

Fig. 6.21. Distribution map of stains in Zone I).

1.8 cm in thickness and in diameter from 5 to 17 cm. These stains were not given feature numbers and are not included in the tables. They were only mapped, recorded, and counted.

This third category was distributed somewhat randomly over the entire site, although a higher number (n 6) occur in the east end (Zone D). These kinds of stains, expected at archaeological sites, are overlain by peaty deposits. They may normally be assigned a feature number and regarded as a special feature type, although they essentially represent only surficial soil discolorations and rarely contain any material, which, if they did, is probably a coincidental association. They may represent residues of cultural activity, but I am inclined to believe that most of them represent natural discolorations, perhaps produced by differential soil moisture, oxidation processes, or organic content. Very faint traces of similar types of stains were observed on the ancient surface of the MV-7 stratum in excavation outside of the site area.

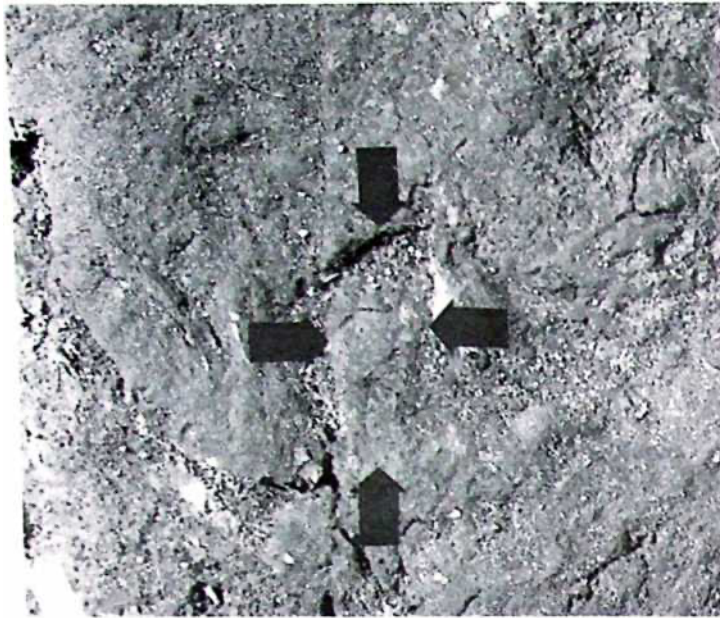
In summary, the stains can be interpreted in several ways. Some of the larger stains may represent the remains of structures whose architectural elements have not survived (they are located in areas where the peat is very thin and terminates). Those located in low, wet places may be refuse dumps at the edge of the living area, where hide and meat were tossed to decay, as possibly suggested by the content and spatial analyses of chemicals and minerals (see Chapter 10). Some stains are probably indeterminate natural phenomena. The fundamental similarities and dissimilarities between stain categories simply are not diagnostic enough to determine whether they are of cultural or natural origin.

FOOTPRINTS

One secure human footprint and two probable footprints (Imprints A-C) were excavated in a sandy mud lens located next to Hearth D-1-24 in Area D, Zone D (Figs. 6.2 and 6.22-24). An area of 4 sq m of the overlying basal peat of Stratum MV-5 was cleared to determine the shape, in plan view, of the imprints. We first excavated the imprints after peeling back the fibrous peat layer and finding an oddly shaped impression (F-A). Complete cleaning of the impression of Footprint F-A revealed what appeared to be roe markings (Fig. 6.22). Excavation of an additional 1 sq m to the immediate north exposed two more probable imprints in line with the first, suggesting a foot path around the hearth and through Workshops 2 and 3. The three imprints were found in patches of hardened muddy sand and silt about 10 cm thick and 40 to 60 cm in diameter. If present, no imprints were preserved



Fig. 6.22. Footprint (F-A) impressed in hardened muddy sand in Area D, Zone D. Note the toe impressions.



I
5 cm

Fig. 6.23. Possible footprint (F-B) located just north of Footprint F-A in Area DW, Zone D. Arrows outline the form of the impression.



5 cm

Fig. 6.24. Possible footprint (F-C) located just north of Footprint F-B in Area DW, Zone D.

in the surrounding sand. We believe the footprints were developed when the MV-7 substrate in the site was considerably wet due to heavy rains and ponding in the creek basin, which would have raised the water table level, at the time of site habitation or when the site was abandoned and possibly revisited.

The excavated imprints were infilled with a fine sand and silt. The sandy mud containing the features has slightly elevated rims around the edges of the imprints indicating that the weight of the foot displaced the mud and pushed it upward and outward. There was no subsequent damage to the imprints for one (F-A) is intact and shows the five toe impressions. No internal cracks, side wall slumping, or intrusive matter were observed in the imprints. There also seems to have been no scouring or erosion by water action before deposition of the fine sandy mud and silt in the imprints. The absence of mud cracks at the time of excavation suggests that the footprints were not exposed to weathering elements and solar radiation for a prolonged period of time prior to burial. Mud cracks in them began to develop eight days after they had been exposed by excavation.

Footprint A was 5.2 cm deep, 13 cm long, and 3.5 cm wide at the heel to 5.2 cm wide at the toe (Fig. 6.22). Possible Imprint B was 4.9 cm deep, 14 cm long, and 3.8 cm wide at the heel to 5.8 cm wide at the toe (Fig. 6.23). Possible Imprint C was 3.6 cm deep, 15.2 cm long, and 5.6 cm wide (Fig. 6.24). The side walls of the prints were straight to slightly inclined. Imprints B and C are poorly developed in comparison to footprint A. If B and C are valid prints, the heel areas and right toes appear to have been eroded slightly prior to burial. Footprint A (and a silicone impression housed at the Universidad Austral de Chile) shows clear evidence of a depressed heel, slightly elevated arch, and a depressed ball and five toes. All prints are relatively narrow and slightly curved. Alignment and size of the three imprints suggest they may be of the same individual. We experimented with footprints produced in sandy mud and sand, and found that when pulling the barefoot from wet but not inundated sandy mud, a sucking action would often produce insloping side walls and uplifted prints in general. If the size of the best-preserved footprint is correct and has not been distorted by this action or by sequential wet and dry periods, we can estimate that the individual was a small adult or an adolescent. The toe impressions seen in the figures may have been produced by a bare foot or by a foot wearing a thin sandal.

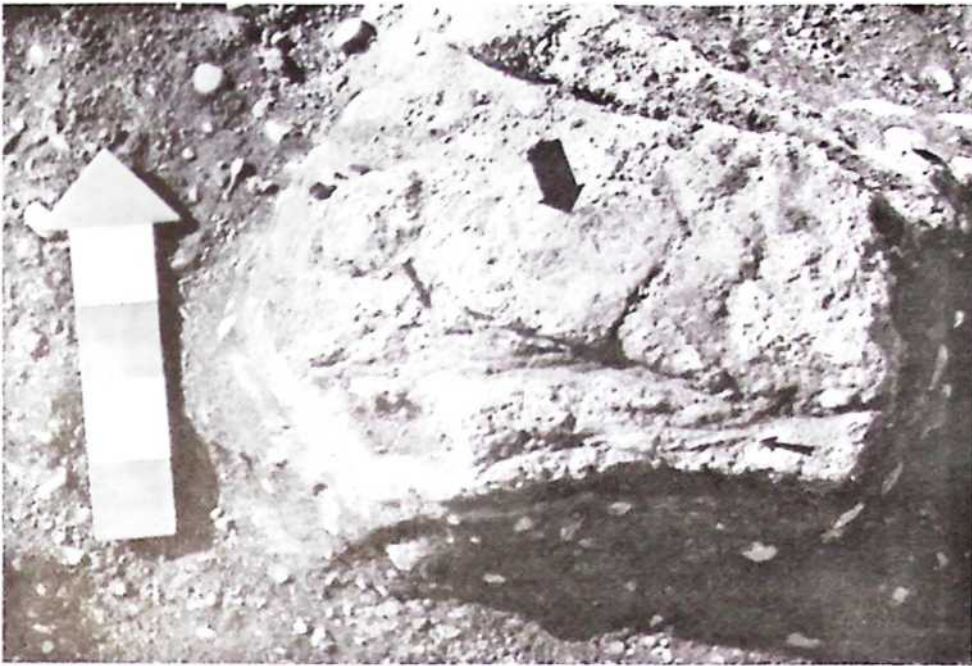


Fig. 6.25. Large block of red ochre located near the Wishbone Structure. Arrows point to cut and scraped areas.

The form and location of imprint A indicates that it is a human footprint. If we accept imprints B and C as valid footprints, it is difficult to estimate the stride distance between the prints because they are imprinted in two different patches of mud and may not represent steps of the same stride. The distance between prints A and B is 68 cm and between B and C is 39 cm. If we fill in the intervening space between prints A and B with two steps, the stride distance is roughly half or about 34 cm from the big toe of the right foot to the big toe on the left foot. This distance conforms to the stride distance for feet of comparable size during normal walking by humans (Murray et al. 1964; Sarjeant 1975).

The presence of these footprints attests to the integrity of the use surface during and after occupation of the site (see Chapter 6). The structural integrity of these prints, especially A, also indicates no modification from fluvial or other agencies.

RED OCHRE

Located 1 m east of the entrance to the Wishbone Structure was a block of red ochre that measured approximately 30 by 40 cm in size. The block was semi-hard and crusty with clear scoring lines on one end and a scraped, flattened top (Fig. 6.25). Small pieces of red ochre were scattered in front of the structure. Two stakes had red ochre smeared on their cut, burned ends (see Fig. 7.47 in Chapter 7). Mario Pino identified the ochre, which was the only block of its kind in the site. This material was not observed in

other rest pits or geological trenches. Its source is unknown.

Feature Assemblage as Part of the Site Organization

The identification of feature patterns within an overall site plan is based on observation of spatial structure and inferences regarding feature function. Some patterns are very distinct while the spatial separation of other features is arbitrary. Nevertheless, the basic assumption here is that most of the spatially discrete features and feature groups represent human activity and thus distinct activity areas. Unlike artifact assemblages that may be removed or disturbed from their original context of use, features are usually permanently anchored in their place of use, thus allowing archaeologists to rely on this assemblage to more securely infer certain aspects about a site record. In a multistructure site like Monte Verde, such areas may represent activity foci of distinct social units. I also assume some contemporaneity of work spaces and residential areas, which allows inference about the size of the resident group. Although spatially distinct activity areas could be produced by a single group over a span of several months, or different groups could produce various activity areas at a single time, the "sense of planning" and the arrangement of the living units imparts a sense of contemporaneity (Dillehay 1984). It is granted that the site or parts of the site may have been modified by abandonment or abandoned sometime prior to inundation by rising

Articles on footprints found in New Mexico and Utah:

<https://www.nps.gov/whsa/learn/nature/fossilized-footprints.htm>

<https://www.sciencenews.org/article/human-footprints-new-mexico-ancient-dating>

<https://www.themeateater.com/conservation/anthropology/photos-10-000-year-old-human-footprints-discovered-in-utah>