This chapter begins by defining three types of meaning – function, structure and content and it is argued that in symbolic studies in archaeology these three types of meaning have not been equally studied. The term contextual archaeology is preferred because it encapsulates the environmental context (how the object functions in its social and physical environment), the structured 'text', and the particular situation within which meanings have historical content. The following terms are outlined as part of the methodological procedure for reconstructing past symbolic meanings: semiotics, sign, index, signal, icon, symbol, metaphor, structure, syntagmatic, paradigmatic, style, culture, tradition, type, norm, context. In order to demonstrate the methods of contextual analysis, an example is first analysed – Collett's (1985) interpretation of the symbolic meaning of iron furnaces in south central Africa. Using this example a number of general methodological principles are defined and the various papers from the volume used as further illustrations. Some general concepts are then discussed concerning the relationship between symbolic meaning and social action. These include the strategies of transformation and substitution of meaning, emulation, 'presencing' and 'fixing'. The role of the individual in relation to norms and structures is discussed. The need to situate general categories (such as 'gender') into past and the observer's present contexts is emphasised. It is argued that, with the gradual development of terms, methods and theoretical concepts, the analysis of past symbolic meanings can claim a distinct part of the field.

All objects can be given meaning, and of varied types. Beyond the meanings of an object as matter, to be studied by physicists, chemists and biologists for example, it can be argued that cultural objects have three broad types of meaning. First, there is the object as involved in exchanges of matter, energy and information. We can talk of how the object is used, and how it conveys information about social characteristics, personal feelings and religious beliefs. This is to talk of the technomic, sociotechnic and ideotechnic functions of the object (Binford 1972). The object's meaning is the effects it has on the world. Second, we can say that the object has meaning because it is part of a code, set or structure. In fact its particular meaning depends on its place within the code. Third, there is the content of meaning. The first and second types of meaning are little concerned with the non-arbitrariness of cultural objects. In the first, the object is assessed in terms of its ability to do a job (cut down a tree or convey information), and there is no way of choosing between equivalently efficient tools. Particularly in the realm of information exchange, any object will do as long as it conveys the correct information. In the second type of meaning, any object will do as long as it has found a place within the code – the sign is arbitrary. So the third type of meaning is the historical content of the changing ideas and associations of the object itself, which makes its use non-arbitrary.

Symbolic archaeology as it is perceived in this volume includes all three types of meaning in relation to the symbolism of objects. Archaeologists have recently tended to concentrate on the first type of meaning, in all the work of 'ceramic sociologists', and information exchange theorists and in the Marxist contribution to the debate about ideological functions. Yet there is also a growing concern with the second type of meaning, in formal, structuralist and other semiotic approaches in archaeology. The third type of meaning has been particularly neglected of late, but it was the
Contextual analysis of symbolic meanings

concern of an earlier generation of culture-historical and historical idealist archaeologists, including Collingwood. A review of these varied approaches to symbolic meanings has been provided elsewhere (Hodder 1986a).

A material symbol (in which I include spatial relationships and the natural world used as symbol) has all three meaning components—action, structure and content. It is not easy to find a term which will encapsulate a commitment to all three types of symbolic meaning. Today terms such as symbolic, structural, cognitive, idealist, or semiotic archaeology have their own histories which tend to set up dichotomies between the three types of meaning. Because the aim in this volume is to break down old dichotomies rather than to set up new ones, I have chosen to retain the term contextual archaeology.

The term 'contextual' captures the three types of meaning outlined above. First, it is often used to refer to the environmental and behavioural context of action. Both the ‘system’, and the ‘mode of production’ can be seen as contexts in which action, including the production and use of objects, takes place. Understanding of the object comes about through placing it in relation to the larger functioning whole. This type of context occurs at many spatial and temporal scales simultaneously, and processual and Marxist archaeology have tended to concentrate on the larger scales. But there is also the moment-by-moment context of situationally expedient action. Indeed, it can be argued (Hodder 1986a) that one of the major developments needed in archaeology is a consideration of the relationships between the individual and society and between the moment and the long term.

Second, context can be taken to mean ‘with-text’, and so the word introduces the notion of linguistic analyses of the culturally constructed material world. The context here is the structure of meaning into which the objects have to be placed in order to be interpreted. The argument is that objects are only mute when they are out of their ‘texts’. But in fact most archaeological objects are, almost by definition, situated in place and time and in relation to other objects. This network of relationships can be ‘read’, by careful and self-critical analysis, as will be outlined below. Of course our interpretations may be incorrect, but our misreading of the language does not imply that the objects must remain mute.

Third, the word context is often used to refer to a concern with particular data rather than general theory, and one of the aims of this volume is to argue that general terms and theories must be better grounded in the particular context of study than has often been apparent in archaeology recently. There are two components of this context. First there is the past context in which meanings have a particular historical content. Second, there is the context of the archaeologist and the relationship between that context and interpretations that are made of the archaeological data. It might be thought that other terms would do equally well, at least in relation to the particularist tendency. Yet in archaeology ‘particularism’ has come to be associated with the rejection of or lack of interest in general theory. In this volume there is a great interest in using and producing general theory, in comparing values and ways of life. But rather than skimming over the surface of the data, using the hypothetico-deductive method to test general theories against decontextualised bits and pieces of societies, the aim here is to ground theory more carefully in data by emphasizing inductive as well as deductive procedures. Contextual is thus a better term than particularist archaeology because it implies a relationship between theory and data, placing one in terms of the other.

The analysis of symbolic meanings is only part of contextual archaeology, but it is at present an important part given archaeology’s recent emphasis on behavioural contexts. While archaeologists have extended their systemic, functionalist, materialist and objectivist inclinations to a consideration of symbols, a fuller symbolic analysis, which attempts to avoid the constraints of these various ‘-isms’, and which incorporates other contextual concerns, will need to develop and clarify terms, concepts and modes of analysis. While a start was made by Miller (1982a) in an earlier volume in this series (Symbolic and Structural Archaeology), further definitions are required for the papers in this volume.

Definitions of terms

In providing definitions of terms for the analysis of symbolic meanings, it will be necessary to introduce a considerable amount of theory. Even in the description of data using a particular terminology, theory is present. The types of theory discussed here will relate to the three types of meaning identified above. Where possible, the definitions provided will be those widely used in the social sciences although some additional terms are needed for archaeological discussion of material culture symbols. It should be borne in mind that although general definitions are provided here, contextual archaeology assumes that changes in definition might be needed in the analysis of any one particular context. It is always necessary to be critical of general terms. And in certain instances, new particular terms will have to be developed in order to capture the nature of social meanings, as is argued by Taylor (chapter 12).

Semiotics in the study of sign phenomena. A sign has two components—the signifier (signifiant) and the signified (signifié). Thus a pot may be the signifier of a concept, such as ‘young man’, which is the signified. It is important to recognise that in most semiotic analysis the relationship between the signifier and the signified is seen as arbitrary. The concern is with the organisation of signifier and signified, rather than with the particular content of the concept ‘young man’ and how it might appropriately be referred to by the pot and its associated meanings. Also the whole analysis remains abstracted from the reality of ‘a young man’. Thus much semiotic analysis leads to inadequate study both of meaning content, and of the relationship between signs and the world of material action.

A simple form of sign is the index, which is a sign where the signifier is contiguous with the signified. Thus the index may be a physical piece of the signified, such as a piece of clothing or a bone of the ancestor. A sherd may be an index for a pot, or a group of pots may be indices of the clay from which they were made.

A signal is when a sign triggers, mechanically or conventionally, some action on the part of the receiver. A signal then may
involve injunctions, orders, warnings and the like, as when a red flag stops traffic and a green flag sets it moving again. An important issue in relation to material culture signals is that people may be able to learn how to react to signs, spaces and actions, without having much idea of other, deeper or broader meanings of the sign. We often know the effect a piece of material culture will trigger without knowing why. It may be the case that much material culture 'works' without being very meaningful. A good example is much contemporary wallpaper, which triggers a reaction, provides an ambience, but the repetitive motifs used have little specific meaning. However, if all material signs were signals only, there would be little possibility for the use of material culture to construct abstract notions and interrelationships - the material world would be greatly impoverished.

It is, however, these simpler forms of sign that are extremely common and important in material culture, yet which have been much less well studied in linguistic analysis. A good example of this problem is the icon which can be seen in this volume to be of central importance in material symbolism, yet in human language the role of the icon is marginal. A discussion of iconicity was introduced by Conkey (1982) who found that icons were particularly present in the Upper Palaeolithic - that is in the early stages of human symbolic activity. An icon is a sign that signifies by virtue of sharing a property with that which it represents, and iconicity is the quality of a sign or form whereby it shares a property with that which it represents. Thus, in Palaeolithic art, the hollows and protuberances on the cave wall surface are used within the design or decoration. In Taylor's study (this volume, chapter 12) the prehistoric art motifs can be interpreted as referring directly to the animals which they look like. A particular form of icon is that discussed by Crawford (chapter 3) in which there is a spiritual connection to the image.

Because icons involve a close connection between signifier and signified, it is often easier to interpret what is signified than in the case of symbols or metaphors to be discussed below. While symbols are often polysemous (they have many meanings), icons are more constrained. Of course the icon has to be interpreted, and we can never be certain that the iconic representation represents what we think it represents. As the painting becomes more realistic, the number of points of comparison between signifier and signified increase, and our interpretation becomes more secure. Perhaps the ultimate icon is the photograph, discussed by Crawford (chapter 3). Yet photographs do not mean just what we see in them. There is more than the iconic representation. There is also the placing of the sign within sets of values, perceptions and abstract meanings. Here we move from icons to more complex forms of sign - symbols and metaphors.

The word symbol is often used loosely to refer to any representation. More strictly, symbol is a sign with an intentional signifier but which does not share a property with the signified. Most words are symbols, and this is why much semiotic linguistic analysis has assumed the sign to be arbitrary or conventional. Any particular sign can be, for example, a signal, or icon and a symbol at the same time. So these terms do not refer to different objects, but to different types of representation.

The conventional nature of symbolic signs is played upon in metaphor to produce additional effects. Metaphor involves a discrepancy between what a particular example of a sign refers to, and the constant capacity of the sign to denote. For example, the word 'milky' may be used to refer to water in a particular case, but it has the constant meaning of milk. A number of material culture examples are provided by Crawford and Ray in this volume (chapters 3 and 7). In general a metaphor adds to the meaning of the signified by placing it in conjunction with other signifieds. Probably more than in speech, material culture metaphors are powerful social strategies which can implicate abstract concepts (God, the ancestors) in the mundane aspects of daily life.

It seems, then, that while in both spoken language and material culture the symbol is the most common form of sign, material culture more frequently involves other types, particularly simpler types, of sign. It is for this reason at least, that archaeology, as a discipline particularly devoted to the 'reading' of material culture, needs to be involved in the debate about semiotic analysis.

Other terms which play an important role in the contextual analysis of symbolic (in a loose sense) meanings, also need definition because they are often used imprecisely in archaeology such that the differences between them are blurred.

By structure is meant any underlying organisational scheme. The term can be used for technological systems, relations of production and kinship. In the study of the symbolic order, structure refers to an organised set of similarities and differences. For example, syntagmatic relations refer to sequential groupings. Thus the human body might be divided into a number of parts (head, torso with arms, legs etc.), a pot may be divided into a certain arrangement of zones, and a settlement into various categories of space. The syntagmatic aspect of structure can be complex, although it is often discussed in terms of simple binary oppositions. A syntagmatic set might include the different items of clothing that go together on different parts of the body to form a suit, uniform or set of clothing. In contrast, a paradigmatic set is two or more signs, each or all of which can occur in the same position. Membership in the set helps to determine the identity of the sign through difference and contrast. Thus here we are considering the alternate types of hat that can be worn on the head, the various motifs that can be used in a particular zone as decoration on a pot, or the different objects and activities that can occur in a part of a settlement.

But the structure so defined remains an abstract code. For this reason, it is insufficient to record similarities and differences. It is also necessary to discuss the content of ideas that bring together signs into a set. Thus, a particular syntagmatic set of clothing may be characterised by blackness and formality because of the ideas thought appropriate for mourning. Numerous examples are provided in this volume. Crawford (chapter 3) discusses the 'timelessness' of icons and photographs in a contemporary village of Cyprus. Williams (chapter 4) discusses ideas of beauty and wealth in Turkana beads. Sinclair (chapter 5) identifies notions of naturalism and restraint in eighteenth-century candlesticks.
Style is very close to structure, since it refers to the way something is done. Style can be seen as the surface appearance of structure, the acting out of the deeper codes. This notion of a close relationship between style and structure is an important one in view of Sacktett's (1985) discussion of style as isochrestic, involving choice between functional equivalents. Sackett relates style to choice, but he provides no way of deciding how choices are made. With the notion of style, we can argue that choices are made in relation to culturally and socially developed organisational schemes.

Because style is the surface appearance of structure, structure 'concretised', it can be directly measured. The particular motifs and ways of doing things can be described. Also, because style is the working out of structure in practical action, it necessitates consideration of social strategies (see Williams, chapter 4), and values of 'good' and 'bad' style (see Sinclair, chapter 5). For the same reasons, style refers to the particular, idiosyncratic aspects of individuals, groups, cultures which set them apart from others. Indeed, even if adjacent groups have similar structures, they may be worked out in practice in different ways, leading to different styles.

So defined, style might be thought equivalent to culture, tradition or type and it is now necessary to distinguish between these various terms. Culture is an additive concept. It is the sum of the values, beliefs, rules and behaviour patterns that are held in common by a group, at whatever scale. It involves a commonality and recurrence of traits in contrast to that which is outside the culture. Culture includes structure, style, meaning content, action and the results of action. A culture can have a style (or varied styles), but a style can only belong to, be part of, a culture or group of cultures. A tradition refers to those aspects of a shared culture which are passed on from generation to generation as part of the socialisation process.

There is of course an enormous archaeological literature on the definition of type, whether it is imposed on or found in the archaeological data, whether it should involve notions of statistical significance, and so on. Like the term culture it involves similarity within, and differences between units. Thus it can only be defined in relation to non-type. Also like culture it is additive, and has structure, style and content, although archaeologists have been loath to interpret the structure and contents of meanings which are the media for the formation of cultures and types. A culture is an example of a type in that it is made up of types of behaviour, types of site and so on. A series of cultures of the same type make up a culture group, in the same way that a series of attributes of the same type make up a 'type' of artifact (Clarke 1968). But here we encounter a difficulty in that archaeologists use the word type most frequently to refer to a class of artifacts, yet it can also have the more general sense of 'a type of behaviour, economy, culture' and so on. On the whole it is the latter, general meaning which is more consistent. Thus type is an additive concept involving judgements of similarity and difference in order to include and exclude attributes. Yet it is a broader term than culture and can refer to any level of analysis. Simply, we can say that the type is a class of occurrences of a sign.

Like culture and type, norm refers to some similarity, some shared commonality within a more or less bounded entity, in contrast to that which is outside. As such, it has two components, the one prescriptive and value-laden, the other descriptive. A norm is a shared standard of a social group to which members are expected to conform, and it is modal or average behaviour, attitude or opinion. Archaeologists, as in Sørensen's study in this volume (chapter 9), tend to work from the second half of this definition in order to infer the first part. There is clearly a danger here in that average behaviour may move away from socially sanctioned rules. However, it is precisely this type of movement that is of interest in the study of the relationship between norm and individual action.

The latter relationship might be studied in a number of different ways. For example, expected ways of behaviour might be emphasised in ritual contexts while the daily practice of mundane lives moves in quite opposite directions. Norms may have to be rethought as new circumstances present themselves, or they may be changed as part of intentional social strategies. Some examples will be given below. But in general it is important to realise that the existence of rules does not imply that adaptive variability is impossible. As Therkorn shows (chapter 10), house construction rules may exist, yet allow a great variety of particular house forms. We should also be wary of assuming that repetitive behaviour implies rules. Much material culture may be organised in modal ways, yet there may be few explicit rules which determine its production and use.

Norms, like cultures, types and styles, are very much defined 'from the outside'. They are averages and summations, to do with wholes, larger than the individual. The term world view allows us to move towards a more ego-centred analysis. By world view I mean the content of ideas about the world around an individual, including taken-for-granted and assumptions about the great unanswerables. Of course members of a culture often hold shared world views, yet the term helps to make the point that perhaps not all members of a group do see the world in the same way.

The problem is a considerable one. Anyone who has tried to define a culture or type as a clear-cut entity, will know that different entities can be produced by considering different traits. The culture, when measuring burial patterns, is often different from the culture based on settlement traces. Similarly, if someone asks you where you are from, your answer will vary depending on the context of the question. Thus you may answer, the Arbury Estate, if you know that the questioner is familiar with Cambridge, but you may answer Europe if talking to a Maasai in Kenya. 'Your meaning' appears to change with context. This is a widely recognised problem in linguistics. Thus, the verb 'to bank' appears to have related meanings depending on whether its object is money, an aeroplane, or whether it is followed by the preposition 'on' (meaning 'to rely'). Consideration of the individual in relation to the whole moves us towards a concern with context.

The term context, as defined here, is object-centred such that, unlike the notions of culture, style, type and norm, it may potentially vary with every object or trait considered. The context of an object is the totality of its relevant environment, where
relevant refers to a relationship with the object which contributes towards its meaning. As outlined at the beginning of this chapter, this relevant context involves all the dimensions of the object including exchanges of matter, energy and information. Thus it is relevant to know, for example, the sources of the materials used in the object, the mechanisms of exchange, the functions to which it is put and the social and ideological information which it imparts. These are the various realms of recent archaeological concern. But the context also includes other dimensions to do with the position of an object in a 'text'. Here the concern is to place the object within relevant dimensions of variation. These dimensions of variation include the more concrete (orientation of tomb, width of pot, size of settlement) and the more abstract (timelessness, degree of restraint, degree of naturalism). The relevant dimensions of variation around the object are those that show statistically significant patterning of correlations, similarities and differences, and the context of an object is the totality of these relevant dimensions.

If it seems that function and symbolic meaning are being blurred within the notion of context, that is intentional. The function of an object is part of its symbolic meaning content, and an object has to be perceived culturally in order to be used in a certain way to achieve an end which is itself culturally chosen. Some examples will be given below in order to clarify the nature of contextual analysis. But for the moment it is sufficient to note that the notion of context seeks to draw together the study of material conditions and the interpretation of symbolic meanings. Also it accepts the possibility of 'deep' meaning contents that lie behind most of the terms already defined (including culture, style, norm) but which are rarely discussed explicitly by archaeologists. It allows for greater variability, being object centred, and implies that larger wholes, such as cultures, need to be proven, not assumed.

A further important distinction between context and culture or type (or phase), is that the boundary of the context of a 'typical' artifact will rarely be the boundary of the culture (or temporal phase) of which it is typical. This is because the differences between objects across a cultural boundary form part of the relevant context of the artifact. Objects are often produced in contrast to those in neighbouring groups (or phases). The totality of the relevant environment refers to both similarities and differences. There is a danger here of an infinite spatial and temporal regress as similarities and differences are followed across the world and back to the very first cultural act. Of course long term history and the diffusion of ideas are important in studying cultural meanings (Hodder 1986a), but for many types of questions, it is the immediate context that is most relevant. In any case, it can be argued that many acts, even within the same culture, are unrelated. But it is the concern of contextual analysis to probe the degree of relatedness.

Contextual analysis

I wish to start with an example of contextual analysis before generalising about the methods employed and drawing in some of the additional examples provided by the remaining chapters in this volume.

Collett (1985) is concerned with the interpretation of prehistoric (3200–1250 bp) iron-smelting furnaces in East Africa. During excavation it was noted that the furnace bases appeared to be divisible into two types—A, deep cylindrical pit bases and B, shallow dish-shaped furnace bases. In fact a boundary is noted between the furnaces. This boundary, defining the two types, occurs in the quantitative distributions of the depths of the furnaces, their diameters, and the angles of slope of the sides of the furnaces. This boundary is then found to coincide with other similarities and differences. In particular, small broken fragments of bricks recovered from the furnaces are sometimes decorated on the outside surface, and a statistical test showed that the decorated bricks were associated with the deep A furnaces and that undecorated bricks were found in the shallow B furnaces. The slag from the two pit types also differs, the A type having slag with a slightly higher iron content. On the basis of general metallurgical knowledge and using analogies with other pre-industrial smelting processes, the difference in the slag is interpreted as indicating that the deep A furnaces were used to smelt the ore, with the shallow B type used for remelting in order further to reduce the iron oxide content.

Other similarities and differences which correlate with the two furnace types concern the link between furnaces and pots. Both furnace types are coil-built in a manner similar to the pottery associated with the furnaces, but the decorative motifs used on the A furnaces show a specific link to the decoration of cooking pottery.

Collett searches for other similarities and differences. For example he considers depositional and temporal variation but finds no significant correlations. Also, there are no obvious differences in the proportion of tewel pieces with attached slag in the two furnace types. The internal diameters of the tewels were found to vary slightly between the two types, but this difference was judged to be too slight to represent intentional choices.

So far, then, the relevant dimensions of variation for understanding the meaning of the furnaces have been identified by searching for those dimensions of variation which show significant correlations, similarities and differences. The pattern recognised can be represented as follows:

<table>
<thead>
<tr>
<th>deep furnaces</th>
<th>decorated bricks</th>
<th>high iron slag</th>
<th>decorated cooking pots</th>
</tr>
</thead>
<tbody>
<tr>
<td>shallow furnaces</td>
<td>undecorated bricks</td>
<td>low iron slag</td>
<td>-</td>
</tr>
</tbody>
</table>

This pattern is produced by considering dimensions of spatial variation (for example, the decorated pottery is found near the furnace bricks), temporal variation (the two furnace types are contemporary), depositional variation (the decorated bricks are found in the deep furnaces), and typological variation (the A furnaces all have the same form, and the motifs used on the furnace bricks and cooking pots are similar). It is from the coincidences between these varied dimensions of variation that we begin to be convinced that there is here specific, cultural behaviour which is meaningful. Because we assumed some universal 'language' in which similarities and differences are meaningful, we begin to think that, in
some way, in this particular instance, decorated bricks ‘mean’ deep furnaces and cooking pots.

Of course it is always possible to find some dimension of variation along which two items can be compared. Beyond the statistical significance of the particular patterns picked out, Collett’s discovery is supported by identifying more abstract dimensions of variation which ‘make sense of’ what at first appear to be rather unlikely associations. After all, what is the relationship between cooking pots and iron furnaces? What do they have in common that makes sense of the linkages identified?

We have already seen one type of argument offered. The furnace types represent functionally differentiated stages in the smelting of the ore. Yet this functional argument does not explain the decoration, nor is it sufficient to explain the division of the furnaces into two types since Collett provides examples of other societies in East Africa in which the two stages of smelting and refining take place in one furnace type.

Staying within prehistory, it would be possible for the archaeologist to imagine a dimension of variation that made sense of the link between deep furnaces and cooking pots. For example, both smelting and cooking involve a change in material using heat. The ore is transformed into iron in the first, deep furnace. This furnace is decorated. But in the second, undecorated furnace the iron is only refined. In the cooking pots, a raw product is transformed into a state used by people. The decoration, therefore, links processes involving heat-mediated transforms, and we can discuss such a change in terms of general anthropological understanding of nature/culture, raw/cooked dichotomies.

In practice prehistoric archaeologists have shown little confidence in such abstractions and have preferred to treat smelting as a technological process and to describe it in terms of chemical reactions. Collett argues that we should be aware that other societies may place iron smelting in a very different context of beliefs from our own. There are many ways in which these other contexts of belief can be approached in any particular case. One way is to continue searching for similarities and differences, unravelling the full network of associations and contrasts, and at the same time, as in the previous paragraph, using insight, imagination and analogy to make sense of the contextual information.

Collett proceeds by using ethnohistorical information from culturally linked groups in eastern and southern Africa. Spatially, temporally and typologically, these other societies can be argued to be close to, and therefore relevant to, the prehistoric furnaces. The same procedure as was followed for the archaeological data is used in order to understand the ethnohistorical data. In some groups the furnace is made to look like a woman, for example with moulded breasts added to the furnace. In other cases a red powder is used on the furnace and on girls at their menarche and when they are getting married. The link between furnaces, woman and procreation is also made in verbal statements, as when it is stated that ‘the furnace is pregnant with iron and if the smelter sleeps with his wife then the furnace will not produce good iron’. Such verbal statements simply set up further linkages, in addition to those made by the material culture itself. Neither the words nor the material culture itself are totally mute. But both have to be interpreted.

The link between procreation and the patterns already identified is strengthened by frequent ethnohistorical reference to associations between smelting and pots and between women and pots. There is also a common idea in the area considered that sexual intercourse makes a couple ‘hot’ and that reproduction is achieved with heat. Collett thus suggests that procreation, cooking pots and iron furnaces are all linked by the idea of heat-mediated transforms. The notion that these three realms are linked together is partly ‘in the data’. It derives from links made by decorative motifs, spatial and verbal associations. Yet at the same time, the links are ‘in the theory’. The idea of a culturally mediated transform between nature and culture is an underlying structure, an abstraction not directly visible in the data. Yet it can be accommodated to the data in such a way that the interpretation is reasonable and plausible. There can never be any final, absolute test as to whether the interpretation is correct, but we can at least support the theory by showing how well it makes sense of the data.

It is important, then, to consider alternative hypotheses. Collett uses ethnohistorical data to show that alternative conceptualisations of the smelting process do exist in Africa. Other furnaces are seen in terms of wind (destruction) and water (fertility) symbolism. Wind, not fire, is often the transformative agent, and this results in a different type of material symbolism, a different network of similarities and differences in relation to smelting. Since Collett does not argue that the difference between fire and wind symbolism is itself part of the understanding of the meaning of the fire symbolism, his comparative work defines the spatial limits of the context of the first group of furnaces considered. The furnaces in the areas with wind symbolism are not part of the relevant environment for the fire symbolism furnaces. The wind furnace area may of course be relevant for an understanding of other material culture items in Collett’s primary study area, but not for his furnaces.

The articles in this volume use some or all of the procedures outlined in the above example. They all show the same general characteristics – a blend of deductive and inductive reasoning, a concern with the context of our own ideas as archaeologists in the contemporary West, the controlled use of analogy, the vision of the data as a ‘text’ written in a simple universal language made up of similarities and differences.

In all cases the first stage of the analytical procedure is to identify the network of patterned similarities and differences in relation to the object being examined and the questions being asked. This is a matter of taking the four dimensions of variation available to archaeologists – the temporal, spatial, depositional and typological, although the latter two can be seen as variants of the first two. Meaningful pattern is initially defined as that showing statistically significant similarities and differences. More specifically, one searches for boundaries in single variables (for example, a break or boundary in the furnace depths), for correlations between variables, and for associations and contrasts. But reading this language of similarities and differences using the orientation of statistical significance is insufficient. It is also necessary, at one and the
same time, to search for more abstract dimensions of variation that make sense of the particular nature of the similarities and differences identified. This is the aspect of archaeology involving creative insight and historical imagination.

The steps outlined can be taken in prehistoric as well as in historic archaeology. Thus in chapter 10, Therkorn notes that prehistoric Iron Age houses, field drainage systems, clay winning and rubbish disposal pits are aligned on a NE–SW or NW–SE axis, whereas house offerings, burial and animal offerings are aligned to the N, S, E or W. She makes the further abstraction that the first group results from mundane activities, and the second from ritual. There is thus an overall contrast between the ritual and the mundane. As another example in the same chapter, Therkorn notes that women, infants and pottery are associated with heartths in domestic dwellings, whereas men and wild animals are associated with communal halls. A network of similarities and differences is built up at the same time as abstractions occur in terms of male/female and wild/domestic.

Again in prehistory, Sørensen (chapter 9) uses the rich network of associations and contrasts in the Scandinavian Bronze Age in order to suggest the following interrelated abstractions:

<table>
<thead>
<tr>
<th>external</th>
<th>unique</th>
<th>male</th>
</tr>
</thead>
<tbody>
<tr>
<td>internal</td>
<td>standard</td>
<td>female</td>
</tr>
</tbody>
</table>

Gibbs (chapter 8) examines associations and variations in burials, hoards, figurines, settlements, pottery and rock carvings from the Danish Neolithic and Bronze Age in order to identify abstractions (underlying schemes) concerning the symbolic agricultural associations of men and women. For example, artifacts are identified as ‘male’ or ‘female’ on the basis of their associations in graves.

Other depositional units, such as hoards, can then be linked to the male/female scheme on the basis of their associated artifacts.

The initial interpretation of signs is facilitated when there is an iconic link between signifier and signified. Thus in the Iron Age art studied by Taylor (chapter 12) the depictions have close typological similarities to living animals. Once identified, Taylor abstracts from the associations and contrasts between the animals so as to divide them into predator and prey. The network of associations with predator and prey is followed through. For example, on hunting gear drinking scenes are present, and on drinking vessels hunting scenes occur. In this way predator becomes linked to the drinking, horses and exchange activities of the male social elite.

There are a number of caveats and problems which need to be considered here which lead to a fuller discussion of the notion of context. From a certain point of view, everything can be seen as both similar to and different from everything else. For example, a pot is both similar to all other pots (because made of clay, having walls etc.) and different from all other pots (no two pots have identical distributions of grits in the clay body). Any decoration is both similar to all other decoration, and it is unique. This is a problem not only for archaeologists, but also for people living in the past. In order for us to understand and act on the world it has to be organised into categories. Otherwise there would be a confusion of continua, and an inability to talk about anything. 'Culture' is about the placing of some 'arbitrary' order in the perceived world. Similarities and differences are constructed by making boundaries between things (whether these boundaries are fences, changes in decoration, changes in temporal association etc.), and by repeating and correlating the same categories along different dimensions. The archaeologist, then, uses the same methods and assumptions to reconstruct past cultural orders as were used to construct and live within them. Of course, the task is more difficult for the archaeologist because the network only partially survives, and because the archaeologist is often historically disassociated from that which (s)he studies. Cultural orders are not arbitrary in relation to their histories. In the construction of the cultural world, all dimensions (the height or colour of pottery for example) already have meaning associations. An individual in the past is situated in this historical frame, and interprets the cultural order from within its perspective. The archaeologist seeks also to get 'inside' the historical context, but the jump is often a considerable one.

So, the question to be asked is not so much 'is the cultural world ordered?', but 'how is it ordered', 'where are boundaries constructed?' and 'what dimensions are brought into play by their construction?'. For example, the boundary between domestic and wild may initially be the house wall, but it may later extend outwards to be the settlement fence, the social territory, the regional grouping, and so on. As another example, polished stone axes may be divided into big, high value axes and small, low value axes, but the size boundary between high and low value axes may vary at different times and/or for different types of axes etc.

It is argued in this volume that where the surviving material culture data are sufficiently networked, it is possible to grasp variations in meaning in different contexts because the network is itself the attempt by people in the past to construct order through the repetition of similarities and differences along various culturally chosen dimensions of variation. Of course there are many types of similarities and differences in play at the same time. The problem is to decide which similarity and difference is relevant. Which similarity and difference is being picked out by those living in the culture? It is argued here that anthropologists and archaeologists
Contextual analysis of symbolic meanings

...ologists can answer such questions because the problem (the need for cultural order) is universal, and the methods of producing and reading the cultural order are the same in the present and in the past. The methods, the universal language, include the processes of comparison and repetition, the construction of boundaries, similarities and differences.

It might be countered that the identification of similarities and differences by the archaeologist remains entirely arbitrary, 'from the outside'. This problem is particularly acute in relation to the term 'context'. Does a dissimilarity in context imply a dissimilarity in meaning? For example, we may have found that women are associated with the domestic sphere and men with the outside and with wild animals. Thus:

<table>
<thead>
<tr>
<th>similarity</th>
<th>difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>female</td>
<td>domestic</td>
</tr>
<tr>
<td>male</td>
<td>wild</td>
</tr>
</tbody>
</table>

But we can also argue that an item associated with female and an item associated with male are similar in that they are linked by the dimension 'sex'. Such items may be more similar to each other in meaning than items linked by other dimensions of variation (such as domestic/wild). Thus:

<table>
<thead>
<tr>
<th>similarity</th>
<th>difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>female</td>
<td>domestic</td>
</tr>
<tr>
<td>male</td>
<td>wild</td>
</tr>
</tbody>
</table>

This last diagram depicts one aspect of the notion of context. The 'sex' context is different from the domestic/wild context. In fact this difference brings into question the first linkage of female with domestic and male with wild. Although 'female' objects may be found in the domestic arena, they may not have the meaning 'female' in that context. Thus we may have identified the objects as 'female' in graves, but can we assume that they had the same meaning in the domestic context?

There is an ambiguity, then, in the definition of context. On the one hand the context which provides the meaning of an object is all the relevant environment. All the varied associations of an object, in graves, domestic and wild spaces, would appear to be an important part of this environment. Yet each aspect of the environment (graves, domestic and wild spaces etc.) is potentially a different context in which the object takes on a different meaning. Sørensen (chapter 9) argues that Scandinavian bronzes form a context of their own, with its own logic, to be studied separated from other contexts.

The problem is clearly present in Taylor's analysis (chapter 12). Attachments depicted on animals are interpreted as wings because they are similar to the more obvious wings drawn on animals in a neighbouring area. Thus, here the same (or similar) object is given the same meaning ('wings') in two different contexts (the two areas considered). In another instance, Taylor notes that use of an eye motif in his study area is connected with its use in Greece. In this case, however, Taylor argues that the same object has different meanings in the two areas. In Greece it meant 'ward off evil'. But in the Getic art it meant 'I can see twice as well; I have eyes like my hawk'.

Clearly objects and object types do frequently change their meanings in different contexts, and this is one of the main concepts of contextual archaeology. Yet in certain cases attempts may be made to retain the same meanings in different contexts – as in Ray's process of 'presencing' (chapter 7). In other cases the meanings in one context may be related to, if transformations of, the meanings in other contexts. In yet other cases there may be no relationship whatsoever between the meanings in different contexts. In the latter case the boundaries of each total context have thus been defined. But in the former cases we see different scales of context, from the specific category of activity (burial, domestic, etc.), to the wider and more general context (the totality of similarities and structured differences within and between social and cultural units).

We can discern whether objects and object types do or do not change their meanings in different contexts, and whether the meanings in the different contexts are related, by continuing to follow through the network of associations and contrasts in any one set of data. Thus Taylor decides that the eyes change their meaning in the Getic area because in this new context they are associated with a 'doubling' of real eyes. Elsewhere in the same art style, doubling appears to mean 'I can do something twice as well, or fast etc.'. Also, depictions of feathers, probably of a hawk, are associated with the eyes.

Thus, the particular problem of defining the boundaries of a context in which objects have related meanings is just a part of the general concern within contextual archaeology to question uncritical transfers of meaning. Whether one is discussing universal assumptions about gender relations (Gibbs, chapter 8), the assumptions about a widespread 'Celtic Spirit' (Merriman, chapter 11), or the more specific problem of whether burials or bronzes define entirely independent meaning frames, the same analytical procedures, as outlined above, are used.

Potentially, every time an object is seen or used it changes its meaning. This is the context of social action, and the improvised, daily solution of problems. As noted above, the term 'context' aims to capture this ambiguity resulting from the practice of action. Even when a full understanding of a cultural order has been approached, it should not be imagined that all categories are clear cut. Much category construction is fluid and contextual. People often describe categories by saying that an object is 'more like a this than a that'. Categories are referential, multivariate and fuzzy (Miller 1982a). An artifact can be more in one category than another, a better or worse example of a type (Sørensen, chapter 9). Thus we need to consider degrees of control of categories and the inherent ability of signs to be polysemous. Within contextual archaeology, concepts and general theory are also necessary in order to understand the link between the structure and content of meaning and social practice.

Concepts and social action

In discussing some of the varied concepts and general theories described in this volume, an underlying concern is to
locate idea, belief and symbolic meaning in social action. A major area of discussion here is the relationship between the individual and the society, between the momentary and the long term, between the action and the structure. For example, Jameson (chapter 6) shows that the Victorian dinner was organised by a complex set of similarities and differences including, for example, strong meat

| strong meat | men and older women |
| light meat  | younger women        |

Yet Jameson argues that the code was neither static nor determining. It was continually transformed as part of the process of social redefinition by the nineteenth-century middle class. Jameson provides an example of how individuals in a new generation can quite simply ‘bring off’ a breaking of an older code, in the eating of asparagus.

But can reflective, critical and creative thinking leading to social and structural change occur in non-industrialised societies? In my view it is extremely difficult to argue that the majority of cultural change and variability in prehistory is reactive, passive, adaptive. The concept of intentional, voluntary change in non-industrialised societies is supported in living societies. Redfield (1953, pp. 128–38) provides a number of examples of ‘primitive reformers’. Certainly most social change takes place in relation to structural incompatibilities, conflicting social interests, and as new conditions develop. Yet change is brought about through choice, problem-solving and problem-solving.

Even on a day-to-day, moment-by-moment basis, other things never are equal. It is always necessary to make slight or major adjustments to the social code, the cultural assumptions. Some people are better than others at social play—they are better actors. They ‘bring things off’ better.

Sorensen (chapter 9) makes an interesting point in relation to norm and variability. She argues that distance from the norm will change the nature of an item’s social meaning. Those objects which fit into well-defined categories, which show limited variation, and which have a fixed, repeated relationship to context, to the range of other types and to decoration, have to a certain degree a pre-existing meaning, automatically ascribed. Unusual, unique, varied artifacts, on the other hand, have to gain meaning as individual objects. The meaning of the latter objects has to be ‘worked at’, often involving manipulation of established meanings.

In any discussion of standardised as opposed to unique, varied or diverse items, there are definitional problems. It seems that few archaeologists have faced the difficulty of separating non-standardised variability from standardisation across a large number of types. The difference between restricted variability in a large number of types and extensive variability in a few types is difficult to define on any universal basis. Rather, it is other contextual information that is needed (for example, do the different types correlate with different depositional contexts etc.) including contrast with the unique. Indeed, Sorensen (chapter 9) suggests that ‘standardised’ cannot be defined universally. Definition is only possible locally in relation to ‘unique’.

It may often be the case that the seeds and strategies of social change are tried out and objectified (brought into consciousness) in the peripheral areas where more variability occurs. At the centre, established authorities may be concerned to set up the maximum of categorical contrasts in order to incorporate and subsume variability of interests. Thus standardisation across many types may be especially common in relation to established authority. On the other hand, Jameson (chapter 6) suggests that a greater security felt by individuals at the centre may allow greater eccentricities and variability.

One way in which the proliferation of categories can result from established yet changing social relations is by the process of *emulation*. This notion is discussed by Sinclair (chapter 5) and Jameson (chapter 6). In the eighteenth and nineteenth centuries in England, there was both an increasing ability and desire to move upwards socially, and a concern to redefine the nature of the middle class. Emulation of material styles played an important role in this process. As defined by Miller (1982b), emulation occurs when material items associated with higher social groups are copied by lower levels within society, so necessitating further symbolic elaboration by the higher social grades in order to maintain structural and categorical contrasts.

Of course, an object copied from one context into another may have its meaning transformed or substituted. Crawford (chapter 3) provides a clear example of the transformation of signs and meanings. In relation to the traditional Cypriot family photograph, the newer snapshot is both similar (in that it also represents an ideal other worldliness) and different (because the snapshot is about another this-world), thus implying a new meaning—the material achievement of individuals. An example of substitution is provided by Sorensen (chapter 9). In the Scandinavian Bronze Age crude copies or miniatures take the place of the object, and ultimately the idea or some representation of the object become ‘equal’ to the object. The objects disappear, but in a sense they are still there.

Many types of sign can, by definition, be substitutes for that which they represent. And the process of substitution can be a powerful social ploy. Ray’s (chapter 7) definition of ‘presencing’ provides a related concept. Crawford (chapter 3) describes the Cypriot religious icon as representing the presence of God in humanity. By means of this icon the power and protection of God are brought into the house. From a distance, God is ‘presenced’ in the house.

As already suggested, established authorities may be particularly concerned to organise and control conceptual categories. Material culture may play an important role here since it is durable (Donley 1982). It therefore allows the ‘fixing’ of categories. Ray (chapter 7) suggests that while skeuomorphic representations may express the power of the owners to transform meanings, the production of symbols of power in durable material serves also to make that power more enduring. Indeed, Sorensen (chapter 9) shows how categories of object can get ‘stuck’ into rigid conceptual schemes so that when society changes, it is this over-rigid material at the core which disappears. Such a notion supports the suggestion made above that change may often derive from and occur in relation to peripheral, variable domains of culture.
In all the above concepts, material symbols have been linked to power relations. Power and ideology in relation to material culture have been fully discussed elsewhere (Miller and Tilley 1984). In the present volume there is consideration of hierarchical power relations. Yet much material culture is involved in other power relations, little studied by archaeologists. In particular, gender relations are discussed by Crawford (chapter 3), Williams (chapter 4), Jameson (chapter 6), Gibbs (chapter 8), Sørensen (chapter 9), and Therckorn (chapter 10). Rather than imposing our own notions of gender relations, it is necessary to see how these were constructed in specific cultural contexts in the past. Much prehistoric material culture, from pots to houses, may have been involved in strategies of male/female dominance and control.

Conclusion: the archaeologist's context

This book is based on the belief that other worlds of meaning, other historical contexts with their unique frameworks of meaning, can be understood through an examination of material culture. The articles demonstrate the viability of this approach in applied examples. In addition, it seems that the development of terms, methods and concepts indicates that a distinct area of study is emerging. Certainly the terms, methods and theories discussed here will need further debate, criticism and change, but there is no longer any need to describe the interpretation of past symbolic meanings as speculative, undisciplined palaeopsychology.

It should be clear, however, that the type of certainty argued for by some recent archaeologists can never be achieved in archaeology, of whatever type. We can no longer have faith in the appearance of universal, independent measuring devices for the testing of theories. We have to be rigorous about procedures and some methods have been described in this chapter. But we also have to accept that rigour should include an analysis of our own contexts as archaeologists. Merriman (chapter 11) shows that study of the origin of our own ideas about the past can lead to serious doubt about their applicability to the past. Many of our ideas about the past are involved in strategies of social domination in the present. Contextual analysis of ourselves involves social critique. In ethnoarchaeology too, as demonstrated by Williams (chapter 4), the relationship between observer and observed is problematic, needing critical analysis. As Williams' title suggests, such analysis is part of, not incidental to, archaeology.

None of this is to argue that subjectivity can in some way be deleted. Taylor (chapter 12) gives the example of the 'fantastic beast' problem. In the Getic art studied, depictions occur of animals which seem to us unreal. But perhaps people in the past believed, erroneously, that such beasts existed. We see them as 'fantastic beasts' but people in the past may have placed them in the same category as real animals — stags, horses etc. There will always be some subjectivity involved in reconstructing past categories. The definition of similarities and differences depends on perception. But it is argued in this volume that careful consideration of the data in relation to theory, can allow plausible insight into other subjectivities, critically evaluated against our own. Thus, in Taylor's problem, we can examine whether our division of depictions into real and fantastic beasts correlates with other dimensions of variation. Do the 'fantastic' beasts occur in different spatial, depositional, typological or temporal contexts to the 'real' beasts? What is the nature of the other associations with each type (for example, are other 'fantastic' events associated with the 'fantastic' beasts)? Are the 'fantastic' events opposed to the 'real' beasts in the organisation of space in the representational art? In answering such questions we ground our subjectivity in another cultural context. More generally, the subjective definition of similarities and differences on the basis of which the whole cultural framework is reconstructed can always be discussed in relation to the coherence and patterning it brings to the data.