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Reviewed Article:

A Picenian Warrior Who Lived in the Eight Century BC: A Hypothetical Reconstruction

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The Iron Age in Central Italy is a period that begins in the tenth century BC and ends as the Romans take control over other Italic populations. Italy is divided longitudinally by the Apennines and the definition of 'Central Italy' includes the actual regions of Lazio and Toscana to the west, Umbria in the middle, Marche and Abruzzo on the east side of the Apennines. These regions border on Liguria and Emilia-Romagna in the north, Campania and Molise in

the south. We also have the Tyrrhenian Sea on the shores of Lazio and Tuscany and the Adriatic Sea adjoining Marche and Abruzzo.



This

reconstruction of the Picenian warrior is the natural evolution of the subject of my thesis: iron smithing in the eighth century BC. (...) While making this reconstruction, I tried to record as much information as possible in order to create a database that may prove helpful for the analysis of archaeological findings.

Various populations inhabited this territory from the tenth to the early third century BC, when the Roman army took control of it: the Laziali and Sabini in Lazio, the Etruscans and, from the fifth century, Celts in Toscana and Emilia Romagna, Umbri in Umbria and Picenians in Marche and Abruzzo. At the beginning of the Iron Age, and until the eighth century, we have evidence of other populations as well. The most ancient group being the Sub-Apenninical culture, which were Villanova and Proto-Villanovan populations that seem to have had towns in the Region Marche. One of the most ancient, Ancona, dates to the Neolithic and is situated on the Italian shores of the Adriatic. There are also signs of Eastern European cultures, such as the Illyrians from Albania and other Balkan populations. Celts conquered the upper half of Marche around the fourth century BC, founding the town of Sena Gallica, actually Senigallia, 30 kilometres north of Ancona, which by that time was known as the Greek colony of Ankon.

Marche and Abruzzo are characterized by a particular geographical feature: the area develops from high mountains (Mt. Catria, 1702 m, Mt. Vettore, 2478 m and Mt. Corno, 2912 m) to a hill zone that extends towards the sea for 25-30 km before reaching the shoreline, which is mainly linear except for the Mt. Conero promontory, the only height on the sea between Trieste, north, and the Gargano, south. Hydrography is another unique feature of the land: it has a 'comb shape' because of the regular conformation of the rivers that flow almost parallel each other into the sea, thus forming long valleys that facilitate trade and transhumance (*Eroi e regine – Piceni popolo d'Europa* 2001, 5-53). Another positive trait of these long valleys is that they influence maritime navigation. Sailing along the coast with a sailboat, I noticed how, at the mouth of the rivers, the wind piped for miles along the valleys is constant and always strong, facilitating navigation.

These particular features were used by humans since ancient times (Alfieri 1990, Bocchini Valani 1990). Unpublished, Neolithic obsidian tools found in Ancona, Cessapalombo and Chieti testify to traders navigating the coast. From the Bronze Age, at least, there are traces of an intense deforestation aimed to increase arable and grazing areas (*Eroi e regine – Piceni popolo d'Europa* 2001). From this period, and for all times following, the growing and harvesting of winter and summer cereals such as einkorn (*Triticum monococcum*), dicocco (*Triticum dicoccum*), wheat (*Triticum*) and spelt (*Triticum spelta*) is well attested. There is also evidence of barley (*Hordeum vulgare*) (in both the 'naked' and 'covered' varieties), of legumes such as favino (*Vicia faba*), Erva and cicerchia (*Lathyrus sativus*). Fruit trees, such as

the grapevine (*Vitis vinifera*), olive (*Olea europaea*), chestnut (*Castanea sativa*) and walnut (*Juglans regia*), complete the set (*Eroi e regine – Piceni popolo d'Europa* 2001, 5-10; Linné 1753).

It is with this background that the Picenian culture was born in the ninth century BC. With their advent we see, for the first time, a progressive awareness towards actions that determine the deterioration of the physical environment and the subsequent adoption of techniques for its containment. Some important works of environmental protection are due to the Picenians. This includes the footholds of slopes - a good example is the recently excavated village of Montelupone, which is still under study (Fiorentini 2011, 16) - and the channelling of rivers (*Eroi e regine – Piceni popolo d'Europa* 2001, 6). The vast historical territory then seems to remain unchanged until the Middle Ages when, after major flooding events, people again recognize the importance of the judicious use of the environmental resources.

Moreover, it is certain that Picenians participated in navigation and maritime trade for the whole duration of their culture. Both literary and archaeological evidence testifying this liaison with the sea can be found in quantity and in all ages. This evidence includes perforated shells, a Balkanic grinding stone and pins with disk-like heads of tenth and ninth century BC, as well as the introduction of iron by the Illyrians who settled in Novilara. From the beginning of seventh century there is the 'Piceno III' age, often nicknamed the 'Orientalizing Age' because the trans-Adriatic relationships become stronger. From this period we have the introduction and massive spread of Attic pottery, Baltic amber and glass, shells and scarabs from Egypt (Percossi Serenelli 1998, 17-32).

While these commercial trades, of which, in more recent times, even Plinio il Vecchio (Nat. Hist. 16, 76, 196) and Vitruvio (De Arch. 2, 10) will talk, continue, a fundamental find born, which is determinant for the analysis of the relationship between the Picenians and the sea: the Novilara stele engraved with a naumachia scene.

On this sixth century BC engraved stone is showed a battle between two Picenian war boats (both with an innovative and modern rudder hinged to the transom, a technology which will be rediscovered in Late Middle Age only), a mercenary one defending a Greek merchant ship (filled with slaves and agricultural products, typic of the Region as Strabone wrote in 5, 240) and another, losing the fight, which try to assault the Greek vessel (*Eroi e regine – Piceni popolo d'Europa* 2001, 33-34; Fiorentini 2011, 39-42). This important document irrefutably confirms the close relationship of the Picenians with the sea. (*Eroi e regine – Piceni popolo d'Europa* 2001, 58-62, 139-163)

Here is my hypothetical reconstruction of an Iron Age warrior. This warrior is born and grows up among the Picenians, during the first years of the Orientalising era. Hence he lived between Regions Marche and Abruzzo, between eighth and seventh century BC (*Eroi e regine*

– *Piceni popolo d'Europa* 2001, 5-35). The figure that I reconstructed is a middle-class worker, which was inspired by the funerary outfit found in the fisherman-warrior grave in Ancona (Lollini 1972, 117-151, *Eroi e regine – Piceni popolo d'Europa* 2001, 277-278).

The paucity of this outfit, when compared with other graves such as the magnificent outfit of the prince found in grave 182 in Matelica, who was buried with his dogs, jewellery and pottery, two war chariots, two bronze sceptres and weapons like spears, Greek swords, double-headed axe, bronze helmets and cuirass (di Bretschneider 2008, 197-244), encouraged me to undertake experiments with organic materials and to propose new interpretations for some archaeological findings the identification and use of which, in the absence of evidence that have not survived, is currently uncertain.

This method is applied to the equipment of my warrior, which I will describe from head to toe. The hat is made of five layers of raw linen, glued and sewn together making a cone. It is a rigid and enveloping headgear, which does not interfere with hearing or sight. It offers a limited protection against direct blows, but it can be useful in deadening weak blows not aimed directly at the head. It is an economical way to protect the head that was widespread among many Iron Age cultures such as the Etruscans, the Oscan and other Alpine ones (*Eroi e regine – Piceni popolo d'Europa* 2001, 27 and 33; Martinelli 2004, 25; Torelli 2000, 190; Homerus X 261, Hencken-Saulnier 1971, 27-28, 58, 85 Figure 58; Wary 1980, 44. Also compare archaeological findings such as Sardinian and Oscan votive figures stored at the Archaeological Museums in Cagliari, Sassari and Nocera Umbra)¹.

Defensive equipment from the individual's torso was also reconstructed. The short tunic is made of raw linen. Due to the lack of evidences among the Picenians (di Bretschneider 2008, 65), I modelled it on the near Etruscan frescoes (Torelli 2000, 344-363), adopting longer sleeves that would provide greater protection against small abrasions than short sleeves. More recent Samnite frescoes and reliefs (which can be seen in Paestum) show details of the torso's equipment. A small rope was likely used as a belt.

The kardiophilax is composed of a pectoral and a dorsal disc, one bigger than the other (*Eroi e regine – Piceni popolo d'Europa* 2001, 120-121, 240-243, 252-254; di Bretschneider 2008, 209-210). Each of them has been made by pasting together four layers of linen, then sewing it to a leather disc that was then hardened with boiled salted water. I replicated the suspension system that can be seen on the Guardiagrele Warrior and on the Capestrano Warrior (*Eroi e regine – Piceni popolo d'Europa* 2001, 240-243), using a leather strap and a smaller string. The decoration represents the chimera, which is typical of the 'Paglieta' kardiophilax, dating to the seventh-eighth century (*Eroi e regine – Piceni popolo d'Europa* 2001, 120-122, 253). It is the poor person's version of the widespread bronze kardiophilax (Papi 1990). Tested against a rock thrown with a sling from a distance of 15 meters, the cuirass absorbed the impact, but it's not clear what injuries the warrior would have sustained.

The sword belongs to the 'Novilara' type, being a short curved sword, single edged with a thick back and a long tang (*Eroi e regine – Piceni popolo d'Europa* 2001, 200-201; Lollini 1972, 117-151; Maroni 1992; *Piceni popolo d'Europa* 1999, 54). Forging it from a raw iron ingot required 6 hours and 6 kilos of vegetal coal, a quench in sweet water, resulting in strong iron enriched with carbon (Fiorentini 2011, 168-173). The handle is yew wood, decorated with 'dice's eyes' and the sheath is leather, lightly hardened with boiling water and decorated with motifs typical of the era (Peroni 1979, see also unpublished razors at the Archaeological Museum of Ancona). The suspension system with three leather strings has been hypothesized judging by the one seen on the Capestrano Warrior (*Eroi e regine – Piceni popolo d'Europa* 2001, 240-241) and has been adapted for the use of two bronze rings like those found near the sword of the fisherman-warrior in Ancona (see the unpublished rings stored at the Archaeological Museum of Ancona). This system has proved to be functional for the suspension and drawing of the sword, including the speed of pulling a slashing blow, thereby validating the hypothesis (*Eroi e regine – Piceni popolo d'Europa* 2001, 114). This suspension system performs much like the Ancona originals, perhaps suggesting the existence of this type of suspension system in that case too. On the other hand, this system proved to be too unstable while running and simulating combat, so I modified it by removing one of the straps and using the kardiphilax leather string to secure the two components together. As a result, everything is much more stable and firm, even under stress.

The last piece of defensive equipment is the war belt, a very popular piece of armour, which was perhaps distinctive of the warrior class (Lollini 1972, Maroni 1992, Martinelli 2004, *Piceni popolo d'Europa* 1999, *Eroi e regine – Piceni popolo d'Europa* 2001, di Bretschneider 2008). I made it by cutting a single strap of hard leather and reinforcing it by other squares of leather. The whole thing is quite sturdy and didn't need to be hardened. The belt is fastened with a copper alloy hook. Though very few examples of leather belts have survived, dozens of similar hooks, have been recovered from Picenian tombs dating to seventh-ninth century BC. The hook created for this study is based on one recently found in the Novilara necropolis.

The sling is made of two leather strings and a pouch; its laces are 90 centimeters long and it has been used to throw many kind of bullets: irregular shaped stones, rounded stones, replicas of biconical and rounded clay bullets found in Southern Italy (Radmilli 1975, Figure 20), replicas of lead glans found in Ascoli Piceno (Naspi-Radelli 2011, 4-7) and replicas of the winged lead glans found in Cyprus (Naspi-Radelli 2011, also see www.slinging.org). These various bullets performed differently: e.g. velocity, drag and penetration. The maximum distance achieved was about 140 meters. Further distance tests made with another sling, a shorter braided one, barely reached 60 meters.

These results, however, are subject to continuous change due to the level of my training. Slings more experienced than me managed to achieve better results: in 2006 Mr. Jerzy Gasperowicz managed to throw a bipointed lead bullet (of which we do not know the mass) at

505 meters; Larry Bray threw a 52 grams stone at 437, 1 meters in 1982, but the current world record is held by David Engvall who, in 1992, used a modern sling of 127 centimeters in length to throw a metal dart that weighed 62 grams at a distance of 477 meters (see list at www.slinging.org)

All these (and many others) results have exceeded expectations of scholars like Ferrill, Connolly and Korfmann (Richardson 1998), so it is not wrong to say that research on this topic is still in progress.

The use of slings among the Picenians seems proven by the naval battle in the Novilara stele (Fiorentini 2011, 31-42, *Eroi e regine – Piceni popolo d'Europa* 2001, 33, www.slinging.org) dating to the seventh century and by some unpublished bullets (recent findings in Sirolo).

According to the smallness of the fisherman-warrior funeral outfit, I reconstructed the equipment of a humble warrior, a slinger from scant economic means. For this reason, and because of the few sources related to his social class (*Eroi e regine – Piceni popolo d'Europa* 2001, 256-262, see also unpublished footgear stored at the Archaeological Museum of Chieti), I decided not to reconstruct shoes or sandals yet. The only surviving evidences of footgear are a couple of female sandals found in Campovalano which were a product of the Etruscans (*Eroi e regine – Piceni popolo d'Europa* 2001, 262) and four pairs of iron crampons found in Nocciano, Campovalano, Loreto Aprutino and Capestrano (*Eroi e regine – Piceni popolo d'Europa* 2001, 256). The statue of the Capestrano Warrior is wearing sandals, but it depicts a chieftain. On the other side, not a single votive bronze figurine depicting a warrior shows footgear, even if in some cases this may be considered part of the heroic nudity.

That is why I preferred not to engage in a reconstruction while I do not have more reliable data.

In any case, my warrior is shaven, a common practice judging by the great number of retrieved razors (Dall'Osso 1914, Peroni 1979); and though from a lower economic class, the warrior had an excellent sword, the first iron weapon that could outmatch bronze ones (Fiorentini 2011, 18-23; *Eroi e regine – Piceni popolo d'Europa* 2001, 114). His desire to emulate the more wealthy warriors can be seen from the accurate decorations upon the sword handle and sheath, as well as upon the kardiphilax. This practice of emulation declines under increasing Greek influence, as they standardized styles in the civilian and military life of the Picenians.

While making this reconstruction, I tried to record as much information as possible in order to create a database that may prove helpful for the analysis of archaeological findings. For example, the stone I polished my sword with show peculiar signs of use that may be compared with those that can be found in stones recovered from an archaeological site. The forge I used to smith the sword produced some waste (mostly iron and coal) that is totally

coherent with the waste that can be found digging a forge. Much more information can be gathered by analyzing the use-wear accumulated on the tools I used to reproduce this warrior's outfit.

This reconstruction of the Picenian warrior is the natural evolution of the subject of my thesis: iron smithing in the eighth century BC. If I studied how the forge works, which impact has a forge on the surrounding area, which could have been the social status of an ancient ironsmith and what it takes to turn an iron ingot into a reliable steel blade, the purposes of this reconstruction are many.

As I wrote before, the main purpose was to see if there were other possible interpretations of some finds, such as the bronze rings of the Novilara sword found in Ancona, of which I tested the functionality as part of the suspension system. Another important goal was to study how the equipment wore out from time and use. Many original blades have unusual and asymmetric shapes, which are, in my opinion, due to constant use and re-sharpening. I am going to take note of how my sword's shape changes after each resharping in order to confirm or deny my hypothesis.

Many more uses for this kind of information. That is why I am ready to give my concrete contribution to those interested in deepen the archaeological and anthropological study of this and other contexts sharing my studies and my assumptions.

¹ Bronzetti sardi, figurina umbra, Eroi e regine pagg 27, 33, Lancia spada cavallo pag. 25, Gli Etruschi pag. 190, Iliade X, 261 – 265; The earliest Europ helmets pag. 27-28, pag. 58, pag 85 Figure 58, Warfare in the classical world pag 44, originale Tedesco.

Link(s)

<http://www.slinding.org/forum/YaBB.pl>

<http://etadelferro.forumfree.it>

<https://www.youtube.com/user/Mauro0Sub0Fipsas?feature=mhee>

🔖 Keywords **weapon**
sword

🔖 Country Italy

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FIG 1. FIRST HYPOTHESIS



FIG 2. SECOND HYPOTHESIS WITH DIFFERENT SUSPENSION SYSTEM



FIG 3. OVERVIEW OF THE WAR BELT



FIG 4. CLOSE UP PICTURE OF THE BELT'S HOOK



FIG 5. THE SLING POUCH WITH SIGNS OF WEAR - INTERNAL



FIG 6. THE SLING POUCH WITH SIGNS OF WEAR - EXTERNAL



FIG 7. NOVILARA TYPE SWORD



FIG 8. FINAL SUSPENSION SYSTEM



FIG 9. NOVILARA TYPE SWORD WITH MAKER'S MARK



FIG 10. NOVILARA TYPE SWORD DECORATION



FIG 11. KARDIOPHYLAX DECORATION