THE USES OF POTTERY

By ROSEMARY ELLISON

Pottery is the most common archaeological artefact: indeed sites are often designated as " pottery " or " pre-pottery " on the basis of whether or not sherds have been found. The fabric of pottery is examined to see how it is made and where the various constituents came from. Shapes and any patterns or designs painted, impressed, carved or scratched on the surfaces, are studied. It is used as a chronological and a cultural indicator. But the purpose for which the pot was made is often overlooked. There are few processing activities which do not require the use of a vessel or vessels: oils and dyes are used in weaving, aromatic oils and salves are mixed in perfume-making, food preparation requires containers for a multitude of purposes. Many other activities could be added, for instance, tanning and metal working and religious ritual.

This wide range of uses makes it more difficult to pin down the actual function of a particular pot. The same shape can be used for a number of purposes. More information is required.

The exact provenance of the pot is important. Was it in a shrine, a house, outside a building, inside a building? Was it near an oven, an altar, beside a hoard of metal goods? The position is by no means conclusive. Vessels used in preparing food may have been kept inside a house while the oven was outside in a courtyard. However, the find-spot can be a guide.

The condition of the pot can also give an indication of its use, particularly if it contained anything when it was discovered. Unfortunately this is not always easy to tell because of the initial washing of sherds—any traces of the contents would probably be removed by this. It is not practicable to scrape off the mud attached to sherds and keep it for analysis—especially as most of it would certainly be quite simply mud. But any signs of blackening caused by heat might suggest how that pot was used.

My particular interest is food preparation. There is a tendency to dismiss the rough pottery as " cooking pots " for use in the kitchen and to overlook the artistry and skill which goes into the preparation of food and into the equipment used for this. The whole population in Mesopotamia was not divided between the king in his palace and a shuffling poor who grabbed whatever food they could find and rammed it straight into their mouths. Only the most wretchedly poor do not spend some time and craftsmanship preparing food and making it look presentable.

I would like to list some pottery shapes and suggest how they may have been used in food preparation.

1. *Bevel-rim bowl*

This has already been well studied. It is one of the most common pottery types in the Late Uruk period and is used as a chronological indicator for this. Among the suggestions for its use are as a votive object in religious services, for making yoghurt and the distribution of rations (Johnson, 1973 : 129–39). Johnson divided the bevel-rim bowls found during excavation and survey in the Susa area, Khuzistan,

Iran, into three main classes according to volume: 0·922 litre, 0·647 litre and 0·465 litre. These measurements were the average of a number of bevel-rim bowls. He took this to suggest that there was a standard volume measure used to issue grain rations.

Barley rations were issued during the third and second millennia in Mesopotamia and the most common amounts recorded during the Early Dynastic period at Lagaš were 72 SÌLA, 48, 36 and 24 SÌLA a month. Later, in the Agade period onwards, the amounts were 90, 60, 40, 30 and 20 SÌLA/*qa*. It would seem that a standard measure existed throughout Mesopotamian history, although the *size* of the SÌLA/*qa* may have varied from time to time and from area to area (Ellison, 1981 : 38). The size of the SÌLA may have changed at the end of the Early Dynastic III period from the equivalent of 0·83 litre to approximately 1 litre.

If the bevel-rim bowls were ration bowls, what replaced them? At Abu Salabikh in southern Iraq, conical bowls of a more or less standard size were found during the Early Dynastic II and Early Dynastic III periods (Postgate, 1983 : 46). Perhaps these were the successors to the bevel-rim ration bowl. However, bevel-rim bowls, conical bowls and open-mouth bowls could all have been used for a number of purposes. They could, especially the smaller ones, have been used for something as simple as holding spices, chick peas or lentils, or for grating and mixing dried curd-cheese balls with water ready for cooking.

2. *Funnels* (Fig. 1 : 1)

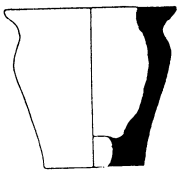
Funnels of one sort or another have been found on a number of sites, for example the Diyala sites and Nuzi (Delougaz, 1952 : Pl. 150 B.174.210a and b; Starr, 1939 : Pl. 50, R). These are wide-mouthed vessels with a draining-hole at the bottom. Funnels are needed for many domestic purposes, e.g. brewing or dairy preparations. Some may have been kept exclusively for one purpose while others were used for several.

Some vessels have small draining holes in their sides or bases which are too small to have been used as straightforward funnels (Fig. 1 : 2). Such vessels could have been used in the preparation of cheese. Cheese can be made by putting thickened soured milk into a cloth bag or a draining-vessel and allowing the liquid to run away leaving only the solid curds behind. The vessel or the bag is set so that the whey runs into another receptacle and is kept for cooking or for drinking. Draining holes in the sides of vessels may have been overlooked as body sherds are not always kept, so it is possible that some draining vessels have been missed.

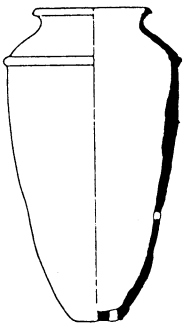
3. *Steamers, sieves and strainers*

A number of vessels have several holes in their bases (Fig. 1 : 3). Such pots could have been set over other vessels containing water and used as steamers to cook vegetables or whole grains. They could double as strainers and colanders and earthen-ware colanders are particularly good for food with a high acid content (Campbell, 1980 : 140).

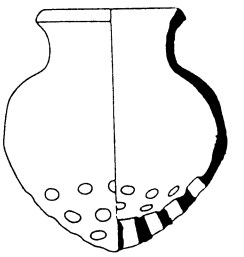
The small "sieves" (Fig. 1 : 4) found at the Diyala sites, Nuzi and Nippur (Delougaz, 1952 : Pl. 147 B.035.500, B.041.200, B.042.500; Starr, 1939 : Pl. 96 E; McCown and Haines, 1967 : Pl. 82, 10 and 11) could be used to remove food,



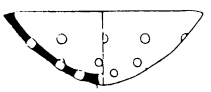
1. Funnel: type taken from Delougaz, 1952: Pl. 150, B.174.210a.



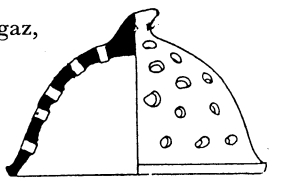
2. Straining vessel: type taken from Delougaz, 1952: Pl. 176, C.477.270.



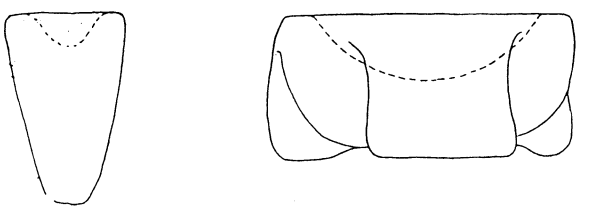
3. Steamer: type taken from Delougaz, 1952: Pl. 159, B.545.640a.



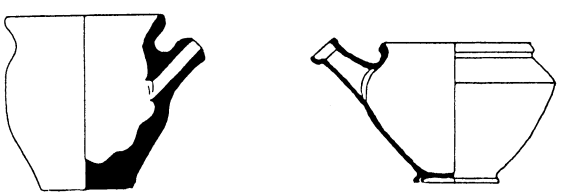
4. Sieve: type taken from Woolley, 1934: Pl. 267: 248.



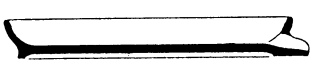
5. Perforated pot-lid: type taken from Starr, 1939: Pl. 95, G.



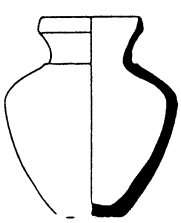
6. Mortars: types taken from Starr, 1939: Pl. 121, FF, and Pl. 122, B.



7. Low-spouted vessels: types taken from Delougaz, 1952: Pl. 158, B.545.222a; and Woolley, 1934, Pl. 265, no. 215.



8. Low spouted draining vessel: type taken from Delougaz, 1952: Pl. 196, D.800.102.



9. Bean-pot: type taken from Delougaz, 1952: Pl. 158, B.545.240a.

Fig. 1

e.g. dumplings of flour or chick pea paste, from hot water or oil. They would, of course, require some sort of handle—perhaps a twisted loop of reed. The inside surfaces of many of the small sieves are very rough so that they could have been used as graters for cheese, onions, spices and vegetables.

Perforated pot-lids have been found (Fig. 1 : 5). They are particularly common at Nuzi (Starr, 1939 : Pl. 95 G). Most steamers have solid lids so that the steam circulates around the food. However, when *couscous*, a North African dish usually made from coarse ground wheat, is cooked, the lid of the steamer is perforated to allow some of the steam to escape. It is possible that these perforated lids were used with steamers to prepare a similar dish.

4. *Mortars*

The most obvious use for mortars and grinding slabs is that of grinding grain into flour, but other food substances require grinding or pounding. Spices, e.g. coriander or cumin, are ground before adding to food, pulses are pounded into a paste, and vegetables (such as garlic, linseed seeds, cress and coriander leaves) are also pounded. This can be done in stone, wooden or pottery mortars. It is better to use separate mortars for different items : for example garlic will flavour and cress or coriander leaves will stain wooden or unglazed pottery mortars. Small stone and pottery mortars (Fig. 1 : 6) suitable for these purposes have been found at Nuzi, Ur and Kish. (Starr, 1939 : Pl. 122A, B, C, D ; Pl. 121, FF, GG ; Woolley, 1934 : Pl. 246, No. 242 ; Pl. 252, Nos. 20A and B ; Mackay, 1925 : Pl. LVI, Nos. 6, 8, 10–12.)

5. *Low-spouted vessels*

This description refers to vessels whose pouring spouts do not come from the lip but from a third or more of the way down their bodies. This means that any surface scum, froth or oil is left behind when the liquid is poured out (Fig. 1 : 7).

Vessels with very low openings (Fig. 1 : 8) could have been used as draining-vessels for the separation of cream from milk.

6. *Moulds*

Moulds were found at Mari in the tumble of Room 77 in the Palace (Parrot, 1959 : 33–57). They varied in shape from round to rectangular plates and deep dishes. The designs cut into the inside bases included combinations of circles, concentric circles, chevrons, parallel lines, goats browsing, lions stalking bulls, rows of animals cut in concentric circles and rosettes. Some were in the shape of fish. These moulds were thought by the excavators to have been kept in an upper storey above Room 77, reached by a staircase from Room 70 which contained large ovens. Moulds like these are rare : some, tentatively dated to the Larsa period, are on display in the Museum in Baghdad. At Assur two copper " handled-pans " were found in graves dating to the Old Assyrian period (Haller, 1954 : Pl. 10b, 10 ; 104 Tomb 21, Pl. 21a f.). The inner bases of these " pans " were decorated with concentric raised circles with a central boss. It is possible that they were used in the same way as the Mari moulds although there are other suggestions for their use (Calmeyer, 1977 : 90). There is little evidence of such moulds continuing through

the second and first millennia, but if they were made of metal it is not likely that they would have survived because of their value for re-use, and wooden ones would have rotted.

Bread or pastries can be baked and decorated in moulds and fish-mousses could be shaped in the fish-moulds. In an experiment, I found that a pastry made from plain flour, water and oil, and filled with chopped dates and nuts, could be pressed into a reproduction of one of the round moulds. The pastry-case was turned out and baked satisfactorily, retaining the design of the mould.

7. " *Bean-pots* "

Vessels with fat bodies and narrow necks have particularly good shapes for cooking pulses or soups (Fig. 1 : 9). Dried pulses such as chick peas or lentils can be placed in the bottom, then other vegetables and meat. They should have a tight-fitting lid if possible but this is not absolutely necessary. The pot can then be set inside a pre-heated oven or over a low fire so that the contents cook slowly for many hours. This technique is somewhat similar to the old hay-boxes or the modern slow-cooker.

The above suggestions are based on the shapes of pottery as shown in pottery drawings. Some vessels in use can be seen on cylinder seals and in reliefs. For example, the limestone relief from al-'Ubaid (Moortgat, 1967 : Fig. 122) shows men milking cows and pouring milk from one vessel into another through a funnel. One man is rocking a large closed vessel, perhaps churning butter. Men rocking churns also appear on cylinder seals of the Akkadian period. (The main theme of these seals is the Etana story.) (See e.g. Moortgat, 1967 : Pl. F, No. 6.) Other cylinder seals and reliefs could be examined to discover the possible use of pottery, bearing in mind that the designs on cylinder seals and reliefs are *representations* of the pots and therefore may not be precise copies of the originals.

What is really needed is a study of the actual pottery itself, not just from a chronological viewpoint nor even as a cultural indicator but as items giving information about how the people lived. Much more could be learned about the state of technology and society if the uses to which the pots were put were given more attention.

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