

A Bronze Vase from Iran and Its Greek Connections

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IN HIS RECENT discussion of the origin and background of East Greek orientaling vase painting—the so-called Wild Goat style—Pierre Amandry suggested that a Near Eastern source was evident but that “on n’a pas, jusqu’à présent, trouvé des modèles dont le décor des vases du ‘wild goat’ style soit directement dérivé.” He went on to say, “si l’on découvre un jour des objets de métal qui aient pu servir de modèles aux peintres de vases grecs d’Asie, il y a de fortes chances pour que ce soit dans la partie la plus reculée de l’Anatolie, dans l’Est de la Turquie ou le Nord-Ouest de l’Iran actuel.”¹

Amandry’s perceptive statement is a good introduction to a study of a bronze vase acquired in 1964 from an antiquities dealer by The Metropolitan Museum of Art (Figures 1–11).² The vessel was said to have come from Iran, specifically from Luristan, but unfortunately the dealer’s statement can have no scientific value. There is no doubt, to my mind, that the vessel does come from Iran, but because dealers may assign ob-

jects to areas for their own convenience, or are misinformed by their sources, we cannot automatically accept the Luristan attribution.³ In short, we have no archaeological information about the vessel: what area in Iran it came from, or whether it came from a tomb or a city mound.

Portions of the vessel are damaged, and the lower section, including the base, is missing. A base, slightly flaring out and with walls partially preserved, was acquired with the vase, but examination and measurement indicated that it does not belong to our vase (Figure 12). It must be part of another, perhaps similar, vessel, the whereabouts of which are presently unknown.

The vase has a high neck consisting of a slightly everted lip below which are three raised bands and a zone of connected conelike buds that are decorated by short lines; the buds are in two rows that touch each other, and those in the upper row are larger than those in the lower. The top of the lip has a ledge 1 cm. wide

1. Amandry, “La Grèce d’Asie,” p. 93.

2. Acc. no. 64.257.1. A photograph appears in *The Metropolitan Museum of Art Bulletin* 24 (1965–1966) p. 46.

3. In recent writings scholars are showing more cautious attitudes toward dealers’ attributions, viz., Hans-Volkmar Herrmann, “Frühgriechischer Pferdeschmuck vom Luristantypus,” *Jahrbuch*

des deutschen Archäologischen Instituts 83 (1968) p. 6, note 26; P. R. S. Moorey, “Towards a Chronology for the Luristan Bronzes,” *Iran* 9 (1971) p. 115. Some dealers give specific areas as sources for their objects because they have been given that information by the vendor. But the information is still without value.



FIGURES 1-3

Bronze vase, Iranian. The Metropolitan Museum of Art, purchase, Joseph Pulitzer Bequest, 64.257.1



formed by bending back metal into the interior of the neck. The walls of the vessel swell outward from the neck toward the belly and then curve back toward the base to form an ovoid. Six registers of animals, executed in repoussé and chasing, and divided by narrow raised bands, decorate the vessel, as preserved, completely. The vessel was made from two separate pieces joined together between registers three and four. A narrow strip of bronze, part of the lower body, was placed under a similar plain strip belonging to the upper body, and the two strips were joined together by six studs.

The preserved height of the vessel is 13 $\frac{3}{4}$ in. (33.3 cm.), the diameter at its maximum is 8 $\frac{1}{4}$ in. (20.9 cm.), and the diameter of the lip is 4 in. (10.1 cm.). The vessel shows definite signs of use, as some of the decoration is worn away in places.

A detailed and complete description of each of the forty-three preserved animals, and each of the forty-four preserved rosettes, plants, and other filler ornaments, would be costly in time and space and would put a strain on the reader's patience. Therefore, in order to discuss each of the six registers as economically



FIGURE 4
The Metropolitan Museum's vase before cleaning



FIGURE 5
The Metropolitan Museum's vase after cleaning



FIGURES 6–8
 Details of the Metropolitan
 Museum's vase





as possible, I shall refer only to what is basic for an understanding of the extensive variety and types of decoration employed in the creation of this truly fine vessel. The reader should be able to follow the discussion and fill in details by studying the excellent photographs taken by William Lyall of The Metropolitan Museum of Art, and the helpful drawings executed by my wife, Grace Freed Muscarella: to both I wish to express my thanks.

Each creature and plant has its own distinct type of body decoration, individually drawn and chased. No two creatures nor plants look exactly alike; each is clearly meant to be individualized by its decoration. This is all the more exciting and significant for those interested in ancient art and artists because it seems definite that the upper three registers and the lower three registers were executed by two different artists. By examining and comparing the execution of horns, eyes, tails, wings, and other body elements of the creatures on the two parts, we find this conclusion to become obvious. I shall return to the differences later,

but it should be emphasized that they are not stylistic, and had the two parts of the vessel been found separately, they would certainly be recognized as having come from the same specific cultural area.

Register 1: Three bulls and one winged composite creature walk to the right. The latter animal has ibex horns—curved up with articulated knobs—and a long bull's tail, and it is smaller than the grazing ibex below. The hair of the animals is depicted by short vertical and horizontal lines, or by a net pattern formed from dots. The stomachs are outlined by a single line and decorated with lines. The upper part of the front legs of the bulls extends partly up the body to describe a shoulder, which is also decorated; it curves back and then forward again in a hooklike fashion. Concentric arcs decorate the shoulder, the joints of the legs, and the cheeks. Note that the curved section of the shoulder resembles a female breast. Series of parallel lines decorate the legs.

The horns of the bulls sweep down gracefully before they turn back into a hook. Manes, decorated by two

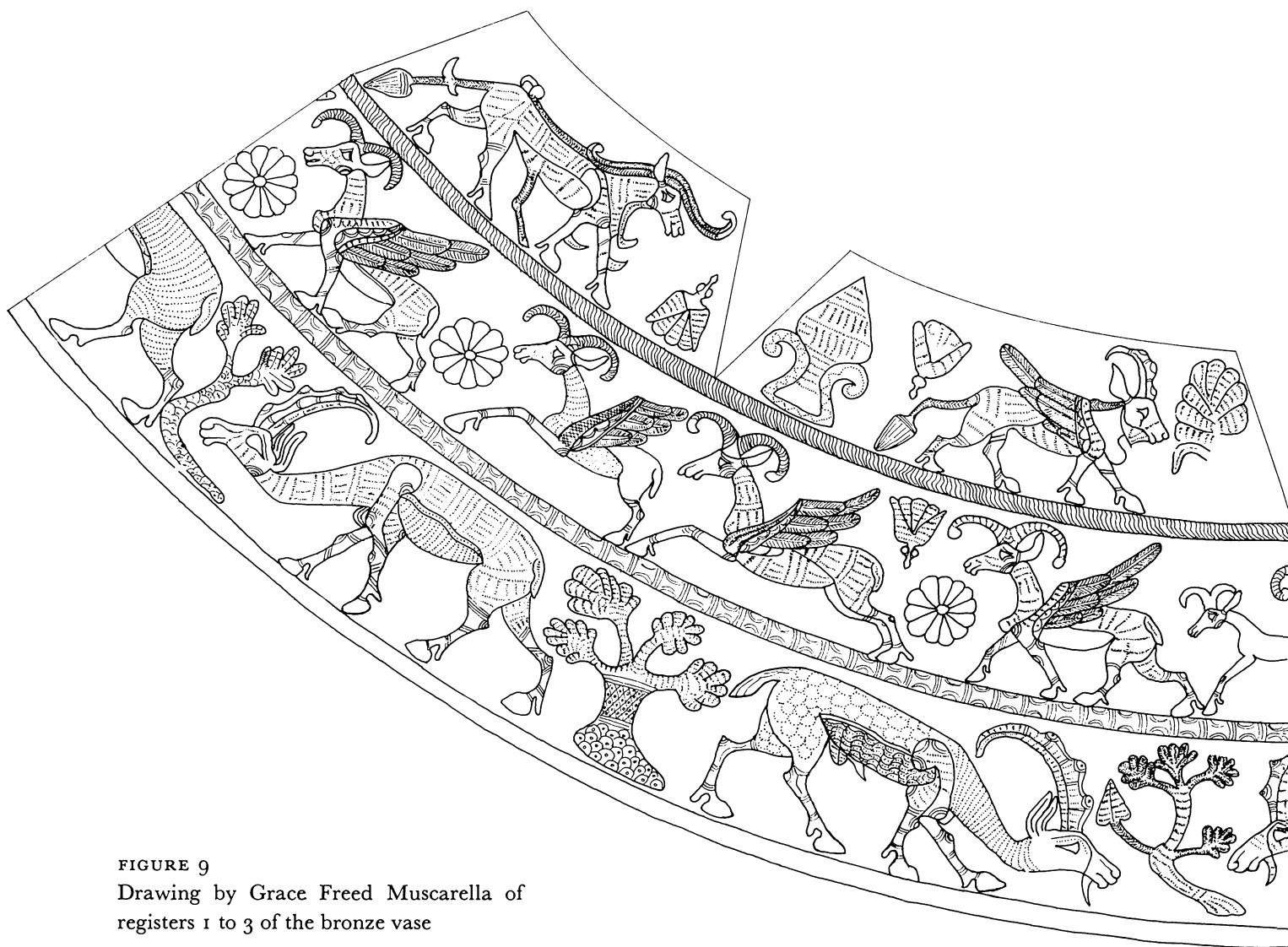


FIGURE 9
Drawing by Grace Freed Muscarella of
registers 1 to 3 of the bronze vase

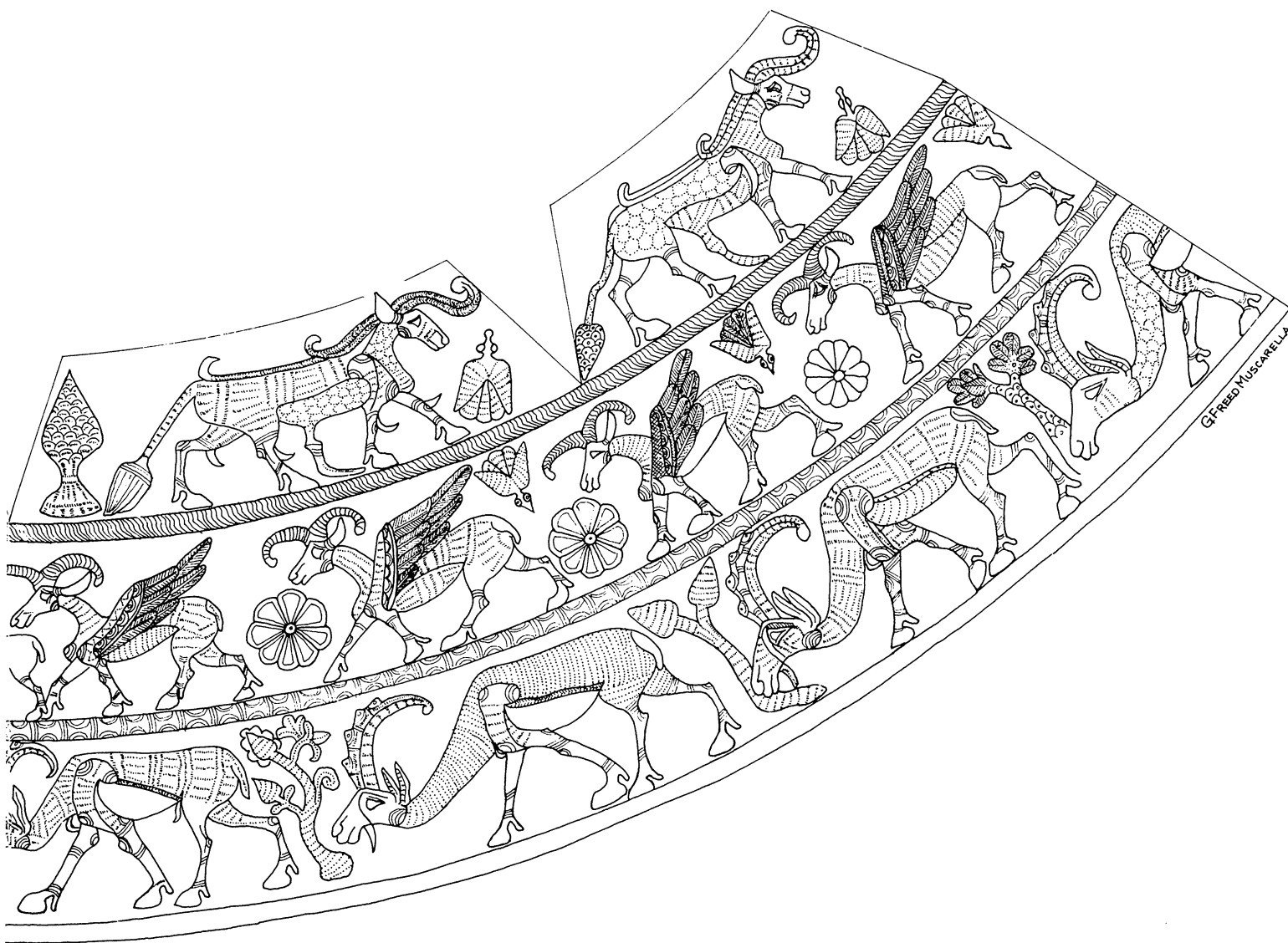
curls, continue the line of the horns and reach to the rump. The tails project down at an angle and end in a spadelike motif. Sicklike tufts of hair project from the legs of all three bulls and from the tail of only one.

Sex on the bulls appears to be represented by a thin curved pendent projecting down from the stomach. This can only be a penis and is certainly not a fifth leg.

Separating the animals are stylized plants and winged birdlike creatures. They have distinct beaks—both pointed and ducklike—and large eyes. They also have a tripartite division of their rear ends, resembling feathers, and one, in register 2, has a herringbone pattern that could more strongly be said to represent tail

feathers, inasmuch as this decoration is used on all the wings of animals represented on the vessel. However, the flying creatures in the lower part of the vessel look more like bees than birds, and therefore it could be assumed that the upper winged creatures are meant to be the same; but we cannot of course be certain. Each of the three plants is of a different type with decoration consisting of rows of dots and short lines. Two of the plants seem to rest in pots; the third is damaged at its base.

Register 2: Eight winged goats, judging by the horns, and one kid, all with short tails, move to the left. Two



of the goats gambol or run; the others walk. The kid seems to have been squeezed in as a filler and apparently was left undecorated. Six rosettes, outlined either with a single or a double line, and winged creatures, all flying downward, also serve as fillers; there are no plants.

The bodies and outlined stomachs have the same basic variety of decoration as in register 1: parallel rows of dots, short lines, and the net pattern. The stomachs of three goats are undecorated.

The shoulders of the walking goats have the breast-like joint and form one unit with the forepart of the wings; the running goats do not have the breastlike

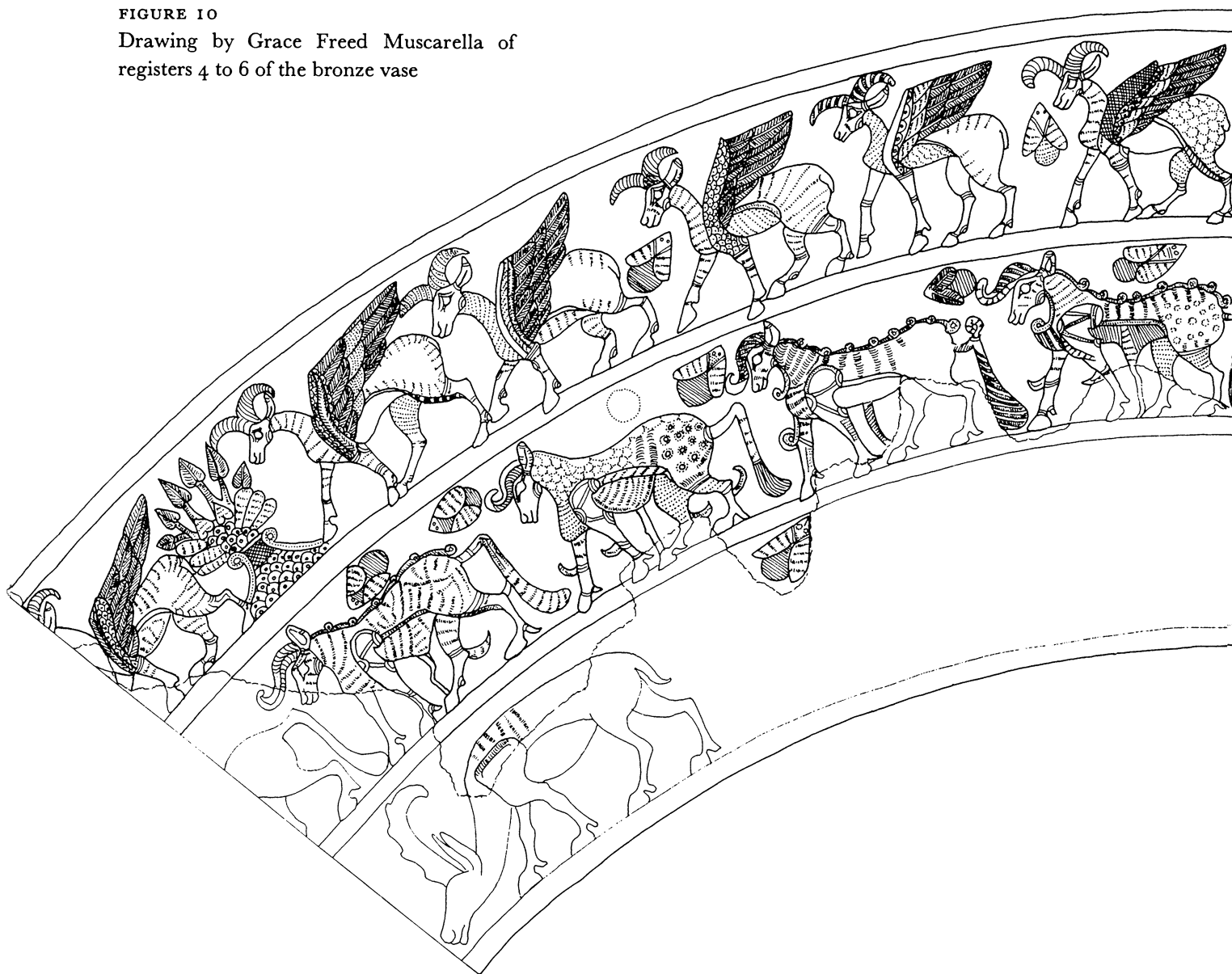
joint. Wings are decorated in typical herringbone patterns and are drawn in two layers or bands; the forepart of the wing is divided into two or three vertical zones elaborately decorated by cross-hatching, herringbones, concentric half-circles, and dots. The two horns are represented projecting left and right from the head and then curving inward; they are decorated with curved lines.

Sex is not represented on any of the creatures.

Register 3: Five large ibex graze to the left; one grazes to the right. They have long, gracefully extended necks and long, curved horns with articulated

FIGURE 10

Drawing by Grace Freed Muscarella of registers 4 to 6 of the bronze vase



knobs; it is not clear if one horn is meant to be represented, divided into decorated zones, or whether both horns are shown overlapping. In any event, both ears are represented.

The body decoration is typical. The stomachs are marked off by two lines and are decorated or left plain; the space between the two lines is decorated also, except on a single ibex. Shoulders are drawn in the hook-like fashion of register 1, with the breastlike joint.

Male sex is represented on only two of the ibex, and four of them have beards.

Each ibex is separated from his neighbor by a stylized plant or tree—it is not really clear which is meant to be shown—whose base curves to fit the available space. Each plant is different in shape and decoration from the others. In two instances an ibex is shown either overlapping a plant or nibbling at it. There are no winged creatures or rosettes.

Register 4: Twelve winged goats walk to the left; several step below the groundline. The body decoration is basically the same as on the goats of register 2: rows



of dots, lines, and net pattern. One goat is completely destroyed except for parts of its legs and wing.

The stomachs are outlined with a double or, in one case, a single line; some of the stomachs are decorated, while others are left plain. An interesting type of decoration on the stomach of one goat consists of oblique parallel lines filled with short lines.

Joints and sometimes cheeks are represented by concentric arcs; veins are represented by parallel lines. The horns are decorated like those of the goats in register 2, but there is more variety here.

The wings are depicted as having one, two, or three layers or bands of feathers. In two cases rows of lines, and in one case rows of dots, substitute for the herring-bone pattern in one of the layers. The forepart of the wing is a clear continuation of the leg and is divided in sections decorated by dots, dotted circles and lozenges, dotted net patterns, curved lines, and cross-hatching.

Two of the goats are separated by a magnificently elaborate plant that apparently grows from a pot; it has three different kinds of leaves and is quite different in type from the plants in registers 1 and 3.

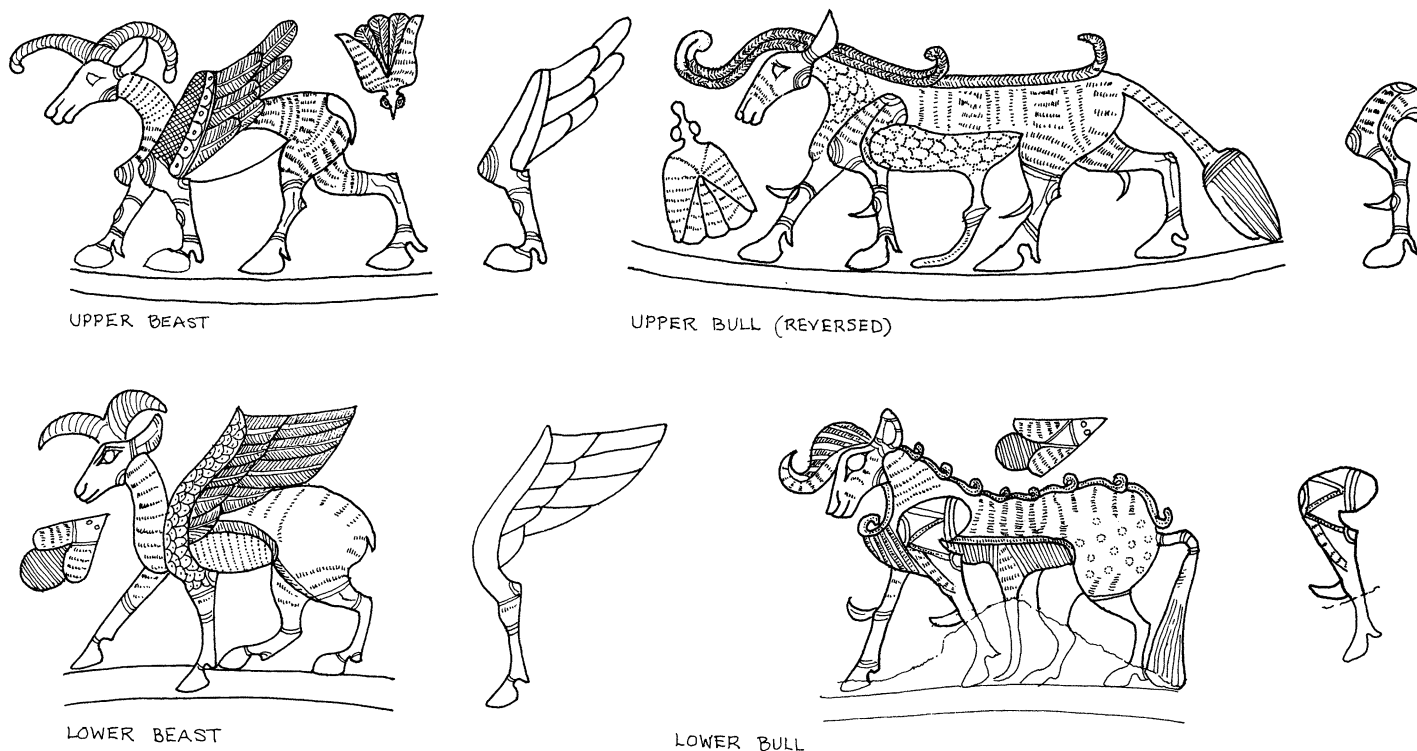


FIGURE 11

Drawings by Grace Freed Muscarella of details of animals on the bronze vase

The eight winged creatures flying around the goats are not drawn in the same manner as those in registers 1 and 2 and look more like insects, probably bees. Their wings are decorated with rows of short lines, their bodies by lines or rows of dots, and there is no tripartite division of the rear end. Small circles represent the eyes, and the head is not separated from the body.

Register 5: Nine bulls walk to the left; a few step below the groundline. Some of the bodies have typical decoration. But one has short curved lines; another, a combination of a net pattern, short curved lines, and dot rosettes; and a third, a combination of rows of dots, short wavy lines, dot rosettes, and an oval motif. Some bulls have a plain back, some have a back decorated with a double line running the length of the body, and some have one or more curls.

Stomachs are outlined with a double decorated border, and the stomach decoration is varied more than on the other registers: oblique straight lines framing

rows of dots, rows of V-shaped lines, and double V-shaped liens decorated with short lines. The shoulders are similar to other shoulders in registers 1 and 3, but the joint has a less obviously breastlike form. Decoration consists of double lines connecting the joints or moving in zigzag fashion.

Tails project horizontally for a short distance and then drop vertically; they are decorated and one bull has a curl at the right angle of its tail. Projecting from the legs, both forward and backward, are bladelike tufts of hair; some bulls have them on all legs, while others have them only on some legs.

Horns are short and thick and curve out before turning back to form a hook; they are divided into decorated zones. Just as with the bulls in register 1, we cannot state whether or not one or two horns are meant to be shown.

Every bull but one has the long thin pendant projecting from the stomach, which we concluded was a penis.

The bees are of the same type as in register 4, except for one that has a long oval shape, and another that has a herringbone decoration on the wing. In this register the bees are placed above the bulls, not between the animals as in register 4.

A dotted circle, .6 cm. in diameter, and not in *repoussée*, exists above one of the bulls; its meaning is not clear.

Register 6: Traces of three grazing ibex moving to the left are extant on this poorly preserved register; there seems to be room for only two more of them. Body and stomach decoration are familiar to us; in one case the stomach is plain. The hooked and decorated shoulders are like those on the bulls in register 5, without the obviously breastlike motif on the joint. Both ears are shown, but again we do not know if both horns are depicted.

One bee has a herringbone pattern on its wing, while the others are similar to the majority of the bees above.

The differences between the upper and lower parts of the vessel, between registers 1 to 3 and 4 to 6, are essentially in details, not in style. Artist A (upper registers) was apparently less restricted by convention or canon than artist B (lower registers). Thus artist A allowed the animals in one register to move to the right while all the others move left, except for an ibex in register 3; he also broke up the monotony of eight goats walking in one direction by allowing two goats to gambol, and by adding a kid to fill a space, rather

than another rosette. The animals of artist B all move in one direction, and all are walking. Artist A used winged creatures, plants, and rosettes as fillers to break up the endless rows of animals; artist B used bees as fillers to break up the rows of animals only in one register and did not draw rosettes at all. Artist A also decorated two of the narrow bands dividing the registers from one another, while artist B left all his bands plain.

In execution of line both artists were masters of the first order, and I see no reason to conclude that one artist was better or more skilled than the other. They had very similar ideas about how to draw and decorate an animal, and one must look carefully at details to discover the differences. We may summarize these differences as follows:

The flying creatures of A look like birds, while those of B look like insects.

The horns of A's bulls are long with blunt tips, while those of B's are short and thick, and have sharp tips (Figure 11). The horns of A's goats are long and blunt, while those of B's are short and pointed (Figure 11). The horns of A's ibex curve back sharply and have pointed knobs, while those of B's are more vertical, with rounded knobs.

The tails of A's bulls fall obliquely and have a spade-like end. Those of B's project horizontally and then drop vertically, forming a right angle; they also have less elaborate ends.

Artist A drew his eyes in profile, making them look like curved triangles, whereas artist B drew his as seen from the front, making them round or oval.

The breastlike joint seen in the shoulders of artist A is absent in B's shoulders (Figure 11). The manner in which the upper stomach line becomes the outer line of the left rear leg is handled differently by both artists. And the stomach and body decoration differs slightly in the use of lines.

In the execution of the animals' wings we also see differences in that artist A always used two layers of feathers while B used one, two, or three layers. Also, the manner in which the forepart of the wing joins the left front leg is different for each artist (Figure 11).

Other minor differences occur, but they need not be brought forth as the evidence is clear enough to document the conclusion that two artists worked on the vase.

There can be little doubt that the vessel is an Iranian

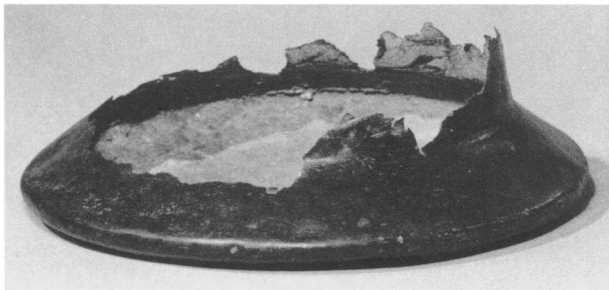


FIGURE 12
Base of a bronze vase. The Metropolitan Museum of Art, purchase, Joseph Pulitzer Bequest, 64.257.1b

work of art. Not only in specific details of the form and position of the animals and in the motifs used to decorate them, but also in the basic concept of the procession, the *Tierfries*, there are many parallels within Iranian art of the late second and the early first millennium B.C.

Several gold and silver vessels excavated at Marlik are decorated with processions of boars, cows, bulls, deer, griffins, and what seem to be unicorns.⁴ Other vessels or metal objects apparently from the south Caspian region also display processions of animals.⁵ Metal objects from Luristan⁶ may also be cited here, and many metal and ivory objects allegedly from Ziwiye depict processions of various kinds of animals and mixed creatures.⁷

Animal friezes have an ancient history in Iran and continued to be represented in art across the millennia.⁸

FIGURES 13, 14

Bronze goblet, Iranian. The Metropolitan Museum of Art, gift of H. Dunscombe Colt, 61.264



4. Negahban, *Marlik*, figs. 103, 108, 109, 111, 113, 136, 140, 144, pls. iv, viiiA, xii, xvi.

5. Porada, *Ancient Iran*, p. 94, fig. 61; Wilkinson, "Marlik Culture," frontispiece, p. 106, fig. 7, p. 108, fig. 10, p. 109, fig. 11.

6. Arthur U. Pope, *A Survey of Persian Art*, VII (Oxford, 1964–1965) pl. 68B, the Holmes beaker; Ghirshman, *Ancient Iran*, p. 70, fig. 91, a quiver in the Metropolitan Museum.

7. André Godard, *Le Trésor de Ziwiye* (Haarlem, 1950) pp. 80, 90, 119 ff., figs. 69, 79, 100–106; Wilkinson, "Mannean Land," pp. 275 ff., figs. 2–5; R. Ghirshman, "Le Trésor de Sakkez," *Artibus Asiae* 13 (1950) pp. 186 f., figs. 9, 10.

8. Louis Vanden Berghe, *Archéologie de l'Iran Ancien* (Leiden, 1959) pp. 12, 75, 78 f., 84 f., 88, 131, figs. 4, 20, 23, 25, 27, 40, 42, pls. 47, 113, 114, 164; Pierre Amiet, *Elam* (Paris, 1966) pp. 99, 139 f., 151, 170 f., 206 f., 273, 283; Robert H. Dyson, Jr., "Where the Golden Bowl of Hasanlu was found . . .," *Illustrated London News*, January 23, 1960, p. 133, fig. 7; T. Cuyler Young, Jr., *Excavations at Godin Tepe* (Toronto, 1969) p. 17, fig. 18, nos. 4, 6, fig. 19, no. 8, fig. 22, no. 1; T. Burton Brown, *Excavations in Azerbaijan, 1948* (London, 1951) pp. 132, 135, fig. 30, nos. 51, 52, fig. 31, no. 49, pl. ix, no. 735.

FIGURE 15
Gold vessel, from Marlik,
Iran. Iran Bastan Museum,
Teheran



First-millennium examples have been found at Hasanlu, in the Ardebil region, and in Luristan.⁹ A goblet in the Metropolitan Museum with an animal procession is said to have come from Luristan; it surely comes from Iran (Figures 13, 14).¹⁰

9. R. H. Dyson, Jr., "Excavating the Mannaeen Citadel of Hasanlu . . .," *Illustrated London News*, September 30, 1961, p. 536, fig. 8; Vanden Berghe, *Archéologie*, pl. 152A, B; *Trésors de l'Ancien Iran*, exhibition catalogue, Musée Rath (Geneva, 1966) pl. 38; C. Goff Meade, "Luristan in the First Half of the First Millennium B.C.," *Iran* 6 (1968) fig. 6, no. 13: I cannot find a reference to this sherd in the text; is it intrusive?; Pope, *Survey*, pl. 11A.

10. Acc. no. 61.264. Its height is 5½ in. (13.7 cm.). There are other unpublished examples of vessels from Iran that have animal processions.

When we seek comparisons for specific decorative details on our vessel, we find that they are thoroughly at home in Iranian art. Exact or close parallels are evident on many vessels excavated in Iran or said to have been found there (with justification in some cases). The research involved in seeking out parallels is not difficult when we are working with excavated pieces from Marlik or from Hasanlu. But it is very difficult and frustrating when we examine many metal vessels that have no archaeological attributions. Many of these are on exhibition in museums, have been displayed in special shows, or are published in catalogues and books dealing with the history of Iranian art. In particular, the proliferation of gold vessels on the antiquities market in



FIGURE 16

Bronze bowl, Iranian. The Metropolitan Museum of Art, Rogers Fund, 51.114

the last decade with attributions claiming that they had been found in Iran and are ancient, when to some eyes they seem to be either outright forgeries or at least of doubtful authenticity, is staggering and frightening. I do not claim that I have seen and examined every such object in this category, but any object known to me that has aroused my suspicion will of course not be discussed or cited here.

The decorated stomach outlined as a separate part of the animal's body occurs often in Iranian art. A few examples will suffice: It occurs on the so-called unicorn vessel (Figure 15), on the vessel with winged bulls and griffins, and on the vessel with the upright bulls, all of gold and all from Marlik,¹¹ and on the gold bowl and the silver beaker from Hasanlu.¹² It also occurs on a gold vessel in the Louvre, and on the gold gazelle cup and a bronze bowl (Figure 16) in the Metropolitan

Museum, all probably from the south Caspian area.¹³ Animals represented on bronze beakers with nipple bases (sometimes called situlae, and probably Iranian), as well as a few objects in the art of Luristan and from Susa, also have the outlined stomach.¹⁴

The characteristic shoulder curved back in a hook-like fashion occurs often on animals represented on vessels from Marlik and the south Caspian area and also on some objects from western Iran and Luristan. These include the gold unicorn and "Cycle of Life" vessels from Marlik, several vessels in the Louvre, a gold cup in the Guennol collection, horse bits formerly in the Graeffe collection, and a bronze goblet (Figures 13, 14), a bronze disk pin (Figure 17), a bronze quiver, the bronze bowl, and the gazelle cup, all in the Metropolitan Museum. Moreover, some of these animals have the distinctive breastlike shoulder joint.¹⁵ This feature is

11. Negahban, *Marlik*, figs. 109, 111, 114, 136, 140, pls. v, xii, xvi.

12. Porada, *Ancient Iran*, p. 95, pl. 23, pp. 98 f., figs. 63, 64; Oscar White Muscarella, "Hasanlu 1964," *The Metropolitan Museum of Art Bulletin* 25 (1966–1967) p. 127, fig. 10.

13. André Parrot, "Acquisitions inédits du Musée du Louvre," *Syria* 35 (1968) pl. xv; Wilkinson, "Marlik Culture," pp. 104 ff., frontispiece.

14. Peter Calmeyer, "Eine westiranische Bronzewerkstatt des 10/9 Jahrhunderts v. Chr. zwischen Zalu-Ab und dem Gebiet der Kakavand-I," *Berliner Jahrbuch für Vor- und Frühgeschichte* 5 (1965) pp. 24, 28 f., 32 f., 40 f., nos. F1, F5, G2, H3; Ghirshman, *Ancient*

Iran, p. 70, fig. 91; Porada, *Ancient Iran*, p. 71, pl. 15, right; Amiet, *Elam*, pp. 498 ff., figs. 375, 376.

15. Negahban, *Marlik*, pp. 103, 109, 113, 114, 136, pls. viiiA, xvi; Wilkinson, "Marlik Culture," frontispiece, p. 106, fig. 7; Parrot, "Acquisitions," pl. xv; Pierre Amiet, "Acquisitions Iranienes récemment acquises par le Musée du Louvre," *Syria* 45 (1968) p. 252, fig. 2; Edith Porada, "Facets of Iranian Art," *Archaeology* 17 (1964) p. 200 for a photograph that is not too clear; Ghirshman, *Ancient Iran*, p. 70, fig. 91, p. 78, fig. 95; Wilkinson, "Marlik Culture," p. 105, fig. 6; G. Goossens, *Bronzen uit Loeristan* (Brussels, 1954) fig. 3; André Godard, *Les Bronzes du Luristan* (Paris, 1931) pl. XLVIII, 182; Pierre Amandry, "Un Motif 'Scythe' en Iran

also evident on the bulls that pull chariots on the gold bowl from Hasanlu, on gold and silver vessels in the Louvre, and on a crude gold vessel from Gilan in the Iran Bastan Museum in Teheran.¹⁶

The position of the bull's horns in register 5, partly resting on the forehead before they curve out, is very clearly paralleled on the Marlik unicorn vessel, on the crude vessel from Gilan,¹⁷ and on the bulls on the disk pin from Luristan in Figure 17.

Most of the bulls on the bronze vase have a mane marked off from the ears to the rump. This feature occurs fairly often in Iranian art from Marlik and Hasanlu, on bronze beakers from western Iran, on objects from Luristan, and on some ivories said to have been found at Ziwiye.¹⁸ Curls of hair on the mane and back of an animal, while not common, are to be seen on some south Caspian and Luristan objects.¹⁹ The same animals have their tails held at a right angle from the body. Likewise, we find curls or tufts of hair projecting from the legs of several animals from the same areas.²⁰

All of the small motifs used on the animals' bodies on the bronze vase, such as the short lines and dots, and net pattern, dot rosettes, outlined joints, and parallel lines for veins, exist on practically every one of the animals cited in the preceding paragraphs, and on still others.²¹ Note also that the stomachs of all the animals on the silver beaker from Hasanlu have the very same



FIGURE 17
Bronze disk pin,
Luristan, Iran. The
Metropolitan
Museum of Art,
Rogers Fund,
39.96.2

decoration as that on a goat and a bull from registers 4 and 5 on our bronze vase.²² Many of these objects also have rosettes used as space fillers, and at least one vessel, that shown in Figures 13 and 14, has a tree very similar to one represented in register 1 of the bronze vase. Moreover, the very same decoration occurs on

et en Grèce," *Journal of Near Eastern Studies* 24 (1965) pl. xxvi, 2. Note that a bronze ibex found on Samos and attributed to Iran by Günter Kopcke, "Heraion von Samos: Die Kampagnen 1961/1965 im Südtemenos," *Mitteilungen des deutschen Archäologischen Instituts, Athenische Abteilung* 83 (1968) pp. 291 f., fig. 33, pl. 123, 1, has these features, along with others he points out, which strengthen its attribution to Iran. A hooked shoulder, but without the breastlike joint, occurs in Phrygian art, Ekrem Akurgal, *Phrygische Kunst* (Ankara, 1955) pls. 12b, 14a, 16a, b, 21b; Rodney S. Young, "The Nomadic Impact: Gordion," in *Dark Ages and Nomads*, ed. Machteld Mellink (Istanbul, 1964) pl. xvi, 1. In Urartian art it may be seen on lions, Guitty Azarpay, *Urartian Art and Artifacts* (Los Angeles, 1968) p. 37, fig. 8; Maurits van Loon, *Urartian Art* (Istanbul, 1966) p. 179, fig. 22. In North Syrian art it may also be seen on lions, Helmuth T. Bossert, *Altanatolien* (Berlin, 1942) fig. 853; see also Max Mallowan, *Nimrud and its Remains*, II (London, 1966) pp. 512 f., figs. 416–417.

16. Porada, *Ancient Iran*, p. 95, pl. 23, pp. 98 f., figs. 63, 64; Parrot, "Acquisitions," pl. xv; Amiet, "Acquisitions Iranienness," p. 252, fig. 2; Jean-Louis Huot, *Persia*, I (New York, 1965) fig. 138.

17. Negahban, *Marlik*, figs. 103, 136, pl. xvi; Huot, *Persia*, fig. 138. I have not seen (except in photographs) the copper and silver vessel published by Pierre Amiet, "Un Vase Rituel Iranien," *Syria* 43 (1965) p. 236, fig. 2, pls. xvi, xvii, and therefore I do not cite it here.

18. Negahban, *Marlik*, figs. 109, 136, pl. xvi (but not continuing all the way to the rump); Muscarella, "Hasanlu 1964," p. 130, fig. 21; Dyson, "Where the Golden Bowl of Hasanlu was found . . .," p. 132, fig. 3; Calmeyer, "Bronzwerkstatt," pp. 32 f., 36 f., 40 ff., nos. G2, H3, I1, L2, M1; Porada, *Ancient Iran*, p. 87, fig. 59; Godard, *Bronzes du Luristan*, pl. xlvi, 182; Godard, *Ziwiye*, pp. 78 ff., figs. 66, 69, 79, 80–82; Wilkinson, "Mannean Land," pp. 274, 276, 282, figs. 1, 4, 14. See also Jeanny Vorys Canby, "Decorated Garments in Ashurnasirpal's Sculptures," *Iraq* 33 (1971) pp. 41 ff.

19. Negahban, *Marlik*, figs. 109, 136, pl. xvi; Huot, *Persia*, fig. 137; Goossens, *Bronzen*, fig. 3.

20. See note 18 and Porada, *Ancient Iran*, p. 94, fig. 61; also Amiet, "Un Vase Rituel Iranien," p. 237, fig. 2, pls. xvi, xvii; Pope, *Survey*, pl. 37b.

21. For references see notes 4–20; also Ghirshman, *Ancient Iran*, p. 40, fig. 49; Negahban, *Marlik*, figs. 105, 107; Ali Hakemi, "Kaluraz," *Archaeologia Viva* 1 (September–November 1968) figs. on pp. 63, 64, pl. xxxiii.

22. Muscarella, "Hasanlu 1964," p. 127, fig. 10. Although the style of the silver beaker is not close to that of our vase, some of the motifs used to decorate the animals are the same.

the raised bands of the Metropolitan Museum's goblet and on the upper section of the bronze vase.²³

I have been able to find three examples of Iranian art where bees are shown in the field. One example is a silver fragment in the Sackler collection of Columbia University. Another is a dagger formerly in the Graeffe collection where nine bees are exhibited in a row along the blade. The third is a belt or band in the Museum für Vor- und Frühgeschichte in Berlin on which we see a triangular object, over a rosette, that could be interpreted as a bee.²⁴

An area where bees seem to be commonly represented in art is Crete, on objects from the sites of Fortetsa, Arkhades, and Praisos.²⁵ One pottery vessel from Fortetsa, no. 1247, has bees that are very close in style to those on the upper register of our bronze vessel.

This detailed account of comparisons surely leads to the easy conclusion that the bronze vase is a product of an Iranian workshop. As demonstrated, the best parallels are on several objects excavated at Marlik, and on other objects attributed to the same south Caspian area. Of special importance is the beautiful unicorn vessel on which there are over a half dozen elements and motifs related to our bronze vase. Other good parallels have been found on objects from Luristan and western Iran, and in the art represented by the beakers.²⁶ A few

good parallels have been cited on objects excavated at Hasanlu.

The chronology of most of the objects referred to here is not quite settled, and discussions on the subject continue. The fifty-three graves in the cemetery at Marlik have yet to be published, and we are thus prevented from reaching firm conclusions concerning the date of their contents. The excavator has maintained in his preliminary reports that the cemetery was in existence for several hundred years, beginning in the late second millennium B.C. and continuing into the first.²⁷ Other scholars have supported this conclusion.²⁸ Edith Porada has assigned a date in the twelfth–eleventh centuries to both the unicorn vessel and the vessel with the upright winged bulls from Marlik.²⁹ She dates the gold bowl from Hasanlu to the same period but considers the silver beaker from Hasanlu to be ninth century B.C. in date.³⁰ I have stated elsewhere that I believe the gold bowl was made in the ninth century,³¹ and it is quite possible that this conclusion may have some bearing on scholars' attitudes about lowering the dates for some of the gold vessels from Marlik. But it is too early to press this suggestion because all the evidence has not been published.

Other objects, not scientifically excavated, but presumably found in the south Caspian area, are generally

23. This decoration also occurs on a bronze beaker in the Teheran Museum that is of the same shape as the goblet in Figures 15, 16, Rosa Maria Carless, "Notes on Luristan Bronzes," *Apollo* 82 (1965) p. 27, fig. 2.

24. Emma C. Bunker, C. Bruce Chatwin, and Ann R. Farkas, "Animal Style" *Art from East to West* (New York, 1970) p. 33, no. 6; Goossens, *Bronzen*, fig. 1; Peter Calmeyer, *Datierbare Bronzen aus Luristan und Kirmanshah* (Berlin, 1969) p. 124, fig. 125; Wolfram Nagel, *Altorientalisches Kunsthandwerk* (Berlin, 1963) pp. 20 f., no. 57, pl. xxxi, and sketch at the back of the volume; a similar triangular motif over a plant may be a second insect. P. R. S. Moorey, "Some Ancient Bronze Belts: Their Antecedents and Relations," *Iran* 5 (1967) p. 97, calls the insects on the Graeffe dagger flies. Moorey also cites a bronze object said to come from Ziwiye as having flies, but I am not convinced. See also Edith Porada, "Nomads and Luristan Bronzes," in *Dark Ages and Nomads*, p. 12, note 12; and her *Tchoga Zanbil*, IV, *La Glyptique* (Paris, 1970) p. 12, for references to flies/bees in Elamite art, and pp. 18, 28, 33, nos. 11, 27, for representations on seals. [Now see note 80.]

25. J. K. Brock, *Fortetsa* (Cambridge, 1957) pp. 107 f., pl. 100, no. 1247, p. 110, no. 1279, pl. 100, pattern 15d; Doro Levi, "Arkhades," *Annuario della R. Scuola Archeologica di Atene* 10–12 (1927–1929) p. 136, figs. 123a, b, p. 430, fig. 578; Paul Jacobsthal, *Greek Pins* (Oxford, 1956) p. 74, fig. 293, also figs. 292, 294. The illustrations in Schiering, *Werkstätten*, Beil. 10, upper row, may be of bees or

lotus blossoms. See R. J. Forbes, *Studies in Ancient Technology*, (Leiden, 1966) pp. 80 ff., for a discussion of bees in ancient cultures.

26. Calmeyer, *Bronzeweerkstatt*, pp. 46 f., 61 f., narrows the area where he thinks the bronze beakers were made to the Kirmanshah region; I think western Iran is more accurate given our present knowledge.

27. Negahban, *Marlik*, pp. 37 ff.; also in his "Notes on Some Objects from Marlik," *JNES* 24 (1965) pp. 311 ff., 326 f. Ekrem Akurgal, *Urartäische und Altiranische Kunstzentren* (Ankara, 1968) pp. 81 ff., 97 ff., dates most of the Iranian material from Marlik to the seventh century B.C.

28. Robert H. Dyson, Jr., "Problems of Protohistoric Iran as Seen from Hasanlu," *JNES* 24 (1965) p. 211, where his chart dates Marlik from 1200 to 750 B.C.; Wilkinson, "Mannean Land," p. 102; Porada, *Ancient Iran*, p. 90.

29. Porada, *Ancient Iran*, pp. 91 ff., 94 ff.

30. Porada, *Ancient Iran*, pp. 113 ff., pls. 23, 24, 28; also in her "Notes on the Gold Bowl and Silver Beaker from Hasanlu," *A Survey of Persian Art*, XIV, ed. Arthur U. Pope (Tokyo, 1967) p. 1968, note 16.

31. Oscar White Muscarella, "Hasanlu in the Ninth Century B.C. and its Relations with other Cultural Centers of the Near East," *American Journal of Archaeology* 75 (1971) p. 265; also in my forthcoming "Hasanlu and the Near East in the Ninth Century B.C.," in *Iran and its Influences*, ed. James Muhly.

dated to the late second or early first millennium B.C., but if the Marlik material is to be lowered to the early first millennium B.C., the date of these objects must follow the same pattern. These objects, all of gold, include the gazelle cup, the cup found at Kalar Dasht, the Guennol cup, and the vessel in the Louvre.³²

The bronze beakers have recently been discussed in detail by several scholars, and there is general opinion that they should be dated to the tenth–ninth centuries B.C.³³ The handful of objects cited from Luristan and western Iran are difficult to date, but there is growing evidence that they should not be dated before the early first millennium B.C. The dagger formerly in the Graeffe collection is about 1000 B.C. in date, maybe even earlier,³⁴ but the horse bits, also formerly in the Graeffe collection, were surely made a century or more after 1000 B.C.³⁵ Porada has called attention to the relationship of the Metropolitan Museum quiver to the Marlik styles, but she prefers to date the quiver to the beginning of the first millennium.³⁶ Recent studies have narrowed the range of dates for Luristan disk pins (Figure 17) to the ninth century, perhaps continuing into the eighth.³⁷ Other objects, such as the Holmes beaker and the vessels illustrated in Figures 13, 14, and 16, cannot be dated independently of the Marlik and south Caspian material, to which they relate stylistically.

I am reluctant to suggest a date for the bronze vessel other than in broad terms. Clearly the date of the Marlik material, especially the unicorn vessel, is crucial in

this matter. If we fall back upon the general chronological formula of late second–early first millennium B.C., we will no doubt be correct, but perhaps excessively vague. My present opinion, based on the evidence presented above, is that it is quite possible to believe that the vessel was made sometime between 1000 and 800 B.C.³⁸ Those who believe that the material cited from Marlik is actually second millennium in date may think the dating offered here too low. But until the archaeological sources show evidence for such a date for the Marlik material cited above, I prefer to see the vessel as early first millennium in date.

Objects acquired from the antiquities market exist in an archaeological void. We may make comparisons and add up the number of parallels gathered in order to help us reach a tentative conclusion, but we will never know for sure if we are correct in our deductions. It seems, therefore, safer and wiser to offer only suggestions rather than definite statements about the possible proveniences of such objects. With this in mind I suggest that the bronze vessel was made in an area bordered by Luristan in the south and the south Caspian in the north. And because there appear to be more parallels from the latter area, I think we may assume that it was made in a workshop that also made some of the works of art excavated at Marlik. For if the vessel had been excavated at Marlik by archaeologists, it would not stand out from the other objects in terms of style. In fact, bronze vessels, up until now unpublished and not available to scholars, were excavated at Marlik.³⁹ It would be a pleasant surprise if subsequent publication of that material would show that vessels similar in shape and decoration to our vase were used there.

This study of the Metropolitan Museum's bronze vase began with Amandry's comments that models for the East Greek friezes would turn up somewhere in the area of eastern Turkey or northwestern Iran. Had the bronze vase been available to Amandry, he would no doubt have identified its decoration as a classical Iranian example of the animal frieze, in fact, the best example of an animal frieze known at present from Iran. Its theme of decoration is so close in conception to that on many East Greek vessels that it surely must be brought into a discussion about the origin or the sources of influences on the Wild Goat style. In works in this style we see continuous processions of animals walking or

32. Porada, *Ancient Iran*, pp. 91 ff., 93 ff., fig. 61, pl. 22b; Wilkinson, "Mannean Land," pp. 101 ff. Vanden Berghe, *Archéologie*, p. 5, dates the Kalar Dasht finds to 1000–800 B.C.

33. Calmeyer, *Werkstatt*, pp. 1 ff.; Pierre Amandry, "Situles à Reliefs du Princes de Babylone," *Antike Kunst* 9 (1966) pp. 57 ff., 69; Porada, *La Gyptique*, p. 130; see also my forthcoming article "Decorated Bronze Beakers from Iran."

34. Calmeyer, *Datierbare Bronzen*, p. 122; Robert H. Dyson, Jr., "Notes on Weapons and Chronology in Northern Iran around 1000 B.C.," in *Dark Ages and Nomads*, pp. 32 ff., and p. 34 for a very similar sword from Giyan, Tomb 10.

35. Moorey, "Chronology for the Luristan Bronzes," pp. 123 f.

36. Porada, *Ancient Iran*, p. 88.

37. Maurits van Loon, review of *Dark Ages and Nomads* in *Bibliotheca Orientalis* 24 (1967) p. 24; Moorey, "Chronology for the Luristan Bronzes," p. 127.

38. The objects cited from Ziwiyeh are not so close to the bronze vase in style that they would effect a lowering of the date to the eighth or seventh century B.C.

39. Negahban, *Marlik*, p. 27.

grazing in one direction and set off in horizontal registers; sometimes the animals in one register move in a direction opposite to the others. There are also a number of filler ornaments, including rosettes and plants, and a few vessels even have small birds in the field.⁴⁰ These motifs and the form of their representation are quite close to those found on our bronze vase. Indeed, not all of the types of animals, birds, and ornaments found on East Greek vessels appear on the bronze vase or in other Iranian processions, and the animals, birds, and plants are drawn in a different fashion, with far less elaborate body decoration, but form and concept make a comparison inevitable. We are not, after all, dealing with a one-to-one copy, but rather with what appears to be an adaptation. All one need do is place the bronze vase next to an East Greek Wild Goat vase and some degree of relationship is established (Figures 1–11, 18, 19).

There is general agreement among scholars concerned with East Greek pottery that the Wild Goat style did not develop before the seventh century B.C. In fact, no one seems to date its inception before the second quarter of that century. Thus Wolfgang Schiering and R. M. Cook date the earliest vessel in the style to about 660 B.C.,⁴¹ while Karl Schefold and John Board-

man place it about 650 B.C.⁴² And it has recently been argued that the style was not known at Sardis until the end of the century.⁴³

Processions of animals existed also in works produced on the Greek mainland. Athenian Late Geometric pottery and Protocorinthian and Corinthian pottery at Corinth present the earliest first-millennium examples.⁴⁴

No one doubts that the animal frieze as a decorative element existed earlier on the mainland than in the islands.⁴⁵ The animal frieze on a vase in the National Archaeological Museum in Athens, 804, painted by the Dipylon Master, is the earliest example of the motif, according to the most recent discussion of Geometric art.⁴⁶ The vase's date has been discussed by many scholars, and the majority would place it close to 750 B.C.⁴⁷ A vase in the Museum für Antike Kunst in Munich, 6080, also with an early frieze and also by the Dipylon Master, is usually placed close to the vase 804 in date.⁴⁸

It is of interest to note that the animal frieze on Late Geometric pottery usually consists of isolated registers—sometimes one, at other times two, and rarely, several—juxtaposed to registers of geometric motifs and genre scenes.

40. Schiering, *Werkstätten*, pls. 4 ff., 12; K. F. Kinch, *Vroulia* (Berlin, 1914) pp. 191, 207, 214, figs. 73, 91, 101, pls. 15, 16; Pierre Demargne, *The Birth of Greek Art* (New York, 1964) p. 341, fig. 437; Elena Walter-Karydi, "Äolische Kunst," *Antike Kunst*, supplement 7 (Bern, 1970) pls. 1, 2, 3, 1 and 3; Chrysoula Kardara, *Rodiaki Angeiographia* (in Greek) (Berlin, 1963) pp. 91, 98, 99, 101 ff., figs. 59, 63, 64–68, 71; Karl Schefold and Johannes Boehlau, *Larisa am Hermos*, III (Berlin, 1942) pls. 16, 19, 25, 29; pl. 19, 1, even has a young ibex tucked in between two grown ibex, as on the bronze vase. Small birds drawn naturally and used as fillers may be seen in Skevos Zervos, *Rhodes* (Paris, 1920) p. 155, fig. 352, XIII, XV; E. Homann-Wedeking, *The Art of Ancient Greece* (New York, 1968) pl. on p. 63; Crawford H. Greenewalt, Jr., "Orientalizing Pottery from Sardis: The Wild Goat Style," *California Studies in Classical Antiquity* 3 (1970) pl. 3, 2; Kardara, *Rodiaki Angeiographia*, pp. 86, 157, figs. 55, 129. I also wonder if the pendant triangles with a "head" and a "beak" found on some East Greek vessels might not be related to the type of winged creature represented on the upper registers of our bronze vase. It is possible, I believe, to understand these triangles as stylized birds; see Kardara, *Rodiaki Angeiographia*, pp. 103, 167, figs. 68, 138.

41. Schiering, *Werkstätten*, pp. 8–11; R. M. Cook, *Greek Painted Pottery* (London, 1960) p. 116, and also in *Gnomon* 37 (1965) p. 506; Demargne, *Greek Art*, p. 338, dates it to c. 675 B.C.

42. Karl Schefold, "Knidische Vasen und Verwandtes," *JdI* 57 (1942) p. 125; John Boardman, *Excavations in Chios 1952–1955:*

Greek Emporio, supplement no. 6 of *The Annual of the British School at Athens* (London, 1967) p. 148.

43. Greenewalt, "Orientalizing Pottery from Sardis: The Wild Goat Style," pp. 66 f. and note 36.

44. J. Nicholas Coldstream, *Greek Geometric Pottery* (London, 1968) pls. 6, 7d, 8e, 11g, 14b, c, e (for four registers); Humfry Payne, *Protokorinthische Vasenmalerei* (Berlin, 1933) pls. 5, 9, 15, 30, 31; Humfry Payne, *Necrocorinthia* (Oxford, 1931) pls. 8 ff.

45. Kunze, *KB*, p. 163; Ekrem Akurgal, *The Art of Greece* (New York, 1966) pp. 170, 202; Amandry, "La Grèce d'Asie," p. 90; also Amandry in *Le Rayonnement des Civilisations Grecque et Romaine* . . . (Paris, 1965) p. 487; compare Frederik Poulsen, *Der Orient und die Frühgriechische Kunst* (Leipzig, 1912) p. 18.

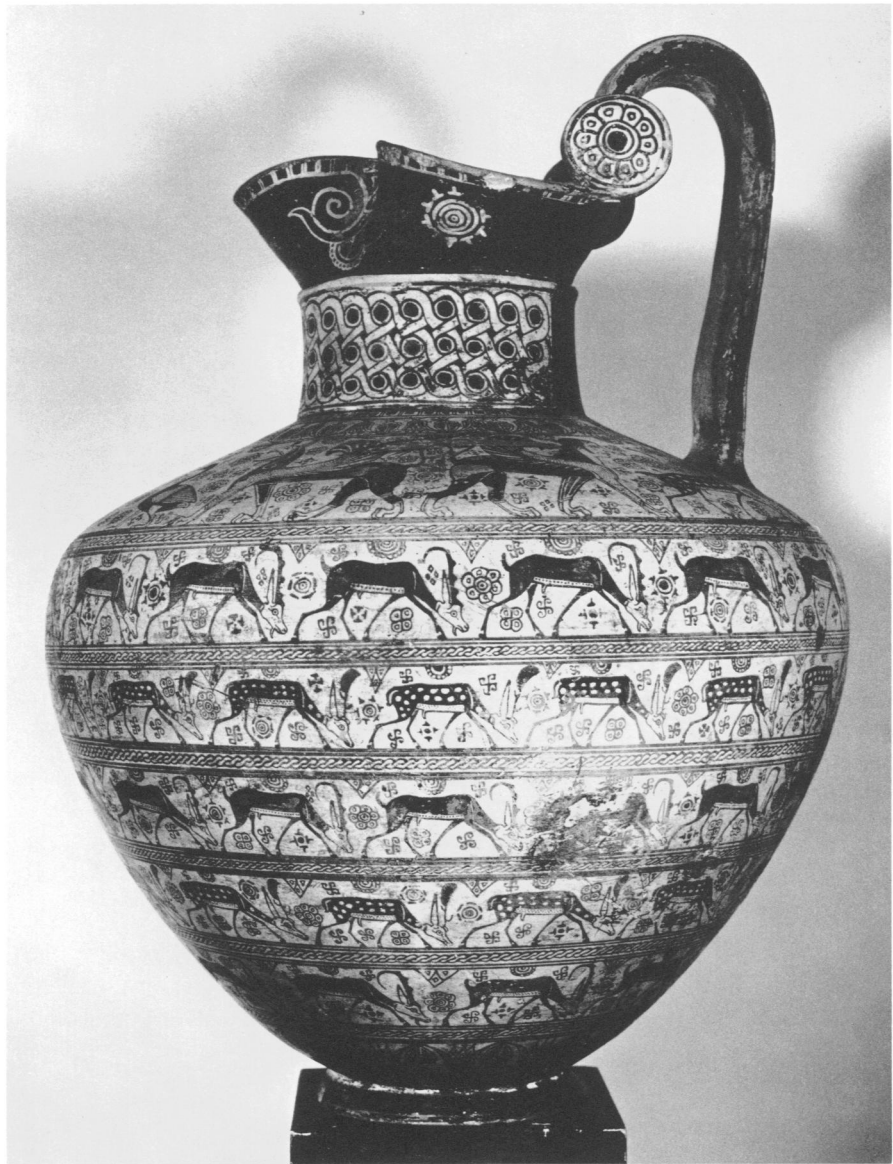
46. Coldstream, *Geometric Pottery*, pp. 40, 45, pl. 6.

47. 775–750 B.C.: Peter Kahane, "Die Entwicklungen der Attisch-geometrischen Keramik," *AJA* 44 (1940) p. 477. 750 B.C.: Gerda Nottbohm, "Der Meister der grossen Dipylon-Amphora in Athens," *JdI* 58 (1934) p. 31; J. M. Davison, *Attic Geometric Workshops* (New Haven, 1961) p. 129; Eva Brann, *Late Geometric and Protoattic Pottery* (Princeton, 1962) p. 13; Jack L. Benson, *Horse Bird and Man* (Amherst, 1970) p. 18. 760–740 B.C.: Coldstream, *Geometric Pottery*, pp. 330 f.

48. Coldstream, *Geometric Pottery*, pp. 32 f., 174, note 4; Davison, *Workshops*, p. 129; Dieter Ohly, *Griechische Goldbleche* (Berlin, 1953) p. 133, note 30, dated early eighth century and claimed as the earliest example of a frieze on geometric pottery.

FIGURE 18

East Greek vase: the
Levy Oenochoe. Musée
du Louvre (photo:
Maurice Chuzeville)



Gold bands with animal friezes have been found at Athens, and it has been suggested by some scholars that they are earlier than the friezes on pottery.⁴⁹ However, the dates of these bands have been lowered, and there is no strong reason to assume that they are earlier.⁵⁰

49. Ohly, *Goldbleche*, pp. 73, 133, note 30; Thomas J. Dunbabin, *The Greeks and Their Eastern Neighbors* (London, 1957) p. 44; also Amandry "Un Motif 'Scythe,'" p. 158, note 41.

50. Kunze, *KB*, p. 206; Coldstream, *Geometric Pottery*, p. 361; Brann, *Late Geometric and Protoattic Pottery*, p. 13.

51. K. F. Johansen, *Les Vases Sicyoniens* (Paris, 1923) p. 185; Payne, *Protokorinthische Vasenmalerei*, p. 20; T. J. Dunbabin, "The

K. F. Johansen and Humfry Payne, supported by Thomas J. Dunbabin, have maintained that the orientaling period at Corinth began after about 750 B.C.⁵¹ Saul Weinberg and J. Nicholas Coldstream have lowered this date to about 725 B.C.,⁵² which makes the

Chronology of Protocorinthian Vases," *Archaiologike Ephemeris* 1953-1954, pp. 247-267.

52. Saul Weinberg, *Late Geometric and Orientalizing Pottery* (Cambridge, 1943) p. 33; also in Weinberg's "What is Protocorinthian Ware?," *AJA* 45 (1941) p. 35; Coldstream, *Geometric Pottery*, pp. 110 f.



FIGURE 19
East Greek vase. The Metropolitan Museum of Art, Rogers Fund, 19.192.12

Athenian animal friezes earlier than those at Corinth. However, in the earlier stages of Protocorinthian pottery the frieze was usually confined to one register, a point of similarity to the friezes on Late Geometric Athenian pottery. It was not until the later Protocorinthian and the transitional period to Corinthian styles that the frieze in several registers came into full development (Figure 20).

Perhaps the best examples of animal friezes in early Cretan art occur on the often discussed shields. But there is much disagreement about the range of dates accepted for their manufacture. Some would date them beginning in the late ninth century B.C., continuing into the eighth century,⁵³ others see them not earlier than the eighth century,⁵⁴ and one scholar has dated them all to the seventh century.⁵⁵ There can be little doubt that the shields were being used in the eighth century and also in the seventh century, as proven by the shield from Arkhades.⁵⁶

The question that naturally arises from this brief survey of the occurrences of the animal procession in the Greek world is: what was the source, or sources, of this idea? We have already seen the Iranian evidence for the frieze and taken note of the existence of the same idea and animals that occur in Greek art. But what of other areas in the Near East? How common was the use of the frieze outside Iran?

Uratian art yields evidence that the animal frieze was a favorite motif, especially on shields, beginning in the early eighth century B.C. Shields of Argishti I (c. 786–764) and Sarduri II (c. 764–735) have lions and bulls walking in rows around the rim; the idea continued into the seventh century.⁵⁷ A fragmentary bronze bowl found at Toprakkale also has an animal-frieze decoration of lions and bulls.⁵⁸ But these friezes do not occur on pottery or on metal vases in registers, that is, at least none have been found to date. They occur rather in a circular fashion, and there are no ibex, goats, or filler ornaments used on the shields.

Phrygia is another area where the animal frieze was used in art. It is best seen on the so-called Alishar IV, or *frühphrygische*, pottery.⁵⁹ Here processions of skidding deer and goats or ibex were drawn in black silhouette in a single register. The repertory of animals was limited, and linear trees and concentric circles were the favorite filler ornaments. The date of this pottery appears to be late eighth century, and it is contemporary, at least in part, with the pottery painting called *reifphrygisch* by Ekrem Akurgal.⁶⁰ This latter style has lions, bulls,

53. Kunze, *KB*, p. 247; Hugh Hencken, "Herzsprung Shields and Greek Trade," *AJA* 54 (1950) pp. 297 ff.; John Boardman, "The Khaniate Tekke Tombs, II," *BSA* 62 (1967) p. 59; earlier, in *The Cretan Collection in Oxford* (Oxford, 1961) pp. 84, 138, Boardman dated the shields to the eighth and seventh centuries; James Muhly, "Homer and the Phoenicians," *Berytus* 11 (1970) p. 48.

54. Coldstream, *Geometric Pottery*, p. 382, note 19; Demargne, *Greek Art*, p. 316, beginning of the eighth century.

55. Sylvia Benton, "The Date of the Cretan Shields," *BSA* 39 (1938–1939) pp. 54, 61, 62 f.

56. Levi, "Arkhades," pp. 40, 245.

57. Van Loon, *Uratian Art*, p. 117, fig. 13, pl. xxv; Azarpay, *Uratian Art and Artifacts*, pls. 7, 18–20, 56, 58.

58. Van Loon, *Uratian Art*, p. 179, fig. 22; probably later than other Uratian material.

59. Akurgal, *Phrygische Kunst*, pp. 4 ff., figs. 1–9, 15, pls. 1–8; R. S. Young, "The Gordion Campaign of 1957," *AJA* 72 (1968) pl. 75, fig. 26.

60. Muscarella, "Hasanlu in the Ninth Century B.C.," p. 263.



FIGURE 20

Transitional Corinthian olpe. The Metropolitan Museum of Art, 96.18.41

goats, stags, and birds drawn in individual metopes, and therefore has no relationship to a true frieze.⁶¹ A fragmentary and charred piece of wood from Gordion has some kind of animal frieze, but too little is preserved to enable us to know exactly what exists.⁶² The use of black silhouette drawing and the framing of an animal

in a metope seem to exclude Phrygian art as a source for animal friezes in the West.

In north Syria the animal frieze was not common. However, a few examples of pottery exhibit a row of black silhouetted animals in one register.⁶³ One may argue that the stone reliefs sculpted on the orthostates of some city walls are friezes. But this would be pushing the evidence too far, and we should be concerned mainly with representations on vessels.⁶⁴ I do not think any of the pottery friezes from north Syria relate to those known in the West.⁶⁵

The Assyrians apparently did not use the animal frieze as a decorative motif,⁶⁶ but ivories and bowls, presumably of north Syrian and Phoenician manufacture, have been recovered from Assyrian ruins. Some of the ivories from Nimrud are in the form of individual plaques representing grazing stags or horned animals; other ivories in the round depict grazing antelopes, bulls, or sphinxes, sometimes in registers.⁶⁷ Single plaques showing grazing animals have been found also at Arslan Tash and Samaria, and on Crete.⁶⁸ Bowls classified as Phoenician or Cypriote and found at Nimrud and Cyprus have friezes of animals as well, sometimes in registers.⁶⁹ Aside from the Iranian evidence, these friezes or representations of grazing animals are the closest in concept to the friezes known to the Greek painters.

61. Akurgal, *Phrygische Kunst*, pls. 12, 14, 16, 19, 22.

62. R. S. Young, "The Gordion Campaign of 1959: Preliminary Report," *AJA* 64 (1960) p. 240, pl. 61, fig. 24.

63. P. J. Riis, *Hama, Les Cimetières à Cremation* (Copenhagen, 1948) pp. 48, 50, figs. 24, 25, 28; C. Leonard Woolley and R. D. Barnett, *Carchemish, III* (London, 1952) pl. 68b, which reminds us strongly of the skidding deer on Phrygian pottery, and pl. 68c, which reminds us of the figures on a vessel found at Hasanlu, and cited in note 9.

64. For examples of animal friezes in stone reliefs see Max von Oppenheim, *Tell Halaf, III* (Berlin, 1955) pls. 56 ff., and also the reliefs from Ankara, Bossert, *Altanatolien*, pls. 1053–1056.

65. The double-headed lion common on north Syrian reliefs was adapted in Greece not in a frieze context, but as a single motif, Dunbabin, *Greeks and Their Eastern Neighbors*, pl. xv, 1, 2; Oscar White Muscarella, "Near Eastern Bronzes in the West: The Question of Origin," in *Art and Technology*, ed. Suzannah Doeringer and David G. Mitten (Cambridge, Massachusetts, 1970) p. 120.

66. But see Peter Calmeyer, *Altiranische Bronzen der Sammlung*

Bröckelschen (Berlin, 1964) pp. 49 f., no. 106, fig. 7, which is apparently an Assyrian object.

67. R. D. Barnett, *A Catalogue of the Nimrud Ivories* (London, 1957) pls. 2, 5, 40, 46–47, 65, 68; Mallowan, *Nimrud and its Remains*, II, figs. 416, 417, 435–439, 550, 561, 562. For an imported example found at Samos see E. Buschor, "Samos 1952–1957," *Neue Deutsche Ausgrabungen im Mittelmeergebiet und im Vorderen Orient* (Berlin, 1959) p. 211, fig. 13.

68. F. Thureau-Dangin, *Arslan Tash* (Paris, 1931) pl. xxxi, nos. 61, 62; J. W. and G. M. Crowfoot, *Early Ivories from Samaria* (London, 1938) pl. x, 8; R. D. Barnett, "Early Greek and Oriental Ivories," *Journal of Hellenic Studies* 68 (1948) p. 4, fig. 1, also pl. viii, d, from Sparta.

69. Poulsen, *Der Orient*, p. 34, fig. 22; C. P. di Cesnola, *A Descriptive Atlas of the Cesnola Collection of Cypriote Antiquities* (New York, 1903) III, part 2, pl. xxxiii, 4; Austen Henry Layard, *Monuments of Nineveh*, 2nd ser. (London, 1853) pls. 57, 59c, 60, 61a, 64; Einar Gjerstad, "Decorated Metal Bowls from Cyprus," *Opuscula Archaeologica* 4 (1946) pls. ii, xi, xiii, dated seventh century and later, pp. 15 ff.

It would appear from this brief summary that the isolated register of animals in the eighth-century Greek friezes could conceivably have been derived and adapted from any one of several Eastern cultures. In seventh-century art we notice a similarity in the use of multiple registers and processions of animals between the Corinthian and the East Greek friezes. The Corinthian friezes tend to include heraldic scenes, or different types of animals and birds juxtaposed, often in hunting situations. The East Greek examples are more concerned with continuous processions of the same animal, walking or grazing usually in one direction. Humfry Payne and others have discussed the spiritual and technical differences between the two styles of painting.⁷⁰ While emphasizing the differences, they admit, at least by implication, that there was some degree of similarity in concept. It is not impossible to my mind that both mainland and island pottery painters may actually have been influenced by the same Near Eastern stimuli but translated them in a different manner and style.⁷¹ Of course, we are not in a position to know if this is true or not, and it could be argued equally that they reflect different Eastern sources. In any event, whatever the Eastern source for the mainland friezes, I believe that we are able to recognize Iranian art, expressed by the bronze vase and the other objects referred to already, as the best candidate available for

the stimuli and inspiration that played some role in the development of the East Greek style.⁷²

If there were no chronological differences between the Iranian material and the East Greek art under discussion, there would be little hesitation in regarding the former as a model for the latter. But there is a chronological gap of approximately 150 to 250 years. Some scholars have suggested that the friezes on Phoenician bowls were the models for Greek friezes,⁷³ and in some ways these friezes are close: a continuous procession of animals displayed in several registers. Nevertheless, the Phoenician frieze is always on the interior of bowls and never, to my knowledge, on the outside of vases. Those who believe that the grazing animals on the ivories found in Assyrian contexts influenced the Greek painters have a strong argument. But I believe that the Iranian evidence is stronger, that is, it is closer than the ivory friezes to the East Greek style.

Akurgal has suggested that the "harmless strolling lions" of the East Greek pottery reflect knowledge of the Urartian lions represented on shields.⁷⁴ But the East Greek lions appear to reflect Assyrian and north Syrian lion types,⁷⁵ especially in the manner in which the feet are drawn and in the position of the tongue. Furthermore, the East Greek lion is usually not drawn in a continuous frieze, as is the case in Urartian art.

Amandry has rejected Urartu and Phrygia as sources

70. Payne, *Protokorinthische Vasenmalerei*, pp. 17 ff., pl. 32; Schiering, *Werkstätten*, p. 94; Amandry, "La Grèce d'Asie," p. 90; Scheffold, "Knidische Vasen," pp. 125, 142; Demargne, *Greek Art*, p. 338; R. M. Cook, "Ionia and Greece in the Eighth and Seventh Centuries B.C.," *JHS* 66 (1946) p. 95.

71. A detail of decoration that occurs in middle and late Protocorinthian painting is the hooked shoulder discussed above in the text and in note 15; see Payne, *Necrocorinthia*, pls. 28, 4, 29, 8; J. L. Benson, "The Ampersand Painter," *AJA* 64 (1960) pl. 81, figs. 1-3, pl. 82, figs. 10, 11, pl. 83, fig. 13. It has also been pointed out that incisions on Protocorinthian pottery suggest that metal models were known and that the technique used on these vessels was adapted to pottery, Payne, *Necrocorinthia*, p. 7; R. M. Cook, "Ionia and Greece," p. 93. The hooked shoulder does not, to my knowledge, occur in East Greek art.

72. See A. U. Pope, "The Art of Persia and Associated Cultures . . .," *Illustrated London News*, August 24, 1935, the caption of the East Greek vessel on p. 315. Jack L. Benson, who, with typical generosity, read the manuscript of this study and shared his opinions with me, disagrees with the conclusions I have reached. He believes that the East Greek frieze may best be understood as a development from mainland art, Protocorinthian and Protoattic, and is not necessarily a result of Near Eastern influence. (Note his comment in *Horse Bird and Man*, p. 70, that the mainland Greeks,

knowing the frieze from their Mycenaean heritage, were inspired by oriental friezes to adapt the motif to their own needs.) Benson also thinks that because most (not all) Greek friezes move from left to right, while the bronze vase discussed here moves basically from right to left, this may be a further indication of East Greek borrowing from the West rather than from the East. Although I do not deny that there are some agreements between mainland and East Greek friezes, there is also agreement between the latter and Iranian friezes (some of which indeed move from left to right), and I doubt if we should assume this is fortuitous. The visual impact of the relationship is too powerful to my mind to be ignored, and I feel justified in defending the relationship. Several scholars mentioned in this study (note 70) have called attention to the differences between mainland and East Greek friezes, and surely it is at least a viable possibility that an oriental style (Iranian, as argued here) was admired and adapted by island painters, thereby causing the differences noted.

73. Poulsen, *Der Orient*, p. 91; Kunze, *KB*, pp. 164 f.

74. Akurgal, *The Art of Greece*, p. 197; note that on p. 193 he compares lions on Protocorinthian and early Attic vases to a disk published by Ghirshman, but the latter piece is not Iranian, as claimed by Akurgal, but Italian; E. Akurgal, *Die Kunst Anatoliens* (Berlin, 1961) pp. 178 f.

75. Schiering, *Werkstätten*, pp. 53 f.

for the Greek frieze and suggested Iran. His main source for parallels is a group of objects allegedly from Ziwiye, of eighth–seventh-century date: silver disks with a circular frieze of running goats with a lotus and bud design.⁷⁶ There is no doubt that the goats and floral motif are close to the East Greek examples, but they are not in a horizontal frieze. Some of the gold objects said to come from Ziwiye, cited above, have horizontal friezes, but I do not think that they could be considered as directly related to the East Greek examples. We are left then with the earlier Iranian representations of the frieze on vessels, especially our bronze vase.

There is no easy explanation for the long span in time between the early first-millennium Iranian evidence and the seventh-century East Greek paintings. Nor do we know anything about the dynamics of the adaptation of the Iranian frieze by East Greek artists who apparently were aware of the earlier mainland use of friezes. One may bring in archaeological clichés that could solve the problem: (1) The bronze vase and closely related material, being valuable, were kept as heirlooms for a long time after their manufacture. These objects were seen by or passed on to Western (East Greek) artists in the seventh century. (2) There were vases with friezes in registers made in Iran over a long period of time. It was these vases that were seen by Western artists and adapted. Because of archaeological accident, they have not yet been recovered in excavations.⁷⁷ Although neither of these conclusions may be proven, for the present I prefer to leave them stand as tentative explanations for the adaptation and chronological gap.

A discussion of the possible routes from Iran to the

West would not prove fruitful as conclusions about them tend to be subjective. Judy Birmingham, Boardman, and earlier, J. Wiesner,⁷⁸ saw no difficulty in proposing a direct land route; R. D. Barnett and also Wiesner saw the possibility of a Black Sea route.⁷⁹ A land and a sea route are both feasible, and it is not necessary to prefer one over the other.

The Metropolitan Museum's bronze vase has become another chapter in the study of Greek-Oriental, specifically Greek-Iranian, relations in the Iron Age. One hopes that its presentation here will lead to further discussion in this area of research and encourage more material to be published so that our understanding of first-millennium cultural exchanges will be increased.⁸⁰

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 Wilkinson, "Marlik Culture,"—Charles K. Wilkinson, "Art of the Marlik Culture," *The Metropolitan Museum of Art Bulletin* 24 (1965–1966) pp. 101–109.

76. Amandry, "La Grèce d'Asie," p. 93, and in *Le Rayonnement des Civilisations*, p. 488; see also notes 7 and 38.

77. At least two Iranian pottery vessels with animal friezes, one from Hasanlu, the other said to come from the Ardebil area, and not pre-ninth century in date, have been published: see note 9.

78. Judy Birmingham, "The Overland Route across Anatolia," *Anatolian Studies* 11 (1961) p. 192; Boardman, *The Cretan Collection in Oxford*, p. 100; J. Wiesner, "Zur orientalisierenden Periode der Mittelmeerkulturen," *Archaeologischer Anzeiger* 1942, pp. 454 ff.

79. R. D. Barnett, "Oriental Influences on Archaic Greece," in *The Aegean and the Near East*, ed. Saul S. Weinberg (New York, 1956) pp. 228 f., 233. James Muhly "Homer and the Phoenicians," p. 49, attacks the land-route theory, but apparently only the alleged route from Urartu to the West; he says nothing about Iran.

80. In 1964 I saw, briefly, a bronze vase, said to come from Iran, that was quite similar to the Metropolitan Museum's bronze vase. The whereabouts of the vase has been unknown to me since that time, and I did not remember decorative details. Recently, and after the completion of the present study, I was allowed to see some photographs (not showing all sides). The vase is presently in a private collection, but no more information was made available. It is basically the same shape as the Museum's vase but for the neck, which, although of the same type and shape, has no bud decoration and is joined to a flat and plain ledge rather than to the upper frieze; this part of the vessel deserves examination. The base is similar to that shown in Figure 12. The vase is also formed from two sections joined together by rivets. There are four registers: The one at the top, curved inward, like the top register of the



FIGURE 21

Bronze goblet. British Museum, 134685. Courtesy of the Trustees of the British Museum

Museum's vase, consists of a frieze of birds with ducks' beaks and, apparently, webbed feet, walking left; rosettes in the form of hair swirls are used as fillers. The register below consists of a frieze of vultures, heads down, moving right; the hair-swirl type of rosette separates each (?) bird from its neighbor. Below this is the join area and then a frieze of winged goats moving left; both regular and hair-swirl rosettes are used as fillers. The lowest register consists of a frieze of grazing ibex moving right; regular rosettes are used as fillers here. Body decoration on all the creatures is basically the same as that employed on the Museum's vase, but is not so finely executed. In addition, the workmanship in general is not as fine, and there are no trees or bees used as fillers. The vessel, while probably made in the same area as the Museum's vase, was clearly not made by the same artists. In addition to a vessel of aesthetic value, we now have another important example of an early first-millennium B.C. Iranian frieze.

After the completion of this study (October 1971) I received from R. D. Barnett photographs of a bronze goblet in the British Museum (134685). Through Barnett's courtesy, I am able to publish one of those photographs here (Figure 21). The vessel has the same shape as the goblet in the Metropolitan Museum, Figures 13, 14, and the one in Teheran mentioned in note 23. The upper register displays a frieze of grazing antelope (?) moving left in a lower

zone and right in an upper zone; not shown in figure 21 is a lion attacking a hare (?) in the upper zone. Rosettes and a winged creature are used as fillers. The lower register also has two zones of grazing antelope, one moving right, the other left. There is also a man in a *knielauf* position holding an axe in his right hand and touching an antelope with his left (compare a similar scene at Carchemish, Bossert, *Altanatolien*, no. 853, and at Hasanlu, Robert H. Dyson, Jr., "Early Cultures of Solduz," in *A Survey of Persian Art*, XIV, p. 2963, fig. 1034). The registers have no groundlines (compare the goblet in Teheran mentioned in note 23). What is of particular interest to us is the occurrence of the animal frieze and the type of body decoration and forms employed: rows of dots, dot net pattern, hooked shoulders, and the rear leg of sicklelike shape. Note also that the winged creature looks very much like a bird. And its head shape and body decoration are very similar to those of the winged creatures in the upper registers of the Metropolitan Museum's bronze vase. That the figure on the British Museum goblet is a bird seems certain to me. Therefore, it would appear more likely that the creatures in the Metropolitan Museum's upper registers are also birds (see note 40, with its references to East Greek birds). I still believe, however, that the creatures on the lower registers of our bronze vase, and those cited in note 24, are bees, and not birds.