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GENDER-BASED VIOLENCE IN THE WARI AND POST-WARI ERA OF THE ANDES

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Introduction

Social norms regarding how men or women are to be treated can have a powerful effect on each sex's health profile. If there are strong social pressures for men to engage in military action or defend a community, then they are likely to exhibit greater frequencies of violence-related injuries and have lower life expectancies than women. This may also mean that men are targeted for attack in village raids or community brawls. If a community views women as subordinate, then they may be treated harshly and be physically punished when their behaviours are deemed inappropriate. Violence targeted against men or women specifically because of their sex and the roles associated with them is a form of gender-based violence. By gender-based violence, I mean physical harm against an individual or group based on one's gender identity (Wies and Haldane 2011). I agree with Wies and Haldane (2011) that gender based violence can occur in the home or larger community and, importantly, that this category of identity-based violence is condoned by the state or the community. That social condoning of violence towards a particular group is what brings it into being, and each act of violence then has the potential to further normalize it, ensuring its perpetuation.

In other writings, I have explored how the construction of masculine identity in Wari society was linked to militarism and aggression, which served to legitimate gender-based violence against men, as well as violence perpetrated by men (Tung 2012). Here, I explore how violence against women in Wari (AD 600–1100) and post-Wari (AD 1100–1400) societies may have been a form of gender-based violence, and not simply isolated, random acts of violence against females. Thus, I present data on the frequency and spatial patterning of male and female cranial trauma through time, particularly to make sex-based comparisons, but I focus most interpretations on what those patterns suggest about the lived experience of females and of women's roles in Wari and post-Wari times.

Violence against women occurs in a variety of social circumstances: domestic abuse, intra-community conflict, small-scale raiding and large-scale wars, to name a few. And while individual agents enact the violence that leads to specific injuries, larger social structures set the conditions for that violence to emerge. Gender-based violence is an example of this. That is, societal ideals and norms shape how women are treated (or maltreated), and notions of female inferiority and limited social networks for women are often linked to abuse of women

(Rodseth and Novak 2009). This chapter explores some of those individual and societal conditions that contributed to violence against females during the time of Wari imperial rule (the Middle Horizon, AD 600–1000) and after Wari imperial decline (the Late Intermediate Period, AD 1000–1400). This is examined through analysis of ante- and peri-mortem cranial trauma on female skeletons from Wari heartland sites in the central, highland Andes of the Ayacucho Basin and Wari affiliated sites in the Majes Valley of southern Peru (Figure 18.1). The post-Wari era skeletons derive from the site of Huari, the former capital city of the Wari Empire. The diachronic view of violence against females in the ancient Andes offers insights into how changing sociopolitical contexts might alter attitudes about violence in general and violence against women specifically.

A review of previously published data, combined with a new analytical focus on female trauma and new comparisons, addresses the following questions. How might broader social conditions affect the likelihood for violence and shape the nature of those violent interactions? And how do gender roles and social norms interact to structure attitudes about violence and the enactment of violent acts? I also examine how social practice, or individual actions, could have structured the societal ethos towards females. That is, each action against, and interaction with, women would have narrated notions about how women were to be perceived and treated in society. Those acts, and the attitudes about women that result from those acts, can thus affect the likelihood that females would or would not become victims of violence.

Social structures and attitudes about violence

The mutual influences between the individual and society and structure and agency have long been topics of inquiry in anthropology, and these recursive interactions that structure society and individual action can especially be observed when investigating the expression and role of violence in a community. In particular, Bourdieu's (1990) concept of *habitus* is helpful to understand how attitudes about women, and the potential for violence against them, may ensue from those attitudes. He suggests that the unspoken rules or social norms in a society can govern how individuals behave and how they act toward others (Bourdieu 1990). These unquestioned norms are continually re-enacted, embedding them and further normalizing them within the structures of society. Because they are not explicit, openly discussed rules, attitudes can become embodied and actualized in day-to-day interactions. In short, these unconscious attitudes guide social practice in powerful ways. Indeed, social norms regarding violence – when, how, and against whom it can be used – can have life or death consequences.

But, those normative notions need not be permanently fixed and unchangeable. As Giddens (1979; 1984) has argued, social structures that shape how an individual perceives and interacts with another person can also guide new and different actions, because the structures are not simply rules, they are also guidelines and resources for novel behaviours that may alter societal norms. In other words, structures place "constraints on human agency", but structures also enable innovation (Giddens 1976: 161). Sewell clarifies this and states that Giddens' idea

> implies that those agents are capable of putting their structurally formed capacities to work in creative and innovative ways. And if enough people, or even a few people who are powerful enough, act in innovative ways, their action may have the consequence of transforming the very structures that gave them the capacity to act.
>
> *(Sewell 2005: 127)*

Thus, a temporal view of the frequency and patterning of violence among males and females may illuminate how social norms related to violence may have changed from one cultural era to the next, if they changed at all. In particular, a bioarchaeological study that considers the role of gender in when and how violence is enacted can further clarify how one's sex structured the likelihood that one might become a victim of violence and whether or not the violence would be deadly.

Violence against women

Violence against women has been an ongoing threat to women's health for millennia, whether in the context of war or domestic disputes. In modern wars, the greatest percentage of casualties are non-combatants, the majority of whom are women and children (Nordstrom 1998; UNICEF 1996). This is in large part because they are less able to defend themselves or escape harm. Indeed, the elderly and disabled, along with women and children, are the most common victims of war, even when it tends to be able-bodied males who are conscripted into military service.

In times of war, it is not just military acts that lead to female injury and death; social and domestic violence also significantly increase with war and war preparation. And it is not just state enemies or outsiders that enact violence against a community during wartime, internal social violence – including domestic abuse, "street fights" and seemingly random attacks – can also lead to injury and death (Lutz 2004; Nordstrom 1996, 1998). This means that times of war – be they formal battles or raids – are not only hazardous for military personnel but are also dangerous for non-combatants. Thus, ancient populations that experienced war, or even war preparations, may have sustained violence-related trauma, not just among young adult males but among various ages of both sexes.

A brief note on methods

In bioarchaeological contexts, gender is inferred from skeletal sex, but they are not always one and the same (Walker and Cook 1998). That is, an individual may be biologically (skeletally in this context) male, but identify with female identity and female roles, or some third gender. But alas, this may not be detected in the archaeological record in this case. As such, this study uses skeletal sex as a proxy for gender. (To my knowledge, ancient Andean society did not include a third social gender, nor are there any clear examples of a sex-gender contrast in the samples discussed here.)

Although some head wounds may result from accidental falls, bioarchaeological studies typically interpret cranial trauma as a proxy for violence (Lovell 1997; Walker 2001), and that interpretation is applied here. The cranial fracture data focuses on adult crania only and, where applicable, the distinction between ante-mortem (healed) fractures and peri-mortem fractures (those injuries that occur around the time of death). In bioarchaeological studies, it is unclear whether peri-mortem skeletal trauma is the mechanism of death, for an individual could have died from some other injury or disease that is invisible to the investigator. Nonetheless, peri-mortem cranial fractures can be interpreted as injuries sustained during, or around the time of, a lethal attack, even if the specific fracture cannot be definitively identified as the mechanism of death. In this study, blunt force peri-mortem cranial fractures are interpreted as lethal, violent events, for it is highly probable that, even if the individual suffered some other coterminous lethal injury, the head injuries would have been sustained during an attack that eventually led to death. This is an important distinction relative to ante-mortem head wounds that have healed because those are clearly sub-lethal injuries.

Background on the sites

Huari-Cheqo Wasi, Conchopata, Nawinpukio and Trigo Pampa (Wari era)

The site of Huari was the capital city of the Wari Empire, where ritual, mortuary, domestic and production activities occurred. Huari probably housed several social classes of people, ranging from royal lineages to elites and commoners. At Huari, the only Wari-era human remains to be recovered thus far come from the sector known as Cheqo Wasi (translated from Quechua, it means "house of megalithic stone blocks"; Benavides 1991). But these were not houses; Cheqo Wasi was an elite mortuary sector with elaborate tombs made of finely cut masonry. Unfortunately, these tombs were looted, so human remains were commingled. Nonetheless, the skeletal elements – crania in particular – could be examined for evidence of trauma.

Located approximately 10km away from Huari, the sites of Conchopata and Nawinpukio were also home to ritual, mortuary, domestic and production activities, but those communities were comprised of intermediate elites and commoners. In short, Conchopata and Nawinpukio were smaller-scale sites with populations that were of a lower social status relative to Huari. Trigo Pampa was a smaller, rural Wari heartland site with domestic, mortuary and ritual components.

Beringa and La Real in the Majes Valley (Wari era)

Beringa and La Real are located in the middle Majes Valley (Figure 18.1), in the agriculturally productive *yungas* zone. The sites were in the southern periphery of the Wari domain and the abundance of Wari artefacts at each site (and elsewhere in the valley) suggest that they were integrated into the Wari trade network and probably had other interactions with Wari personnel. Although there is no Wari administrative site in the Majes Valley, the site of Quillcapampa in the Siguas Valley, located just south of the Majes, may have been an administrative centre (Málaga Linares 1990), so Wari may have had a mix of direct and indirect control in the region.

The site of Beringa was a village for commoners (Tung 2007b), while the site of La Real was a mortuary centre primarily for the burial of elite individuals. The sites are located 8km apart and shared much of the same resources produced in the middle Majes Valley.

Huari-Monqachayoq (post-Wari)

Parts of the capital city of Huari were used after the demise of the Wari Empire in the eleventh to twelfth centuries AD and the Monqachayoq sector, in particular, was used to dispose of bodies. During Wari times, Monqachayoq was a space used for elaborate rituals and the burial of "royals" or the highest-level elites. But in the subsequent era it appears that the deceased did not receive formal burial. Rather, their dismembered bodies – as evidenced by the cutmarks on nearly all types of skeletal elements – were simply disposed of in underground galleries at Monqachayoq (Tung 2009). They were not placed in or near the ritual D-shaped structure, nor were they placed in the labyrinth of underground tombs where the royal or elite persons were interred during Wari times.

Prevalence of violence in Wari and post-Wari eras

Wari-era cranial trauma

Before presenting a detailed discussion of the female cranial trauma, I present the overall adult cranial trauma rates for all sites considered in this study. In the Wari heartland where the sites of

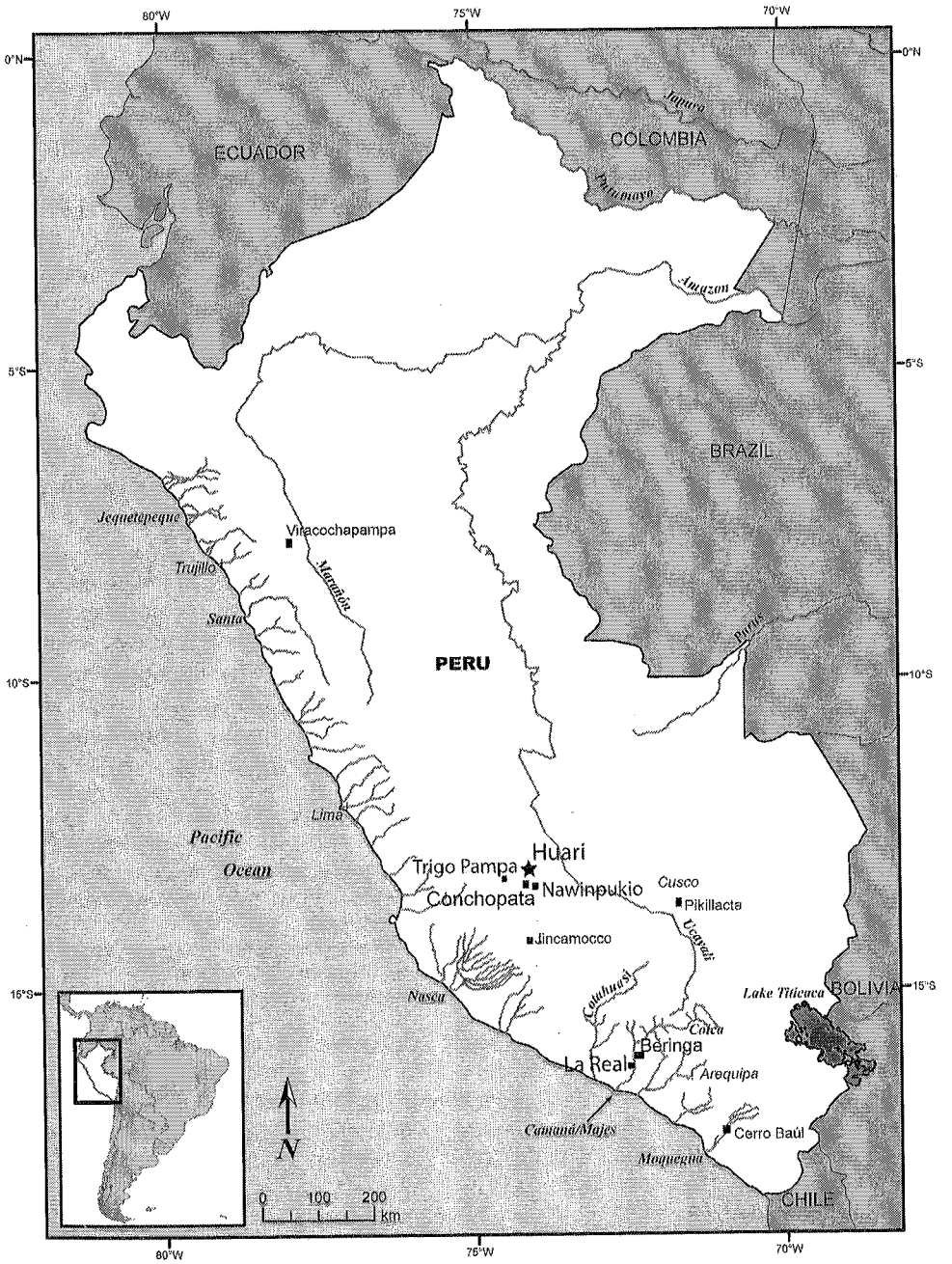

Figure 18.1 Map of Peru with sites discussed in the text (based on map by S.A. Wernke).

Huari, Conchopata, Nawinpukio and Trigo Pampa are located, rates of cranial trauma are highest at the elite sites and lowest at the commoner sites: Huari-Cheqo Wasi = 50% (12/24); Conchopata = 23% (10/44); and Trigo Pampa and Nawinpukio = 0% (0/5). The royal/elite sample from Cheqo Wasi is statistically significantly higher than the others: Huari-Cheqo Wasi

vs. Conchopata (Fisher's exact, $p = 0.022$, $n = 68$) and Huari-Cheqo Wasi versus Trigo Pampa and Nawinpukio combined (Fisher's exact, $p = 0.052$, $n = 29$) (for those data, see Tung 2012, forthcoming). Those patterns suggest that royal/elites and intermediate elites at the sites of Huari-Cheqo Wasi and Conchopata, respectively, had a greater likelihood of being involved in war and other violent encounters. It may be that violent actions, whether in war or within the community at large, helped to create and sustain elite status within Wari society. This hints at the possibility that militaristic actions provided a path to elite status for certain individuals.

In the Wari hinterland, the Beringa sample exhibited an adult cranial trauma frequency of 33% ($n = 39$) and La Real was 31% ($n = 104$) (Tung 2007a). Although the rate of trauma was similar at the two sites, the spatial patterning of wounds suggests that the Beringa individuals were mostly injured during raids on their village, while the La Real adults (men in particular) sustained much of their trauma in ritualized physical conflict resolutions (Tung 2007a).

Wari-era sex-based differences in cranial trauma

Sex-based differences in cranial trauma among the Wari-era groups show that men (30/73 = 41%) are significantly more affected than women (22/75 = 29%) (Fisher's exact, $p = 0.0081$, $n = 170$), a pattern that mirrors many other bioarchaeological studies of violence-related trauma (Larsen 1997; Walker 2001). Although that is the overall trend in the Wari groups, more women (64%) than men (50%) exhibit head wounds at the site of Huari-Cheqo Wasi.

The range of head wound frequencies among females ranges from as high as 64% at Huari-Cheqo Wasi to as low as 19% at La Real, where women seem to be the most protected from violence (see Table 18.1 and Figure 18.2). Those frequency data indicate that women at the capital city were most likely to be victims of physical attack, a seemingly odd outcome given their high social status. It is possible that they were closely controlled and monitored,

Table 18.1 Cranial trauma frequencies among adults at the sites discussed in the text. Ante- and peri-mortem trauma are combined, except at Huari-Monqachayoq (post-Wari) where the large number of each wound type necessitated greater distinction.

Site	*Females*	*Males*	*Unsexed adults*	*Totals*	*F vs. M*
Huari-Cheqo Wasi	7/11 = 64%	5/10 = 50%	0/3 = 0%	12/24 = 50%	$p = 0.4250$
Conchopata	6/25 = 24%	4/14 = 29%	0/5 = 0%	10/44 = 23%[a]	$p = 0.5198$
Nawinpukio	0/0	0/0	0/3	0/3 = 0%	
Trigo Pampa	0/0	0/0	0/2	0/2 = 0%	
La Real	5/26 = 19%	16/39 = 41%	11/39 = 28%	32/104 = 31%[b]	$p = 0.0565$
Beringa	4/13 = 31%	5/10 = 50%	4/16 = 25%	13/39 = 33%[c]	$p = 0.3062$
Total Wari era	22/75 = 29%	30/73 = 41%	15/68 = 22%	67/216 = 31%	$p = 0.0081$
Huari-Monqachayoq (ante-mortem)	9/11 = 82%	12/18 = 67%	1/2 = 50%	22/31 = 71%	$p = 0.3296$
Huari-Monqachayoq (peri-mortem)	4/11 = 36%	9/18 = 50%	0/2 = 0%	13/31 = 42%	$p = 0.3717$
Huari-Monqachayoq (all trauma)	10/11 = 91%	15/18 = 83%	1/2 = 50%	26/31 = 84%[d]	$p = 0.5068$

[a]No Conchopata adults exhibit peri-mortem trauma.
[b]Five of the 32 affected La Real adults exhibit peri-mortem trauma.
[c]Four of the 13 affected Beringa adults exhibits peri-mortem trauma.
[d]Nine of the 26 affected adults had both ante-mortem and peri-mortem trauma.

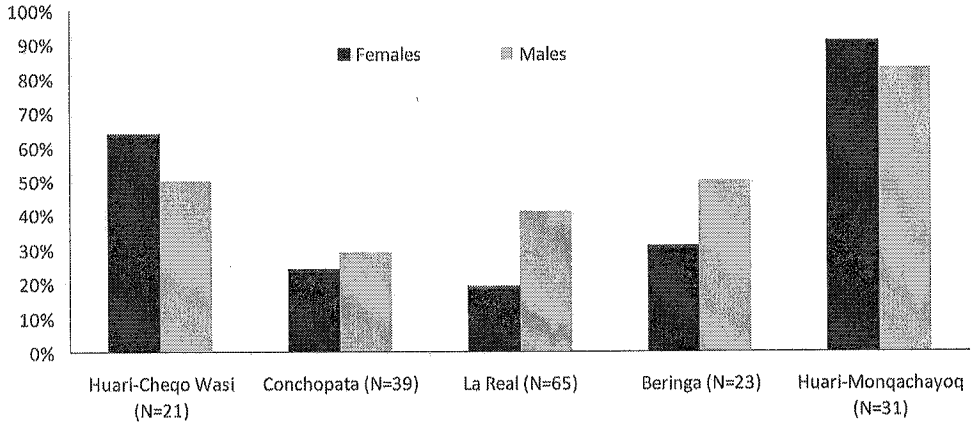

Figure 18.2 Cranial trauma frequencies among adults (ante-mortem and peri-mortem combined). Nawinpukio and Trigo Pampa adults exhibited no trauma. Unsexed adults are not shown in this graph.

occasionally receiving beatings from intimate partners or judicial leaders, but this is currently unclear. If the Huari-Cheqo Wasi women were non-local (e.g. abductees or immigrants), then their outsider status might explain their high rates of trauma. (Strontium isotope analysis is needed to determine their geographical place of origin and those studies are ongoing.) At Beringa, strontium isotope analysis shows that the population is primarily local: 2/22 individuals (an infant and an adult male) exhibit non-local strontium isotope ratios (Knudson and Tung 2011), so the high levels of violence against this group is not related to the presence of "outsiders" who could have been more likely victims of attack.

In the Wari era, the average number of wounds per person was greater among men than women. There were 72 ante- and peri-mortem wounds on the 30 injured males, an average of 2.4 head wounds per male. Among the 22 injured women, they had a total of 33 ante- and peri-mortem wounds, an average of 1.5 wounds per woman. This suggests that males were more likely to be hit repetitively, or that they were more commonly in separate incidences of violence.

Increase in cranial trauma from Wari to post-Wari era

Overall, 31% (67/216) of the adult Wari-era crania exhibit trauma (ante-mortem and peri-mortem) and this increases to 84% (26/31, ante-mortem and peri-mortem) among the post-Wari adult crania from Huari-Monqachayoq (Tung 2008) (Figure 18.2). This is a statistically significant increase in cranial trauma (Fisher's exact, $p < 0.0001$, $n = 247$), a temporal increase that also occurs in other areas of the Andes (Andrushko and Torres 2011; Kurin 2012; Torres-Rouff and Costa Junqueira 2006). Notably, the significant increase in head trauma occurs for both men and women. Among men, the rate goes from 41% ($n = 73$) to 83% ($n = 18$) (Fisher's exact, $p = 0.0013$, $n = 91$), and among women, it significantly increases from 29% ($n = 75$) to 91% ($n = 11$) (Fisher's exact, $p = 0.0001$, $n = 86$).

Not only did violence increase, it becomes much more deadly after the demise of the Wari Empire. During Wari times, only 5% (11/216) of adults have peri-mortem trauma, suggesting that death involving violent head injuries was very rare. In the post-Wari era, peri-mortem head injuries significantly rise to 42% (13/31) (Fisher's exact, $p = 0.0001$, $n = 247$) (Tung 2008; Figure 18.3). Given that the peri-mortem fractures on the cranium were either the mechanism of death or closely associated with the deadly event, we can interpret those peri-mortem traumatic lesions as occurring in deadly encounters. This deadly violence affected both

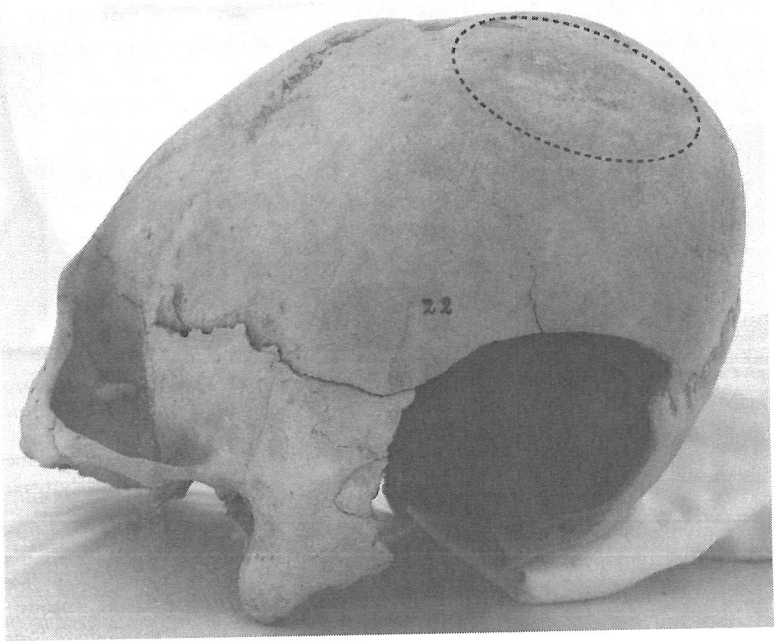

Figure 18.3 Cranium with ante-mortem trauma (circled) and peri-mortem trauma. Huari-Monqachayoq (post-Wari).

men and women in post-Wari times; 50% of males and 36% of females have peri-mortem cranial fractures. These data that show more deadly violence against women indicate that there was a dramatic change in the social contexts in which violence occurred in the post-Wari era, a pattern discussed in more detail below.

Another change in the post-Wari era is the increase in the average number of cranial wounds per woman. Injured Wari women show an average of 1.5 head wounds, and injured post-Wari women show an average of 2.9 head wounds (29 wounds on ten women). Men's average number of wounds stays similar: 2.4 head wounds per injured Wari male: 2.3 wounds per post-Wari male (35 wounds on 15 men).

The general increase in violence, and its greater lethality, is probably partly related to the decline of the political infrastructure of the Wari Empire. As political alliances and social and trade networks changed, there was apparently newfound competition between post-Wari groups leading to social conflict and violence in which large fractions of the population were injured or killed in warfare, raids, massacres and intracommunity conflicts. In addition to that, major transformation in the sociopolitical context, the general increase in female trauma, its lethality and the specific increase in wounds per injured women suggests that there may have also been a concomitant change in women's roles and how they were perceived in post-Wari society.

Patterns of violence-related trauma among men and women

Wari era

To clarify how the social contexts of violence may have changed and to explore how female roles may have altered, it is useful to examine the spatial distribution of head wounds and how

it may have differed between the sexes during the Wari and post-Wari eras. Among Wari adults, females generally exhibit more head wounds on the posterior of the cranium, while men exhibit more wounds on the anterior (Figures 18.4, 18.5 and 18.6). Specifically, among the 72 ante- and peri-mortem wounds on the 30 injured men, the greatest number are on the anterior (26/72 = 36%). This suggests that males were most often facing their attackers when injuries were sustained, a posture that is more offensive than defensive. The next most common place for men to exhibit wounds was the posterior and superior of the cranium: 28% and 25%, respectively. The posterior head wounds suggest that men were also sometimes in defensive positions when attacked, either ducking the head or fleeing from attack. The wounds on the superior cranial vault could have been sustained in either defensive (e.g. kneeling in front of the attacker) or offensive positions. However, given that 12 of those 18 superior wounds (67%) are on the left side, it appears that they were sustained while facing a right-handed assailant who could have wielded a mace or some other blunt force weapon (Figure 18.7). Importantly, the sidedness of the superior wounds differs between men and women, as discussed below.

There are a total of 33 wounds on the 22 affected Wari-era women, and only 9% (3/33) of the wounds are on the anterior (Figures 18.4 and 18.6), suggesting that they were rarely facing their attackers when they were hit. This is in marked contrast to the males, who show the greatest proportion of cranial fractures on the anterior. For Wari-era females, most head wounds are on the posterior (15/33 = 45%) (Figures 18.4 and 18.6). This is strongly indicative of injury sustained while in a defensive position. The patterned distribution of female wounds, with most wounds on the posterior, is similar at all of the Wari sites in this study. The second most common cranial surface to exhibit wounds was the superior (8/33 = 24%), a proportion similar to that of the males. Thus, like the males, they could have been injured while in a defensive or offensive position. However, 75% of the female wounds on the cranial apex are clustered on the right side, the opposite pattern of what males exhibit (Figures 18.4, 18.5 and 18.6). This limits the likelihood that they were facing a right-handed attacker with a weapon and instead suggests that they may have been in a more defensive position when they received the blow to the head.

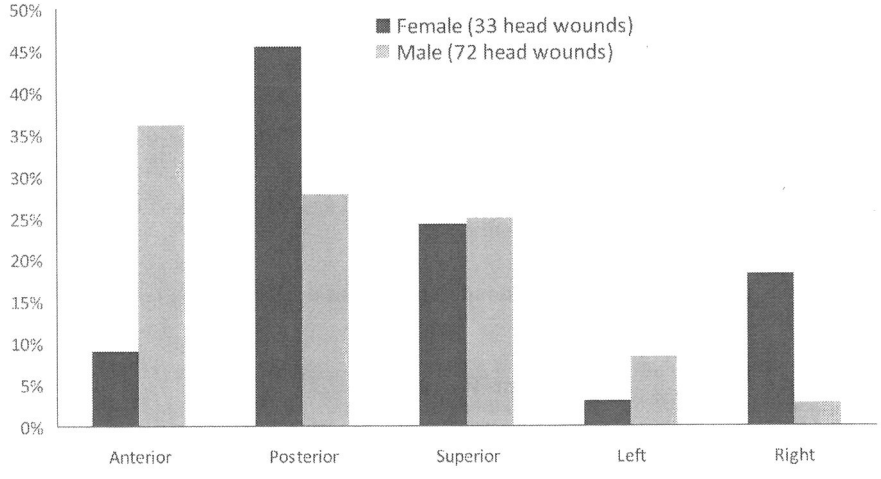

Figure 18.4 Spatial distribution of cranial wounds on adult males and females from the Wari era.

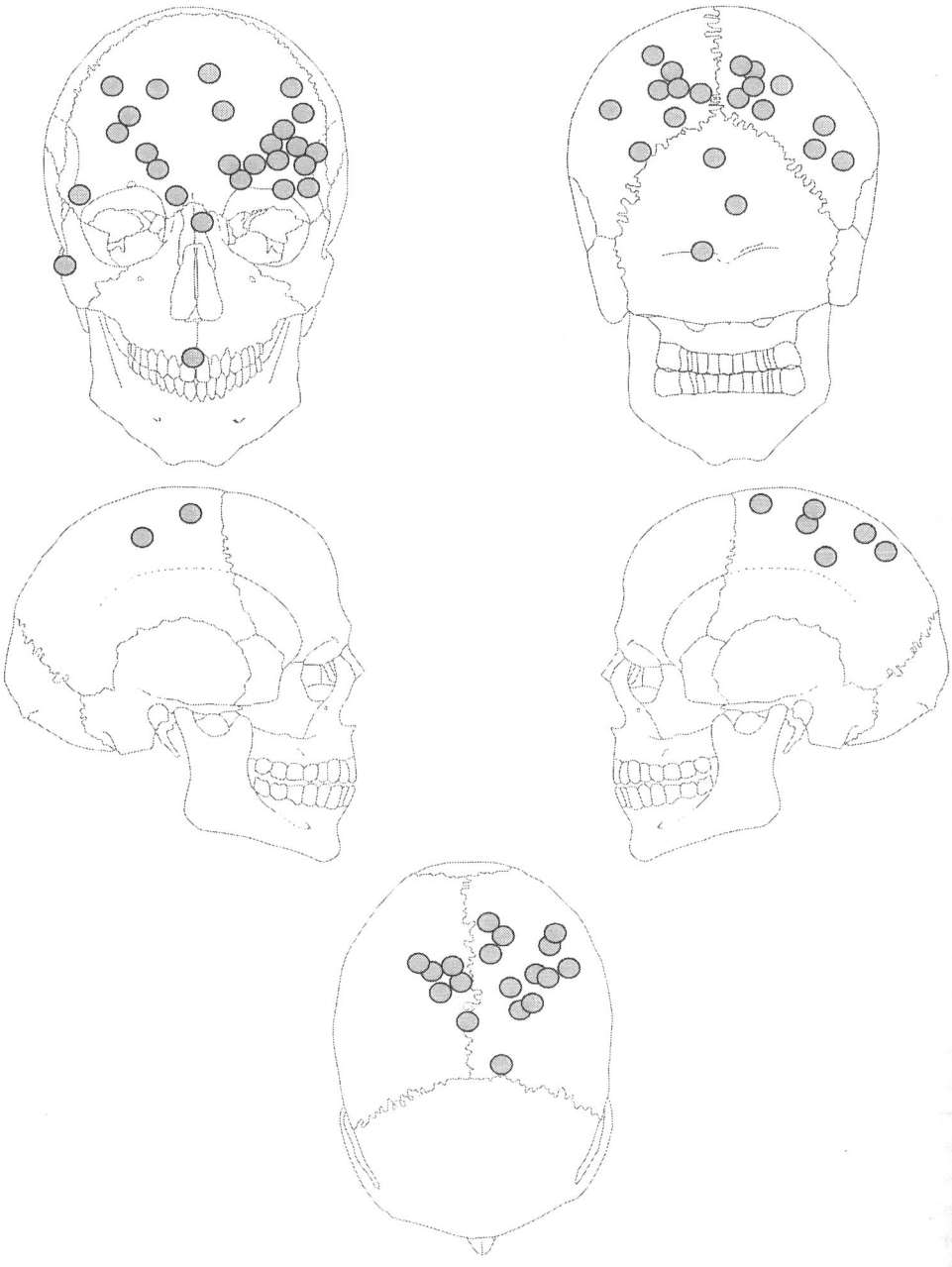

Figure 18.5 Ante- and peri-mortem wounds on adult males from the Wari era.

Post-Wari era

In the post-Wari era, the spatial patterning of wound locations changes for each sex. The most notable change is the greater proportion of ante- and peri-mortem wounds on the anterior of female crania: 57% are located there (17/30, and 14 of those 17 wounds are ante-mortem)

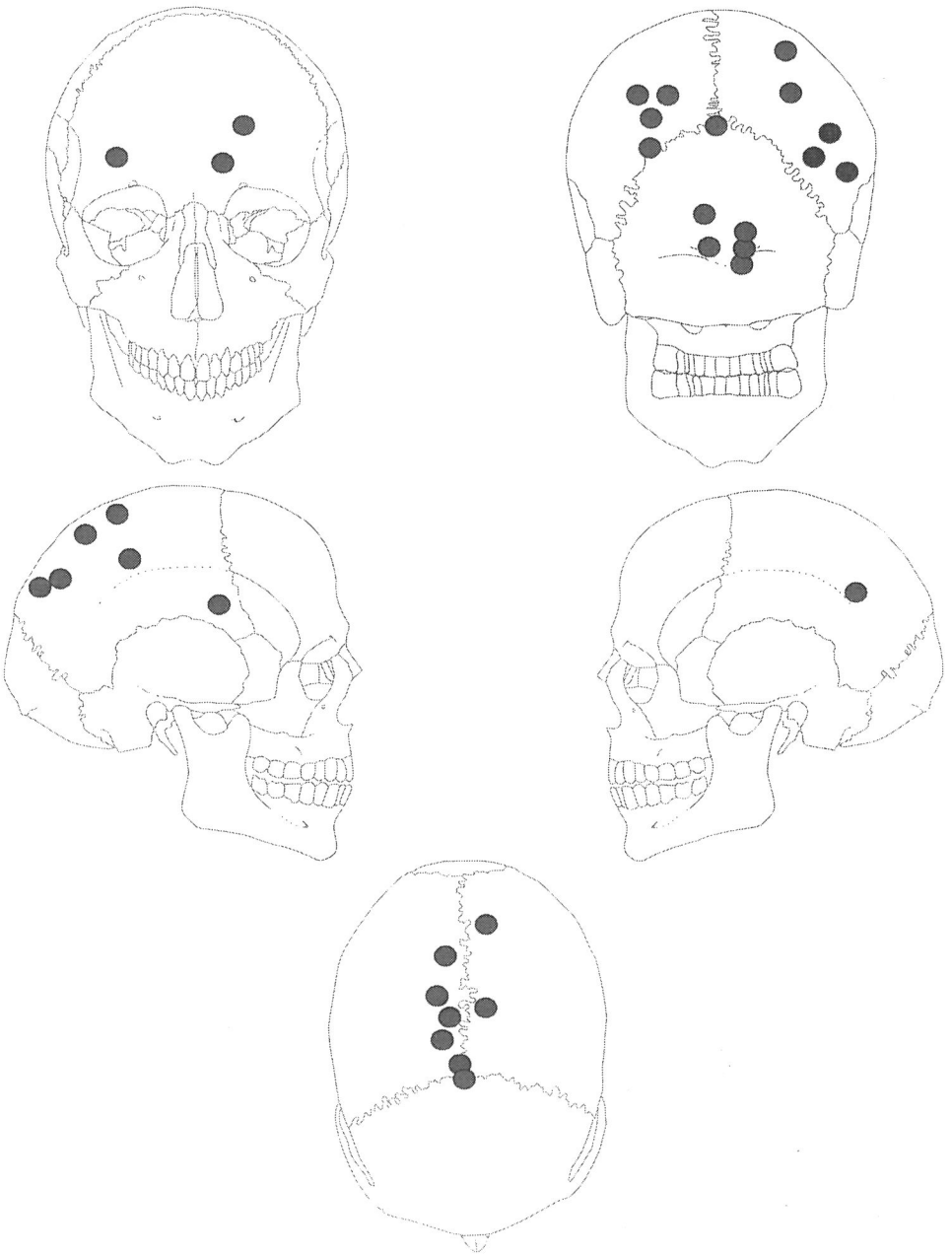

Figure 18.6 Ante- and peri-mortem wounds on adult females from the Wari era.

(Figures 18.8 and 18.9). This is a statistically significant shift compared to Wari-era women who had only 9% (3/33) of their head wounds on the anterior (Fisher's exact, $p = 0.0001$, $n = 63$). There is also a change in the proportion of wounds on the posterior cranium: 23% on post-Wari women (7/30), a nearly statistically significant decrease from the 45% in the Wari era (Fisher's exact, $p = 0.0569$, $n = 63$). The wounds on the superior also significantly decrease from 24% to

Figure 18.7 Mace from the site of Beringa, Majes Valley in southern Peru.

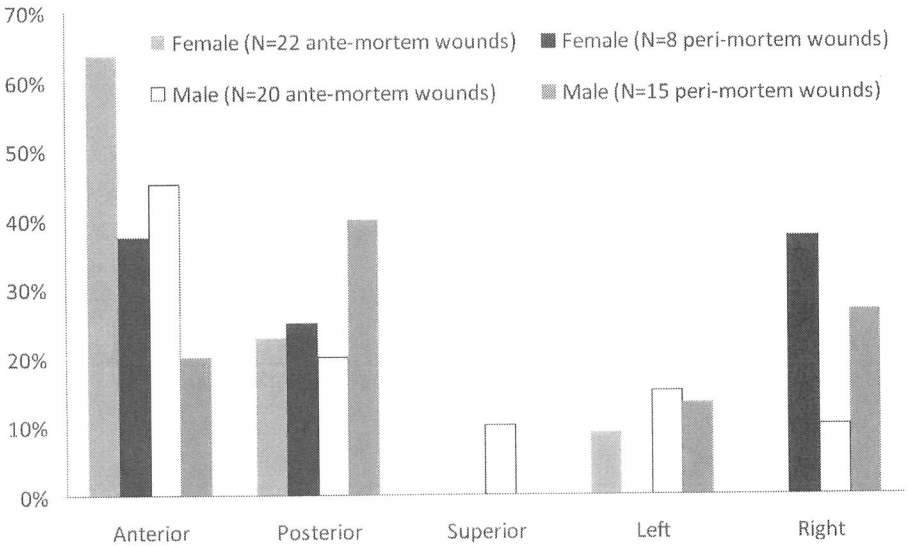

Figure 18.8 Spatial distribution of ante- and peri-mortem cranial wounds on adult males and females from the post-Wari era.

0% (Fisher's exact, $p = 0.0036$, $n = 63$). Keeping in mind that the Wari-era superior wounds were mostly on the right side (i.e. not hit by a right-handed attacker from the front), and that there was a greater proportion of anterior wounds among post-Wari females, it appears that post-Wari women were more commonly facing their attackers, rather than ducking or fleeing from them as the Wari era women had done. These data suggest that there was a major change in how women were engaging in, and how they were victims of, violence in post-Wari times. In some cases, they were no longer simply defending themselves, but may have been taking a more offensive stance and, while they survived many of those violent interactions, a greater proportion of them show peri-mortem (lethal) trauma relative to the preceding era.

Among post-Wari men, the proportion of wounds on the anterior, posterior, and left side of the cranium stays remarkably similar through time: 34%, 29% and 14%, respectively (Figure 18.10). (It was 36%, 28% and 8% in the Wari era, respectively.) The greatest changes were in the proportion of wounds on the superior vault, which significantly declined from 25% to 6% (Fisher's exact, $p = 0.0122$, $n = 107$ wounds) and on the right side, which significantly increased from 3% to 17% (Fisher's exact, $p = 0.0143$, $n = 107$). Overall, the limited changes among male skulls suggest that there was not a systematic shift in how men engaged in violence (i.e. bodily positioning seems rather constant). The way it did change, however, was in the patterning of peri-mortem wounds. There are more ante-mortem than peri-mortem wounds on the anterior vault, and more peri-mortem than ante-mortem wounds on the posterior vault. This suggests that post-Wari men had a much greater chance of surviving an attack if they were facing their assailant. And when hit from behind, they were more likely to die. This patterning could relate to differential susceptibility to death or unconsciousness for distinct cranial regions. For example, while a hit to the frontal can lead to brain contusions on the front and back (the coup and contrecoup), the initial impact point of a blunt force trauma will be the most severe. Given that injuries to the frontal lobe of the brain typically result only in a taciturn state (Ropper 2010), while those to the posterior basal area can lead to unconsciousness and sometimes immediate death (e.g. when there is subarachnoid haemorrhage or rupture

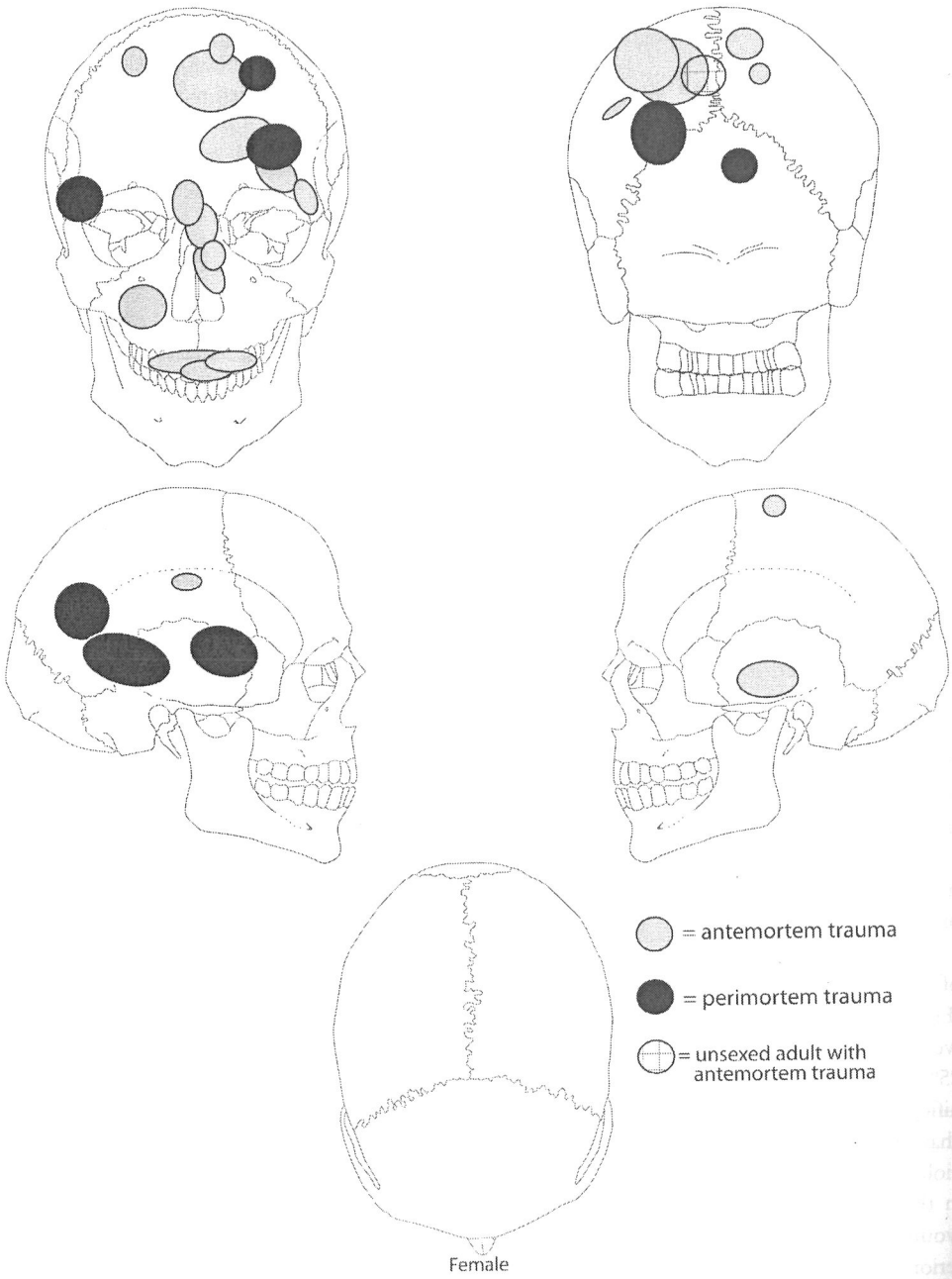

Figure 18.9 Ante- and peri-mortem wounds on adult females and one unsexed adult from the post-Wari era.

of the posterior inferior cerebellar artery; Boström et al. 1992), it may be that trauma to the posterior of the head is more lethal simply because of damage to vital structures. Unconsciousness from a posterior blow is also a serious danger because the victim can no longer defend himself. Aside from natural susceptibility for certain cranial regions, it is also possible

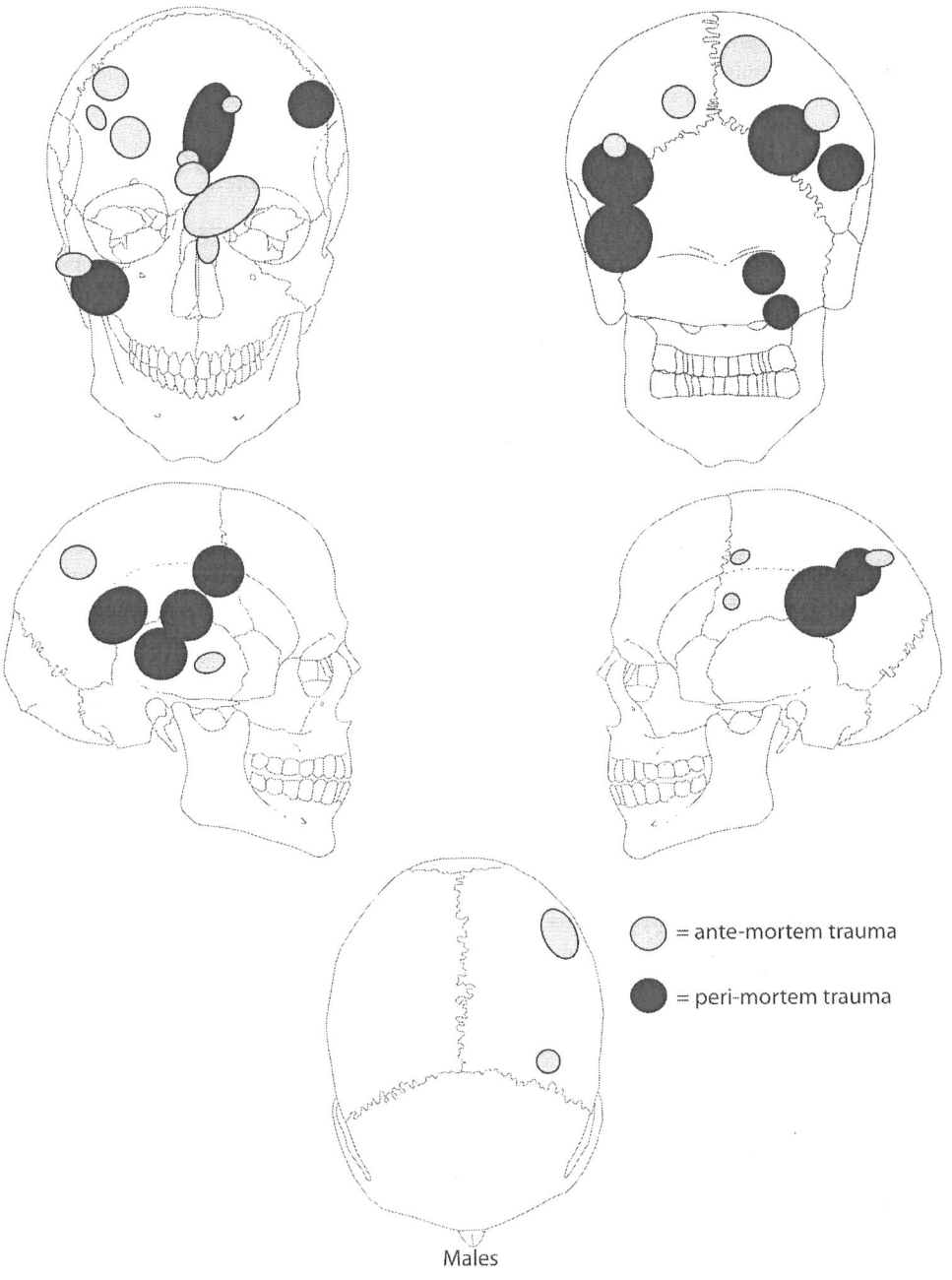

Figure 18.10 Ante- and peri-mortem wounds on adult males from the post-Wari era.

that the attackers were intent on killing the victim and thus delivered a lethal blow to the back of the head. Whether the association of posterior wounds and death is related to anatomy, intent or both, the posterior head wounds still suggest that those men may have been unprepared to fight (e.g. surprise attack and/or no weaponry) and had to take defensive bodily

positions. Another possibility is that they were intentionally killed "execution style" with a lethal blow to the posterior of the head.

Discussion and conclusions

"Acceptable" violence against Wari-era women

The data presented above show that during the time of Wari rule there was a remarkably similar patterning of wound locations among women (i.e. the majority of wounds on the posterior cranial vault). This may reflect some sort of pan-Andean treatment of women as it related to violence against them. That is, the status and roles of women in society may have been similar at elite, commoner, heartland and hinterland sites within the Wari domain. This suggests that perhaps there were broad social norms regarding how women were to be treated, including how they could be physically abused. The potential abusers are many; they could have been male partners, the most common abuser of women in the modern era (Rodseth and Novak 2009; Walker 1997) or affines, especially a mother-in-law, a disciplinary abuser that has been well-documented among indigenous Andean communities (Van Vleet 2002). Other attackers could include co-wives if Andean marriage practices included polygyny, as suggested by Isbell (Isbell and Cook 2002). Ethnographic studies show that physical conflict between co-wives is not uncommon. For example, in eastern Bolivia there is fighting between Siriono co-wives who sometimes use digging sticks as weapons (Holmberg 1950). Overall, polygynous societies experience female-female conflict much more commonly than societies with other marriage forms (Levinson 1989). However, this was apparently not the dominant marriage practice in the Wari heartland, though some elite males may have had multiple wives (Tung 2012). Another possibility is that, given Andean kinship rules in which ancestor-descendent relationships are traced through the male or female line (Zuidema 1977), lower-ranked women could have been abused by higher ranking women.

Although there are a number of different categories of persons who could have abused women, the key point is that a fair number of women were physically abused, and they were abused in quite similar ways. The blows were not lethal,[1] but they were done primarily when women were defenceless or at least when they were not offensively engaged in a fight. These shared traits of violent injury may suggest that sub-lethal physical abuse of women was permissible; it was a social norm and not viewed as a social transgression. In contrast, the ongoing battering (repeated abuse) of a woman was apparently not acceptable. The average number of wounds per injured woman is only 1.5. (The sole female with multiple wounds was an unusual case; she was identified as a possible non-local at Conchopata and this "outsider" status may have marked her as suitable for abuse; Tung 2012.)

This pattern of female trauma in which about a quarter of them exhibit sub-lethal cranial trauma, but not repeated trauma, is more in line with broader social notions of female subordination and the related understanding that women can be disciplined through physical punishment, usually by their male partners (Rodseth and Novak 2009). In contrast, "battering – a distinct mode of human aggression – ... does not necessarily imply a generalized antagonism toward women. On the contrary, it seems to reflect ... an overemphasis on conjugal intimacy and exclusivity" in which a typically male partner repeatedly abuses his intimate partner for perceived transgressions (Rodseth and Novak 2009: 300). These authors are drawing from modern and historical examples to make this claim and, while their emphasis on male control of female sexuality as a cause for battering may not be wholly applicable to pre-Hispanic populations, the distinction between "wife-beating" and "wife-battering" is

important. Wife-beating – the occasional beating when the wife has done something deemed inappropriate – may be commended by both men and women "as a sign of traditional authority and domestic discipline", but wife-battering is viewed as "deplorable in virtually all societies [and] should be distinguished from 'ordinary' beatings" (Rodseth and Novak 2009: 308; see also Counts et al. 1992). If this is accurate, then the sizeable proportion of Wari era women with sub-lethal, single wounds seems to suggest that occasional, non-deadly, "disciplinary" beatings were deemed appropriate. However, it is unclear if those beatings were done by intimate partners, other family members or some judicial authority. What is clear is that vicious, repeated attacks against Wari-era women were not acceptable, a social norm that appears to shift after the decline of the Wari Empire.

Increasing social tensions and dual social roles: "wife-battering" and female combat

After the demise of Wari state infrastructure and the concomitant changes in political and social organization, women's roles seem to have undergone a dramatic change. Although some women still received sub-lethal head injuries, they were more numerous, suggesting more vicious attacks (many blows in one event) or they could have suffered from repeated attacks. Notably, violence against women also became more deadly, just as it did for men. This may reflect some broader sociopolitical changes, such as heightened social tensions and outbreaks of war. Indeed, previous research has shown that the post-Wari era (the Late Intermediate Period, LIP) was a time of conflict and war in the Andes; this is evidenced by increases in violence-related trauma in the LIP (Andrushko and Torres 2011; Schjellerup 1997; Torres-Rouff and Costa Junqueira 2006; Tung 2008) and the construction of defensive architecture throughout much of the highlands (Arkush 2010; Covey 2008; Stanish et al. 1997; Wernke 2006).

The spatial patterning of wounds also shifts dramatically, suggesting that many post-Wari women engaged in face-to-face conflicts. Those injuries could have been sustained in contexts as diverse as domestic abuse when a woman faces her intimate partner during an argument (Rodseth and Novak 2009) or sustained while fighting in war or raids on one's community. In the modern West, sub-lethal trauma to the anterior of the head – the face in particular – is a common injury pattern among victims of domestic violence (Rodseth and Novak 2009; Walker 1997), and several of the females exhibit that kind of trauma pattern. In particular, three women (Cran 43, 60 and 63) have healed fractures on the left nasal bone, suggesting that they were hit in the face by a right-handed attacker (Figure 18.11). Further, all three of those women exhibit ante-mortem tooth loss of the anterior maxillary dentition, suggesting that the tooth loss may have been related to a blow to the face (Figure 18.11), and two of them (Cran 43 and 63) exhibit evidence for a traumatic dislocation of the mandible (i.e. a shallow and reformed temporo-mandibular joint (TMJ) with porosity and lipping). The broken noses, knocked out teeth and dislocated jaw all could have happened in the same violent event, as all three cases show evidence for healing of each fracture and dislocation (i.e. nasal bones are healed, sockets have resorbed and the TMJ is reformed). However, it is also possible that these are cases of injury recidivism in which the women were hit in separate violent incidences, actions more akin to "wife-battering". In fact, of those three women that show broken noses and missing front teeth, all of them exhibit at least one other head wound. One of them (Cran 43) has a nearly complete healed wound on the left temporal (a possible side-swipe by a right-handed attacker), and its different state of healing suggests that she was attacked on different occasions. Granted, healing rates on distinct cranial regions can differ; however, the numerous traumatic lesions on injured women suggest that many of them were suffering from repeated

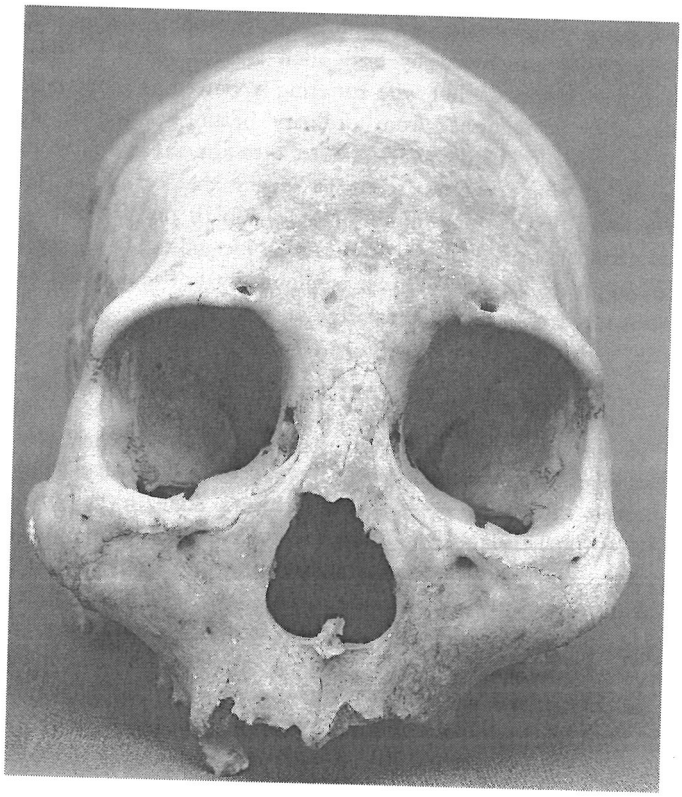

Figure 18.11 Adult female (Cran 43) with healed fracture on left nasal bone and ante-mortem tooth loss, both of which are likely related to a violent incident.

beatings or from repeatedly engaging in fights. Additional evidence that women could be victims of repeated attacks is seen in three other females (Cran 42, 44 and B) who exhibit both ante-mortem and peri-mortem head wounds. There is fourth female with peri-mortem head wounds, and in all four cases, the women exhibit at least two peri-mortem cranial fractures, indicating that there was a succession of deadly hits to the head, some so severe that they blew out entire portions of the cranium. These data indicate that post-Wari women could be repeatedly victimized in vicious violent attacks that sometimes turned deadly and some of those attacks could have been at the hands of domestic partners. Those repeated abuses against women are alarmingly similar, suggesting that there were social norms about how women were to be beaten and battered, and this hints at a kind of gender-based violence that was prevalent in post-Wari society. Women may have been beaten – and beaten in particular ways – because of their sex. That is, their identity as women marked them as appropriate for repeated abuse, some of which occurred within the household.

However, not all of the female injuries may have been sustained in domestic disputes, for the patterning of wounds also suggests that they were taking more offensive positions and perhaps willingly engaging in fights or combat. Many of the anterior head wounds on females are on the left side (Figure 18.9), a pattern more commonly observed in injured males. While the broken noses and dislodged teeth discussed above could have resulted from a fist to the face, the oval-shaped cranial fractures on the left frontal bone suggest the use of a blunt force weapon. Could this suggest that women were also fighting in combat or in attacks on their

community in which they had to fight more offensively? If so, this would have been a dramatic change to women's roles relative to the preceding Wari era. There is no iconographic evidence to suggest that women (or men) were being trained for military activity,[2] although the defensive architecture and weapons caches (sling stones) at many LIP (post-Wari) sites suggests that communities were gearing up for conflicts or at least attempting to protect themselves from attack. Thus, there was communal awareness of potential battles and raids to come, and this could have necessitated a shift in roles and responsibilities for post-Wari females. That is, women may have had to take on more combative roles because of the broader sociopolitical changes that ushered in an era of conflict and warfare.

As women were brought into obligations of community defence, this novel social role could have become a new norm, even an expectation. As each female engaged in these new militaristic-like activities, from defence preparations to actual fighting, notions of female identity and their roles in society would have changed. It is likely that many social roles were changing and individuals were becoming less specialized and more generalized, relative to the Wari era. In Wari times, there were political elites, ritual specialists, master artisans and a special class of military personnel who would have been highly trained and skilled in their particular specialty (Isbell and Cook 2002; Ochatoma and Cabrera 2002; Pozzi-Escot 1991; Tung 2012). These categories of experts diminished after the demise of Wari, and individuals were likely to have been expected to perform a variety of tasks, including agricultural production, food preparation, ceramic manufacture, ritual obligations and community defence. Post-Wari females may have been taking an active role in this latter community obligation and suffering violence-related injuries as a result.

Granted, the high rate of trauma observed on female crania could be that they were simply victims of violent raids or brutal partners; however, the great proportion of anterior head wounds suggests that they were facing their attackers, attempting not only to defend themselves – often successfully (i.e. they survived) – but to fight back. Rather than assume that their physical resistance was merely a "will to survive", it is possible that war preparations and concerns for defence altered structural norms regarding gender roles, expanding the range of actions that a woman might take. Although these changes had dire consequences for female morbidity and mortality, it shows the way that social structures and human agency can interact to create novel behaviours. In other words, as these broader changes in sociopolitical organization were occurring, post-Wari females were altering their behaviours, perhaps engaging in the planning and implementation of community defence. As they did this, they were simultaneously altering the sociopolitical structure of post-Wari society in the former imperial heartland. As Sewell (2005: 127) noted, if individuals "act in innovative ways", they can change those very same social structures that informed and shaped their ability to act. This may have been occurring in the post-Wari era when females who engaged in the development and enactment of defence strategies essentially created a path for other women to do the same, thereby changing female social norms as they related to women's roles in violence, aggression and community defence.

This discussion of two contexts in which women could have been injured and killed – domestic abuse and community defence – may seem at odds with each other because in one setting they are identified as victims and in another they are characterized as active agents engaging in combat. However, ethnographic studies have shown that domestic abuse increases with war and war preparations (Lutz 2004, 2007; Nordstrom 1998). Thus, post-Wari females could have indeed been suffering from abuse that came from within the household, while simultaneously participating in the defence of the community, showing how multiple social identities can be ascribed to a category of individuals, females in this case. It is also possible that different classes of women were battered, while others engaged in combat. However, differences in burial

type, which can be used as a proxy for social class (Dillehay 1995), cannot be examined because all were buried together in a large pit. Furthermore, comparisons of general physiological health as measured by cribra orbitalia (CO) and porotic hyperostosis (PH) show no significant differences between females probably injured in domestic contexts (CO or PH was present on all three females with broken noses and knocked-out front teeth) versus those injured or killed in fights or combat (CO or PH was present on 3/7 females with peri-mortem trauma or large, healed anterior head wounds) (Fisher's exact, $p = 0.1667$, $n = 10$). Thus, although one group of females seems to exhibit wounds consistent with 'wife-battering' and another group have wounds more consistent with fighting, it is unclear whether these trauma differences are correlated to health status, and thus, perhaps social status. Did a female's social status structure the kind of violence she might experience? This remains an open question.

Nonetheless, the cranial trauma data from the Wari and post-Wari eras show a clear increase in the percentage of women who suffered violence-related injuries, while the spatial patterning of the wounds and the increase in lethality suggest that the social conditions were also quite distinct. Wari females appear to have suffered relatively mild abuse that was rarely, if ever, repeated; this suggests that they may have received "disciplinary" beatings from intimate partners, some other community member or from some judicial authority. There is no evidence to suggest that Wari women were engaging in combat or attempting to square-off with an opponent. In the succeeding post-Wari era, women seem to be victims of "wife-battering" in which they are repeatedly hit in one or several violent events. Post-Wari women may have also engaged in combat or the active defence of their community, revealing a dramatic shift in the range of roles that a female might embody. These two potential contexts of violence are not mutually exclusive; rather, they demonstrate how a time of social strife is associated with both household violence and violence in war, and they reveal the varied roles that women might enact during a time of social transformation, while they simultaneously further those social transformations through their individual reactions and actions.

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Notes

1 The exception is a female at Beringa who exhibits two coterminous peri-mortem wounds on the posterior of the cranium. That, combined with injury patterns of other Beringa inhabitants and the defensibility of the site, suggests that some of those women may have been victims of raids.
2 In contrast, Wari iconography shows men in battle gear carrying weapons, suggesting that there was a military class and perhaps associated military training.

References

Andrushko, V. A. and E. Torres. 2011. Skeletal evidence for Inca warfare from the Cuzco region of Peru. *American Journal of Physical Anthropology* 146: 361–72.

Arkush, E. N. 2010. *Hillforts of the Ancient Andes: Colla Warfare, Society, and Landscape*. Gainesville, FL: University Press of Florida.

Benavides, M. C. 1991. Cheqo Wasi, Huari. In W. H. Isbell and G. F. McEwan (eds), *Huari Administrative Structure: Prehistoric Monumental Architecture and State Government*. Washington, DC: Dumbarton Oaks, pp. 55–70.

Boström, K., C. G. Helander and S. Lindgren. 1992. Blunt basal head trauma: aspects of unconsciousness. *Acta Neurochirurgica Supplementum* 55: 25–8.

Bourdieu, P. 1990. *The Logic of Practice*, trans. R. Nice. Stanford, CA: Stanford University Press.

Counts, D. A., J. K. Brown and J. Campbell 1992. *Sanctions and Sanctuary: Cultural Perspectives on the Beating of Wives*. Boulder, CO: Westview Press.

Covey, A. R. 2008. Multiregional perspectives on the archaeology of the Andes during the Late Intermediate Period (c. AD 1000–1400). *Journal of Archaeoligical Research* 16(3): 287–338.

Dillehay, T. (ed.). 1995. *Tombs for the Living: Andean Mortuary Practices*. Washington, DC: Dumbarton Oaks.

Giddens, A. 1976. *New Rules of Sociological Method: A Positive Critique of Interpretative Sociologies*. New York: Basic Books.

——1979. *Central Problems in Social Theory: Action, Structure, and Contradiction in Social Analysis*. Berkeley, CA: University of California Press.

——1984. *The Constitution of Society: Outline of the Theory of Structuration*. Berkeley, CA: University of California Press.

Holmberg, A. R. 1950. *Nomads of the Long Bow: The Siriono of Eastern Bolivia*. Washington, DC: US Govt. Print. Off.

Isbell, W. H. and A. G. Cook. 2002. A new perspective on Conchopata and the Andean Middle Horizon. In H. Silverman and W. H. Isbell (eds), *Andean Archaeology II: Art, Landscape, and Society*. New York: Kluwer Academic Press, pp. 249–305.

Knudson, K. J. and T. A. Tung. 2011. Investigating regional mobility in the southern hinterland of the Wari Empire: biogeochemistry at the site of Beringa, Peru. *American Journal of Physical Anthropology* 145: 299–310.

Kurin, D. S. 2012. The bioarchaeology of collapse: Ethnogenesis and ethnocide in post-imperial Andahuaylas, Peru (AD 900–1250). PhD thesis, Vanderbilt University.

Larsen, C. S. 1997. *Bioarchaeology: Interpreting Behavior from the Human Skeleton*. Cambridge and New York: Cambridge University Press.

Levinson, D. 1989. *Family Violence in Cross Cultural Perspective*. Newbury Park, CA: Sage Publications.

Lovell, N. C. 1997. Trauma analysis in paleopathology. *Yearbook of Physical Anthropology* 40: 139–70.

Lutz, C. 2004. Living room terrorists. *Women's Review of Books* XXI(5): 17–18.

——2007. Militarization. In D. Nugent and J. Vincent (eds), *A Companion to the Anthropology of Politics*. Oxford: Blackwell Publishing, pp. 318–31.

Málaga Linares, E. 1990. *Pre-historia de Arequipa*. Arequipa: Universidad Nacional de San Augustín.

Nordstrom, C. 1996. Rape: politics and theory in war and peace. *Australian Feminist Studies* 23: 147–62.

——1998. Deadly myths of aggression. *Aggressive Behavior* 24: 147–59.

Ochatoma, J. A. and M. R. Cabrera 2002. Religious ideology and military organization in the iconography of a D-shaped ceremonial precinct at Conchopata. In H. Silverman and W. H. Isbell (eds), *Andean Archaeology II: Art, Landscape, and Society*. New York: Kluwer Academic Press, pp. 225–47.

Pozzi-Escot, D. B. 1991. Conchopata: a community of potters. In W. H. Isbell and G. F. McEwan (eds), *Huari Administrative Structure: Prehistoric Monumental Architecture and State Government*. Washington, DC: Dumbarton Oaks, pp. 81–92.

Rodseth, L. and S. A. Novak. 2009. The political significance of gender violence. In M. N. Muller and R. W. Wrangham (eds), *Sexual Coercion in Primates and Humans: An Evolutionary Perspective on Male Aggression Against Females*. Cambridge: Cambridge University Press, pp. 292–321.

Ropper, A. H. 2010. Concussion and other head injuries. In S. Hauser (ed.), *Neurology*. New York: McGraw-Hill, pp. 400–7.

Schjellerup, I. R. 1997. *Incas and Spaniards in the Conquest of the Chachapoyas: Archaeological and Ethnohistorical Research in the Northeastern Andes of Peru*. Copenhagen: National Museum of Denmark.

Sewell, W. H. 2005. *Logics of History: Social Theory and Social Transformation*. Chicago, IL: University of Chicago Press.

Stanish, C., et al. 1997. *Archaeological Survey in the Juli-Desaguadero Region of Lake Titicaca Basin, Southern Peru*. Chicago, IL: Field Museum of Natural History.

Torres-Rouff, C. and M. A. Costa Junqueira 2006. Interpersonal violence in prehistoric San Pedro de Atacama, Chile: behavioral implications of environmental stress. *American Journal of Physical Anthropology* 130: 60–70.

Tung, T. A. 2007a. The village of Beringa at the periphery of the Wari Empire: a site overview and new radiocarbon dates. *Andean Past* 8: 253–86.

——2007b. Trauma and violence in the Wari empire of the Peruvian Andes: warfare, raids, and ritual fights. *American Journal of Physical Anthropology* 133(3): 941–56.

——2008.Violence after imperial collapse: a study of cranial trauma among Late Intermediate period burials from the former Wari capital, Ayacucho, Peru. *Nawpa Pacha* 29: 101–18.

——2009. *Informe preliminar: analisis de los oseos humanos del sector Monqachayoq, Hauri.* Submitted to the Instituto Nacional de Cultura, Ayacucho.

——2012. *Violence, Ritual, and the Wari Empire: A Social Bioarchaeology of Imperialism in the Ancient Andes.* Gainesville, FL: University Press of Florida.

——2013. Making warriors, making war: violence and militarism in the Wari Empire. In A. K. Scherer and J. Verano (eds), *Embattled Bodies, Embattled Places: War in Pre-Columbian America.* Washington, DC: Dumbarton Oaks, pp. 229–58.

UNICEF. 1996. *The State of the World's Children.* Oxford: Oxford University Press.

Van Vleet, K. E. 2002. The intimacies of power: rethinking violence and affinity in the Bolivian Andes. *American Ethnologist* 29(3): 567–601.

Walker, P. L. 1997. Wife beating, boxing, and broken noses: skeletal evidence for the cultural patterning of violence. In D. K. Martin and D. W. Frayer (eds), *Troubled Times: Violence and Warfare in the Past.* Amsterdam: Gordon and Breach Publishers, pp. 145–79.

——2001. A bioarchaeological perspective on the history of violence. *Annual Review of Anthropology* 30: 573–96.

Walker, P. L. and D. C. Cook, 1998. Gender and sex: vive la difference. *American Journal of Physical Anthropology* 106(2): 255–59.

Wernke, S. A. 2006.The politics of community and Inka statecraft in the Colca Valley, Peru. *Latin American Antiquity* 17(2): 177–208.

Wies, J. R. and H. J. Haldane (eds). 2011. *Anthropology at the Front Lines of Gender-based Violence.* Nashville, TN: Vanderbilt University Press.

Zuidema, R. T. 1977. The Inca kinship system: a new theoretical view. In R. Bolton and E. Mayer (eds), *Andean Kinship and Marriage.* Washington, DC: American Anthropological Association, pp. 240–92.

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