The Different Steps of the Rough-Hewing on a Monumental Sculpture at the Greek Archaic Period: the Unfinished Kouros of Thasos

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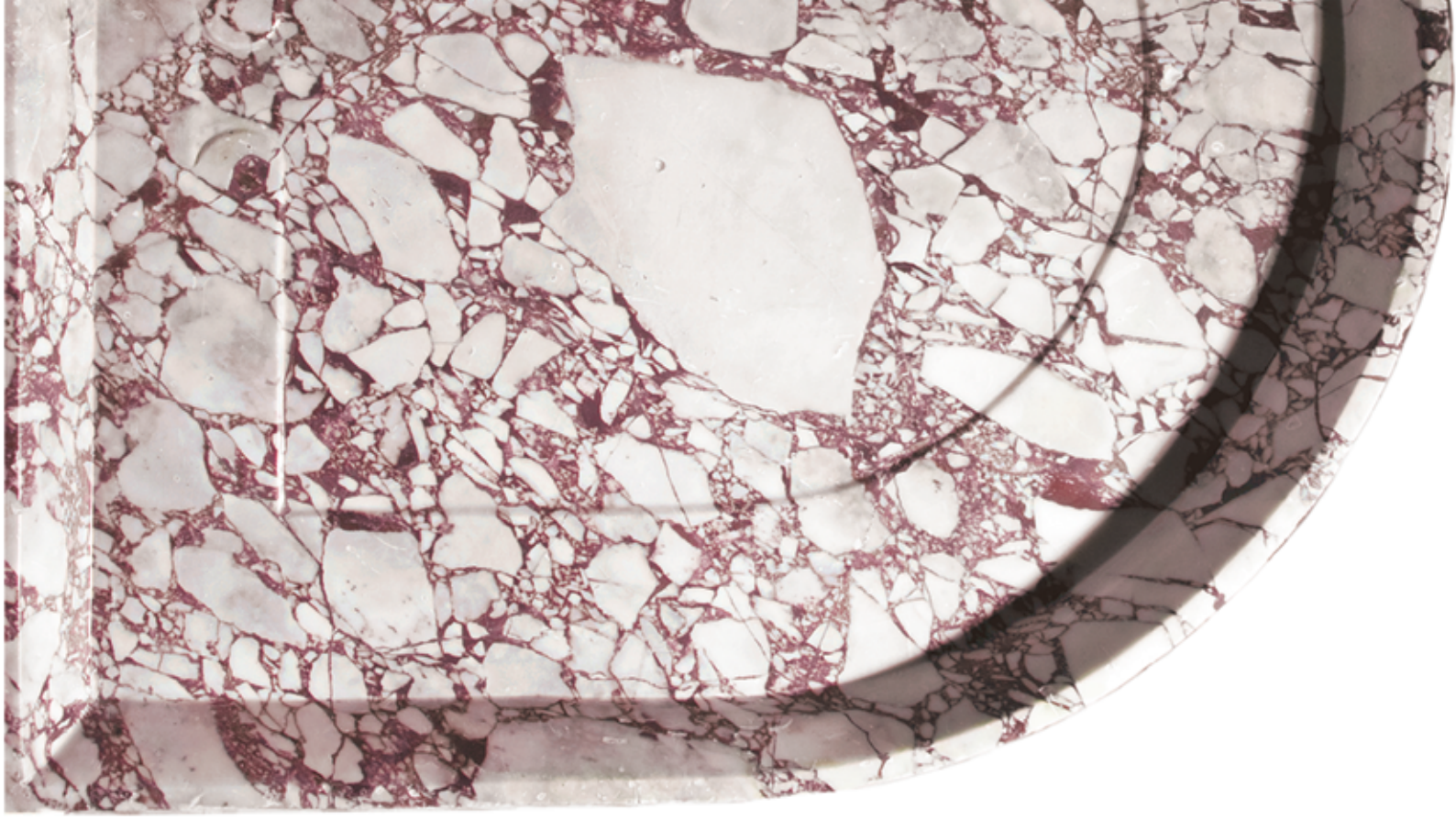

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CONTENT

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THE DIFFERENT STEPS OF THE ROUGH-HEWING ON A MONUMENTAL SCULPTURE AT THE GREEK ARCHAIC PERIOD: THE UNFINISHED KOUROS OF THASOS

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Abstract

On the colossal unfinished kouros from Thasos (around VI B.C.) exhibited in the Archeological Museum of Thasos, the marks of one tool only can be seen: the point. But they are not all the same. In fact, there are four types of marks which correspond to four different ways of using the point. And each way of using the point corresponds to one step of rough-hewing the sculpture. After that, it is possible to deduce some hypotheses about the work in a quarry, the work in the place of exhibition or in the workshop, the order of operations on the statue and the different crafts (stone-cutters, sculptors, specialized sculptors).
Therefore, the study of the marks of just one tool on this unfinished kouros allows a much better understanding of the process of making a statue in the archaic period and the importance of the role of stone-cutters in the rough-hewing of sculptures.

Keywords
tools, rough-hewing, stone-cutters

I studied the colossal unfinished kouros exhibited in the Archeological Museum of Thasos in great detail by looking for the marks of tools on the Greek archaic marble sculpture[1]. This specific study allowed me to suggest a restitution of the different steps from rough-hewing, started in the quarry after the extraction of the block, and finished in the place where the statue was exhibited and to suggest a theory to explain why the sculpture had been abandoned before being finished.

Discovered and partially removed in 1914 by Charles Picard[2] in a medieval part of the surrounding east wall of the Acropolis, the colossal unfinished kouros from Thasos was entirely extracted in 1920 (Fig. 1). Broken in five parts – head and shoulders, torso with beginning of the legs, each leg and the feet adhering to the plinth – the kouros was reconstituted on the ground in the courtyard of the museum (Fig. 2), repaired and then stood upright again[3]. It was exhibited in a room in the Archeological Museum of Thasos especially built for it because of its 3.50 meter height with the plinth[4].

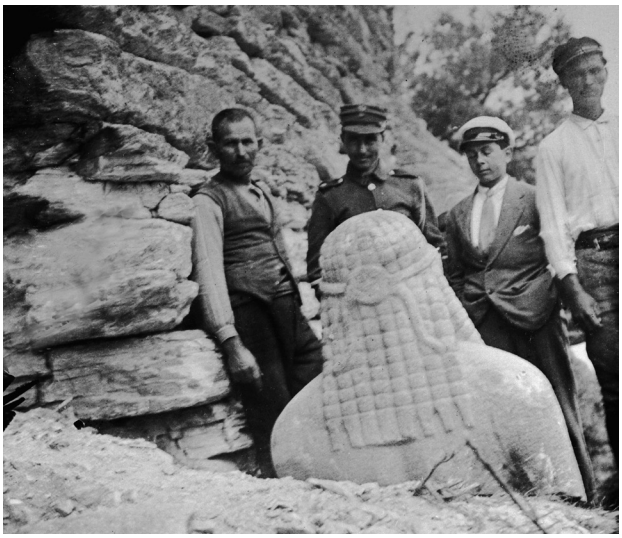

Fig. 1. Part of the kouros, after the extraction from the east wall of the Acropolis (photo: EfA 1920)

It is dated around 600 B.C. and is registered under inventory number 1[5].

Description (Fig. 4 and Fig. 5)

The kouros is presented front face view. The left leg is advanced, the right arm along the body, the left bent on the breast. He holds a ram vertically against the right part of the torso.

1 Subject of my doctoral thesis, accepted in 2007.

2 PICARD 1921, 88.

3 PICARD 1921, 113-127.

4 The plinth is 0,10 meter high.

5 POTTIER 1920, 218-223; HOLTZMANN 2000, 245-246.

Fig. 2. Kouros reconstituted in the courtyard of the museum (photo: EfA 1920)

Radiating from the crown of the head, the hair is arranging in long pearl locks, except on the forehead where the pearls are not yet carved. The hair is retained by a headband tied in the back and falls down on the back and on each side of the face in four parotid locks.

A big crack runs from the left ear to the breast.

Technique

On the unfinished kouros of Thasos the marks of only one tool can be seen: the point. But these marks are not all the same everywhere.

But to start, let us come back to the tool and its technical definition[6].

A point is a metal rod with a circular or octagonal section. Its extremity has a pyramidal shape. It is used from the beginning of cutting stone, for extracting material surplus, from the biggest to the smallest, and for coarsely approximating the shape (Fig. 5).

Points with a large section allowed the removal of big fragments of marble. They produce coarse marks with deep grooves. As the rough-hewing continues, smaller points, taking out little fragments of material, are used to approximate the shape little by little. The marks become thinner, with smaller grooves, longer and deeper, ending in impacts, and then with short grooves ending in impacts, almost like pricking. In the very last step, thinner points[7], used with a strike angle of nearly 90°, create the "pricking".

So, according to the size of the tool and the ways of working the material, we have different marks from the same tool. As stated earlier, the unfinished kouros of Thasos shows all of them. They can be classified in four types:

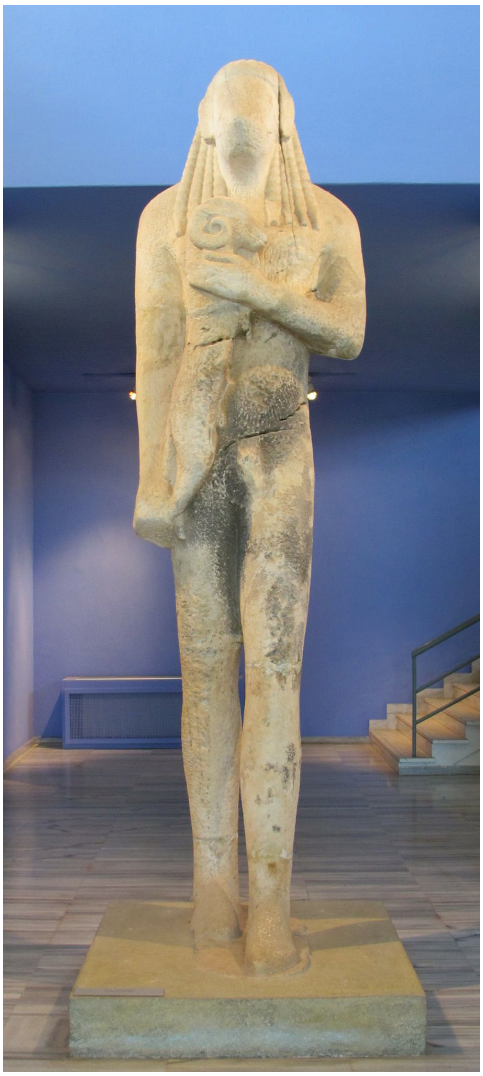

Fig. 3. Kouros, front face view, Thasos 1 (photo: D. Braunstein)

1. coarse marks with deep grooves
2. thinner marks with smaller grooves, longer and deeper, ending in impacts
3. marks almost like pricking, with short grooves ending in impacts
4. finally, pricking marks, perfectly clear.

And each type of mark matches a particular step of rough-hewing:

1. From the right heel, the ankle and above the foot (Fig. 6), the obvious thickness of the material shows the very first rough-hewing of the sculpture: the marks are coarse and big; the grooves are short, closer together (Fig. 7). We notice this kind of mark on the back of the right leg, corresponding to the same step. They are probably made with a pickaxe in the quarry, after the extraction of the block.

6 BESSAC 1986, 108-115.

7 A "needle" in French stone-cutter language.

Fig. 4. Kouros, back view, Thasos 1
(photo: D. Braunstein)

2. Marks located on the inner face and top of the right foot, on the profile of the right leg (Fig. 8), on the inner face of the left leg, on the back of the right hand and the throat too correspond to the following step of rough-hewing. The point used for this work is probably a big one. The marks from the profile of the right leg are characteristic of a stone-cutter's work: the angle formed by the two sides of the block has been cut down (Fig. 9). The same applies for the back of the right hand. This work could have been done in the quarry.

3. The third type of mark, sometimes close to pricking, is located on the top of the right foot, the profile of the right leg and the entire left thigh (Fig. 10), the left hand and the ram (Fig. 11). The shape is beginning to appear and the point, now smaller, is often used with an angle of more than 45°. At this step, we can notice that the left leg is thinner than the right: the work is more advanced (Fig. 12). We can also see that by observing the point marks.

Fig. 5. Points with different sizes
(photo: D. Braunstein)

4. At last, a tight pricking, nearly imperceptible, located essentially on the hair (Fig. 13 and Fig. 14), constitutes the last step of rough-hewing. The shape appears.

Analysis

Analyzing all this technical information, it is possible to arrive at some hypotheses about the work in the quarry, the work in the place of exhibition or in the workshop, the order of operations on the statue and the different crafts (stone-cutters, sculptors, specialized sculptors).

I suggest the following hypothesis:

— In the quarry, a big block of marble is extracted and cut into the form of an approximate parallelepiped;
— There, *in situ*, the first rough-hewing is done with pickaxes and big points. Stone-cutters work the faces and geometric forms, in order to reduce the weight of the block and facilitate transport;
— Then the block is carried horizontally to the place where it will be exhibited[8]. There, it is stood up and a scaffolding is built.
— Some parts of the body, such as the shoulders, arms, legs, are left deliberately for the end because of the large planes which are easily workable with abrasives.

8 On the Acropolis of Thasos.

Fig. 6. Right ankle, coarse marks
(photo: D. Braunstein)

Fig. 7. Side profile of the right foot, thickness of material
(photo: D. Braunstein)

Fig. 8. Right leg, deep and long grooves ended by impacts (photo: D. Braunstein)

Fig. 9. Right leg, edge formed by two sides of the block cut down (photo: D. Braunstein)

Fig. 10. Left thigh, short grooves ended by impacts
(photo: D. Braunstein)

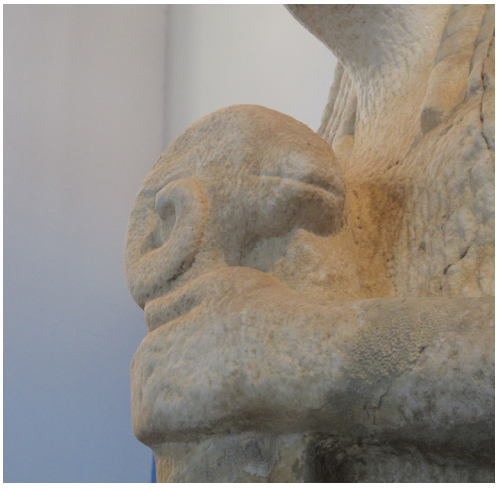

Fig. 11. Ram's head, very short grooves, close to pricking
(photo: D. Braunstein)

Fig. 12. Left leg thinner than the right one: more advanced work (photo: D. Braunstein)

Fig. 15. Left part of the head, big crack (photo: D. Braunstein)

Fig. 13. Hair on the left shoulder, pricking (photo: D. Braunstein)

Fig. 16. Top of the head, crack on the left (photo: D. Braunstein)

Fig. 14. Hair locks and headband bow, back view, pricking (photo: D. Braunstein)

— On site, given the size of the sculpture and the tightness of the base, the work begins at the top. In this way, there is less weight on the top so a better balance is achieved. Some specialists, probably stone masters, work in the shape of the hair and the ram with thin points, very precisely.
— The work of the face and the final work too are left to the sculptor, master of the project.

And at this moment, an accident probably happened: the sculpture fell face down and broke in five pieces. The tightness in addition to the imposing height has probably made the sculpture unstable, despite the scaffolding. The unfinished kouros was left and discarded.

We used to say that the kouros was left because of the big crack going through the left part of the head (Fig. 15 and Fig. 16). If the argument of an accident can be supported, another theory can be suggested: the fragments were big enough to be re-used for building materials. Locked into the surrounding east wall of the Acropolis, at the mercy of the damp climate of Thasos, the cold winters and hot summers, the fragments have suffered damage from erosion and fragile parts, such as micro-cracks or veining, became true cracks over the course of time.

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