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## **The Order of Things in Ancient Peru Visual Metaphors in Wari-Associated DWW Textiles**

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Two very different types of high status ritual textiles were produced with the use of the discontinuous warp and weft (hereafter DWW) technique during the Wari sojourn on the coast of Peru (ca. 600-800 C.E.): complex tie dyes, in which case the undyed cloth was woven in a DWW-based technique, and cloth woven in multiple techniques, wherein DWW is one of several weaves in a single textile.<sup>1</sup> In all probability, both types of ritual cloth were created on the coast of Peru for use by the highland Wari culture and/or their coastal representatives.<sup>2</sup> In the following paper, I will compare various technical and formal elements of these textiles in pursuit of Wari attitudes to their coastal neighbors. Such analyses add to the ongoing debate about Wari-coastal relations, traditionally based on ceramic distribution and architectural remains.<sup>3</sup>

The tie dyes, such as the mantle in the Museo Amano in Lima (Fig. 1), appear to promote the Wari as orchestrators of a harmonious, if complex, cosmic balance and integration. Often referred to as Nasca-Wari in collections, they are usually associated with the Wari presence on the South Coast. Fragments of these fabrics, however, have been found as well in graves along the Central Coast, and as far north as the Chicama Valley on the North Coast.<sup>4</sup> The Museo Amano mantle was reportedly found at the South Coast site of Santa Cruz in the Nazca Valley (Tsunoyama 1979: 202-203). In contrast, the tunic (Fig. 4) and similar compositions with multiple techniques and hierarchically-arranged figurative imagery speak, at least initially, of cultural separation. The techniques represented here are plain weave, slit tapestry, DWW, and slit tapestry and openwork (see Emery 1994: 88). Such textiles have been found in burials on the Central Coast of Peru and as far north as the Huarmey Valley, but not on the South Coast (see Menzel 1977 and Prümers 1990). This tunic in the Phoebe Apperson Hearst Museum at Berkeley was excavated by Max Uhle at the Central Coast site of Chimu Capac in the Supe Valley (Menzel 1977: 36).

The DWW technique shared by these two types of textiles has, as its name implies, a most unusual quality; neither warps nor wefts travel the entire length or width of the cloth. The result of their interaction, however, is plain weave with the warps typically outnumbering the wefts. What makes this technique special, and hence potentially evocative, is that both warps and wefts participate in the creation of color and pattern (Fig. 6).<sup>5</sup> Since both are equally exposed, their color is usually the same in a given color area, as is their material, all camelid or all cotton.<sup>6</sup> In lieu of the load-bearing warps of tapestry, the weavers of DWW cloth employed temporary scaffold wefts, an interesting inversion of the tapestry technique,<sup>7</sup> or, if the pattern area was very small, threads might be inserted with a

needle,<sup>8</sup> such as the 3/8 in. (1 cm.) eyes of the felines. The joins between different color areas are the same as those in tapestry (see Emery 1996: 19-81, 90); the choice of join appears to have been specific to certain regions at certain times based on my examination of over 250 DWW textiles. Here, they are a combination of single interlocking and dovetailing (interlocking around a common warp) in the wefts and single interlocking in the warps.

Complex tie dyes of the Wari era represent a special category of DWW-related textiles. Camelid fiber, probably undyed, was initially woven into strips of plain weave cloth with side selvages or slit junctures in the weft direction and dovetail joins around removable scaffold wefts in the warp direction. In the Museo Amano mantle, which measures 79 x 44 3/4 in., the strips were composed of rectangular modules created by two stepped right triangles. The woven strips were then resist dyed. Based on the patterns created on this textile, 5 fabric strips were tie dyed.<sup>9</sup> After dyeing, and over-dyeing in some cases, the strips were taken apart and reassembled into pre-planned, striking patterns with sometimes contrasting, sometimes similar color in adjacent pieces. To hold the pieces in place, scaffold wefts were reinserted through the warp dovetails, and the side selvages and slits were sewn together.

The entire process of creation in the DWW technique, whether on a backstrap loom or in some cases on a horizontal staked loom, was very time-consuming, perhaps more so than any other technique in ancient Peru.<sup>10</sup> Such a labor of love, or conspicuous devotion and sacrifice, seems to have been an advantage to the minds of ancient Andeans, since there are so many instances of technical over-elaboration (see Stone-Miller 1992a: *passim*). What was valued appears to have been the amount of creative, animating energy transmitted to the finished textile. In fact, it could be said that the efficacy of a textile was directly proportional to the quantity and quality of interaction between weaver and fiber.

On a purely practical level, cloth woven in the DWW technique is typically flexible and relatively light weight, and hence is well-suited to the arid South Coast, where it first developed sometime around the 3rd century B.C.E.<sup>11</sup> The visual impact of sun and desert sand, which tend to bleach out color, was probably another practical reason for developing the technique, which can create rich, intense color with the use of dyed camelid fiber. However, since polychromy was not always sought in the production of DWW fabrics (sometimes a drab, almost monochromatic palette of browns, greys, and whites was selected),<sup>12</sup> the actual structure of DWW must have been charged with expressive meaning all its own.

Indeed, it is in the reciprocal sharing of responsibility for pattern and color by the warps and wefts of this technique that I believe is embedded a most important pair of ancient Andean principles; balance and reciprocity. These principles were necessitated by the extremes of the Peruvian landscape and climatic inversions in the form of El Niño and La Niña floods and droughts. In

the ancient Andean world, a harmonic balance on and between all levels of existence and reciprocity, a give and take relationship between humans and humans and the natural environment, were actively pursued and promoted through rituals.<sup>13</sup> Given the high esteem of textiles in ancient Peru, their role in such ritual contexts must have been active, fully participatory, and not passive.<sup>14</sup>

When the Wari descended to the coast from the highlands of southern Peru at about the beginning of the 7th century, it may have been in response to a 30-year period of floods and droughts.<sup>15</sup> If so, these phenomena may have been interpreted as an imbalance in the cosmos that could be righted only with the appropriate rituals performed in and beyond the Wari heartland. In any event, the Wari seized the moment and appeared on the coast with new or revamped religious beliefs and rituals which apparently required highland-lowland unity. This unity was manifested in the socio-political form of either a state or perhaps a federation,<sup>16</sup> and in the establishment of a sacred pilgrimage site at Pachacamac on the Central Coast. I contend that the costumes of the ritualists were a major vehicle for communicating and participating in this cosmology, as much as the integrating rituals themselves.

Wari costumes were typically composed of exceptionally fine tapestries, which have also been found in South and Central coastal graves, or the complex tie dyes. Facial paint, head gear, and other ritual paraphernalia were also *de rigueur* based on extant ceramic figures shown wearing tapestry or tie-dye garments (Figs. 3a and 3b). The tapestries of the Wari were their native costume.

For the production of the complex tie dyes, the Wari apparently co-opted and expanded upon the DWW technique, which had been until that time primarily a coastal technology.<sup>17</sup> To communicate their cosmic vision to a wider audience on the South Coast, the Wari over time also adopted geometric abstraction and South Coast color sensibilities.<sup>18</sup> The means by which the Wari symbolically and perhaps actually incorporated the southern lowlands into this grand plan for cosmic rebalance may well have been through the production of the tie dyes. Balance and reciprocity, expressed by the structure of the DWW technique and wed to other South Coast textile features, was communicated through both the process of their fabrication and the final compositions. Costumed in these tie dyes the Wari and their coastal representatives literally placed themselves, it would seem, at the center of the cosmic imbalance in the role of mediators in ritual. It is possible that the tie dyes actually became a model for, as well as a recognized generator of, what was desired: a return to cosmic harmony, by virtue of their multi-color, multi-shape components.

These components build one upon another from the stepped triangles, to rectangles composed of complementary, reciprocating pairs of stepped triangles, to cruciforms superimposed on rectangles, to the largest pattern created here, cruciforms on rectangles set within even greater rectangles. Although punctuated by animating rhythmic color

and linear patterns, an overall harmonious balance is nonetheless expressed, in part a product of those hard-edged building blocks composed of right angles.<sup>19</sup> The regularity with which each piece of cloth has been marked with resist-produced diamond shapes and parallel lines, and which is sustained in the union of pieces in the final composition, also contributes to the sense of control and order exuded by this textile. A secondary rhythm of animating diagonals, however, is created by the projecting warm colors of the red and golden yellow ground pieces, reproduced as light and medium grey in the illustrations (Figs. 1 and 2). The dark grey to black stepped triangles are the recessive cool colors of dark blue, blue-purple black, and green. Each row of these diagonals is a different con-figuration, which further energizes the composition, as do pattern deviations in some rows (for example, the second row from the left in Fig. 1). Even so, the mood and feeling projected by this textile remains one of balance, albeit complicated and full of life.

Other contemporaneous textiles speak less obviously of balance and integration through the juxtaposition of distinct techniques and hierarchically-arranged figurative imagery. One example is the Wari-associated ritual tunic at Berkeley, which was excavated at a fortified Wari outpost on the Central Coast known today as Chimu Capac (Menzel 1977: 29). Certain features, such as shape (it measures 36 x 50 1/2 in.), variety of weaving structures, and cotton and camelid fibers, are shared with other tunics of this region. The color complexity and iconography on this tunic, however, are quite unique and together suggest that the wearer, who was actually buried in a temple platform at the site,<sup>20</sup> was a particularly high-status individual. As was true of the tie dyes, certain components of this tunic suggest non-Wari features, including some shared by the Central and North coast cultures, such as the proportions of the garment and its sleeves. Many of the choices, however, suggest specifically North Coast aesthetics, including the use of relatively naturalistic figurative imagery, the horizontal registers, the rusty red overall ground, and paired warps in the plain weave section (these continue down into the slit tapestry).<sup>21</sup> In addition, woven in slit tapestry in the lowest register is a series of so-called moon animals, a North Coast mythological being (Menzel 1977: 34, 37; Benson 1985; Berrin 1997: 93, 102-103).

Nevertheless, the Wari components dominate, especially the diagnostic kneeling or running figures carrying staffs. These are actually larger than the felines and moon animals and occupy a superior position to them in the highest register. An emblematic feature of Wari tapestries, the staff-bearing figures ultimately refer back to imagery carved on *The Gate of the Sun*, a sacred portal at the highland center of Tiwanaku (fig. 7).<sup>22</sup> The felines in the DWW panel, although a pan-ancient Andean symbol with celestial associations,<sup>23</sup> are nevertheless also suggestive of the Wari aesthetic in their geometry. The color complexity in each section of the textile is also a Wari component, including a blue-green anomaly in the back foot of one of the winged beings (Stone-Miller

2000, personal communication),<sup>24</sup> as is the tunic's overall technical refinement.<sup>25</sup> Another color deviation appears in the face and paws of one feline.<sup>26</sup>

The passivity of these felines and their containment in rectangular boxes positioned directly below the active Wari agents speaks volumes about the Wari's proposed role in taming their capricious environment. That so much of the garment, one-half of its length, is given over to these creatures woven in the DWW technique is surely significant.<sup>27</sup>

Overall, the metaphorical content of this tunic implies that the relations between the Wari and most probably a North Coast culture, were problematic and/or that the Wari's self-appointed cosmic role had to be dictated with greater clarity if not greater force. The order of things and the Wari's role therein had to be spelled out in a markedly different aesthetic language from that of the abstract tie dyes. The specific non-Wari moon animal imagery, relegated to the lowest position along the bottom border and the sleeves suggest that the cosmic audience or powers addressed by the Wari were at least associated with the Moche or their immediate successor on the North Coast.<sup>28</sup> A state-level culture, the Moche had moved their capital far up the coast, perhaps in response to the same cataclysmic weather that had brought the Wari down from the highlands (Shimada 1994: 118-134). Whether the Moche were folded into the Wari state or remained independent is an unresolved issue, still hotly debated by scholars.<sup>29</sup> Perhaps the ritualist who wore this garment was key to the actual resolution of hostilities, presumed to have been felt between these two great centralized powers. Alternatively, rituals of integration, which incorporated mythological beings dear to northern religious beliefs, may have been carried out to complete the Wari's vision of a balanced cosmos.

In closing, a technical and formal aesthetic interpretation of ancient Peruvian textiles with specific site associations can add to our understanding of cultures and their interaction. Here, two very different ritual textiles were created with the use of the discontinuous warp and weft technique, itself expressive of the pan-ancient Andean principles of balance and reciprocity. Both textiles were the product of contact between the highland Wari and coastal cultures of ancient Peru. Although very different in the means by which they professed Wari ideas and ideals of cosmic order, their message was essentially the same, and in keeping with the message encoded in Wari tapestries: natural chaos (the predictable unpredictable) of all varieties was acknowledged, aggressively embraced, and vigorously contained (Stone-Miller 1992b: 334-345; 1995: 118; and Stone-Miller and McEwan 1990/1991). For the oral cultures of ancient Peru, ritual textiles were extremely important as a medium of communication, not only through their imagery and color, but also through the important languages of structure and technique.<sup>30</sup>

#### Notes

1. See Cook 1996, for her analysis of Wari tie dyes as high status costumes. Although the tie dyes have been found most commonly in burials on the deceased, Amy Oakland Rodman (T.S.A. 2000 paper) mentioned two Wari textile fragments that had been ritually burned at the Moche site, El Brujo, in the North Coast Chicama Valley: one tapestry and one tie dye.
  2. Found with Wari-associated remains on the coast, who made the tie dyes and who was allowed to wear them are questions that are difficult to answer with certainty. Camelid fiber is usually associated with highland production, although the South Coast cultures had been importing the fiber many centuries prior to the Wari presence on the coast. See Rowe 1986: 182 (Fig. 40), for a tie dye that she attributes to the Wari. For Nasca-attributed tie dyes, see Brugnoli B. and Hoces de la Guardia Ch. 1999: 14-17, 37-38.
  3. For a recent reassessment of the Wari, see Isbell and McEwan, eds., 1991.
  4. A ritually burned and buried tie-dye fragment excavated at El Brujo in the Chicama Valley was reported by Amy Oakland Rodman in her T.S.A. 2000 paper (see note 2).
- The Chicama Valley lies immediately north of the Moche Valley. At least 6 fragments have been excavated from the Huarmey Valley, along with some 25 tapestry fragments, see Prümers 1990: 434-435, 725, 730.
- A tie-dye fragment reportedly from Huarmey is in the Amano Museum (Tsunoyama 1979: 225).
- The Huarmey Valley is the most southern valley on the North Coast, and until the era of the Wari, was the southern boundary of the Moche state. It apparently became the most northerly Wari settlement. For tie dyes excavated at Pachacamac, see Shimada 1991: 32; VanStan 1961 and 1967: 71-73, 84, fig. 67. Unpublished fragments from San Nicolas cemetery in the Supe Valley are in the Phoebe Apperson Hearst Museum at Berkeley ( 4-7512, 4-7486, 4-7796 A/B, 4-7791 a/b/c).- 5. The only structurally-created color and pattern in plain weave are stripes or plaids. In tapestry, a relative of DWW like plain weave, structurally-created color and pattern are produced in great variety, but at the expense of the hidden continuous warps.
- 6. In this tunic, the off-white, beige and tan fiber is cotton, which includes the plain weave upper section, the warps of the slit tapestry sections, and the white and tan rectangles and details in white in the DWW section.

7. Also, stick scaffolds were used rather than fiber, based on examples in the collection of the American Museum of Natural History and illustrated in Phipps 1982.
8. See Rowe 1973, for a discussion of the possible use of scaffold cloths in the creation of some of the finer examples of DWW by the Nasca culture of the South Coast. See Strelow 1996: *passim*, for her identification of many Middle Horizon-Late Horizon DWW textiles in which fibers were inserted with a needle.
9. All of the resist-dyed marks could have been created by tying alone based on the experiments of Ana Lisa Hedstrom and Yoshiko Wari (Ana Lisa Hedstrom, personal communication, T.S.A. 2000 symposium). They had tried to reconstruct the original fabric strips by cutting up photo-graphs of tie-dye cloths, but to no avail. This suggests that more than one textile was made at a time, a cost effective strategy. Indeed the color palette of the Amano tie-dye mantle is precisely that of a tie dye in the Boston Museum of Fine Arts (see Stone-Miller 1992a: 99-100): red on golden tan; green on golden tan; blue on white; red on white; and red and dark blue-purple (black) on white.
10. Consider especially those *tour de force* examples in which frequent color variation was emphasized, such as the figurative textile in Boston (see Stone-Miller 1992a: 89-90).
11. Garaventa 1982 and Phipps 1982. This textile was found in the Yauca Valley on the South Coast of Peru and is in the Phoebe Apperson Hearst Museum at Berkeley.
12. Textiles excavated from tombs at Cahuachi are particularly supportive of this idea. See especially Ubbelohde-Doering 1967: 179, for a late Nasca tomb at one time reconstructed in the Staatliches Museum f. Völkerkunde in München. The walls of this tomb were hung with brown, grey, and white DWW cloth in a repetitive stepped-fret pattern.
13. See Salomon and Urioste 1991: 16 and Classen 1993: 11-38, especially on the ancient Andean concept of *ayni*, balance and reciprocity. The actual term is Quechua. According to Classen: 2, the major Inka rituals celebrated the agricultural and the human life cycles. Although the recording of ancient Andean oral traditions dates to the colonial period, there is a general agreement among scholars that the cosmologies were age-old. In the case of the Inka, it is highly possible that much of their belief system was built on a Wari foundation. See Cook 1996, for a recent assessment of Wari-Inka continuities. It should be noted that continuities can be traced from Chavín de Huantar and its predecessors to highland and coastal cultures of successive eras (e.g., Tiwanaku, Nasca, Moche, and Wari) by studying the visual arts (see Burger 1992 and Stone -Miller 1995).
14. Ancient Peruvian textiles used in ritual were surely not without some tacitly acknowledged magical properties. Through their symbolic languages (color, imagery, structure, and technique), ritual vestments would have been understood, in the very least, to protect the ritualist from

- the forces honored during the rites. On the function cloth in the Inka state, see Murra 1989.
15. See Shimada et al 1991, about the 1,500-year Andean ice core precipitation record and Moseley 1992: 28 about the drought, 562-594 C.E.
  16. See Isbell and McEwan 1991: 1-17, 293-294 and Schreiber 1992: 113, for how the Wari's socio-political rule has been interpreted as a state, an empire, and as part of a religious hierarchy of sites with oracles perhaps dominated by Pachacamac.
  17. Unfortunately, due to the climate in the highlands ancient textiles have not been preserved as they have along the arid South Coast of Peru.
  18. The Wari style was apparently more naturalistic in its earliest manifestation, closer in fact to the style of Tiwanaku, the genesis of Wari religious beliefs and iconography. See Rowe 1986 for a tentative chronology of Wari designs and Conklin 1971 for an early Wari textile.
  19. The configuration in this particular tie dye reads like a cosmogram expressive of a unified state or empire. The arms are perhaps symbolic of the lateral and vertical planes of the universe, which emanate from the core, i.e., the unifying culture and/or its capital city. On crosses in Andean astronomy and cosmology, see Urton 1980 and 1982.
  20. Also buried in the platform was an individual wearing a Wari-style tapestry tunic and perhaps another individual wearing a type of tunic more typical of the Central Coast during the Wari era (Menzel 1977: 36-37, 114, Fig. 75 and 115, Fig. 77).
  21. The cotton fiber is S-spun singles, while all of the camelid fiber is Z-spun and S-plied. For the few extant Moche textiles, see Conklin 1979 and Benson 1992: 314-315. Paired singles in the warps have been identified with the Chimú, a later successor of the Moche (see Rowe 1984).
  22. On this portal (Fig. 7), a centrally-located, front facing diety, usually identified as a sky god, appears in a position superior to profile human-, bird-, and feline-headed agents. These agents converge upon this central figure from the left and right. In the lowest register are unidentified frontal figures. When the Chimu Capac tunic was worn in ritual, as was true of Wari tapestries, the ritualist became the sky god, or at least that is the implication.
  23. Menzel refers to these felines as "Huari Feline Star Animals" (1977: 36). In 1968:87, she suggested that fully feline creatures might be synonymous with the Pachacamac griffin. Felines have such a long history in the visual arts and imaginations of ancient Andeans that their meaning on this tunic was probably multivalent. See Saunders 1998 and Benson 1998 on feline symbolism in the ancient Americas, but particularly in South America, wherein the jaguar was associated with rain, fertility, and water (Saunders: 37).
  24. See Stone 1987: 167-174 on color anomalies in Wari tapestries.
  25. The thread count is: in the plain weave section, 13 pairs of warps to 12 single wefts; in the tapestry section, 7 warps composed of two pairs of

- single threads to 46 wefts (average); and in the DWW section (it varies from color to color), 19 warps to 12 wefts of 2-ply red camelid fiber, and 18 pairs of warp singles to 14 weft singles in the white cotton.
26. The facial colors of a feline in one diagonal row are dark pink with blue eyes, the reverse of all others in that row, and the paws are both dark pink rather than one dark pink and one brownish-black. See Stone 1987: 154-163, on color deviations in Wari tapestries.
  27. Of particular interest is the appearance of a reclining feline at the side of a ruler in Moche iconography (Benson 1998: 61), while felines carved in relief prowl below a register of shamans in transformation at Chavín de Huantar (see Burger 1992: 133-135).
  28. The revision of the Moche chronology by Bawden 1996: 23, makes this association with the Moche feasible. He places Moche V in Middle Horizon 1b, if not MH2a. The immediate successor to the Moche was the Sicán culture (Shimada 1990: 297-392).
  29. See Isbell and McEwan 1991: 1-17, Bawden 1996: 271, and Shimada 1994: 131-134. The interpretation of Wari and Wari-related ceramics and textile fragments at Moche sites needs to be carefully scrutinized. Their incidence need not mean a physical presence, or political hegemony for that matter, but rather the importation of highly valued objects (with which travel ideas), or mementos or relics of a pilgrimage, to name but two of a number of other possibilities. See Caldwell 1964 and Schreiber 1992: 113, on interaction spheres in prehistory.
  30. On the importance of examining structure, materials and techniques, see Lechtman 1996.

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Fig. 1: Tie dye, Museo Amano, Lima.  
Photo: K. Fugita.

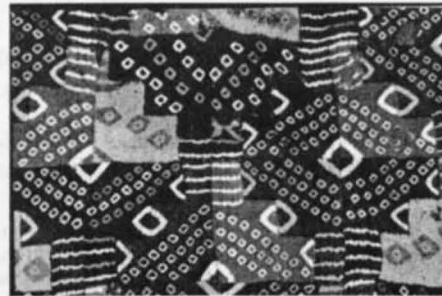


Fig. 2: Detail of Fig. 1.  
Photo: K. Fugita.



Fig. 3a: Wari Ceramic Effigy  
w/Tapestry Tunic,  
Museo Amano, Lima.  
Photo: R. Stone-Miller.



Fig. 3b: Wari Ceramic Effigy  
w/Tie-Dye Tunic,  
Museum Rietberg, Zürich.  
Photo: Wettstein and Kauf,  
Zürich.



Fig. 4: Tunic, Phoebe Apperson Hearst Museum of Anthropology,  
University of California at Berkeley.  
Photo: the author.



Fig. 5: Detail of Fig. 4. Tapestry figures above  
and DWW felines below.  
Photo: the author.

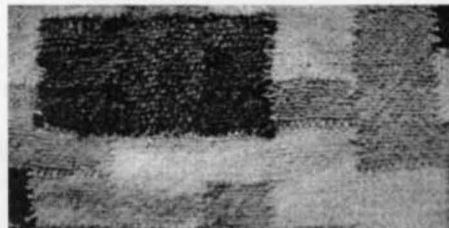


Fig. 6: Detail of Fig. 4. DWW feline face and upper body.  
Photo: the author.



Fig. 7: Detail of the Gate of the Sun, Tiwanaku, Bolivia.  
Photo: the author.