & Luso-Brazilian Councils, 1963). For a comprehensive bibliography up to the mid-1990s, see José Pedro Sousa Dias, 'Bibliografia sobre a farmácia e a material médica da expansão e da colonização portuguesa (séculos XVI a XVIII)', *Mare Liberum* 11–12 (1996): 165–207; Walker, 'Acquisition and Circulation' and 'The Medicines Trade'; Márcia Moisés Ribeiro, *A ciência dos trópicos: A arte médica no Brasil do século XVIII* (São Paulo: Editora HUCITEC, 1997); Vera Regina Beltrão Marques, *Natureza em Boiões: Medicina e boticários no Brasil setecentista* (Campinas: Editora da UNICAMP, 2000); Cagle, *Assembling the Tropics*.
- <sup>23</sup> Among the few English-language contributions discussing West-Central African medicine and medical practices in the early modern period are Simon, 'A Luso-African Formulary'; Miller, Way of Death; James H. Sweet, Recreating Africa: Culture, Kinship, and Religion in the African-Portuguese World, 1441–1770 (Chapel Hill: University of North Carolina Press, 2003); Kalle Kananoja, 'Healers, Idolaters and Good Christians: A Case Study of Creolization and Popular Religion in Mid-Eighteenth Century Angola', International Journal of African Historical Studies 43 (2010), 443–465; Kalle Kananoja, Central African Identities and Religiosity in Colonial Minas Gerais (Unpublished Ph.D. thesis, Åbo Akademi University, 2012). For a modern ethnographic perspective, see Eric Bossard, La medecine traditionnelle chez les Ovimbundu (Neuchâtel: Institut d'Ethnologie, Université de Neuchâtel, 1987); Eric Bossard, La medecine traditionnelle au centre et a l'ouest de l'Angola (Lisbon: Instituto de Investigação Científica Tropical, 1996).

<sup>&</sup>lt;sup>20</sup> Grove, Green Imperialism; Drayton, Nature's Government; Schiebinger, Plants and Empire; Cook, Matters of Exchange; Cagle, 'The Botany of Colonial Medicine'.

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The reasons for the acceptance and adoption of natural medicine in different parts of Atlantic Africa were pragmatic. Pharmaceuticals imported from Europe were expensive and their supply was never sufficient to quench the demand for medical drugs in the tropics. Curiosity also played a part, as physicians as well as ordinary European men and women experimented with local products. After all, natural medicine in Africa did not differ significantly from early modern European medicine, with both consisting of the use of various plants and mineral products. Furthermore, from the mid-eighteenth century onwards, scientific and economic interests started to play a greater role in African medical history.<sup>24</sup> Ultimately, as Suman Seth has demonstrated for the British Empire, the crucial question was one of local knowledge and medical expertise versus academic learning: 'The debate between those who claimed a kind of universal, or at least easily transferrable, medical knowledge, and those claiming superior, locally based empirical and experiential skills was one that shaped medical practice and socioprofessional life throughout the growing [British] empire.<sup>25</sup> By emphasising day-to-day cross-cultural medical interaction rather than medical theorising, especially in Chapters 1 through 5, I demonstrate the importance of local knowledge in shaping healing knowledge in Atlantic Africa.

Linda Heywood and John Thornton have argued that Portuguese settlement in West-Central Africa led to processes of cultural creolisation between Europeans and Africans.<sup>26</sup> One of the areas affected by creolisation, which has not been hitherto studied, was health and medicine. For Atlantic Africa as a whole, I argue that, in medical matters, Europeans learned and willingly borrowed more from locals than they gave in return or contributed to the African population's health. Early modern European medical thought was dominated by Hippocratic and Galenic ideas of disease and the body. Restoring the patient to health relied on purging the body of 'bad humours' by using strong laxatives as well as

<sup>&</sup>lt;sup>24</sup> On Portuguese scientific expeditions, see William J. Simon, Scientific Expeditions in the Portuguese Overseas Territories (1783–1808) and the Role of Lisbon in the Intellectual-Scientific Community of the Late Eighteenth Century (Lisbon: Instituto de Investigação Científica Tropical, 1983).

<sup>&</sup>lt;sup>25</sup> Seth, *Difference and Disease*, 51. As Schiebinger, *Secret Cures of Slaves*, 5, put it: 'Fine educations in Europe could not guarantee success on the ground in the tropics.'

<sup>&</sup>lt;sup>26</sup> Linda M. Heywood, 'Portuguese into African: The Eighteenth-Century Central African Background to Atlantic Creole Cultures', edited by Linda M. Heywood, *Central Africans* and Cultural Transformations in the American Diaspora (Cambridge: Cambridge University Press, 2002), 91–113; Linda M. Heywood and John K. Thornton, *Central* Africans, Atlantic Creoles, and the Foundation of the Americas, 1585–1660 (Cambridge: Cambridge University Press, 2007).

bleedings to reduce the volume of blood.<sup>27</sup> These were also common indigenous methods in Atlantic Africa. Moreover, an idea that illness was caused by spiritual forces still prevailed in Portuguese popular culture.<sup>28</sup> Thus, in many ways early modern European and African medical practices resembled one another and, as Timothy D. Walker has noted, the Portuguese were far more receptive to the adoption and dissemination of indigenous medical practices than has generally been appreciated.<sup>29</sup>

# Health and Healing in African and Atlantic History

Healing and medicine in Africa are significant not only for their therapeutic effects, but also because they have long been implicated in the organisation and transformation of social and communal life on the continent. In most African societies, several kinds of healers have worked and continue to work side by side. No single healer decides the cause or cure of illnesses because multiple authorities coexist and negotiate the course of treatment in coordination with the patient and his relatives and neighbours. The history of therapeutics therefore needs to take account of all the forces affecting community and domestic organisations to the greatest extent possible given the sources at hand. One must also recognise the ambiguity of a healer's practice in assessing the physical signs and the totality of the patient's social situation.<sup>30</sup>

In an early interpretation, Robin Horton argued that African traditional thought forms a tight system from which escape is impossible. He contrasted it with Western scientific thought, which constantly tests its assumptions against experience.<sup>31</sup> In a critique of Horton's thesis, Steven Feierman argued that European medicine is not a fully open system, nor is African medicine closed.<sup>32</sup> This book agrees with Feierman and contends that Atlantic African healing systems were open

<sup>&</sup>lt;sup>27</sup> Georgina Silva dos Santos, 'A Arte de Sangrar na Lisboa do Antigo Regime', *Tempo* 10 (2005): 43–60.

<sup>&</sup>lt;sup>28</sup> Jose Pedro Paiva, Bruxaria e superstição num país sem "caça às bruxas" 1600–1774 (Lisbon: Notícias Editorial, 1997), passim.

<sup>&</sup>lt;sup>29</sup> Walker, 'Acquisition and Circulation'; Timothy D. Walker, 'Global Cross-Cultural Dissemination of Indigenous Medical Practices through the Portuguese Colonial System: Evidence from Sixteenth to Eighteenth-Century Ethno-Botanical Manuscripts', in *The Globalization of Knowledge in the Iberian Colonial World*, edited by Helge Wendt (Berlin: Max Planck Institute for the History of Science, 2016), 161–192.

<sup>&</sup>lt;sup>30</sup> Steven Feierman, 'Struggles for Control: The Social Roots of Health and Healing in Modern Africa', *African Studies Review* 28 (1985): 73–147.

<sup>&</sup>lt;sup>31</sup> Robin Horton, 'African Traditional Thought and Western Science', *Africa* 37 (1967): 50–71, 155–187.

<sup>&</sup>lt;sup>32</sup> Steven Feierman, 'Change in African Therapeutic Systems', *Social Science and Medicine* 13:4 (1979): 277–284.

to creative modification and experiment and that medical pluralism already characterised African healing in the precolonial period. Africans observed, studied and selectively adopted European medicines and therapeutic practices, and they visited European doctors whose remedies they regarded as potent. Alternatives for medical intervention should not be seen as mutually exclusive but as representing a spectrum of valid therapeutic options.<sup>33</sup>

The precolonial period has rarely been featured in studies of health and healing in Africa. John Janzen's study of the Lemba cult of healing is a rare exception in the field. Lemba came into being in the seventeenth century in Equatorial Africa. Its illness has been described as possession by Lemba's ancestors; as any illness affecting the head, heart, abdomen and sides; as difficulty breathing, which is a typical witchcraft symptom; as miraculous recovery from a deadly disease, and more. The individuals afflicted and directed towards membership in Lemba were normally the region's elite, prominent healers, chiefs and judges. Their engagement in mercantile networks and ability to succeed in commerce made them vulnerable to the envy of their kinsmen, and therefore marginal in society, 'sick' with the Lemba affliction. Following Victor Turner, Janzen described Lemba as a 'drum of affliction' (ngoma or nkonko). In Equatorial Africa, it was considered an extraordinary institution, the most important of the consecrated medicines (min'kisi) among those that achieved corporate status.<sup>34</sup>

Healers and diviners were highly regarded religious specialists in Central African societies, whose professional status was acquired through individual initiation conducted by older members of the profession. The method of historical linguistics has revealed that such ritual/ medical specialists have been present in Bantu societies since times immemorial. The Njila languages spoken in nearly all the countries of West-Central Africa stem from a single ancestral tongue labelled 'proto-Njila'. The word denoting these specialists, \*-ganga in proto-Njila, survived in languages spoken in West-Central Africa, although religious

<sup>&</sup>lt;sup>33</sup> William C. Olsen and Carolyn Sargent, 'Introduction', in *African Medical Pluralism*, edited by William C. Olsen and Carolyn Sargent (Bloomington: Indiana University Press, 2017), 1–27.

<sup>&</sup>lt;sup>34</sup> John M. Janzen, Lemba, 1650–1930: A Drum of Affliction in Africa and the New World (New York: Garland Publishing, 1982), 3-4; Victor W. Turner, The Drums of Affliction: A Study of Religious Processes among the Ndembu of Zambia (Oxford: Oxford University Press, 1968), 15. Turner adopted the term 'drums of affliction' for Ndembu rituals because the Ndembu often use the term 'drum' (ng'oma) as a synonym for a type and actual performance of a ritual. Rituals were performed by cult associations on behalf of persons believed to be afflicted with an illness of misfortune caused by ancestor-spirits, witches or sorcerers.

vocabulary underwent a great many changes as speakers of Njila languages dispersed throughout the region. Male and female diviners, who operated via spirit possession, were, according to Jan Vansina, 'the most spectacular professionals' in Central Africa. They used trances to directly relay the wishes and observations of the spirits who entered into them. Divination by spirit possession gave them an unchallengeable authority in society.<sup>35</sup>

While this book is more concerned with the healing register, harming has often been paired with healing in African political discourse. In some cases, Portuguese settlers were accused of taking advantage of African sorcerers' powers to eliminate their enemies. Anthropologists have pointed to the ambivalence of medicinal charms and power objects and their ability to heal or harm. In the early modern period, this can be observed in cases where African ritual specialists in Angola were accused of using medicines for their therapeutic effects and to hurt and harm as well as eliminate their enemies. Most early modern Europeans, the Portuguese included, shared a belief in witchcraft and magic as real phenomena, although witchcraft trials declined in number and witchcraft was decriminalised across Europe between the late seventeenth and late eighteenth centuries. The African terms for powerful physical substances were often translated into European languages as 'poison'. In the Portuguese southern Atlantic world, feitiço was the most common term to denote all kinds of power objects used by Africans, including physical substances, which were sometimes referred to as poison (veneno). What is significant, however, is that a belief that harm could be done to people through spiritual or occult means was widely shared by people of different continental origins in the Atlantic world. They also shared a sense

<sup>&</sup>lt;sup>35</sup> Jan Vansina, How Societies Are Born: Governance in West Central Africa before 1600 (Charlottesville and London: University of Virginia Press, 2004), 51, 167–168. The societies in the Great Lakes Region of East-Central Africa gave recognition to the powers of healer-diviners (\*mufÚmÚ) and other healers (\*mugàngà), who could use the power of 'seeing' but who did not have a similar role as communal leaders. Although the power of muganga healers became separate from the power of mufumu leaders, the role of healers and midwives cannot be considered as socially less important. The men and women attending to people's health were experts in herbal knowledge, bonesetting and giving birth. They were also subject to witchcraft accusations because of their constant contact with the powers guiding life, death and nature, which could be harnessed for social good in giving health as well as for antisocial ends in terms of causing misfortune and taking life. David Lee Schoenbrun, A Green Place, A Good Place: Agrarian Change, Gender, and Social Identity in the Great Lakes Region to the 15th Century (Oxford: James Currey, 1998), 108–112.

that poisons could be involved in harming people and that spiritual power could also protect and heal.<sup>36</sup>

Healing and harming knowledge travelled from Africa throughout the Black Atlantic. The slave trade made the Americas a cultural melting pot with medical pluralism a norm, not an exception. Pluralism has been regarded as the central feature of Latin American and Caribbean medical cultures. In the slave societies of the New World, African healing knowledge was highly sought after because the number of European and university-trained doctors was minuscule and their services often inaccessible for economic or geographic reasons, but also because of physicians' desire to develop new cures, underpinned by the political and economic ambitions of European states.<sup>37</sup> As Pablo Gómez has shown, African healers took root in the early modern Caribbean and began to form authoritative knowledge and truth about the natural world, particularly that of the body, by creating sensorial landscapes based on experiential phenomena.<sup>38</sup> Similarly, the medical culture of eighteenth-century Saint Domingue was dominated by Africans as healers of people and animals. Hybridisation of European, African and Caribbean healing systems was regarded as a normal course of events.<sup>39</sup>

In the British West Indian colonies, African healing often went by the name obeah and healers were called obeah men and obeah women. Obeah men were respected for their healing knowledge but feared because of the magical powers associated with them. In the colonial Caribbean, the English denounced obeah as superstition and actively persecuted practitioners as charlatans who led the slaves astray. In the early nineteenth century, Africans were still punished harshly for practising obeah. It remained punishable for a long time and has only in recent decades become more tolerated.<sup>40</sup> This was also true in non-British

<sup>&</sup>lt;sup>36</sup> On the harming register, see Nancy Rose Hunt, 'Health and Healing', in *The Oxford Handbook of Modern African History*, edited by John Parker and Richard Reid (Oxford: Oxford University Press, 2013), 384–386. On shared approaches to spiritual power and witchcraft in the early modern Caribbean, see Diana Paton, *The Cultural Politics of Obeah: Religion, Colonialism and Modernity in the Caribbean World* (Cambridge: Cambridge University Press, 2015), 22–27.

<sup>&</sup>lt;sup>37</sup> Kalle Kananoja, 'Infected by the Devil, Cured by Calundu: African Healers in Eighteenth-Century Minas Gerais, Brazil', Social History of Medicine 29 (2016): 490–511; Schiebinger, Secret Cures of Slaves, 5.

<sup>&</sup>lt;sup>38</sup> Gómez, The Experiential Caribbean.

<sup>&</sup>lt;sup>39</sup> Karol K. Weaver, Medical Revolutionaries: The Enslaved Healers of Eighteenth-Century Saint Domingue (Urbana and Chicago: University of Illinois Press, 2006).

<sup>&</sup>lt;sup>40</sup> Paton, *The Cultural Politics of Obeah*; John Savage, 'Slave Poison/Slave Medicine: The Persistence of Obeah in Early Nineteenth-Century Martinique', in *Obeah and Other Powers: The Politics of Caribbean Religion and Healing*, edited by Diana Paton and Maarit Forde (Durham, NC and London: Duke University Press, 2012), 149–171; Kenneth M. Bilby and Jerome S. Handler, 'Obeah: Healing and Protection in West Indian Slave Life', *The Journal of Caribbean History* 38 (2004): 153–183; Jerome

possessions in the Caribbean, such as the Danish-held Saint Croix, where obeah men accused of poisoning people received death sentences. Obeah men were feared among the whites because they were respected by blacks and were seen as potential leaders of slave rebellions. However, from a medical perspective practising obeah and using herbal remedies was not seen as unacceptable in the Danish colonial context. Slave owners accepted that slaves treated each other, occasionally with more success than the doctors on Saint Croix, who sought to understand why Afro-Caribbean remedies were effective.<sup>41</sup>

It could be assumed that there was little room for African healing knowledge in the American South. However, before the American Civil War the medical culture was characterised by experimentation, scepticism and competing visions of scientific legitimacy. Perhaps the bestknown example of the transmission of African healing knowledge to North America is the use of variolation in Boston in the early eighteenth century, when Cotton Mather learned the practice from his Senegambian slave Onesimus. Despite popular resistance, variolation was employed to stave off a smallpox epidemic.<sup>42</sup> In the slave societies of the American South, medical interaction led to cross-cultural experimentation, in which the medical systems of American Indians and African slaves spread far and wide. As in other New World slave societies, views regarding black healers were contradictory and conflicting. While slave owners might have recorded recipes of the herbal remedies used by the enslaved in their private notebooks, they at the same time outlawed the activities of black healers. Despite this, African healing knowledge remained vibrant in North America for a long time, eventually hybridising with other forms of healing.<sup>43</sup>

The Atlantic slave trade was a dehumanising experience for the enslaved. Compared to the so-called numbers game, the medical

Handler, 'Slave Medicine and Obeah in Barbados, circa 1650 to 1834', New West Indian Guide–Nieuwe West-Indische Gids 74 (2000): 57–60.

- <sup>41</sup> Niklas Thode Jensen, For the Health of the Enslaved: Slaves, Medicine and Power in the Danish West Indies, 1803–1848 (Copenhagen: Museum Tusculanum Press, 2012), 70–72. See also Gunvor Simonsen, 'Magic, Obeah and Law in the Danish West Indies, 1750–1840s', in Ports of Globalisation, Places of Creolisation: Nordic Possessions in the Atlantic World during the Era of the Slave Trade, edited by Holger Weiss (Leiden: Brill, 2016), 245–279.
- <sup>42</sup> Mark A. Peterson, 'Theopolis Americana: The City-State of Boston, the Republic of Letters, and the Protestant International, 1689–1739', in Soundings in Atlantic History: Latent Structures and Intellectual Currents, 1500–1830, edited by Bernard Bailyn and Patricia L. Denault (Cambridge, MA and London: Harvard University Press, 2009), 357–359.
- <sup>43</sup> Sharla M. Fett, Working Cures: Healing, Health, and Power on Southern Slave Plantations (Chapel Hill: University of North Carolina Press, 2002).

dimensions of the Atlantic slave trade and slavery in the New World have received scant attention in the historiography.<sup>44</sup> Joseph Miller wrote extensively about diseases of West-Central Africa and how the high rate of mortality affected the profitability of the slave trade. Together with Dauril Alden, he also analysed the transmission of smallpox to Brazil. Epidemic diseases held a central role in Miller's analyses as well as in the work done by Jill Dias and Douglas Wheeler concerning Angola.<sup>45</sup> The biological experience of enslaved Africans has also been studied by tracing slave ancestors from Atlantic Africa to the West Indies. Nutritional and disease environments shaped the health of the enslaved in their homelands, and the Middle Passage had devastating epidemiological and pathological consequences for blacks. In slavery in the Americas, nutrition was to play an important role in the development of diseases. Caribbean slaves fared poorly from a demographic standpoint because of high rates of infant and child mortality caused by poor nutrition.46

Few studies have considered issues related to mental health in slavery and the slave trade, although they were certainly part of the early modern Atlantic medical landscape.<sup>47</sup> A study on slave health in the Danish West Indies concluded that while a few cases of mental illness were mentioned from various plantations and at the public hospital near Christiansted, it

<sup>44</sup> David L. Chandler, 'Health Conditions in the Slave Trade of Colonial New Granada', in Slavery and Race Relations in Latin America, edited by Robert B. Toplin (Westport, CT: Greenwood Press, 1974), 51-88; David L. Chandler, Health and Slavery in Colonial Colombia (New York: Arno Press, 1981); Todd L. Savitt, Medicine and Slavery: The Diseases and Health Care of Blacks in Antebellum Virginia (Urbana and Chicago: University of Illinois Press, 1978); Marie Jenkins Schwartz, Birthing a Slave: Motherhood and Medicine in the Antebellum South (Cambridge, MA: Harvard University Press, 2006); Sowande' M. Mustakeem, Slavery at Sea: Terror, Sex, and Sickness in the Middle Passage (Urbana, Chicago and Springfield: University of Illinois Press, 2016).

- <sup>45</sup> Miller, Way of Death; Dauril Alden and Joseph C. Miller, 'Out of Africa: The Slave Trade and the Transmission of Smallpox to Brazil, 1560–1831', *The Journal of Interdisciplinary History* 18 (1987): 195–224; Jill R. Dias, 'Famine and Disease in the History of Angola, c. 1830–1930', *Journal of African History* 22 (1981): 349–378; Douglas L. Wheeler, 'A Note on Smallpox in Angola, 1670–1875', *Studia* 13/14 (1964): 351–362.
- <sup>46</sup> Kenneth F. Kiple, The Caribbean Slave: A Biological History (Cambridge: Cambridge University Press, 1984). See also Richard B. Sheridan, Doctors and Slaves: A Medical and Demographic History of Slavery in the British West Indies, 1680–1834 (Cambridge: Cambridge University Press, 1985).
- <sup>47</sup> William Dosite Postell, 'Mental Health among the Slave Population on Southern Plantations', *The American Journal of Psychiatry* 110 (1953): 52–54; William D. Pierson, 'White Cannibals, Black Martyrs: Fear, Depression, and Religious Faith as Causes of Suicide among New Slaves', *Journal of Negro History* 62 (1977): 147–159; Terri L. Snyder, *The Power to Die: Slavery and Suicide in British North America* (Chicago and London: University of Chicago Press, 2015).

does not seem to have been a great problem. However, the study also acknowledged that it is worth 'considering if the cases of fatal accidents points to depressions or other psychological illnesses among the enslaved workers'.<sup>48</sup> In the southern Atlantic, mental illness was most commonly conceptualised as *banzo*, which was encountered in Angola and Brazil in the eighteenth and nineteenth centuries.<sup>49</sup> Elsewhere in the Black Atlantic, a similar ailment was observed in late eighteenth-century Cuba, where a Spanish surgeon named Francisco Barrera y Domingo wrote an extensive treatise on slave medicine. Barrera's views on melancholy were partly rooted in the writings of other physicians and partly in his own innovations based on observation and experience in the Caribbean.<sup>50</sup>

# A Global Framework for Studying Health and Medicine in Atlantic Africa

When studying contemporary societies, medical anthropologists have increasingly begun to look at Africa as a continent where global flows of capital, technologies, information and people originate and circulate within and beyond national and continental boundaries. Public health policies and practices in sub-Saharan Africa have become globally inflected by the practice of biomedicine, which, like other modalities of healing, is inexplicably intertwined with politics, religion and community and family life. While transnational entanglements and networks shape biomedicine in Africa, affective and material resources are not allocated equally across space. Despite the global circulation of international standards of medical education, research, practice and policy, local realities of resource-poor settings produce effects that do not resemble their ostensible aims. Transnational capitalism and neoliberal reform have put further economic strains on inadequate healthcare services.<sup>51</sup>

<sup>&</sup>lt;sup>48</sup> Jensen, For the Health of the Enslaved, 109.

<sup>&</sup>lt;sup>49</sup> The discourse and experience of *banzo*, conceptualised as melancholy or nostalgia, in the late eighteenth-century and early nineteenth-century Brazil has been analysed in several articles by Ana Maria Oda, who has examined historical representations of *banzo* primarily in Brazil. Ana Maria Galdini Raimundo Oda, 'O banzo e outros males: o pathos dos negros escravos na Memória de Oliveira Mendes', *Revista Latinoamericana de Psicopatologia Fundamental* 10 (2007): 346–361; Ana Maria Galdini Raimundo Oda, 'Escravidão e nostalgia no Brasil: o banzo', *Revista Latinoamericana de Psicopatologia Fundamental* 10 (2008): 735–761. See also Chirly dos Santos-Stubbe, 'Banzo: Uma nostalgia afro-brasileira', *Journal of Psychology in Africa* 1 (1989): 8–14.

 <sup>&</sup>lt;sup>50</sup> Adrián López Denis, 'Melancholy, Slavery, and Racial Pathology in Eighteenth-Century Cuba', Science in Context 18 (2005): 179–199.

<sup>&</sup>lt;sup>51</sup> Kathryn Rhine, 'Introduction', in Medical Anthropology in Global Africa, edited by Kathryn Rhine et al. (Lawrence: University of Kansas, 2014), 5; Randall M. Packard, A History of Global Health: Interventions into the Lives of Other Peoples (Baltimore: Johns

Folk healing, therefore, continues to play an important role in Africa. Medical anthropologists and historians have pointed out that 'traditional'<sup>52</sup> African therapies and medicinal products often move across vast regional distances, with healers travelling from afar claiming heightened potency.<sup>53</sup> This book shows that the mobility and circulation of healing techniques and materials was an important feature of the early modern Black Atlantic world and not something that began in the nineteenth century or later. African healing specialists not only crossed the Atlantic to the Americas and Europe – where Lisbon remained the most important centre of African healing from the sixteenth to perhaps the nineteenth century<sup>54</sup> – but also moved within and between regions to offer their services. At times, patients, Europeans included, travelled relatively long distances in Africa to receive treatment from a certain healer.

How does the global historical framework fit precolonial Atlantic Africa, and how does it relate to the social and cultural history of medicine in the region? While some Africanist scholars have warned about hopping on the global history bandwagon and have duly emphasised a focus on the mechanisms of connection and their limits, others have pointed out that Africans lived, not isolated, but in broader historical contexts long before colonial rule in the twentieth century.<sup>55</sup> Interaction with the Islamic world, Indian Ocean and Mediterranean regions are the most obvious examples of contacts that predated links with the Atlantic economy. Islam, especially, was significant for the development of medical practices in Muslim Africa.<sup>56</sup> Moreover,

Hopkins University Press, 2016); Stacey A. Langwick, *Bodies, Politics, and African Healing: The Matter of Maladies in Tanzania* (Bloomington: Indiana University Press, 2011).

- <sup>52</sup> Given the transformations in African healing over centuries, I use the term 'traditional medicine' cautiously.
- <sup>53</sup> Stacey A. Langwick, Hansbjörg Dilger and Abdoulaye Kane, 'Introduction: Transnational Medicine, Mobile Experts', in *Medicine, Mobility, and Power in Global Africa: Transnational Health and Healing*, edited by Hansbjörg Dilger, Abdoulaye Kane and Stacey A. Langwick (Bloomington: Indiana University Press, 2012), 1–27. For a critique of the term 'traditional medicine', see Sjaak van der Geest, 'Is There a Role for Traditional Medicine in Basic Health Services in Africa? A Plea for Community Perspective', *Tropical Medicine and International Health* 2 (1997): 903–911.
- <sup>54</sup> Daniela Buono Calainho, Metrópole das Mandingas: Religiosidade negra e inquisição portuguesa no Antigo Regime (Rio de Janeiro: Garamond, 2008).
- <sup>55</sup> Robert Harms, Africa in Global History with Sources (New York: W. W. Norton, 2018); Toby Green, A Fistful of Shells: West Africa from the Rise of the Slave Trade to the Age of Revolution (London: Allen Lane, 2019).
- <sup>56</sup> Ismail H. Abdalla, 'The Ulama of Sokoto in the Nineteenth Century: A Medical View', in *African Healing Strategies*, edited by Brian M. du Toit and Ismail H. Abdalla (Owerri: Trado-Medic Books, 1985), 8–19; Ismail H. Abdalla, 'Diffusion of Islamic Medicine

Africans' experience of global historical processes can direct attention to changes occurring on the fringes of 'civilisations' instead of concentrating on their relatively stable centres as distortedly narrow regional fields are increasingly becoming 'globalised'.<sup>57</sup>

Circulation of knowledge was central to the shaping of what Londa Schiebinger has called the Atlantic world medical complex. Multidirectional trade in people, disease, plants and knowledges linked Europe, Africa and the Americas along interconnected nexuses, where the West Indies served as a 'centre of calculation' and doctors and healers of all types as 'knowledge brokers'. The slave trade nexus joined Africa and the Americas, but in Schiebinger's formulation knowledge was only carried from Africa to the Caribbean.<sup>58</sup> Highlighting the Africans' Atlantic experience just in the Americas, however, leaves Africa disconnected from the rest of the world, as if it was impossible for European and American medical knowledge to circulate to Africa. Although they probably had little to do with the fate of Africa during the era of the slave trade, Central Africans practised phlebotomy and sought surgical knowledge from the Portuguese, as demonstrated in Chapter 5. Some of the Angolan slaves taken to Brazil continued to practise as barbers on the other side of the Atlantic. European and American medicinals were spreading to the interior of Central Africa by the seventeenth century, and quina was used as an antimalarial medicine in Central and West Africa in the eighteenth century. To fully appreciate the Atlantic world medical complex, these connections as well as the linkages between the Atlantic and Indian Oceans must be taken into account.

This book contends that global history can provide a complementary interpretive layer when thinking about African medicine and vernacular science in the early modern world. While the Atlantic can be conceptualised as the primary arena of interaction for West and West-Central Africans and the Indian Ocean for East Africans, I argue that the Atlantic served as a passageway to the world beyond it. This can be discerned in the movement of people, commodities and plants between the Indian and Atlantic Oceans, with West-Central African slaves providing labour not only in the Americas, but also working in South and South East Asia; Asian textiles and cowries flooding the local markets in

<sup>58</sup> Schiebinger, Secret Cures of Slaves, 13–14, 153–156.

into Hausaland', in *The Social Basis of Health and Healing in Africa*, edited by Steven Feierman and John M. Janzen (Berkeley: University of California Press, 1992), 177–194.

<sup>&</sup>lt;sup>57</sup> Frederick Cooper, 'African History/Global History', Perspectives on History 50 (December 2012); Joseph C. Miller, 'History and Africa/Africa and History', American Historical Review 104 (1999): 1–32, especially 29–31.

Atlantic Africa; and the movement and circulation of plants between continents.

The last example is the most relevant for the purposes of the present work. Historians and archaeologists have long acknowledged that tropical Africa participated in the global migration of crops.<sup>59</sup> Edible bananas (genus Musa) are perhaps the best-known example of an Indian Ocean crop that spread into Africa, although the origins and dating of their domestication have been brought into question.<sup>60</sup> Undoubtedly, many plants spread across cultural borders in Atlantic Africa without external agency but, starting from the fifteenth century, the Portuguese also played a major role as carriers in the global dissemination of cultivated plants. In seventeenth-century Dutch Brazil, naturalists Georg Marcgraf and Willem Piso documented plants of commercial importance and with medicinal qualities, both indigenous and those imported from Africa and Asia. In the eighteenth century, Dom João V (1706–1750) ordered the cultivation of Asian plants in West Africa and Brazil. Pepper seeds and cuttings from India were also regularly sent to Brazil and Angola. Several plants of American origin - sweet potatoes, peanuts, manioc and maize corn, to name just a few - were introduced to Atlantic Africa in the sixteenth century. Maize became a popular crop throughout Atlantic Africa, and manioc spread rapidly throughout Central Africa and the Upper Guinea coast.<sup>61</sup>

Similarly to other plants, medicinals circulated between regions and continents and multiple innovators participated in the shaping of drug knowledge across vast geographic regions and over long periods of time. One of the best-known African plant medicines to have had an impact outside of Africa in the early modern period was the grains of paradise or guinea grains (*Aframomum melegueta*), also referred to as melegueta

<sup>&</sup>lt;sup>59</sup> See, e.g., John W. Purseglove, 'The Origins and Migrations of Crops in Tropical Africa', in Origins of African Plant Domestication, edited by Jack R. Harlan, Jan M. J. de Wet and Ann B. L. Stemler (The Hague and Paris: Mouton Publishers, 1976), 291–309; Ilaria Maria Grimaldi, 'Taro across the Oceans: Journeys of One of Our Oldest Crops', in News from the Past: Progress in African Archaeobotany, edited by Ursula Thanheiser (Groningen: Barkhuis, 2016), 67–82; Dorian Q. Fuller and Chris J. Stevens, 'Sorghum Domestication and Diversification: A Current Archaeobotanical Perspective', in Plants and People in the African Past: Progress in African Archaeobotany, edited by Anna Maria Mercuri et al. (New York: Springer, 2018), 427–452.

<sup>&</sup>lt;sup>60</sup> The debates are summarised in Katharina Neumann and Elisabeth Hildebrand, 'Early Bananas in Africa: The State of the Art', *Ethnobotany Research & Applications* 7 (2009): 353–362.

<sup>&</sup>lt;sup>61</sup> Russell-Wood, *The Portuguese Empire*, 148–150, 154, 164–168. In the second half of the seventeenth century, Duarte Ribeiro de Macedo proposed a concerted imperial effort to transfer the most profitably traded plants from the East Indies to Brazil. On this plan, see Cagle, *Assembling the Tropics*, 254–270.

pepper, which enjoyed widespread popularity among African folk remedies in the Americas. Of the Asian plants with medical value, Indian pennywort (*Centella asiatica*) spread widely throughout West and East Africa. African 'traditional' medicine has changed and moved over time both within and without the continent as many people in many places shared and elaborated on plant medicine recipes over a span of years and centuries. 'Traditional' medicine has rarely been purely local, as knowledge about healing plants has spread widely across continents when plants, people and information have migrated.<sup>62</sup> Although early modern sources are not rich enough to write extensive biographies of medicinals in the same way that Guillaume Lachenal has so magisterially done for a twentieth-century pharmaceutical product,<sup>63</sup> or to explore the ethos of medical research and drug development in Africa,<sup>64</sup> they allow us, at least, to reconstruct the great variety of these materials and their movement over time and space.

The world, and therefore global history, was present in Atlantic Africa's medical thought in many other ways. A mid-seventeenth-century Portuguese soldier serving in Angola, when writing a catalogue of the region's medicinal plants, began his manuscript by pointing out that he wanted to imitate Monardes, a Sevillian physician best known for his study of medicinals imported to Spain from the West Indies. In West Africa, a Danish physician named Paul Erdmann Isert, wanting to make a scientific contribution to global natural history, sought patronage from Sir Joseph Banks. Although he failed to get attention from London, Isert's fellow Scandinavian, Adam Afzelius, was more successful. He joined Banks's network of collectors and travelled to Sierra Leone in the 1790s.<sup>65</sup> Their attempts at seeing African natural resources in a global perspective will be discussed in Chapters 3 and 4, respectively.

<sup>&</sup>lt;sup>62</sup> Osseo-Asare, Bitter Roots.

<sup>&</sup>lt;sup>63</sup> Guillaume Lachenal, The Lomidine Files: The Untold Story of a Medical Disaster in Colonial Africa, translated by Noémi Tousignant (Baltimore: Johns Hopkins University Press, 2017).

<sup>&</sup>lt;sup>64</sup> P. Wenzel Geissler, 'Studying Trial Communities: Anthropological and Historical Inquiries into Ethos, Politics and Economy of Medical Research in Africa', in Evidence, Ethos and Experiment: The Anthropology and History of Medical Research in Africa, edited by P. Wenzel Geissler and Catherine Molyneux (New York: Berghahn Books, 2011), 1–28; Paul Wenzel Geissler, Guillaume Lachenal, John Manton and Noémi Tousignant, eds., Traces of the Future: An Archaeology of Medical Science in Africa (Bristol: Intellect, 2016).

<sup>&</sup>lt;sup>65</sup> Hanna Hodacs, 'Local, Universal, and Embodied Knowledge: Anglo-Swedish Contacts and Linnaean Natural History', in *Global Scientific Practice in an Age of Revolutions*, 1750–1850, edited by Patrick Manning and Daniel Rood (Pittsburgh: University of Pittsburgh Press, 2016), 90–104.

### Sources and Methodology

Africa, and African medicine, was therefore clearly present in early modern medical thought outside the continent. For example, a central figure in the early eighteenth-century Portuguese popularisation of medical prescriptions from the tropics, João Curvo Semedo, published African treatments alongside Asian and Brazilian ingredients in his books. In other parts of Europe, a German doctor writing about global medical geographical knowledge in the late eighteenth century included Africa in it, although, like Curvo, he had never visited the continent (see Chapter 7). Drawing upon published European sources, he thought it was important to include and deal with Atlantic Africa in detail and place it in a global, comparative framework.

## Sources and Methodology

By analysing a variety of written sources, this book argues that, in Angola, along the Gold Coast and in Sierra Leone, indigenous natural medicine was used by and enjoyed widespread popularity among locals and non-Africans alike. Based on the early contacts and long-standing acknowledgements of African natural medicine, knowledge began to be systematised in the latter half of the seventeenth century by slave traders, military officials and missionaries. European attitudes towards African natural medicine were generally positive, although indigenous medical practitioners were occasionally criticised on religious grounds because of their ritual proceedings. Another source of criticism was the arbitrary dosages of medicine used by popular healers.

Like in most studies of Atlantic Africa in the precolonial period, the sources for this book present an asymmetry in that they contain much more information on Europeans than on Africans. Despite this limitation, it would be erroneous to suggest that precolonial African medical practices cannot be studied in the light of European written sources. Although African informants and assistants were rarely put in the spotlight and almost always remained anonymous, their voices can be discerned through a close reading of European sources. While unpublished manuscripts might give clearer hints on how knowledge about African medical practices was constructed, in published works this often has to be read between the lines.

The book surveys mostly Portuguese but also Danish, Dutch and English printed and archival sources. The foremost archival research has taken place in Portugal, and it is strongly present in Chapters 1 and 2 as well as Chapters 5 through 7. At the overseas archive (*Arquivo Histórico Ultramarino*, AHU), the documentation on medical issues includes the governors' and the bishops' reports on health conditions in the colonies of Angola and Benguela, decisions by Luanda's municipal council touching upon hygiene and the nomination of doctors, and occasional letters from Angola's chief physicians. There are also nomination letters of physicians and surgeons, correspondence from the *Misericórdia* brotherhood concerning hospitals and leave requests by soldiers wanting to travel to Brazil or Portugal to treat their illnesses. Accounts of military campaigns also include sporadic references to health and disease in the interior.

Besides the AHU, I have made use of the documentation produced by the Lisbon Inquisition, which had commissioners in Angola. The denunciations received by the Inquisition include information on African healing practices, including notes on the use of medicinal plants and ritual practices. Relatively few denunciations from Angola proceeded to full-scale *processos* or trials. The trial records provide even more detailed accounts of the healing rituals and remedies used in curing illness. The Inquisition sources also reveal the proclivity of Portuguese settlers in Angola to turn to local folk healers when seeking medical assistance.

The Portuguese National Library includes further valuable sources on West-Central African medical history. At least two manuscripts were compiled by Portuguese soldiers on herbal remedies in seventeenthand eighteenth-century Angola. These texts provide not only listings of the most popular ingredients used in the region, but also information on how diseases were conceptualised by laypeople. The manuscripts are essential for discussing how disease was understood by Central Africans and the Portuguese in this period. They provide clues to studying everyday forms of herbal healing that did not necessarily take place in a highly ritualised setting. They also show that African medical knowledge was circulating, at least to some extent, openly. Although everyday plant remedies were occasionally well-kept secrets, mostly they were freely available to anyone.

Besides the archival documentation, this book relies on published sources such as missionary accounts. Italian Capuchin missionary records are worth underlining for the detailed information they provide on specialist healers and plant remedies. While some missionaries were clearly open to experimenting with African medicinals, others were afraid of the healers' and diviners' powers to heal and harm. When ill, they often suspected that someone had used poison against them. In addition to the Capuchin accounts, the documents compiled by Padre António Brásio in the *Monumenta Missionaria Africana (MMA)* series are essential for any scholar of precolonial Atlantic Africa. They provide a wealth of information on issues related to health, disease and medicine.

# Structure of the Book

A few physicians and surgeons also wrote longer treatises on their experiences of treating illnesses in Atlantic Africa. Unlike many amateur botanists, physicians like Aleixo de Abreu, Francisco Damião Cosme and José Pinto de Azeredo were less interested in African healing practices, or at least they did not demonstrate this interest in their writings. Beyond the longer treatises, the documents signed by physicians and surgeons contain very little material on the practice of medicine in Africa. For the most part, these specialists of European medicine remained silent on everyday experiences of health and illness. While this can signify many things, I have interpreted it as powerlessness in the face of disease and death. Until the late nineteenth century, Portuguese physicians simply did not understand or have the means to cure diseases that prevailed in Atlantic Africa. Rather than admitting this in writing to their superiors in European metropoles, they chose to remain silent, employing their therapeutic tools in the best way they could. European doctors stationed in Africa simply did not have an advantage. They fumbled around bleeding and purging patients, which often did more harm than good. This must have been a demoralising experience for many men of medicine, who firmly believed they could help their countrymen and alleviate suffering in a foreign environment. Seeing their fellow Europeans turn to African healers certainly did not raise their spirits.

For other parts of Atlantic Africa, namely the Gold Coast and Sierra Leone, I have mostly drawn upon published sources. Chapter 3 deals with the Gold Coast by concentrating on Dutch and Danish documentation. For Sierra Leone, in Chapter 4, the focus is on the journal of the Swedish botanist Adam Afzelius and the work of an English physician named Thomas Winterbottom. These sources clearly reveal that the Portuguese in West-Central Africa were not the only ones interested in African healing knowledge.

# Structure of the Book

The book consists of seven chapters. Chapter 1 discusses medical pluralism and the multiplicity of healing (and harming) specialists. It begins by focusing on conceptions of disease and bodily health in Central African communities. Relying on Inquisitional sources, the chapter then concentrates on ritual practitioners who attracted more attention than those practising everyday acts of herbal healing. At best, these sources provide us with a glimpse into a healer's hut. They also demonstrate that the careers of Angolan healers were characterised by great mobility, meaning that spirit entities could also move from place to place.

In Chapter 2, the focus turns from healing specialists to the materiality of medicine in Angola and Kongo. It delves into substances that gained popularity as medicinals among Europeans and Africans, and it points to the existence of regional and Atlantic markets for medical plants, minerals and animal parts, which were regarded as potent cures. In other words, not only healers but also healing substances were mobile and traversed the Atlantic in addition to being traded locally. Although rare sources, pharmacopoeias compiled by Portuguese officers document the wide variety of substances that were used by healers and common people for self-medication. When used in different cultural settings, the beliefs connected to certain substances changed. Perhaps the most remarkable cross-cultural experiments concerned a plant called enkasa, which was used in poison ordeals, but, in the popular Catholicism of the Kingdom of Kongo, became transformed into a sacred tree. In the eighteenth century, the plant turned up as a multipurpose drug in Portugal, where it was also used by a lay exorcist to chase away the Devil.

Chapters 3 and 4 turn from West-Central Africa to the Gold Coast and Sierra Leone. Focusing largely on Dutch, Danish and Swedish documentation, they open with the question of the uniqueness of crosscultural medical encounters in Portuguese Angola. The evidence is strong that similar processes of medical interaction were taking place in West Africa, where the minuscule European settler population was in constant contact with local go-betweens. For many Europeans, African healers became the first choice when their lives were in danger. Even when African healers were not necessarily the first choice, the medical pluralism of Atlantic African trading communities ensured that there were several possibilities for obtaining a cure, ranging from self-help to European physicians, surgeons and pharmacists or to African herbalists and spirit healers. Finally, these chapters point to the important role of African women in providing access to local sources of healing knowledge.

Chapter 5 returns to West-Central Africa to discuss European healers and medical practices. It demonstrates the state of European healthcare in Luanda and its hinterland, where access to Portuguese doctors was limited and hospitals operated with extremely scant resources. The transfer of European medical knowledge was restricted to the training of African barbers, who had become common in most Portuguese settlements by the end of the eighteenth century. European medical substances enjoyed limited popularity in Angola. However, an American import, cinchona or Peruvian bark, was brought to Angola in substantial quantities. The first documented instances of the use of this antimalarial agent, which was later commercialised as quinine, were recorded in Angola and are analysed here.

Illness and disease are the central foci of Chapter 6, which argues that early modern European and African ways of understanding health and disease were not fundamentally different; rather, there was a great deal of common ground and similarities between the two. This was a prerequisite for meaningful cross-cultural exchanges in the field of health and healing. The chapter explores early modern social diagnoses of diseases. It shows that humoural theory had relatively little influence and only a minor place in West-Central Africa, where physicians were rare. Instead, lay diagnoses and self-medication were common. The chapter closes with a discussion of mental afflictions among West-Central Africans and the Portuguese settlers in Angola, showing that the Atlantic slave trade gave rise to a new disease category that also spread trans-Atlantically to the Americas. The experiences of enslavement and the horrors of the Middle Passage gave rise to a disease called banzo, an affliction likened to melancholia by the Portuguese, but perhaps best translated literally as a longing for home.

Chapter 7 focuses on medical geography in the southern Atlantic. It discusses early modern European conceptions of environment and climate in connection to health and disease, showing that both environment and climate were integral components in conceptualising disease patterns in West-Central Africa. Travelling for health, or moving to a more salubrious climate, was a regular feature of migrant experiences in this world. This could mean moving within Africa or travelling from Africa to Brazil or Portugal to seek treatment and recovery from tropical illnesses.