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ARTICLE

Exploring the Quotidian: An Analysis of Plain-Weave Textiles at Cerro de Oro, Peru, during the Sixth to Tenth Centuries

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Abstract
Andean prehispanic textiles are renown for being complex masterpieces made with labor-intensive techniques and high-quality raw materials. Nevertheless, the vast majority of textiles, those used by the population at large, were plain, simple, and without any decoration. We study a sample composed of the most common textiles used by people living at Cerro de Oro in the Cañete Valley, Peru. Our analysis focuses on fiber selection, yarn thickness, and the presence of errors throughout the process of weaving. We discuss relevant aspects of the social process of textile production, such as the role played by plain-weave textiles in different contexts, their use in different types of garments, and the varied ways community members, with particular skill levels, participated in clothing the living and the dead at Cerro de Oro.

Resumen
Los textiles prehispánicos andinos son conocidos por ser complejas obras maestras, hechos con técnicas que requerían una intensa mano de obra y utilizaban materias primas de alta calidad. Sin embargo, la gran mayoría de los textiles, los utilizados por la población en general, eran simples, llanos y con mínima decoración. Este artículo presenta una muestra compuesta por los textiles más comunes utilizados por las personas que habitaron Cerro de Oro en el valle de Cañete, Perú. A través de un análisis enfocado en el proceso de selección de fibras, el ancho de los hilos, así como la presencia de errores en los tejidos, expondremos aspectos relevantes sobre el proceso social detrás de la producción textil. Evidenciaremos cómo se entrelazan diferentes aspectos como el rol jugado por los textiles llanos en distintos contextos, su uso en diferentes tipos de vestimenta, así como la manera en que los miembros de la comunidad, con sus respectivos niveles de habilidad, participaron en vestir a los vivos y a los muertos en Cerro de Oro.

Keywords: plain-weave textiles; community; crafts; textiles; quotidian; Cerro de Oro

Palabras clave: textiles llanos; comunidades; artesanía; textiles; cotidiano; Cerro de Oro

Historians, anthropologists, and archaeologists have long recognized the importance of Andean textiles. Ethnohistorical references account for their importance in Andean politics, rituals, and the economy (Arnold 2000; Murra 1978; Rostworowski 1983), whereas archaeologists and textile experts recognize their central role in publications and museum exhibits (Ángeles 2000; Bergh 2012; Bird and Bellinger 1954; Carrión 1931; Conklin 1971; D'Harcourt 1962; Frame 1994; Young-Sanchez 2010). Nevertheless, there is an overwhelming (and possibly unacknowledged) emphasis on finer textiles, with everyday plain-weave cloths and clothing often being lumped together with thousands of "nondiagnostic" pottery sherds and other "nonfancy" artifacts.

We argue instead that everyday textiles were socially charged objects, with multiple layers of social knowledge embedded in every thread (Hendon 2006; Lechtman 1996). This social knowledge was learned

through practice and by observing and imitating elders and more skilled community members (e.g., Bourdieu 1977; Hendon 2006; Lemonnier 1992; Roddick and Stahl 2016). Textile making was a practice that permeated different spheres of daily life and included people of varying ages, statuses, and levels of skill engaged in this practice for many different purposes. Every member of society had exposure to the process of producing, using, or mending these textiles in some way. Ordinary people wore clothing made from plain-weave textiles and used them as garments to bury their dead. In addition, plain-weave cloth was used in dozens of everyday objects such as bags, *costales* (large bags), *llicllas* (shawls or blankets worn by women), blankets, and mats. In this sense, plain-weave textiles conveyed multiple meanings, functions, and uses at the same time. The design and technical details embedded plain-weave textiles with meaning, as did the hands that made them and the people who wore them. Furthermore, when people included such textiles in funerary or highly special contexts, they encompassed different layers of social meaning surrounding the deceased, the community, and society in general (Baitzel and Goldstein 2014).

This article analyzes various aspects related to the production of plain-weave textiles that were excavated in funerary and domestic contexts within a residential compound in the densely populated settlement of Cerro de Oro (AD 550–900) in Cañete, Peru (Figure 1). To explore the processes surrounding textile making, we analyzed a sample comprising the most common textiles used by the inhabitants of Cerro de Oro. This yielded information about larger aspects of social life, such as the way people with different skill levels were interwoven within the community. By focusing on fiber selection, yarn thickness, and the presence of errors throughout the process of weaving, we exposed relevant aspects of the social process of textile production, highlighting interlaced aspects such as the role played by plain-weave textiles in different contexts, their use in different types of garments, and the different ways community members, with particular skill levels, participated in clothing the living and the dead at Cerro de Oro in the Cañete Valley, Peru.

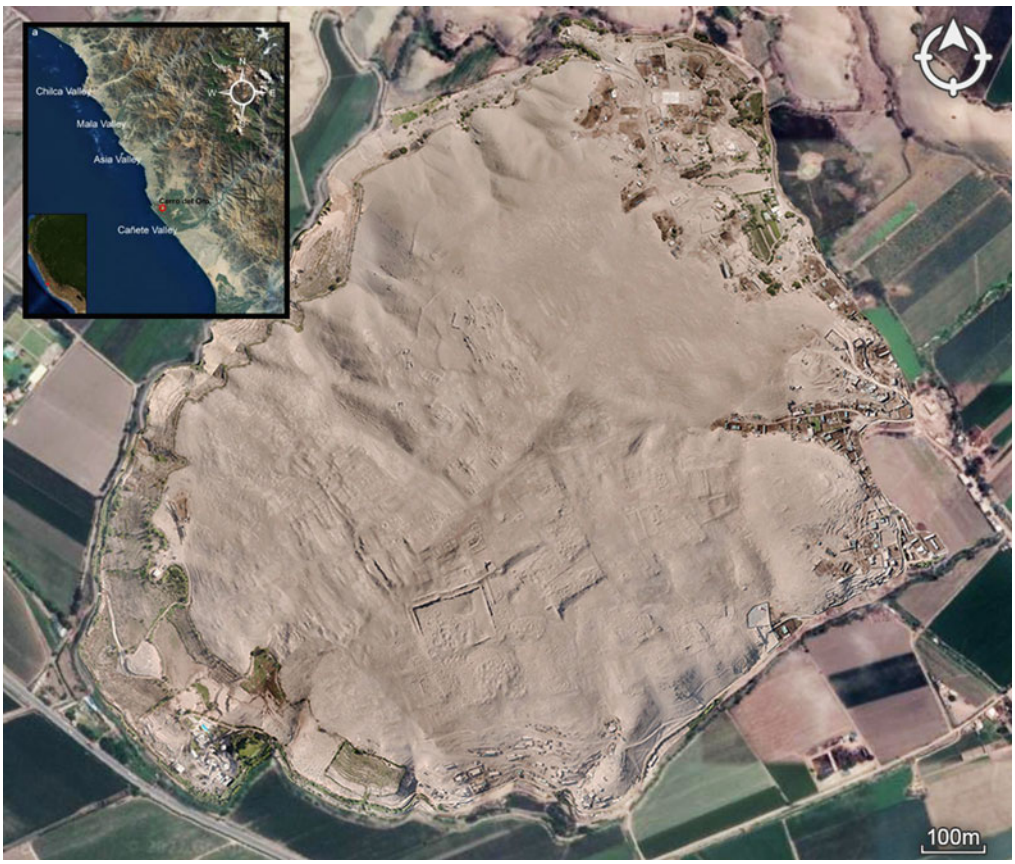

Figure 1. Aerial view of Cerro de Oro.

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Textiles, Learning, and Daily Life

Archaeological, ethnographic, and ethnohistorical data show that textile making was much more than a technical specialization: instead, spinning and weaving formed part of daily life. It was a process inherently joined to the space where it was taught and to the person teaching it. Social lessons came along with the learning. Textile manufacturing, particularly the process of transforming fiber into yarn, served as a silent but pervasive companion to women's lives (Marcelina Acos, personal communication 2019). Learning to spin or weave was an integral part of the socialization of children into their own families and communities. The fact that spinning, an activity usually learned as a young person, is generally performed while doing other tasks—such as herding, tending to children, feeding corralled animals, or other types of activities—transforms this technical process into something "natural." In her ethnographic study of child-rearing in the Chillihuani community of Cusco, Bolin (2006) describes how, after their first haircut, children are socialized into gender roles. For girls this process includes spinning fibers into yarns. Bolin also stresses that spinning and weaving are taught through example, in a familiar setting, with younger girls learning from more experienced or older women. Children learn to spin and later weave within the home by copying their mothers, grandmothers, aunts, or other older relatives. As children become more experienced, they produce textiles that are more complex.

The whole process of production and use included almost every member of the community (Arnold and Espejo 2019). In this sense, textile manufacturing was a doxic practice (sensu Bourdieu 1977); that is, a routine activity performed daily using a certain "natural knowledge" that was learned and interiorized gradually. It became a lifelong lesson on touching, smelling, and tasting the cloth fibers and on developing calluses in the appropriate places. These lessons were acquired not only through the experience of watching older people spin or weave but also by listening to what they said about their lives, their neighbors, and their place in the world. Young children would observe how adults moved, touched, and expressed themselves, slowly instilling in the youngsters a sense of place, belonging, and even corporeal memory. Thus, the process of learning how to produce a textile became entwined with the social process of learning how to become a member of the community. As Baitzel and Goldstein (2018) argue for Tiwanaku, the physical and social context of textile production was as important in shaping the minds and bodies of members of the Tiwanaku community as the technical aspects of the process itself.

Textile characteristics, both technical and aesthetic, configured a "way of doing" that carried certain meanings that evolved as weavers delineated their own "way of weaving" (Jiménez 2006). Every stage of this process required a series of decisions that revolved around the type of fiber selected (or the effort invested in acquiring it), the way it was processed and warped, the type of garment or artifact produced, and how many times it was mended. Furthermore, as textiles were used, gifted, reused, and transformed, the notion of what the object can "do" constantly changed. Textile production implied a practical knowledge embedded within a set of relations. Each decision carried with it a social process that embodied learned traditions—experiential knowledge learned by observation and repetition (Hendon 2006). In addition, this social labor had to keep in mind notions of time, the availability of resources, and other logistical and practical limitations that influenced the manufacturing process.

Archaeological studies focused on the connection between community and the textile-making process show that there is a context-specific variability that seems to be related to practicality, specifically in terms of domestic textiles. For instance, Siveroni and Tiballi's (2016) study of the everyday use of textiles in a household setting focuses on the domestic production of textiles in the southern coast site of Huayurí (Peru), a settlement of people involved in caravan trade during Late Intermediate and Late Horizon times. The authors analyze the *chaîne opératoire* behind the production of utilitarian and plain-weave cloths within three neighboring households: they conclude that domestic production at Huayurí followed a pragmatic logic based on the availability of raw materials. Textiles woven from cotton fiber were more abundant, reflecting the wide availability of this raw material. Textiles made from llama fibers were the next most frequent type. This type of wool was available because the weavers owned their own llamas. This analysis showed that textile production at Huayurí was an independent

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endeavor for each household, which contrasts with other studies in the region such as Conlee's (2016) evidence for multifamily specialized production at La Tiza, a contemporaneous settlement in the Nasca area.

Ethnohistorical evidence from chronicles also provides us with information regarding the production of plain-weave textiles for everyday use during Inca times. Chroniclers such as Guamán Poma (2001 [1615]), Bernabé Cobo (1964 [1653]), and Polo de Ondegardo (1940 [1651]) mention two main categories of cloth: a high-quality cloth named *cumbi* and a low-quality, coarse type named *ahuasca*. Additionally, Cobo (1964 [1653]:225–226) distinguishes between *cumbi* and *cumbi* with feathers and mentions an unlabeled category inferior to *ahuasca*. Guamán Poma (2001 [1615]:162–174) describes how younger women manufactured both fine and coarse textiles, *cumbi* and *ahuasca* (Murra 1978:109), whereas older women were associated exclusively with *ahuasca* textiles. Polo de Ondegardo (1940 [1561]:146) mentions that both *cumbi* and *ahuasca* were produced within domestic contexts and could be requested as tribute. Moreover, archaeological evidence documents *acllawasis,* an Inca institution where selected women lived and worked, which served as centers of specialized production (Tiballi 2010). The textiles these women produced were meant for the official Inca deposits, to be used by the elite and for state-sponsored ceremonies and negotiations. In Guamán Poma's (2001 [1615]:199, 265–267) description of the month of Capac Inti Raymi, he mentions, "Cómo [el Inca] ordenó vestidos y ropa de sus dioses uacas, se llaman Capacocha. Lo hacían de cumbi y de auasca" (How the Inca ordered dresses and garments from his *uaca* gods, they are called Capacocha. They made it with *cumbi* and *auasca*). This information raises an interesting point. Even assuming that *cumbi* production required a higher level of skill, it is possible that a highly skilled person also produced *ahuasca* textiles on occasion, and trainees may have produced *cumbi* textiles under supervision.

These examples illustrate that the production of plain-weave textiles was a context-specific, socially embedded endeavor. The sociopolitical organization and nature of a settlement, as well as logistical aspects such as the availability of raw materials, seem to have played a crucial role. With this background, we turn to the analysis of the production of plain-weave textiles excavated in different use contexts within a residential compound in the prehispanic settlement of Cerro de Oro. We focus on the characteristics of plain-weave textiles and their contexts of use. We then suggest the roles played by people with different levels of skills in the social and physical aspects of textile production. Our textile analysis centers on durability, effort/cost, and time of production while taking into consideration the social aspects that these processes entail.

Cerro de Oro and Its Contexts

Cerro de Oro is a settlement located on top of a mound overlooking the Pacific Ocean in the lower Cañete Valley. The site was occupied between about AD 550 and 1550 for domestic and funerary purposes. The first occupation at the site, dated between about AD 550 and AD 900, is labeled as the Cerro de Oro phase (Fernandini 2015). Then Cerro de Oro was a 150 ha densely populated settlement characterized by dozens of residential compounds, ceremonial spaces, cemeteries, canals, and paths, as well as areas designed for the communal production of ceramics, food processing, storage, and discard, among other productive activities. Around AD 850–900 the settlement was abandoned through an elaborate process that included the burial of individuals within prior domestic and residential spaces. We refer to these burials as "intrusive funerary contexts." The last occupation dates to the Late Intermediate period (AD 1200–1450) and the Late Horizon (AD 1450–1532). Materials from this final occupation are not included in this study.

Over various research seasons, the Proyecto Arqueológico Cerro de Oro (PACO) excavated different areas of the settlement, providing an idea of social and funerary practices at the site. Excavations show that textile production was done within residential contexts. There was the recurrent discovery of cotton and camelid fibers, dyes, spindles, spindle whorls, needles, spades, waist looms, textile combs, and chalk that provide evidence of textile production at the site (Figure 2a and b).

Textiles, mostly fragmentary, found in residential or domestic contexts tend to be located in between occupation floors and in areas for discarded materials. These textiles were part of larger pieces of garments or fabrics with utilitarian purposes. We also found plain-weave textiles within storage

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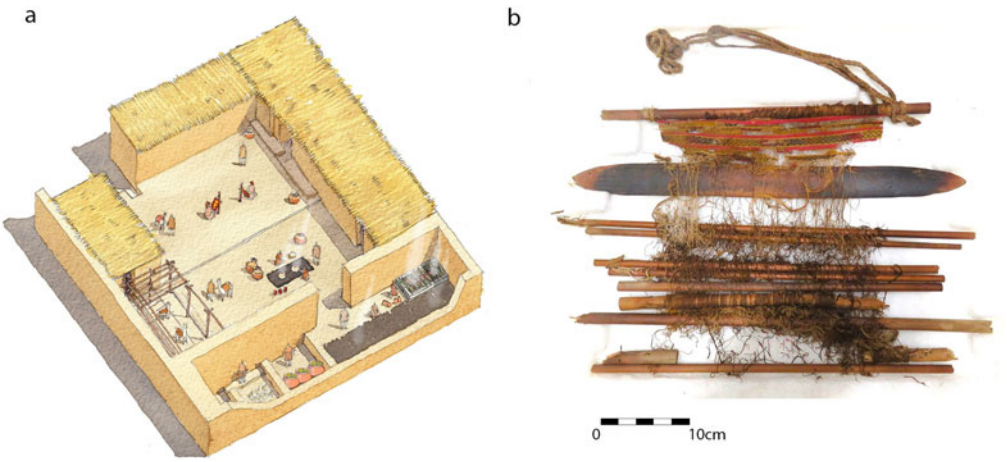

Figure 2. (a) Re-creation of a residential compound showing people involved in textile production in the patio area (illustration by Alfonso Huamaní); (b) waist loom found in a funerary context within Residential Compound SW 2019.

contexts and funerary contexts. Funerary contexts at the site are located either in funerary areas or within residential spaces, included as part of abandonment or remodeling events (de la Puente 2018).

For this study, we compare plain-weave textiles from a residential compound covering the span of the Cerro de Oro phase (AD 550–900). The compound comprised two structures divided by an open area (Figure 3a). Each structure had a series of rooms; we analyze textiles from Rooms A and G

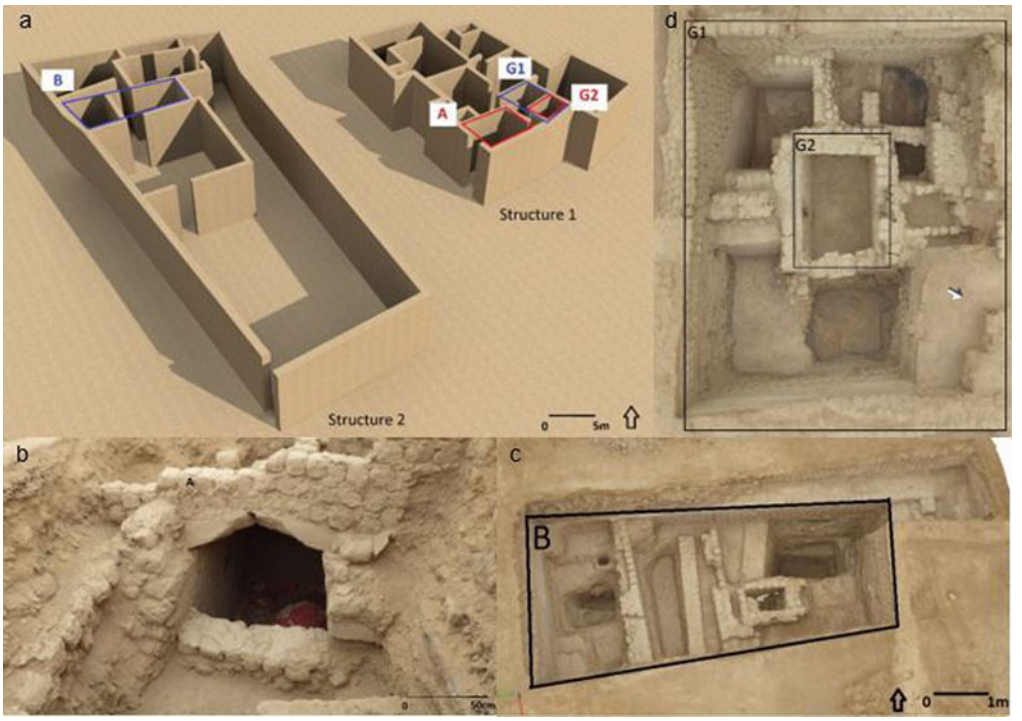

Figure 3. (a) A 3D reconstruction of excavated structures showing each context referred to; (b) an intrusive funerary context where Group A elements came from; (c) a domestic context where elements from Group B came from; (d) view of Room G showing storage context where elements from Group G1 came from and an intrusive funerary context where elements from Group G2 came from.

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(divided into G1 and G2) in Structure 1 and Room B in Structure 2 (Figure 3b–d). This compound presented different use contexts such as residential (Room B) and a storage area (Room G1), as well as two intrusive funerary contexts intruding Rooms A and G (remains from the intrusive context are labeled G2) associated with the abandonment of the settlement (about AD 850–900). Hilda Chuchón (2014) and Rosa María Varillas (2016) analyzed these textiles.

The Sample and Its Contexts

The sample used for this analysis contains 243 textile pieces drawn from a total of 465 textiles and textile fragments collected within Structures 1 and 2, in four different contexts of use: mainly a residential context, a storage area, and two intrusive funerary contexts (Table 1). The textiles in the sample are undyed cotton spun in Z(2s), meaning two S spun threads that are spun once again in the opposite (Z) direction to create a stronger thread, woven in a 1/1 balanced plain-weave structure predominantly of warp face, with no added embellishment or decorations. This type of textile represents more than 50% of the excavated textile remains. Plain weaves 1/1 with 2sS yarns are typical of the central coast (Wallace 1979), whereas scholars agree there is a tendency to find "z" spun threads in the south-central coasts, both archaeologically and ethnographically (Bird 1968; Conklin 1971; Franquemont et al. 1992; Rowe and Cohen 2002; Splitstoser 2009). Based on this information and their abundance in Cerro de Oro, we propose that plain weaves 1/1 with 2sS represent the average Cerro de Oro textile.

We decided to analyze only this type of plain weave because it represents the largest group within the universe of recorded textile fragments and was recorded in all four contexts present in this analysis. We excluded highly elaborate textiles because they were found almost exclusively within funerary contexts, which also present plain weaves with different patterns of weft/warp intersection (2/1 and 2/2), as well as threads spun in S and Z directions; these specimens were rare and did not allow for proper comparisons between contexts. Choosing the most common type of textile allows us to compare between funerary and domestic contexts using variables that apply to all specimens. Moreover, the presence of slight variations, errors, and mends allows us to tentatively identify the different people involved in production of these textiles.

It is important to state that textiles from Group B (residential context) and G1 (storage context) represent the entire Cerro de Oro occupation, whereas those from Group A and G2 (both funerary contexts) come from the abandonment of the site. Although this difference may affect the comparison, a detailed analysis of all textiles in Rooms A, B, and G shows that there is marked consistency in textile techniques and traditions, particularly in plain-weave textiles.

Working with the same sample used by Varillas (2016), we identified, when possible, the types of garments or specimens produced with these plain-weave cloths. Table 2 shows the type of specimens found per context, and Figure 4a–c presents a re-creation of how these pieces could have been worn by Cerro de Oro people. As can be seen, only specimens from Group A could be identified in great measure (78%).

Domestic Contexts

Group B: *Residential Context in Room B*. We partially excavated this room and found mainly domestic remains associated with food preparation, storage, discard, and burning. Textiles are relatively scarce

Table 1. Type of Context for Each Sample Group.

Sample Group	Description	Amount
Group B	Domestic context (Room B)	36
Group G1	Storage context (Room G)	77
Group A	Intrusive Funerary context A	61
Group G2	Intrusive Funerary context G2	69
Total		243

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Table 2. Types of Garments per Context.

		Context			
		B	A	G2	G1
Type of Textile	Bags	1	8	0	1
	Miniatures	0	31	0	0
	Clothing Attire	1	3	0	0
	Cloths or Mantles	1	6	0	0
	Unidentified Fragments	33	11	69	76
	Others	0	2	0	1
Total		36	61	69	77

and mainly of low quality. These textile fragments seem to have been part of people's garments or elements used in their daily routines. Although the 1/1 plain weave was the most abundant, we recorded 12 techniques, many of which had individual variations. For example, the more common "Balanced Plain Weave" was found not only in the standard 1/1 format but also in 2×1, 2×2, and, in one case, alternating between 1/1 and 2×1.

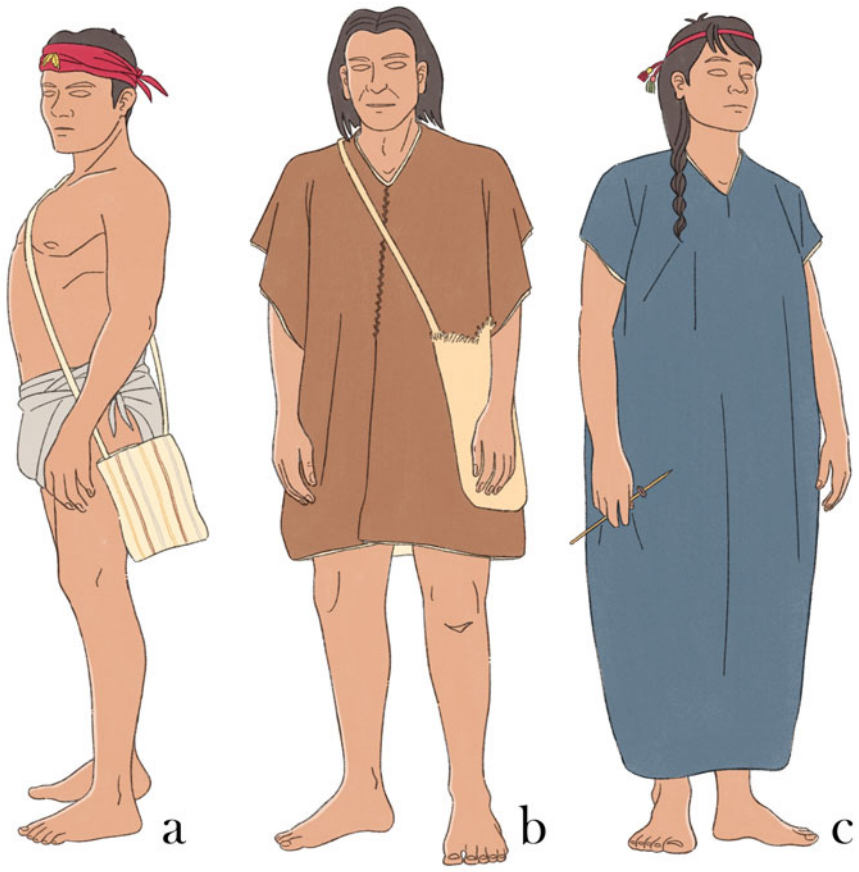

Figure 4. Re-creations of (a) a man wearing a loincloth, headband, and bag; (b) man wearing an *unku* and bag; (c) a woman wearing an *unku* and holding a needle (drawings by Carol Rodriguez Romero).

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Room G: *Storage Area in Room G.* This storage area has six small storage cubicles containing a wide variety of elements such as ceramics, food, shell remains, and other items. During the abandonment process, Cerro de Oro people sealed each cubicle by placing offerings on top and, on two occasions, burning the cubicle's top floor (Fernandini 2015). The Group G1 sample comprises mostly textile fragments and some cords. It presents a mixture of simple low-quality material that is mostly 1/1 plain weaves and other slightly more complex pieces. Most notably, there are three distinct fishing nets. In general, most yarns are 2sS plied, with some recorded exceptions. Ten fragments are done exclusively in Z plied yarns.

Funerary Contexts

Group A: *Intrusive Funerary Context in Room A.* A funerary intrusive chamber located in Room A includes almost 200 objects, most of them textiles exclusively from the funerary context. Although this context presents a rich assemblage of fine textiles (Fernandini 2020; Varillas 2016), we focus only on the plain textiles. Most are placed in small baskets and are grouped by type of garments; other plain textiles include fragments or complete pieces used to dress or wrap the funerary bundle. Within the baskets are groups of miniature *unkus* (garments with a slit in the middle), miniature loincloths, and plain cloth squares. We propose that these baskets were offerings from regular members of the community paying their respects, because the simple nature of the contents within the baskets contrasts with the highly elaborate textiles found elsewhere in the burial.

Group G2: *Intrusive Funerary Context in Room G.* This intrusive funerary chamber intrudes in Room G1, destroying part of the earlier mentioned storage cubicles. Textiles from Room G2 are made predominantly of 2sS plied cotton yarns woven in a 1/1 structure. Some exceptions are the presence of S plied yards in nine fragments, pieces made exclusively with camelid fibers and others made using camelid and cotton fibers, and, most notably, several fragments of tapestry with distinct Wari iconography.

Methods of Analysis

Our methodology is framed within the standard protocols for textile analysis and identification outlined in Emery (1966), with D'Harcourt (1962) and Seiler-Baldinger (1994) as additional sources for technique identification and Hoces de la Guardia (2006) specifically for union and reinforcement techniques present in Andean textiles. It aims to establish a parameter for textile comparison based on uniformity. Our objective is to identify varying levels of skill even with specimens that share the same techniques and fibers. To evaluate the learning process of plain-weave production, we analyze three variables: consistency of yarn thickness, warps per centimeter, and quantification of errors in weaving based on techniques developed by Varillas (2016).

Yarn Thickness Variation

For a specimen to have an aesthetic and uniform look, it requires a yarn that is consistent in diameter throughout the piece. Variation in yarn thickness may imply a less skilled spinner, especially considering that we are identifying this variation in a finished piece. Following this logic, a specimen produced with a non-uniform yarn will necessarily produce a non-uniform cloth; thus, the weaver who chooses this yarn knows this in advance. We argue that consistency in yarn thickness may be related to the skill of the spinner and that a piece made intentionally with a non-uniform yarn may be associated with a weaver who is still learning the craft.

We examined all yarns from the sample using a metal gauge with the following ranges: 0.0239 inch, 0.0299 inch, 0.0359 inch, 0.0478 inch, and 0.0598 inch, which we converted to metric: 0.61 mm, 0.76 mm, 0.91 mm, 1.2 mm, and 1.5 mm. Each specimen was measured in three equidistant sections (two lateral and one central measurement). Using these measurements, we categorized variations in yarn thickness within three categories: high variation (two or more variations in one yarn), medium variation (one variation in one yarn), and low variation (no variation in one yarn). Figure 5a presents examples of each range.

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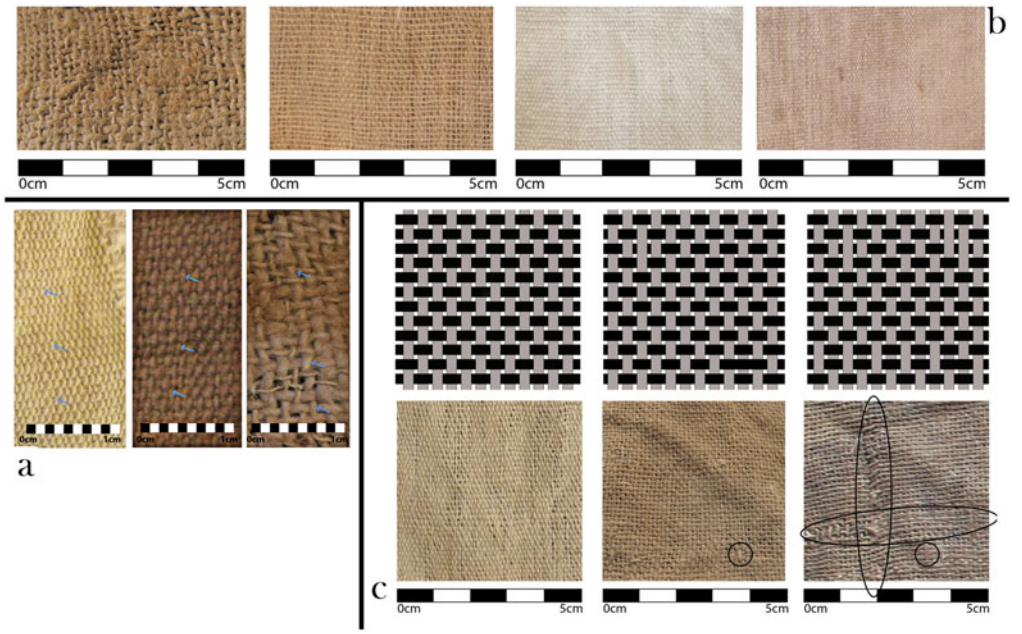

Figure 5. (a) Ranges for yarn thickness variation; from left to right: no variation, two variations, and more than two variations; (b) ranges for raw number of warps per centimeter; from left to right: low, medium, high, and very high warp count; (c) ranges for errors in weaving' from left to right: no error, low frequency, and high frequency of errors.

Warps per Centimeter

We measured the number of warps per centimeter using a yarn counter. Because any handwoven textile will present some variation in the number of yarns per centimeter in different sections, we measured multiple points in each textile: rarely did we see a variation greater than one yarn. We decided to measure warps rather than wefts for two reasons. First, when preparing the loom for weaving, weavers are usually conscious of how many warps they are placing. Wefts, unless they are making a pattern (which is not the case), will be woven until they run the full length of the loom. Second, in the early stages of this work we graphed the wefts as a precaution, and the results were similar enough to those of the warps as to be redundant. In other words, more warps tend to mean more wefts, and graphing either gives similar results.

This analysis is oriented toward an evaluation of strength and durability. A higher number of warps per centimeter allows for a more resistant cloth because the application of any type of stress over the textile is divided among a larger number of fibers. More warps per centimeter also imply a higher cost of production because more raw materials and more time are required to warp the loom for the same length of cloth. We also propose that a textile with a high warp count may have been done by a skilled weaver who would have used more raw materials and invested more time to create a well-made specimen.

To quantify our analysis, we divided the number of warps per centimeters into four ranges: low warp count (12 warps or fewer per centimeter); medium warp count (between 13 and 19 warps per centimeter), high warp count (between 20 and 29 warps per centimeter), and very high warp count (more than 30 warps per centimeter). Figure 5b illustrates examples of these four ranges.

Manufacturing Errors in Weaving

A visual analysis of each textile piece allows for the identification of errors performed during the process of weaving. We define a weaving error as a "break" in the pattern of the fiber structure. For example, if we are analyzing a textile with a 1/1 structure and we detect that one weft goes under two warps on a particular point, we would consider that an error. This, of course, excludes any textiles where this type of action is done intentionally as part of a pattern or decoration. We paid special attention to

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differentiating between manufacturing errors (when the individual fiber can be followed to the end edges of the textile) and modern breakages (where it is clear the individual fibers were broken because of poor preservation).

We would have liked to count the number of errors in whole pieces, but this was not possible given that most textiles in the sample are fragmentary or varied greatly in size. This means that there is no guarantee that an errorless fragment did not belong to a larger textile with many errors, or vice versa. To mitigate this problem, we categorized errors performed during weaving as follows (Figure 5c). "None" refers to cases where no weaving mistakes could be identified. "Low frequency" refers to textiles with a few errors that are distributed sporadically, such as a small accident that is inconspicuous enough to be left in place without greatly affecting the overall look of the final product. "High frequency" refers to textiles in which weaving errors occur throughout the piece. These last cases seem to reflect a systematic carelessness because the weaver's objective was probably to produce the cloth as fast as possible without regard to overall preciseness.

These analytical techniques allow an integrated analysis that focuses on consistency (yarn thickness variation), strength and durability (warps per centimeter), and the overall look (manufacturing errors in weaving). They also enable us to better understand the textile production process as the product of a community, with individual ways of doing, different levels of skill, and weavers of possibly different ages. To complement this approach, we contrast this information with the context where they were found and, when possible, with the type of garment. This approach to textile making provides an integrated view that interrelates the technical with the social aspects of textile making.

Results

Yarn Thickness Variation

After measuring yarn thickness in the sample, we found that 55% of the sample presents consistent yarn thickness, 43% presents one variation of thickness throughout the yarn, and only 2% present two or more variations of thickness (Figure 6a). When we correlate this variable with provenance, we see that proportions of thickness vary within each context. For instance, both funerary contexts (A1 and G2) present a higher percentage of consistent yarns (65% and 70%, respectively). In contrast, the storage context presents an almost equal proportion of "no variation" and "one variation" yarns (49% and 51%, respectively). Finally, the domestic/residential context presents only 19% of yarns with no variation (Figure 6b).

We cross-referenced the variable "yarn thickness variation" with the types of garment present in the sample. Because we could only identify types of garments within Group A, we cross-referenced exclusively textiles in that group. Results from this cross-referencing show that although there is no real correlation between the type of garment and yarn thickness, there seems to be an association between yarn thickness and garment size. Specimens from Group A are a series of miniature garments and cloths, as well as regular-sized ones. Cross-referencing between yarn thickness and the size of the garment shows that regular-sized garments included in the funerary context present mostly yarns with a consistent thickness, whereas miniatures present a higher variation (Figure 6c).

Warps per Centimeter

As mentioned, our methodology allows us to divide our sample into four ranges: very high, high, medium, and low. Figure 7a shows the general distribution of our sample, and Figure 7b shows the distribution of our sample when correlated with provenience or context.

When cross-referencing garment type (from Group A) with the variable "warps per cm," we can see that specimens within the low, medium, and high ranges include several types of garments, such as miniature *unkus*, miniature cloths, miniature bags, sieves, and bags. Only the garments associated with dressing the funerary bundle, such as the false head, a part of a regular sized *unku*, and part of the wrapping cloth, present a warp count within the "very high" range.

Manufacturing Errors in Weaving

After analyzing the entire sample for errors in weaving, we found that 38 of 243 specimens present errors in weaving; that is, 16% of the sample (Figure 8a). When these results were correlated with

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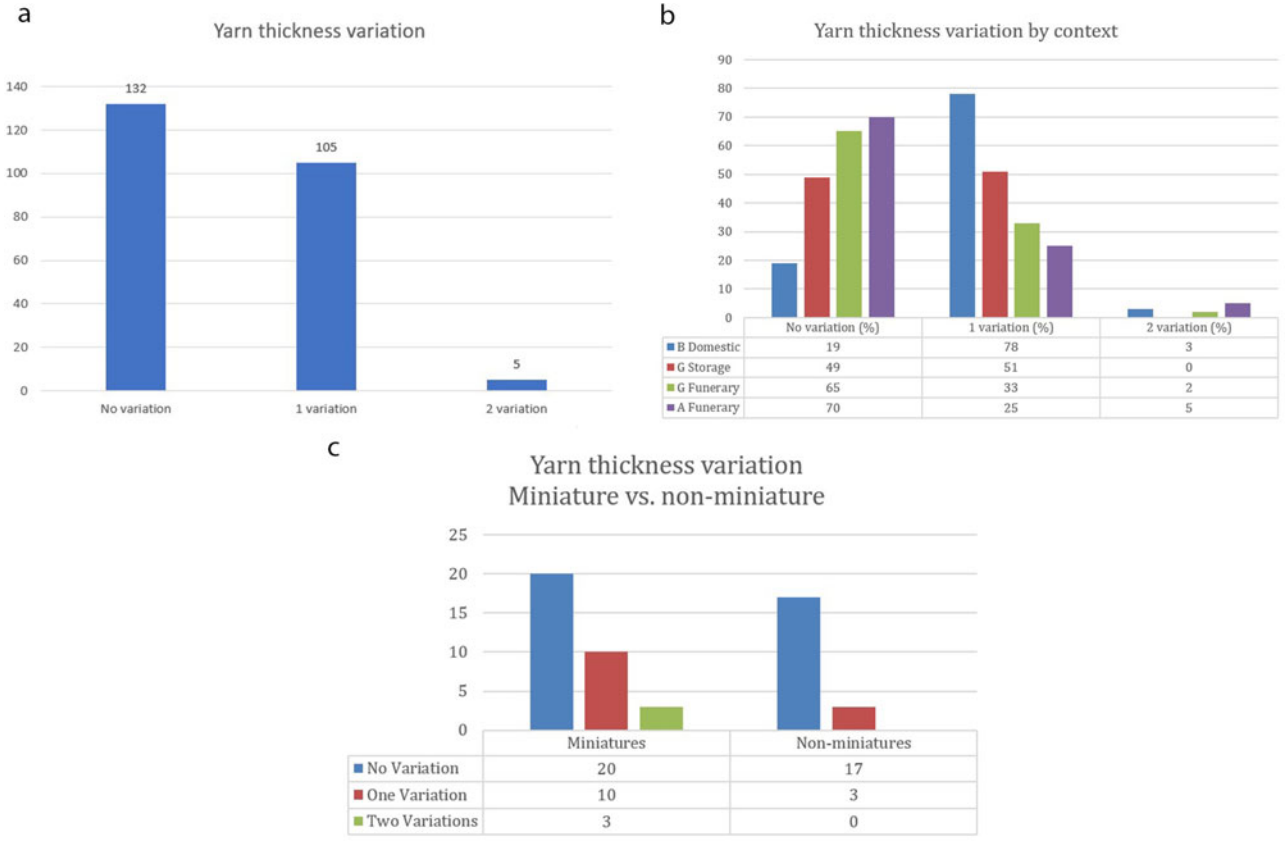
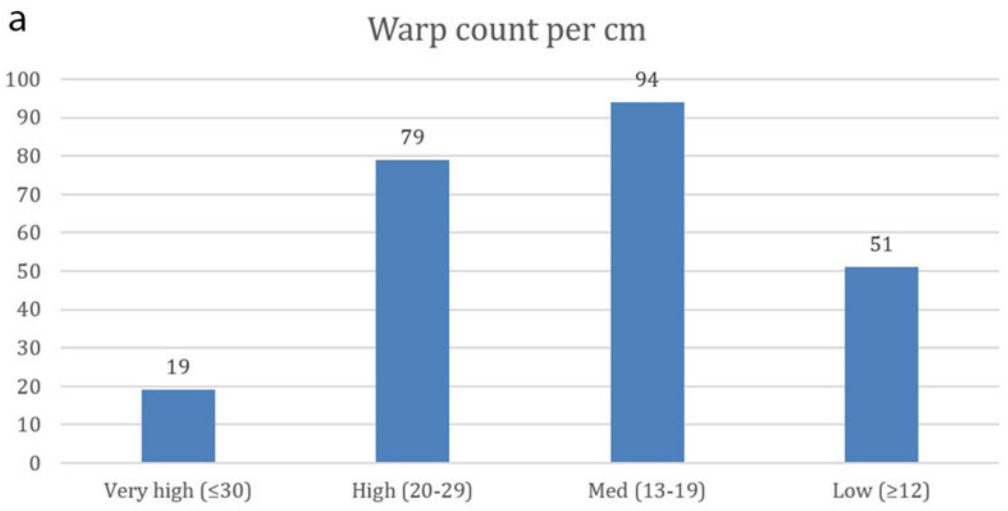
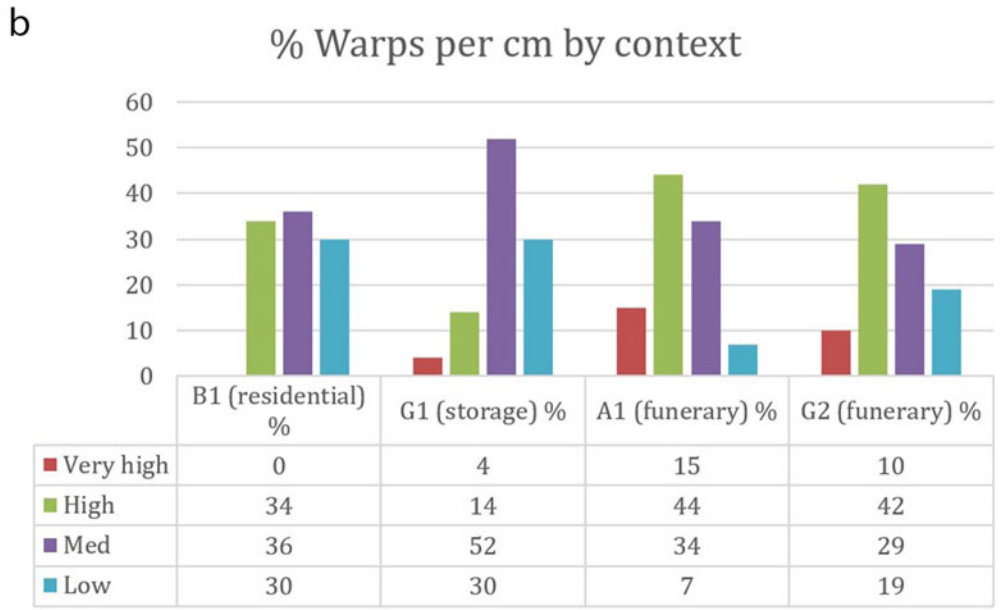


Figure 6. Bar graphs showing yarn thickness variation (a) for the entire sample; (b) by context; and (c) for Group A between miniature and non-miniature items.





	B1 (residential) %	G1 (storage) %	A1 (funerary) %	G2 (funerary) %
Very high	0	4	15	10
High	34	14	44	42
Med	36	52	34	29
Low	30	30	7	19

Figure 7. Bar graphs showing number of warps per centimeter (a) for the entire sample and (b) by context.

their contexts of provenience, the subsamples from the funerary contexts (A and G2) only have two specimens with a low error count each: 2% for Group A and 3% for Group G2. In contrast, in Group B, the residential context, 18 (50%) of its specimens have weaving errors, whereas subsample G presents 16 specimens with errors (21% within subsample B; Figure 8b).

When we cross-reference "errors in weaving" with types of garments, we did not find any correlation, mainly because the Group A sample only presents two specimens with a low frequency of errors.

Variables Considered Together

We integrated these variables in different combinations to explore them more thoroughly. First, we analyzed in tandem the co-presence of variation in yarn thickness and the density of warps per centimeter. We checked for coincidences between the three values established for "yarn thickness

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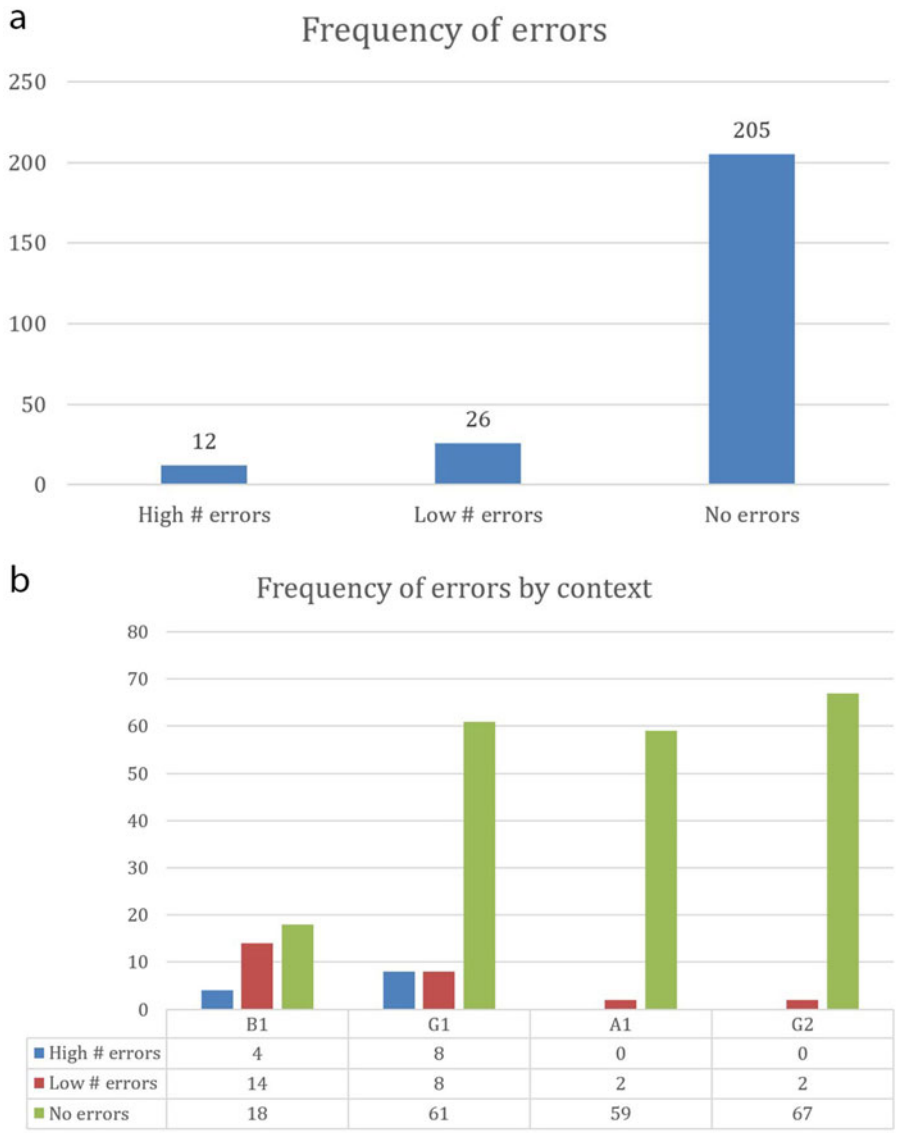

Figure 8. Bar graphs showing frequency of errors (a) for the entire sample and (b) by context.

variation" (no variation, one variation, and two variations) and the four ranges established for "warps per centimeter" (low number, medium number, high number, and very high number); in the latter variable, we fused high and very high into one range for comparison purposes (Figure 9a). We identified that yarns with no variation coincide 70 times with specimens with high or very high counts of warps per centimeter, yarns with only one variation coincide 49 times with specimens within the medium range, and only two specimens present both low warp per centimeter count and two variations in yarn thickness. These results show there is a strong correlation between these variables, particularly between pieces that present high and very high warp counts and yarn consistency.

We also ran this analysis taking into consideration the provenience of the specimens. The results show that those within the funerary contexts have a higher correlation between "warps per cm" and "yarn thickness variation" than those in residential and storage contexts (Figure 9b).

In terms of the correlation between warps per centimeter and the presence of weaving errors, we observed that weaving errors are randomly distributed among the four ranges defined for "warps

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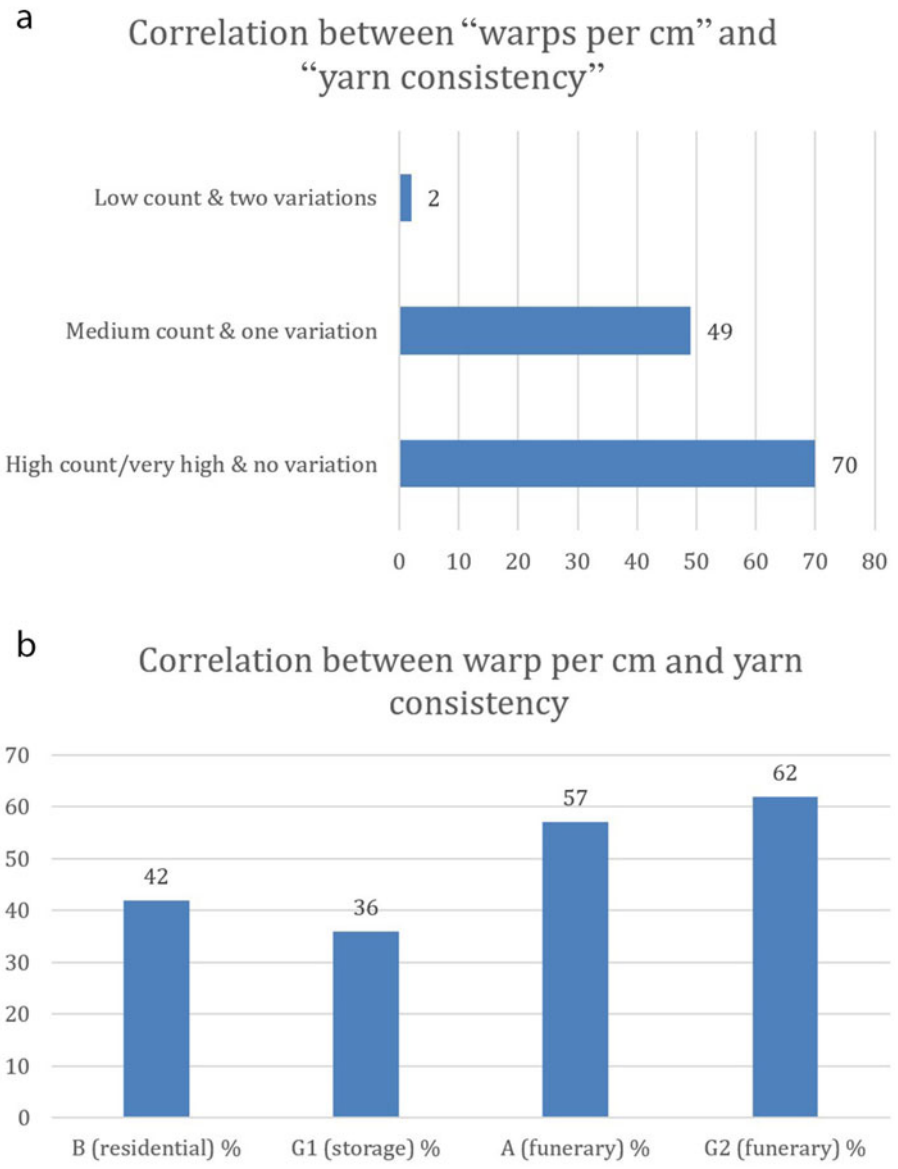

Figure 9. Graph showing correlation between "variables warps" per cm and "yarn consistency" (a) for the entire sample and (b) by context.

per cm" both in Groups B and G1. We did not include Groups A and G2 because they have minimal errors. Moreover, integrating the three variables does not yield a clear relationship between them.

Discussion

Textile production at Cerro de Oro was done within residential areas (Fernandini 2020; Varillas 2016). Excavations in these areas reveal hundreds of elements associated with textile production such as looms, needles, combs, spades, spindle whorls, cotton and camelid fibers, yarn, and remains of dyes, as well as unfinished textiles, some still inserted within the loom. Raw materials were obtained locally. Cerro de Oro people planted cotton in the plains surrounding the settlement, and excavations show that camelids were raised in corrals close to residential areas (Fernandini 2020; González Gómez de Agüero 2023). Moreover, several spindle whorls were recorded in residential areas, showing that spinning was an activity performed by community members. Evidence for weaving has been found

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both in refuse and cultural floors, as well as within funerary contexts. This evidence shows that weaving was performed using waist looms (Varillas 2016) that were tied to posts located in communal spaces within residential areas.

Based on this evidence we can deduce that the textiles selected for this study were mainly produced within or near the residential areas where they were found. Although non-plain-weave textiles within the areas of study may have been imports, the homogeneity in technique, twist, and materials leads us to propose that the plain-weave cloth selected for this study was produced by a cohesive group, possibly living within the same residential area or sector.

Our main objective was to characterize the production of plain-weave textiles found in Cerro de Oro, exploring how the process integrated spinners and weavers with different skill levels. To do so we focused on the most common and quotidian textile found in Cerro de Oro: plain weaves, made out of undyed cotton spun in Z(2s), woven in a 1/1 plain structure, balanced and predominantly of warp face with no added embellishment or decorations. Our homogeneous sample comprised 243 plain-weave textiles of a universe of 465 textile specimens.

These items were produced by a cohesive group, such as a community. Because the sample presents the same technical characteristics and raw materials, variations in the way these techniques were performed show that different manufacturers had different skill levels and included children and youth. Evidence for textile production within communities comes from several ethnographic accounts; Arnold and Espejo (2013) publish examples from traditional communities in Oruro and Cochabamba, Bolivia, where spinning and weaving are taught from a young age to children, particularly girls, increasing in complexity as they grow up. Fernandez (2007) studied the community of San Ignacio in La Libertad (Peru), showing that traditional textile production is still performed in domestic contexts. In these examples, younger members are given simpler tasks, usually involving coarser or thicker threads, such as producing small items or low-quality cloths (Arnold and Espejo 2013). Moreover, these ethnographic accounts show that textile production plays an important role in community relations and cohesiveness.

Identifying the level of skill of a textile manufacturer cannot be achieved through a straightforward analysis but can be hinted at through the combination of different analyses. To assess the level of skill of the spinner we focused on consistency in yarn thickness, assuming that an experienced spinner would produce yarns with less variation in thickness. Moreover, the presence of yarn variation in a finished piece also implies that the weaver knew that the end product was not going to be uniform. This assumption is confirmed by the expert opinion of María Condori (personal communication 2022), from the Vinchos community in Ayacucho (Peru), who told us that children or young people learning to spin sometimes produced irregular threads, which were used to produce low-quality garments.

We also used the variable "warps per centimeter." A larger number of warps lowers the probability of breakage and wear because each individual fiber receives less stress, resulting in a more resistant cloth (Varillas 2016). Specimens with a large number of warps require a longer production time and more fiber/yarns. We propose that if the producer were going to invest large amounts of raw material and time in producing a resistant and strong textile, then this task would probably be performed by an experienced weaver. Finally, the presence of "errors in weaving" also reflects the skill level because experienced weavers would make few errors and, if they did make them, would probably know how to correct them.

We acknowledge that each of these variables may be subject to diverse interpretations and by themselves do not allow us to precisely identify a spinner's skill level. Nevertheless, by cross-referencing these variables and including characteristics such as provenience and, when possible, the type of garment the specimen belonged to, we can approach our objectives of identifying different skill levels. Given the sample's consistency in technique and overall characteristics, the specimens seem to have been produced by one group or community. In terms of spinning skills, most of the sample have either one (43%) or no variation (54%) in yarn thickness; only 3% present two variations. Thus, spinners seem to have had a good grasp of the activity. When these results are contrasted with their contexts of provenance, we can clearly see that funerary contexts accumulate a much higher percentage of

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yarns with no variation (A: 65%; G2: 70%). For the domestic contexts, we see that the storage context presents 49% of yarns with no variation, and the residential context presents 19% yarns with no thickness variation. These results show that it is possible that low-skilled spinners were selected to produce yarns for everyday garments or utensils such as the ones found in residential contexts. In contrast, skilled spinners produced pieces to be included either for funerary contexts, whereas less skilled spinners worked on pieces intended for storage.

These results were further confirmed when we contrasted them with the different types of garments identified in Group A. This analysis showed that whereas miniature or utilitarian elements were made with yarns with no or one variation, the garments involved in "dressing" the funerary bundle present only yarns with no variations. This contrast is interesting if we consider that miniatures and utilitarian elements seem to have been offerings made by the community as a whole and presented in baskets within the funerary chamber (A), whereas the elements dressing the bundle (these and other, more elaborate pieces not included in the analysis) present only high standards of uniformity.

Analysis of "warps per centimeter" shows a relatively even distribution of cloths within the high (39%), medium (33%), and low (21%) ranges, with only 8% in the very high range. When we contrasted these results with their provenience, we observed that specimens found in the residential context (B) are in the high (34%), medium (36%), and low (39%) ranges. The storage context (G1) presents specimens in all ranges, including the very high range, although most of its specimens are within the medium range (52%). Funerary contexts A and G2 present most of its specimens within the high range (44% and 42%, respectively). When this variable was cross-referenced with the types of specimens (only Group A) we found that miniature and utilitarian elements are present in every range, whereas pieces intended for dressing the bundle are only present in the very high range. Finally, our analysis of "errors during weaving" showed that 16% of the sample present errors during weaving: 90% of these errors are found within the domestic contexts, 47% in the residential, and 43% in the storage contexts. Cross-referencing with the type of garment was not possible because of the low number of specimens with errors in Group A.

When integrating these three variables, we found a high correlation between consistent yarn thickness and high and very high counts of warps per centimeter. When we ran these variables by their contexts of provenance, we saw similar results. For the relation between yarn thickness and the presence of weaving errors, we focused exclusively on Groups B and G1, because they presented 90% of the errors recorded. There does not seem to be a connection between inconsistent thickness in yarns and errors in weaving; however, the absence of errors does coincide with consistent yarn thickness. In other words, when manufacturers were trying to make a piece that would be included as a funerary offering, such as miniatures or pieces intended for dressing a funerary bundle, they made sure they used consistent yarns and did not make mistakes in weaving. In contrast, when manufacturers were making everyday garments, they did not pay special attention to yarn thickness. Additionally, there does not seem to be any correlation between the presence of weaving errors and the number of warps per centimeter nor when the three variables are integrated.

From these results we interpret that plain-weave textiles were ubiquitous in different types of contexts, from residential to storage to funerary. When textiles were intended for everyday activities, the spinners do not seem to have played special attention to yarn consistency, strength, nor mending errors. The wide variety of ranges shown in all three variables, especially in domestic contexts, shows that all members of the community—including skilled and unskilled spinners and weavers—were involved in the process. In contrast, the high level of quality present in specimens in funerary contexts show that mostly skilled workers were in charge of making these pieces. In Group A, miniatures and utilitarian offerings presented a high to medium quality, leading us to propose that skilled members of the community were in charge of making these offerings. However, pieces intended for dressing the bundle presented a very high quality, strength, and consistency. These pieces seem to have been made by highly skilled manufacturers, who paid special attention to yarn selection, invested large amounts of raw materials, and did not make mistakes when weaving.

These results also enable us to solve a long-standing conundrum regarding the presence of high-skilled manufacturers in Cerro de Oro. Given the elaborate pieces in funerary contexts, such as four-

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pointed hats or a tie-dye mantle, we had assumed that these highly decorated pieces were imports. Nevertheless, because high- and low-quality plain weaves shared the same technical characteristics and only differed in the level of skill of the manufacturer, we propose that Cerro de Oro did have very high skilled manufacturers, possibly specialists, who could have made both the high-quality plain weaves and the highly elaborated mantles, *unkus*, and other complex elements included in dressing the bundle in the funerary chamber in Room A.

Our sample presents manufacturers from at least three levels of skill: people in the process of learning to spin and weave, consolidated spinners and weavers, and specialized, highly skilled manufacturers. Those individuals with a low level of skill spun irregular yarns, made some errors during weaving, and used a low to medium number of warps per centimeter. This group could have been made up of children, youth, or adults who were learning to spin and weave. The specimens they produced were usually found as part of used or discarded elements within a residential context and in lesser amounts within the storage context. The second skill level is characterized by the production of well-made specimens that tend to present little variation in yarn thickness, few errors, and a medium to high number of warps per centimeter. This group could have been adults who were largely involved in the process of textile making, although this task was probably performed alongside other productive tasks that could have included agriculture, ceramic production, tending to animals, childcare, and cooking, among other daily tasks. Finally, there is a third level of skill. People at this level produced high-quality specimens that contain yarns with no variation, present no errors in weaving, and show a large investment of time and raw materials, as reflected in the high number of warps per centimeter. We propose specimens from this third level could have been produced by highly skilled manufacturers who possibly specialized exclusively or almost exclusively in manufacturing textiles. Of course, these were not really bounded groups, and people who produced specimens from the third group could have produced pieces categorized in the second group. Yet these categories allow us to think of the process of textile production as an endeavor that included all or most of the community, with some people learning, others doing textile work as part of other daily tasks, and a possible group of specialists only producing the highest quality of textiles intended for important contexts and people.

Conclusions

This study focuses on plain textiles from different contexts in the prehispanic settlement of Cerro de Oro. Although Andean textiles have been widely studied and still represent an integral part of traditional communities in different areas of modern Peru and Bolivia, emphasis is usually placed on finer fabrics (Ángeles 2000; Bergh 2012; Conklin 1971; Frame 1994; Young-Sanchez 2010; among others). The focus is on the variety of decorations used, the use of mineral and natural pigments, or the delicacy of the fibers and the intricacy of techniques. It is typically the exceptional textiles that are considered heritage emblems. Attention paid to the grandiosity of textiles has led to important advances in textile analysis, but it has relegated the analysis of plain-weave textiles to simple, generic descriptions. This article proposes that a focus on quotidian textiles found in different contexts brings us closer to less-explored areas of textile production and use. Given the pervasiveness of these elements, we used plain-weave textiles to assess the process of textile production and use within Cerro de Oro and to make a tentative identification of manufacturers with different skill levels.

In general, this study presents textile production as a task that goes beyond the mechanics of its manufacture. Through a focus on the most common cloths recorded at Cerro de Oro, we used a methodology that interrelates quantitative and qualitative aspects of textile production, with the objective of delineating textile manufacturing as a social and technical process that includes all members of the community, from learners to highly specialized manufacturers, thus allowing us to peek into the daily lives of Cerro de Oro people.

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Data Availability Statement. All analysis presented here was conducted using textiles obtained from excavations at the archaeological site of Cerro de Oro, under the direction of the first author. These textiles are currently stored at the Museo de Sitio de Pachacamac (Peru).

Competing Interests. The authors declare none.

References Cited

Ángeles, Rommel. 2000. Textiles del Horizonte Medio: Las evidencias de huaca Malena, Valle de Asia. *Boletín de Arqueología PUCP* 4:401–424.

Arnold, Denise Y. 2000. "Convertirse en persona" el tejido: La terminología aymara de un cuerpo textil. In *Actas de la I Jornada Internacional sobre Textiles Precolombinos*, edited by Victòria Solanilla Demestre, pp. 9–28. Universitat Autònoma de Barcelona, Departament d'Art, Barcelona.

Arnold, Denise Y., and Elvira Espejo. 2013. *El textil tridimensional: la naturaleza del tejido como objeto y como sujeto*. Fundación Albó, La Paz.

Arnold, Denise Y., and Elvira Espejo. 2019. *Ciencia de tejer en los Andes: Estructuras y técnicas de faz de urdimbre*. Instituto de Lengua y Cultura Aymara, La Paz.

Baitzel, Sarah, and Paul Goldstein. 2014. More than the Sum of Its Parts: Dress and Social Identity in a Provincial Tiwanaku Child Burial. *Journal of Anthropological Archaeology* 35:51–62.

Baitzel, Sarah, and Paul Goldstein. 2018. From Whorl to Cloth: An Analysis of Textile Production in the Tiwanaku Provinces. *Journal of Anthropological Archaeology* 49:173–183.

Bergh, Susan. 2012. *Wari, Lords of the Ancient Andes*. Cleveland Museum of Art, Cleveland, Ohio.

Bird, Junius. 1968. Handspun Yarn Production Rates in the Cuzco Region of Peru. *Textile Museum Journal* 7(3):9–16.

Bird, Junius, and Louisa Bellinger. 1954. *Paracas Fabrics and Nazca Needlework: 3rd Century B.C.–3rd Century A.D*. National Publishing Company, Washington, DC.

Bolin, Inge. 2006. *Growing Up in a Culture of Respect: Child Rearing in Highland Peru*. University of Texas Press, Austin.

Bourdieu, Pierre. 1977. *Outline of a Theory of Practice*. Translated by Richard Nice. Cambridge University Press, Cambridge.

Carrión, Rebeca. 1931. La indumentaria en la antigua cultura de Paracas. *Wira Kocha* 1(1):37–86.

Chuchón, Hilda. 2014. *Informe de Análisis Textil del Proyecto Arqueológico Cerro de Oro, Temporada 2013*. Internal report, Proyecto Arqueológico Cerro de Oro.

Cobo, Bernabé. 1964 [1653]. *Obras del P. Bernabé Cobo de la Compañía de Jesús*. Ediciones Atlas, Madrid.

Conklin, William. 1971. Chavin Textiles and the Origin of the Peruvian Weaving. *Textile Museum Journal* 3(2):13–19.

Conlee, Christina. 2016. *Beyond the Nasca Lines: Ancient Life at La Tiza in the Peruvian Desert*. University Press of Florida, Gainesville.

De la Puente, Gabriela. 2018. Los vivos y los muertos en Cerro de Oro: Un estudio de las prácticas funerarias en los espacios residenciales durante su primer periodo de ocupación (500–850 d.C.). Bachelor's thesis, Facultad de Letras y Ciencias Humanas, Pontificia Universidad Católica del Perú, Lima.

D'Harcourt, Raoul. 1962. *Textiles of Ancient Peru and their Techniques*. 3rd ed. Dover, New York.

Emery, Irene. 1966. *The Primary Structures of Fabrics: An Illustrated Classification*. Thames and Hudson, New York.

Fernández, Arabel. 2007. El anaku, la lliclla y las fajas sara y pata: Supervivencias Inca en la comunidad de San Ignacio de Loyola, Sinsicap–Otuzco. In *La Trama y la urdimbre: Textiles tradicionales del Perú*, edited by Editorial Ricardo Palma and ICPNA, pp. 149–158. Editorial Universidad Ricardo Palma, Lima.

Fernandini, Francesca. 2015. Beyond the Empire: Living in Cerro de Oro. PhD dissertation, Department of Anthropology, Stanford University, Stanford, California.

Fernandini, Francesca. 2020. Identidades heterogéneas: Construyendo una persona funeraria en Cerro de Oro. In *Los desafíos del tiempo, el espacio y la memoria: Ensayos en homenaje a Peter Kaulicke*, edited by Rafael Vega-Centeno and Jalh Dulanto, pp. 127–154. Fondo Editorial PUCP, Lima.

Frame, Mary. 1994. Las imágenes visuales de estructuras textiles en el arte del antiguo Perú. *Revista Andina* 12(2):295–372.

Franquemont, Edward, Christine Franquemont, and Billie Isbell. 1992. Awaq ñawin: El ojo del tejedor. La práctica de la cultura en el tejido. *Revista Andina* 10(1):47–80.

González Gómez de Agüero, Adrián. 2023. Agricultural Intensification at Cerro de Oro (Cañete Valley, Peru): Exploring the Use of Fertilizers through Stable Isotope Analysis. Master's thesis, Trent University, Peterborough, Ontario, Canada.

Guamán Poma de Ayala, Felipe. 2001 [1615]. *Nueva corónica y buen gobierno*. Biblioteca Real de Dinamarca, Copenhagen.

Hendon, Julia. 2006. Textile Production as Craft in Mesoamerica: Time, Labor and Knowledge. *Journal of Social Archaeology* 6(3):354–378.

Hoces de la Guardia, María Soledad. 2006. *Manual de técnicas textiles andinas: Terminaciones*. Museo Chileno de Arte Precolombino, Santiago.

Jiménez, María Jesús. 2006. Introduction. In *Weaving for the Afterlife: Peruvian Textiles from the Maiman Collection,* Vol. 1, edited by Krzysztof Makowski, Alfredo Rosenzweig, and María Jesús Jiménez Díaz, pp. 27–38. AMPAL/MERHAV, Mexico City.

https://doi.org/10.1017/laq.2023.4 Published online by Cambridge University Press

Lechtman, Heather. 1996. Cloth and Metal: The Culture of Technology. In *Andean Art at Dumbarton Oaks,* Vol. 1, edited by Elizabeth Hill Boone, pp. 33–43. Dumbarton Oaks, Washington, DC.

Lemonnier, Pierre. 1992. *Elements for an Anthropology of Technology*. Anthropological Papers Series Vol. 88. University of Michigan Museum of Anthropological Archaeology, Ann Arbor.

Murra, John. 1978. *La organización económica del estado inca*. Siglo XXI, Mexico City.

Polo de Ondegardo, Juan. 1940 [1561]. *Informe al licenciado Briviesca de Muñatones sobre la perpetuidad de las encomiendas del Perú*. Revista Histórica, Lima.

Roddick, Andrew, and Ann Stahl (editors). 2016. *Knowledge in Motion: Constellations of Learning across Time and Place*. University of Arizona Press, Tucson.

Rostworowski, María. 1983. *Estructuras andinas del poder: Ideología religiosa y política*. Instituto de Estudios Andinos, Lima.

Rowe, Ann, and John Cohen. 2002. *Hidden Yarns of Peru: Q'ero Textiles*. Textile Museum, Washington, DC.

Seiler-Baldinger, Annemarie. 1994. *Textiles: A Classification of Techniques*. Smithsonian Institution, Washington, DC.

Siveroni, Viviana, and Anne Tiballi. 2016. La producción doméstica de textiles en la ocupación prehispánica tardía de la región de Nasca (costa sur del Perú): Una mirada desde Huayuri, Palpa. *Nuevo Mundo Mundos Nuevos* Colloques 2016. https://doi.org/10.4000/nuevomundo.69901.

Splitstoser, Jeffrey. 2009. Weaving the Structure of the Cosmos: Cloth, Agency, and Worldview at Cerrillos, an Early Paracas Site in the Ica Valley, Peru. PhD dissertation, Department of Anthropology, Catholic University of America, Washington, DC.

Tiballi, Anne. 2010. Imperial Subjectivities: The Archaeological Materials from the Cemetery of the Sacrificed Women, Pachacamac, Peru. PhD dissertation, Department of Anthropology, Binghamton University, State University of New York, Binghamton.

Varillas, Rosa María. 2016. Los textiles de Cerro de Oro: Un análisis técnico y una propuesta para la interpretación de tejidos llanos. Bachelor's thesis, Facultad de Letras y Ciencias Humanas, Pontificia Universidad Católica del Perú, Lima.

Wallace, Dwight. 1979. The Process of Weaving Development on the Peruvian Coast. In *The Junius B. Bird Pre-Columbian Textile Conference*, edited by Ann Rowe, Elizabeth Benson, and Anne-Louise Schaffer, pp. 27–50. Textile Museum and Dumbarton Oaks, Washington, DC.

Young-Sánchez, Margaret. 2010. Los unkus de los señores del sur: Huari y Tiahuanaco. In *Señores de los imperios del Sol*, edited by Krzysztof Makowski, pp. 225–237. Banco de Crédito del Perú, Lima.

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