

Recovering Local Agency and Technology in the Trans-Roman-Deccani Trade

It has long been known that imported Roman-manufactured terracotta items were a feature of Rome’s export trade to the powerful Satavahana Empire that flourished in the “Deccan” region of southern India between the 2nd century BCE and 3rd century CE (See Maps, Image 1 and 2). However, such terracotta figurines were also locally manufactured and tailored to local patrons’ tastes.¹ Local terracotta manufacturers came to understand that Indian consumers were enamored of the gloss applied by Roman manufacturers to

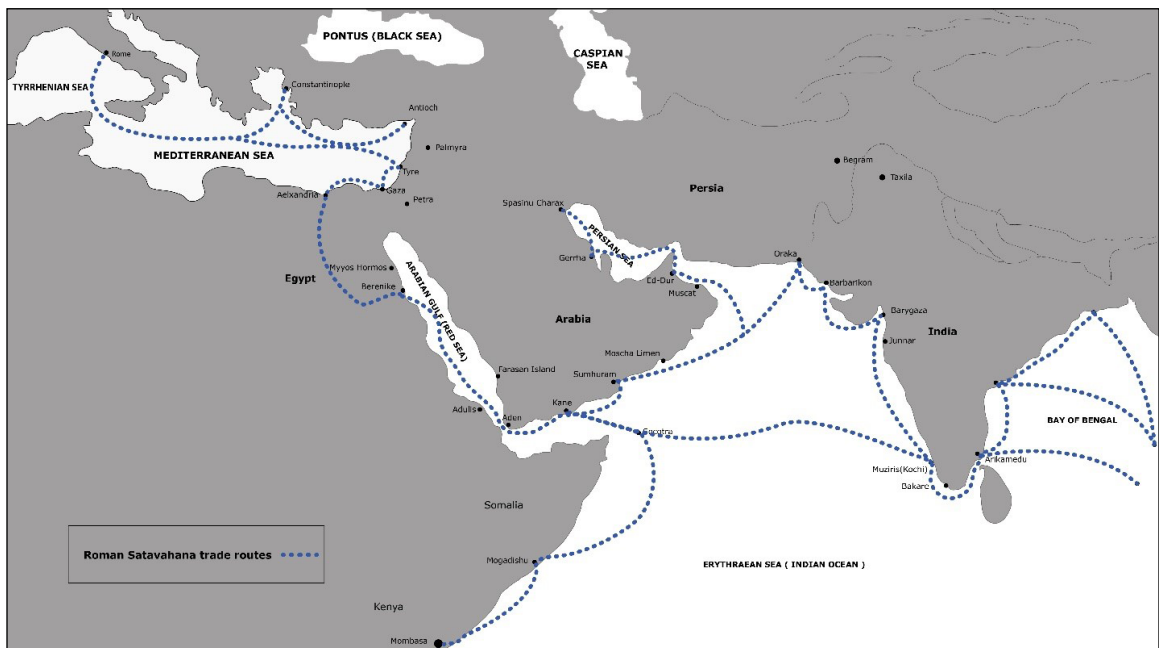


Image 1. Roman-Satavahana trade routes. Map commissioned by the author, created by Bijay Nath, February 2022.

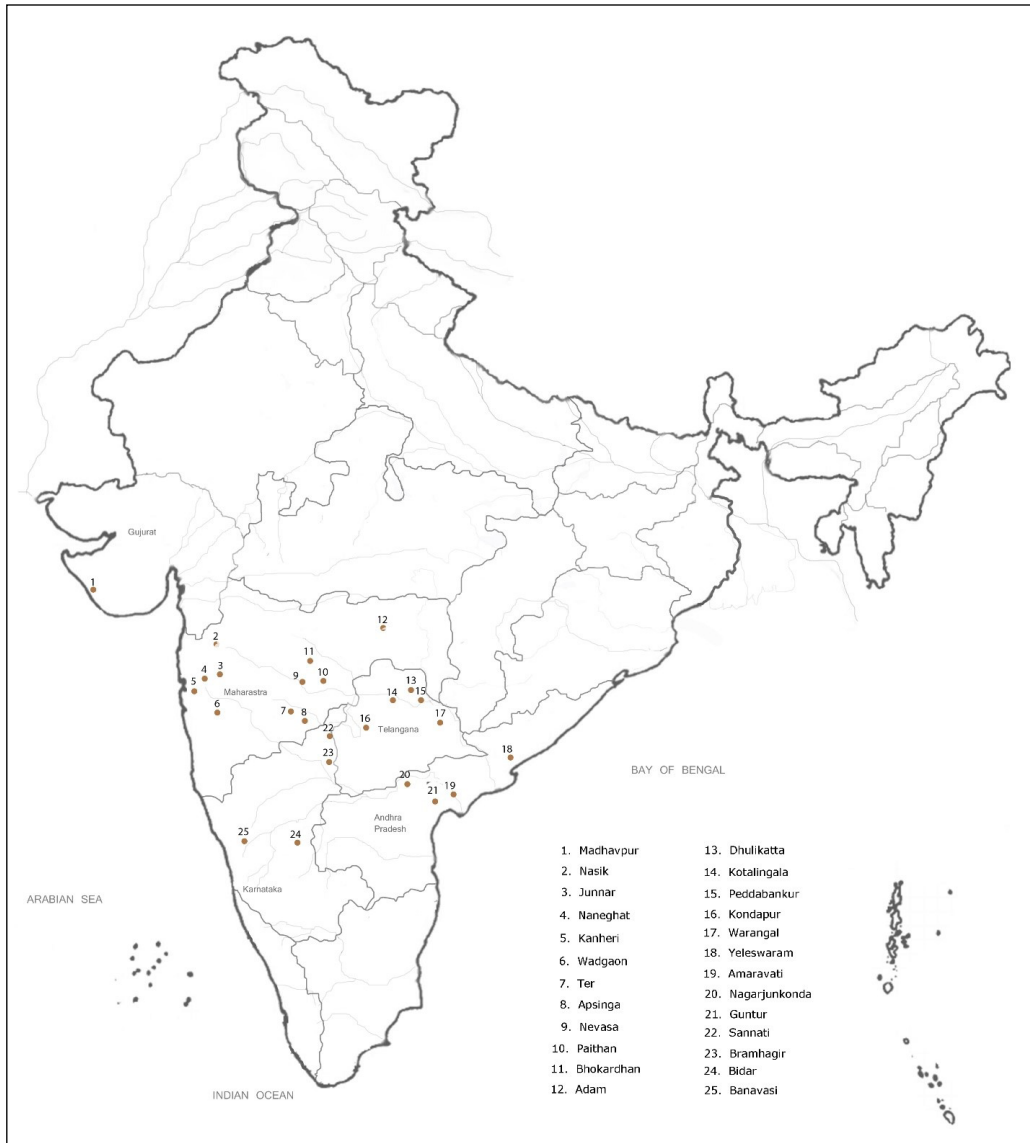


Image 2. Satavahana sites in Deccan, 2nd and 3rd century CE. Map commissioned by the author, created by Bijay Nath, December 2020.

their terracotta products (*Terra sigillata*).² This realization led local artisans to seek to replicate the popular sheen by exploring the potentialities of different qualities of local clay.³ Their success in matching the imported Roman terracotta artifacts led to a demand for their products among wealthy patrons of the Indian peninsula that appreciated both the Roman-style sheen and local touches provided by indigenous artisans.

The indigenization of Roman terracotta products by Deccani artisans and the resultant expansion of their own markets, and the technological innovation employed to achieve that

end is of some significance for research and teaching of world history. It may serve to illustrate the poverty of Eurocentric archaeology, which has often uncritically assumed artistic production and manufacture flows only West to East and also reserving progress through the use of “scientific method” for itself.⁴ It also serves as an example of the responsiveness of local markets in the ancient world to overseas trade in terms of local agency as well technical ability. Moreover, the artistic and tactile nature of the terracotta items themselves may also hold students’ interest during any course that seeks to illuminate the complexity of transregional trade in the Classical World.⁵

It is important to note that the freestanding sculptures (Image 4a & 4b) found below made use of a double mold technique typical of Satavahana terracotta. In this essay, archaeological evidence and textual references will engage in art historical discourse over artistic practices concerning the treatment of material, experiment, skill, sensibilities, and power. It will do so to trace the multiple human and non-human agencies responsible for the cultural assimilation of the Classical Roman and Deccani worlds. This essay also traces how colonial archaeology continues as a disciplinary force in decolonized India and creates a hierarchy in the studies of patrons and their objects over artistic practices, which shares a considerable stake in making history, and hence calls for our attention.

The first part of this paper locates the classical artifacts unearthed in the sites of present India which represent the entanglement between ancient and contemporary, trans-classical and local, archaeological, and artistic. The section draws the methodological framework from Ian Hodder’s *Entangled*, where he points out that the archaeological artifact’s taxonomy is entangled with hegemonic interest to construct lineages and affiliation of cultural sequence.⁶ The second part examines terracotta as sociohistorical material by drawing the outline from Daniel Miller where he demonstrated that the study of material culture often becomes an effective way to understand power, not as some abstraction, but as the mode by which certain forms or people enter the historical record, often at the expense of others.⁷ Moreover, the very mutability of clay will here be seen as offering an alternative to the trans-regional history of Classical trade thought through the study of the agency of the artisanal process, and practice as the nature of clay itself comes to influence cultural and historical relations of Rome and the Deccan.

Terracotta: Contact Zones of the Roman and Deccan

There is substantial scholarship on the Roman-Satavahana mercantile connection in ancient India and about the nature and objects of mercantile trade between them.⁸ The artifacts excavated from the sites in today’s Maharashtra, Telangana and Andhra Pradesh, such as Ter, Bhokardan, Adam, Nasik, Paithan, Apsinga, Kondapur, Nevasa, and Yeleswaram (See Map, Image 2) not only confirm a network of production, usage, and overseas circulation in the past, but also their entanglement within the contemporary moment through housing

such terracottas in various museums in India and abroad.⁹ Objects manufactured in Roman colonies or traded by Romans (e.g. Samian sherd, imitation of Megarian bowls, glass, intaglios, mirrors, and bronzes) are common in many sites and suggest the circulation of the artifacts.¹⁰ For example, Bhokardan excavation unearthed varied terracotta potteries such as black and red burnished ware, coarse black and redware, coarse redware, red-slipped ware, crude handmade redware, ware with red wash, red-polished ware, tan-slipped ware, drab black ware, and black burnished ware. These wares reflect a range of patrons' choices as well as artisans' craftsmanship. Clay bullae¹¹, two pieces of amphora, and a piece of redware that seems to be an imitation of red polish ware reflect a connection with Indo-Roman contacts.¹² Discovery of large numbers of Roman coins and imitation of clay bullae and coins (Figure 3) at such sites as Adam and Bhokardan suggests that the artisans have tried their hand to make bullae closer in the look of those from the Roman market.¹³ The amphorae from Paithan and Ter also confirm the choice and usage of Roman ware.

Kondapur, Sannati, and Ter were the hubs of various crafts making, including terracotta during the Satavahana period.¹⁴ However, the terracotta figurines in fragments made of ball clay are found from the sites at Nevasa, Nasik, Ter, Bhokardan, Paithan, Adam, and Apsinga that unfold various layers of Satavahana settlement which spread across the regions of the present-day Andhra Pradesh, Telangana, and Maharashtra.¹⁵ Nonetheless, as some of these sites are loaded with Roman specimens, the terracotta figurines drew the scholars' attention and interpretation.



Image 3: Coinage of Tiberius Caesar, Indian Imitation, 1st Century CE.
Source: British Museum, used under provisions of I, PHGCOM, CC BY-SA 3.0, at <https://commons.wikimedia.org/w/index.php?curid=2270233>.



Image 4a and 4b: two views of Terracotta Head, Yeleswaram, approximately 3 x 2 x 0.7 in. Satavahana period. Courtesy of The Department of Heritage Telangana, Hyderabad, and The National Mission on Monuments and Antiquities, Government of India.

However, the Satavahana terracottas (Image 4a & 4b, above) with large petal-shaped eyes, bulbous nose, and voluminous lips resemble the figures of Karle and Bhaja that are carved in stone.¹⁶ The figurines are made in double molds—one for the front and another for the sculpture's back. A thin strip of clay is pressed on both the molds to join them, visible on the surface. Sometimes the seam line of the joinery is applied with a ribbon of clay. The larger terracotta figurines that are approximately five cm in height and eighty-four cm in width have holes on the unnoticeable parts of the figures, such as the ears and nostrils. The use of molds has been interpreted as a method of making multiple figurines from a master copy. Historian and archaeologist M. K. Dhavalikar mentions that the double mold technique was highly specialized and did not appear elsewhere in the country.¹⁷ The double mold technique does not seem to have evolved locally and is supposed to have been imported from the Roman Empire.¹⁸ Scholars continued interpreting this technique as one that traveled with the products in the Indo-Roman mercantile network.¹⁹ I argue that using double molds to make hollow terracotta figurines was neither introduced during the Satavahana period nor an imported technique. The scholars mostly tracked the circulation of artifacts and simulation of the iconic form rather than artistic enterprise.²⁰ There is minimal

attempt to trace the process of making the artifacts connected with the trans-Roman and Deccan trade. There is evidence of the molding technique in South Asia since the eighth century BCE.²¹ The use of molds was widespread in making terracotta sculptures that had entangled liaisons with the rise and spread of Buddhism and political tussles among many powers such as Mauryan, Sunga, Kanva, Datta, Mitra, as well as Satavahana.²² The Satavahana terracotta sculptures reflect the long artistic practice that traveled with the shifts of different political dynasties and patrons. The excavated artifacts thus reflect the network of commerce, choices of clientele, as well as practices of the makers or artisans who are often denied an agency.

It should be stressed that the Satavahana terracotta sculpture appears exclusively local, not only because of the double-mold technique, but also because of the use of distinct clay. Ball clay as a material for making sculpture appears to be new for the artisans, as we do not find any archaeological and textual evidence of the figures made from this kind of clay earlier, an absence which had encouraged scholars to assume the clay as being “exotic.”²³ We also should consider that making a double-mold sculpture out of any other kind of clay is not similar to building pottery, even though the artisans may have the expertise on nature and culture of the clay used in both cases. The process of preparing ball clay, modeling, and baking differs between making sculpture and pottery. For example, pottery made in ball clay does not need holes on the surface to adjust an excessive heat of firing as its mouth serves that purpose, whereas a sculpture of ball clay does require these holes to avoid breakage. Thus, we find the tiny holes aesthetically merged with the surface of Satavahana terracotta modeled in ball clay. Here we see advocating archeological evidence as a center of knowledge production has overshadowed the cognitive understanding of artisanal knowledge.

The selection of a type of clay (here, ball clay), which was neither popular nor explored earlier or in neighboring regions of the Satavahana settlement, compels us to problematize artistic choices and their link to trans-Roman-Satavahana trade in the Deccan plateau. It leads us to question how a kind of clay configures a complex network of various human actors that includes the traders, clients, and artisans from locales of the Deccan and overseas; non-human actors that comprise the formalistic elements of the sculptures such as motif, form, size, texture, and weight; and the double-mold processes invented, adapted, and altered in making sculptures.

The Deccani Turn

The Deccan in the Indian peninsula is rich in dense black clay and red laterite soil, neither of which are best for cultivation or modeling. The regional artisans preferred either red clay or a composition of white or ball clay for making the artifacts.²⁴ Historian M. K. Dhavalikar mistook the ball clay as kaolin and explained that kaolin is a much more exceptional material

because there was no evidence of its use earlier and the Satavahana terracotta reflects the artist's skill who fashioned them for plasticity and durability.²⁵ On the contrary, kaolin is a non-plastic clay.²⁶ It is possible that Dhavalikar (and other scholars) was unaware of kaolin's low plasticity. The artisans used ball clay that looks like kaolin.²⁷ Furthermore, the use of kaolin was unknown to South Asian potters until the Muslim invasion that introduced the application of kaolin through porcelain-making and pot-glazing.²⁸ Moreover, the appliqué technique for ornamentation with ball clay is also quite risky because of the tremendous plasticity of the material. Thus, terracotta in ball clay (Figure 3a & 3b) from the Satavahana period is small, and the detailed ornamentation is done from the mold itself, which is distinct from the contemporary terracotta, in that it is made of red earthen clay and found at sites in north India.

However, despite having plenty of red earthen clay for modeling, the imported Roman objects played a role in selecting an inconvenient material like the ball clay. Roman objects in the local markets could have led to a demand for similar kinds that look precious and are attractive for its shiny effect, which regional ball clay could partially create. Thus, perhaps a market grew with a demand for exclusive items that includes Roman objects and objects from different parts of South Asia, thereby encouraging the manufacture of these terracotta sculptures for the wealthy clans of Satavahana regions. The exclusive Northern Black Polish ware disappeared from the Gangetic valley by 200 BCE but continued to be in use in the Satavahana regions around 50 CE, which suggests that preference of the wealthy customers has an influence on what is produced by local artisans.²⁹ The Northern Black Polish wares were excavated from Amaravati, Kondapur, Nasik, Nevasa, and Ter; places that were significantly known as terracotta-making centers. Samian sherd, Roman coins, and bullae have also been found at these sites, suggesting they were the contact zone of the Roman and Deccani artifacts, Northern Black Polish wares, and other terracotta production. Moreover, we find the abundant mine of ball clay that is used for modelling Satavahana terracotta in Wadgaon, Nalgonda, Bidar, and Warangal, sites that are very close to many Satavahana trading routes, such as Ter, Kondapur.³⁰ Thus, the Satavahana trading routes were used to market the raw materials, such as clay, to the guilds.³¹

The appreciation for the Roman objects led to attempts at imitation as indicated by the replication of Roman coins and bullae, or in one case a terracotta that looks like Eros, excavated from Junnar.³² These do not suffice the scholars' observation on the double mold as imported method from the Classical world to South Asia. In 1959, Swiss archaeologist Hanna Rydh's observations based on *Swedish archaeological expedition at Rang Mahal from 1952 to 1954 (one of the earliest excavation in decolonized India)* add to this point.³³ She notes, "most of the writers presume the very plausible theory that it was manufactured under Roman influence. It is very much more difficult to decide whether the form is foreign or whether the sprinklers are imported . . . No pottery examples in any considerable

quantity are known outside India."³⁴ Moreover, Classical literature reflects more on the exchange and purchase of the goods than on the processes and production of the goods in South Asia.³⁵ The scholars also construed the Satavahana terracotta as having "comically deformed western traits . . . different from the ones reproduced on the *bullae*. They do not respond to a "naturalistic" perception of foreignness but to a grotesque yaksa-like form . . ." ³⁶ Such interpretation reflects the pioneering German art historian and archaeologist J. J. Winkelmann's³⁷ hegemonic construction of "classical" idealized Greek art as being superior to Roman, and that Roman copies of Greek originals as reflecting a deficiency of artistic ability.³⁸ His agenda to establish Greek art as the pure classical ideal not only discriminated against Roman art, but was also a feature in the colonial enterprise used to segregate and subordinate diverse art forms and artisanal knowledge of the world.³⁹ The Classical became a yardstick to valorize and categorize art and artistic practice on the basis of style and material in the colonial world. Winkelmann's research methodology as a scientific way of reasoning deploys the Classical as a political, social, and archeological tool to advocate a hierarchy in cultural lineage and historical studies.⁴⁰



Nevertheless, the use of unusual clay such as ball clay achieved a closer tactility of material used in the Roman artifacts. For example, Figure 3a and 3b are a broken piece of a round terracotta figurine. The features of the face are in low relief, and blended with the surface. Here, I would like to draw attention to the affinity of the artistic attempt found in the Deccani terracotta sculptures (Image 4) with the use of pipe-clay in making figurines (Image 5) by the artisans from the periphery of the Roman Empire, such as the local artisans from the regions of Meuse, Thames, Rhineland, and Gaul.⁴¹ The exploitation of pipe-clay was like the use of ball clay from the Deccan mine. The use of double mold technique was also common. In both cases, the use of uncommon local clay was challenging but attempted with the

Image 5: East Gaulish pipeclay figurine of the Roman goddess Fortuna, made at Cologne. 2nd century CE. Ht. 17.8 cm. Source: British Museum, London. Used under the provisions of GR 1949.10–11.54, by AgTigress - Own work, CC BY-SA 3.0, at <https://commons.wikimedia.org/w/index.php?curid=11299066>.

artisans' existing practical knowledge. For instance, the artisans of the Bronze and Iron Age in South Asia and Europe experimented with clay molds to craft metalware.⁴² However, pipe-clay is highly plastic unlike ball clay⁴³; but the aesthetic appeal, and formal elements of the figurines⁴⁴ in pipe-clay are similar to Satavahana terracotta sculptures. Thus, the artisan's engagement with the local material such as clay, the technique of clay processing modeling, and firing are all cloaked in the Westernized hierarchy of classicism. Adding to this point, archaeologist Colin Renfrew stressed the process of interactive and cognitive engagement with a wide range of materials as being a driving force of world history.⁴⁵ Nonetheless, the arrival of new and different features and surface treatment that appeared in Roman artifacts which were in circulation encouraged Deccani artisans to replicate the effect and absorb the form in the existing practices of making terracotta figurines to satisfy the aesthetic preference of the wealthy clans.

Conclusion

It is hoped that this study will complement the work of those world historians who look at cross-cultural encounters and exchanges as more than a one-way street. It is fascinating to understand world history as enmeshed and layered rather than as a hierarchical tiered system, with the "classical world" as a locus of triggering ideas among Romans, Deccani, Gauls, artisans, artifacts, clay, traders, clients, clans, rulers, and others. Remarking on the virtues of an "encounters model"⁴⁶ of analysis in world history, John Davidann and Marc Jason Gilbert note that this approach has the benefit of tending to "subvert the commonly accepted assumptions about differences between peoples in terms of race, ethnicity, nationhood, or empire."⁴⁷ This perception would seem to be validated by this study's examination of the contact between Roman artifacts and Satavahana artisans and will, it is hoped, open further possibilities and explorations of material, technological, cultural, and economic crossroads.

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NOTES

¹ For references of the network of the potters' guilds, their social and professional status such as 'court potters' (*raja-kumbhakara* or *maha kumbhakara*) who cater the aristocrats different from the ordinary potters, see Devangana Desai, "Social Milieu of Ancient Indian Terracottas 600 B.C.E–600 A.D.," Amy Poster, ed., *From Indian Earth, 4000 years of Terracotta Art* (New York: Brooklyn Museum, 1986), 29–42; Devangana Desai, "Terracottas and Urban Culture of Ancient India (Circa 600 B.C.E–A.D. 600)," *Proceedings of the Indian History Congress* 37 (1976): 555–62; R. S. Sharma, *Sudras in Ancient India: A Social History of the Lower Order Down to Circa A.D. 600* (Delhi: Motilal Banarsidass Publishers Pvt. Ltd., 1990), 25–95, 124–182; R. C. Majumdar, *Corporate Life of Ancient India*, (Poona: Oriental Book Agency, 1922), 19–35; R. N. Misra, *Ancient Artists, and Art Activity* (Simla: Indian Institute of Advanced Study, 1975), 5–23.

² To know more about Roman *terra sigillata*, see Gunnar Fulle, "The Internal Organization of the Arretine Terra Sigillata Industry: Problems of Evidence and Interpretation." *The Journal of Roman Studies* 87 (1997): 111–55 and A. Van Oyen, "The Roman City as Articulated through Terra Sigillata." *Oxford Journal of Archaeology* 34 no. 3 (July 2015): 279–299.

³ H. D. Sankalia, B. Subbarao, and S. B. Deo, *The Excavations at Maheshwar and Navdatoli, 1952–53, no.1* (Poona: Deccan College Research Institute and M. S. University Publication, 1958), 46–50 and Michael Vickers, "Nabataea, India, Gaul, and Carthage: Reflections on Hellenistic and Roman Gold Vessels and Red-Gloss Pottery." *American Journal of Archaeology* 98 no. 2 (April 1994): 244–245.

⁴ Sudeshna Guha, *Artefacts of history: archaeology, historiography and Indian Pasts* (New Delhi: SAGE Publications India), 30–65.

⁵ This paper owes to my graduate days' studies on terracotta. It is enmeshed with the pedagogical intervention of the courses on the art history of the Classical West and South Asia as well as making of clay sculptures. The former oriented me to the historiography of the evolution of art, whereas the latter grounded me to the historicity of the materials that are used to make clay sculpture.

⁶ Ian Hodder, *Entangled: An Archaeology of the Relationships between Humans and Things* (West Sussex: Wiley-Blackwell, 2012), 145–147.

⁷ Daniel Miller, "Materiality: An Introduction," Daniel Miller, ed., *Materiality* (Durham and London: Duke University Press, 2005), accessed May 23, 2020, <https://www.ucl.ac.uk/anthropology/people/academic-and-teaching-staff/daniel-miller>.

⁸ Himanshu Prabha Ray, *The Archaeology of Seafaring in Ancient South Asia* (Cambridge: Cambridge University Press, 2003), 232–236; Raoul McLaughlin, *The Roman Empire, and the Indian Ocean: The Ancient World Economy and the Kingdoms of Africa, Arabia and India* (South Yorkshire: Pen and Sword, 2014), 157–17; Pia Brancaccio, "Satavahana Terracottas: Connections with the Hellenistic Tradition," *East and West* 55, no.1 (December 2005): 55–69; Matthew Adam Cobb and Fiona Mitchell, "Eros at Junnar: Reconsidering a Piece of Mediterranean Art." *Greece and Rome* 66, no. 2 (2019): 203–26.

⁹ See Tapati Guha-Thakurta, *Monuments, Objects, Histories. Institutions of Art in Colonial and Post-Colonial India* (New York: Columbia University Press, 2004), XVIII–XX, 175–204; See also Amy Poster, ed., *From Indian Earth, 4000 years of Terracotta Art* (New York: Brooklyn Museum, 1986) and Rebecca M. Brown, *Displaying Time: The Many Temporalities of the Festival of India*, (Seattle: University of Washington Press, 2017), 28–42.

¹⁰ Warwick Ball, *Rome in the East: The Transformation of an Empire* (New York: Routledge, 2016), 145 and Hanna Rydh, *Rang Mahal: The Swedish Archaeological Expedition to India, 1952–1954* (Lund: CWK Gleerup Publishers, 1959), 147–149.

¹¹ Clay bullae in various geometric forms are miniature tokens used for different purposes such as counter and ritual. These often bore the impression or inscription of individuals seals and used to attest the official documents in the Hellenistic and Roman eras. To read more about bullae see Sharon Herbert, "Bullae," William Aylward, ed., *Excavations at Zeugma, conducted by Oxford Archaeology* (Los Altos, CA: Packard Humanities Institute, 2013), 210–212 and J.W. Palka, "Not Just Counters: Clay Tokens and Ritual Materiality in the Ancient Near East," *Journal of Archaeological Method Theory Not Just Counters: Clay Tokens and Ritual Materiality in the Ancient Near East. Journal of Archaeological Method Theory* 28, 414–445 (2021), accessed August 11, 2021, <https://doi.org/10.1007/s10816-020-09457-8>; Haim Gitler, "A Group of 120 Clay Bullae from Petra with Titles of the City," *The Numismatic Chronicle*, 165 (January 2005): 183–92.

¹² Upinder Singh, *A History of Ancient and early medieval India, from the stone age to 12th Century*, (Delhi: Pearson, 2008), 398.

¹³ Singh, *A History of Ancient*, 397.

¹⁴ Himanshu Prabha Ray, *The Archaeology of Seafaring in Ancient South Asia* (Cambridge: Cambridge University Press, 2003), 235–236.

¹⁵ S. B. Deo, "Satavahana Archaeology." *Bulletin of the Deccan College Research Institute* 35, no. 1/ 2 (1975): 37–41; Vasudev Vishnu Mirashi, *Literary and Historical Studies in Indology* (Delhi: Motilal Banarsidass, 1975), 221–222; Himanshu Prabha Ray, *Monastery, and guild: commerce under the Sātavāhanas* (New Delhi: Oxford University Press, 1986); Sunil Gupta, "Neasa: A type-site for the study of Indo Roman trade in Western India," *South Asian Studies* 14, no. 1 (1998): 87–90; Devendra Samadhan Ingle, "The Role of Buddhism in Ancient Indo–Roman Trade (200 B.C –200 AD)," *The Czech Historical Review*, no. 2, (2011): 223–226; Rebecca Darley, "Self, Other and the Use and Appropriation of Late Roman Coins in Peninsular India," Himanshu Prabha Ray, ed., *Negotiating Cultural Identity: Landscapes in Early Medieval South Asian History* (Oxon: Taylor & Francis, 2019), 68–71; S. Autiero, "Bes Figurines from Roman Egypt as Agents of Transculturation in the Indian Ocean," *Thiasos* 6 (2017): 79–89; C. Margabandhu, "Roman Influence on the Art of Clay Modelling of the Sātavāhanas: A Study in Cultural Fusion," *Indian Historical Review* 32 no. 1 (January 2005), accessed May 2, 2020, <https://doi.org/10.1177/037698360503200106>.

¹⁶ Walter Spink, "On the Development of Early Buddhist Art in India," *The Art Bulletin* 40 no. 2 (1958): 95–104; Vidya Dehejia, "Questioning Narrativity and Inscribed Labels: Buddhist Bharhut, Sannati and Borobudur," Himanshu Prabha Ray, ed., *Sacred Landscapes in Asia, Shared Traditions, Multiple Histories* (Delhi: India International Centre and Manohar, 2007), 286–303; B. G. Gokhale, "Bharukaccha/Barygaza," G. Pollet, ed., *India and the Ancient World: History, Trade and Culture before A.D. 650* (Leuven: Department Orientalistiek, 1987), 72–73; and E. H. Johnston, "Two Notes on Ptolemy's Geography of India," *Journal of the Royal Asiatic Society of Great Britain and Ireland*, no. 3 (July 1941): 208–213.

¹⁷ M. K. Dhavalikar, "Paithan Terracottas," *Journal of the Indian Society of Oriental Art* (New Series) VII (1975–76): 65.

¹⁸ Ibid.

¹⁹ M.N. Deshpande, "Classical Influence on Indian Terracotta Art," *Huitième Congrès international d'archéologie classique* (Paris 1965): 603–610; Pia Brancaccio, "Close encounters: multicultural systems in ancient India," Doris Meth Srinivasan, ed., *On the Cusp of an Era: Art in the Pre-Kuṣāṇa World* (Leiden: Brill, 2007), 392; Pia Brancaccio, "Satavahana Terracottas: Connections with the Hellenistic Tradition," *East and West* 55 no. 1/ 4 (December, 2005): 65; Shahida Ansari, Vijay Sarde, and Mohan S. Pardhi, "Archaeological Investigation in 'Apsinga'a Satavahana Settlement in Osmanabad District, Maharashtra," *Bulletin of the Deccan College Research Institute*, 72/73 (2012-2013): 225-244.

²⁰ Autiero, "Bes Figurines," 81.

²¹ J. Marshall, "Excavations at Bhiṭa," *Archaeological Survey of India Annual Reports 1911–12* (Calcutta 1915): XXII–9. Marshall reported that a female standing under a palm tree, found from Bhiṭa excavation, is dated around the 8th century BCE.

²² The Mauryan Empire with its capital in Pataliputra (today's Patna, Bihar), stretched from the northwest (now Pakistan) to the eastern part of the Indian Subcontinent. Pataliputra, the heart of Mauryans along with the Empire, was overtaken by Sungas (c.2nd–1st century BCE); later, the area came under the control of the Kanva dynasty ruled from their capital Besnagar / Vidisha (now in Madhya Pradesh). The Datta dynasty, in the areas of the present-day Mathura and Ayodhya in northern India around the 1st century BCE–1st century EC, was the competitor of both Sunga and Kanva who was later replaced by the Mitra dynasty from Kaushambi (in present Uttar Pradesh) These political dynasties were the contemporary challengers of Satavahanas who ruled in the regions of today's Maharashtra, Telangana, and Andhra Pradesh. See D. D. Kosambi, *The Culture and Civilisation of Ancient Indian Historical Outline* (London: Routledge and K. Paul, 1965) and Baishali Ghosh, "Moulded Plaque-Jack of all trades: a sociological interpretation of ancient terracotta," in S. Panikkar and A. Sheth, eds., *Art of Ancient India: contextualizing social relation* (Baroda: Maharaja Sayajirao University of Baroda, 2004), 62–76.

²³ Vickers, "Nabataea," 244–245.

²⁴ Baishali Ghosh, "Technique, Time and Form in Ancient Indian Terracotta Sculptures," Shivaji K. Panikkar, Parul Dave Mukherji, and Deeptha Achar, eds., *Towards a New Art History: Studies In Indian Art* (New Delhi: D. K. Printworld Pvt Ltd., 2003), 136–137.

²⁵ H.D. Sankalia and M.K Dhavalikar, "The Terracotta Art of India," *Mārg* 23 no. 1 (December 1969): 43 and M. K. Dhavalikar, "Paithan Terracottas," 64.

²⁶ F. A. Andrade, H.A. Al-Qureshi, and D. Hotza, "Measuring the plasticity of clays: A review," *Applied Clay Science* 51, issues 1–2 (January 2011): 1.

²⁷ In contrast, the composition of ball clay that looks very much like kaolin is coarse and plastic. It has an excessive shrinkage quality during firing as a result of its high plasticity. Sculpture in this clay has to be small since its high shrinkage does not let the figure to be prominent in size. Simultaneously, the molded figure needs some passages to bypass heat and inflated air uniformly, so that it does not shrink abruptly during firing since sudden shrinkage breaks or cracks the figures. See Ghosh, "Technique," 136–137.

²⁸ See Muhammad Baqir, "Islamic Pottery," *Marg*, XIV, no.3 (1961): 57 and Derek Kennet, "Reconsidering the decline of urbanism in late early historic and early medieval South Asia," Jérémie Schiettecatte and Christian Robin, eds., *Les préludes de l'Islam: Ruptures et continuités dans les civilisations du Proche-Orient de l'Afrique orientale, de l'Arabie et de l'Inde à la veille de l'Islam, Orient & Méditerranée* 11 (Paris: de Boccard): 346–347.

²⁹ Northern Black Polish (NBP) pottery is a high-quality deluxe ware. Even the rich could not afford to discard a broken vessel, and it was repaired by copper wire or pin reverting, found from excavated sites. This evidence suggests that repairing a broken NBP ware perhaps costs less than buying a new one. It also indicates that the NBP ware had no adequate supply due to distance, or the high cost of production, which involves an expensive investment that limited production. J. S. Nigam, "Northern Black Polish Ware," *Marg* XIV, no. 3 (1961): 37–45 and D. Sharmin and F. Okada, "Surface Coating Technique of Northern Black Polished Ware by the Microscopic Analysis," *Ancient Asia* 3 (December 2012): 49–65.

³⁰ M. N. Deshpande, "Satavahana Terracotta Art: With Special Reference to Ter," A.M. Shastri, ed., *The Age of the Satavahanas* (Delhi: Aryan International Book, 1999), 479.

³¹ Kiran Kumar Thaplyal, "Guilds in Ancient India (Antiquity and Various Stages in the Development of Guilds up to AD 300)," G.C. Pande, ed., *Life Thoughts and Culture in India* (Delhi: Munshiram Manoharlal Publishers Pvt. Ltd., 2001), 998–1000.

³² Cobb and Mitchell, "Eros at Junnar," 204–216.

³³ F. R. Allchin, "Hanna Rydh and Others: Rang Mahal," *Bulletin of the School of Oriental and African Studies* 23, no. 2 (June 1960): 406.

³⁴ Rydh, *Rang Mahal*, 149.

³⁵ Cobb and Mitchell, "Eros at Junnar," 215.

³⁶ Pia Brancaccio, "Perception of 'Westerners' in the Satavahana Times: The Archaeological Evidence," *South Asian Archaeology 2001, Volume II* (Paris: Editions Recherche sur les Civilisations, 2005): 403.

³⁷ The modern discipline of art history and archaeology owes much to J. J. Winckelmann. For orientation to his scholarship see "Piranesi in Rome," accessed August 28, 2020, <http://omeka.wellesley.edu/piranesi-rome/exhibits/show/winckelmann/introduction>.

³⁸ Gazda, Elaine K, "Roman Sculpture and the Ethos of Emulation: Reconsidering Repetition," *Harvard Studies in Classical Philology* 97 (1995): 125–127.

³⁹ Partha Mitter, *Much Maligned Monsters: A History of European Reactions to Indian Art* (Chicago: University of Chicago Press, 1992), 189–220 and Simon Gikandi, "Picasso, Africa, and the Schemata of Difference," *Modernism/modernity* 10, no. 3 (September 2003): 459–460.

⁴⁰ Mitter, *Much Maligned*, 189–220.

⁴¹ Those interested in knowing more about the making, use, and circulation of the pipe-clay figurines may wish to consult: Matthew G. Fittock, "Broken Deities: The Pipe-Clay Figurines from Roman London," *Britannia* 46 (November 2015): 111–134 and Alison Taylor, "A Roman Lead Coffin with Pipeclay Figurines from Arrington, Cambridgeshire," *Britannia* 24 (November 1993): 191–225.

⁴² Thomas E. Levy, *Journey into the Copper Age: Archaeology in the Holy Land* (San Diego: San Diego Museum of Man, 2007), 81–87; Michael S Bisson, "Precolonial Copper Metallurgy: Sociopolitical Context," Joseph O. Vogel, ed., *Ancient African Metallurgy: The Sociocultural Context* (CA: Alta Mira Press, 2000), 83–90; G. Westerberg, "Spatial Organization of Mining and Smelting at Feinan, Jordan: Mining Archaeology beyond the History of Technology," Paul T. Craddock and Janet Lang, eds., *Mining and Metal Production through the Ages* (London: The British Museum Press, 2003), 82–87; and Paul T. Craddock, "The Metal Casting Traditions of South Asia: Continuity and Innovation," *Indian Journal of History of Science* 50, no. 1 (2015): 55–82.

⁴³ A. Hale, "Pipe-Clay," *Nature* 30 (1884): 489–490.

⁴⁴ The pipe-clay artifacts are usually small in size and mostly the figurines of mother, animals and birds. A large number of figurines are excavated at burial sites. See Ian Ferris, "A Pipeclay Pseudo-Venus Figurine from Binchester Roman Fort, County Durham," Rob Collins and Frances McIntosh, eds., *Life in the Limes: Studies of the people and objects of the Roman frontiers* (Oxford: Oxbow Books, 2014), 105–107.

⁴⁵ Colin Renfrew, "Towards a Cognitive Archaeology: Material Engagement and the Early Development of Society," Ian Hodder, ed., *Archaeological Theory Today* (Cambridge: Polity Press, 2012), 126.

⁴⁶ John Thares Davidann and Marc Jason Gilbert, *Cross-Cultural Encounters in Modern World History, 1453–Present* (New York: Routledge, 2019), 4.

⁴⁷ Davidann and Gilbert, *Cross-Cultural Encounters*, 3.