

Flints and frying pans: excavations at 11–13 Point Pleasant and the Morganite Works, Wandsworth

CHRIS JARRETT, BARRY JOHN BISHOP, NICK BRANCH, ENID ALLISON,
ROB BATCHELOR, CHRIS GREEN and CHRIS PICKARD

Excavation of two sites at Point Pleasant, Wandsworth recorded archaeological evidence dating from the Mesolithic period through to the 20th century. A scatter of Mesolithic flints was the earliest indication for human activity and this is discussed with the other evidence in the Wandle valley for activity during this period. An infilled water channel or creek dating from the Early Bronze Age was also revealed and the environmental evidence from this feature is also discussed. From the early 17th century Point Pleasant was the location for industrial activity, initially for making iron frying pans and other kitchenwares, and then changing in the early 18th century to a copper mill. From 1770 industrial activity was concerned with vinegar production and dye manufacture for the local cloth and calico industries, the latter probably associated with the site at the start of the 19th century. Although no products associated with these industries were recovered from the excavation, features, waste and a small number of items associated with these localised industries were recorded and are related to the historical background. From 1820 the excavation area became the site of the British School and the rear of housing fronting onto Point Pleasant. Structures, rubbish pits and cultural material associated with this period were excavated and are described here.

Introduction

Archaeological excavation was undertaken by Pre-Construct Archaeology Ltd on two adjacent sites at 11–13 Point Pleasant (site code: POI05) and the Morganite Works, Osier Road (site code: MPP04) in the London Borough of Wandsworth. The Morganite site was centred at TQ 2525 7512 and was located on the east side of Point Pleasant immediately opposite the site at 11–13 Point Pleasant, which was situated on the west side of the road at TQ 2520 7510 (fig 1). The archaeological work took place during June and August 2005 and was initially a strip-mapping exercise and a watching brief on ground reduction and enabling works at the Morganite site, which led to the excavation of a large trench across a palaeochannel running along the eastern boundary of the site. At 11–13 Point Pleasant six evaluation trenches were followed by an excavation of two main areas – north and south (fig 2). The sites lie on low-lying ground close to the southern bank of the Thames.

Point Pleasant is located in the valley of the river Wandle, about 200m upstream from its confluence with the river Thames and about 200m west of the Wandle. In this lowest reach of its course, the Wandle valley cuts through the Kempton Park Terrace of the Thames and London Clay bedrock underlies the valley floor. The site is mapped by the British Geological Survey (1998) as Made Ground over Alluvium. Previous investigations in the Wandle valley by Gibbard (1994), close to the site, recorded *c* 1.67m of gravel overlying London Clay at *c* 0.55m OD and overlain by *c* 1.11m of alluvium and peat with an upper surface at *c* 3.3m OD. Archaeological excavations at the former Shell Oil Terminal (Perry & Skelton 1997), Prospect Reach foreshore (Perry & Skelton 1995), south of the site at Garratt Lane (MoLAS 2004), Strathville Road (Giorgi *et al* 1995) and north-east at Queenstown Road (Mackinder 2002) have also uncovered peat deposits.

The archive comprising written, drawn and photographic records and artefacts from the sites will be deposited at the London Archaeological Archive and Research Centre, 46 Eagle Wharf Road, London N1 under site codes MPP04 and POI05.

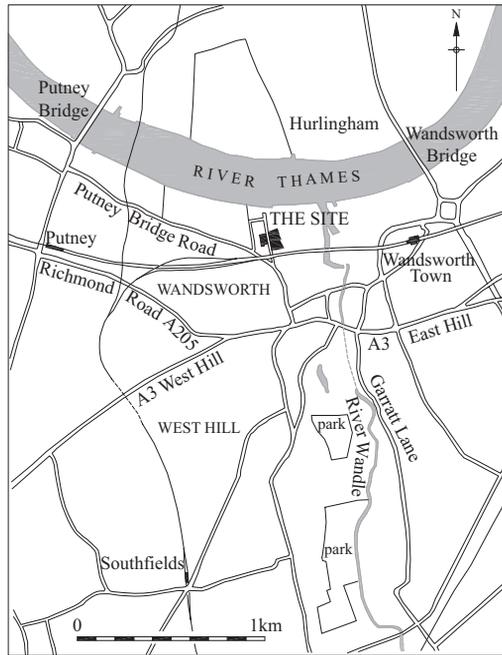


Fig 1 Point Pleasant and Morganite Works, Wandsworth. Site location. (© Crown copyright Ordnance Survey. All rights reserved)

The archaeological sequence

NATURAL

The natural geology of both sites consists of a sandy gravel defined as the first Thames river terrace: Kempton Park Gravels (BGS 1998). On the 11–13 Point Pleasant site it was at its highest at 5.59m OD to the south of the site in trench 6 and sloped down to the north towards the Thames to 4.87m OD in trench 1. The natural gravel was observed on the Morganite site at a top height of between 4.30 and 4.50m OD along the western edge of the area where it sloped down to the east to 4.10m OD in the centre of the site and to 3.30m OD along the western edge of a fluvial channel which was located at the eastern edge of the site.

MESOLITHIC–EARLY NEOLITHIC FLINTS, by Barry John Bishop

The excavations at Point Pleasant produced a total of 109 struck flints of Mesolithic date and a small quantity of burnt flint fragments. These were mostly recovered from a sandy layer overlying the natural late Pleistocene gravels, with some pieces embedded within the upper parts of the gravels. Fifteen pieces were recovered from later features and unstratified contexts, although these are likely to have been redeposited from the same sandy layer during subsequent activity at the site.

The Morganite Works produced a further two struck flints and two burnt flint fragments. Both struck flints were likely to have been residually deposited; one, a core rejuvenation flake, was recovered from within a palaeochannel while the other, the distal end of a blade or narrow flake, was recovered from a post-medieval context. These two pieces are most likely of Mesolithic or Early Neolithic date; they are closely comparable to those from Point Pleasant and may be associated with the same broad phase of occupation.

The following analysis concentrates on the larger body of material, that recovered from Point Pleasant, as this forms a distinct and self-contained assemblage, although the following

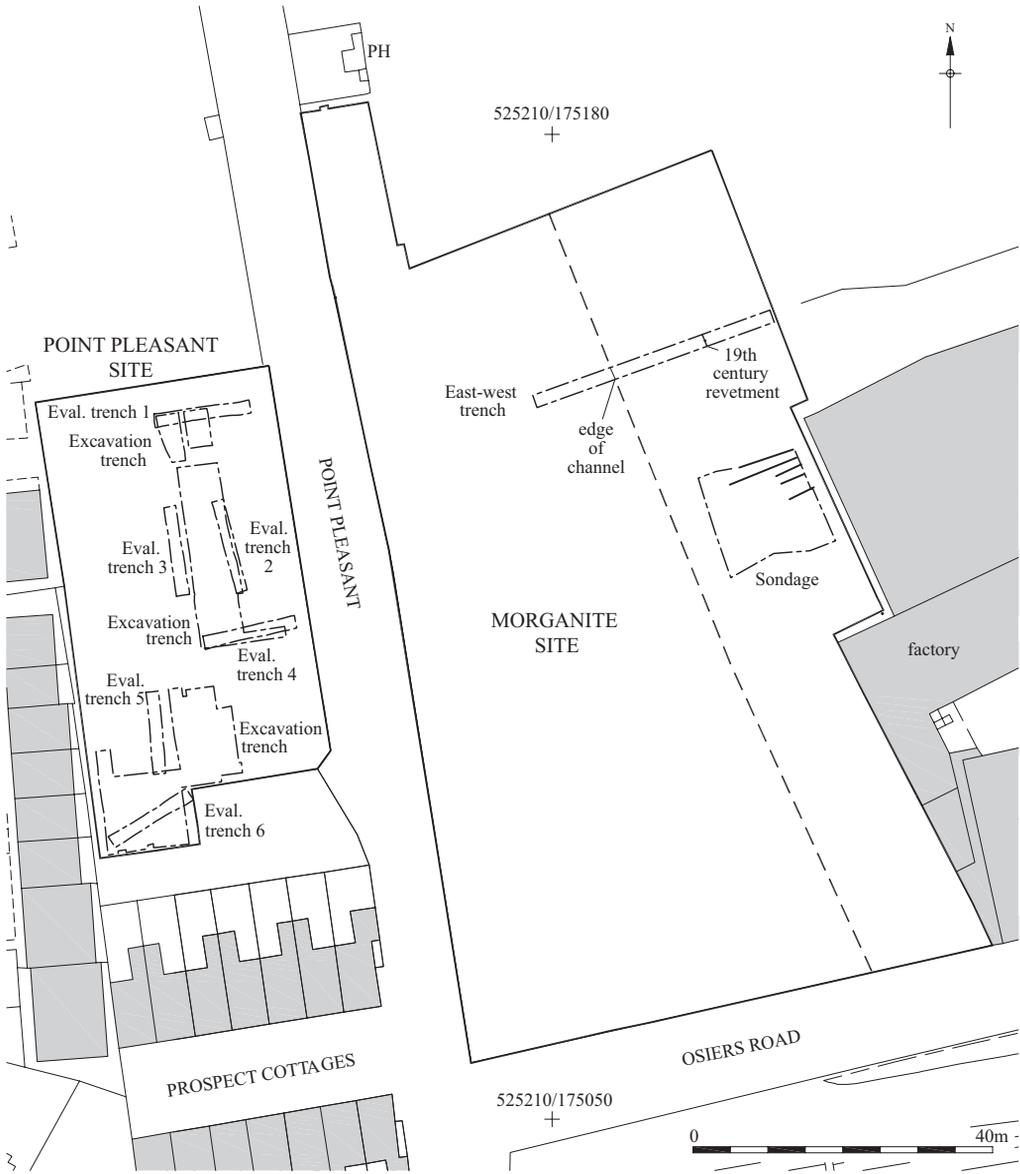


Fig 2 Point Pleasant and Morganite Works, Wandsworth. Trench location and areas of archaeological investigation. (© Crown copyright Ordnance Survey. All rights reserved)

discussion suggests that it may only form part of a larger spread of Mesolithic material, which includes the worked flint from the Morganite Works as well as that from other sites in the vicinity.

The majority of the worked pieces from the sand horizon were in sharp condition with only limited evidence of edge chipping or abrasion, indicating that they had not been subjected to any significant post-depositional disturbance and were largely found *in situ*. Many of the flakes and blades were broken, however, and although this was mainly because of their thinness and fragility, it does suggest some trampling of the material, perhaps from the period of occupation during which they were manufactured. The condition of the pieces from the

Table 1 Quantification of worked flint from Point Pleasant

| Type | No | % |
|--|----|------|
| Decortication and core preparation flake | 14 | 12.9 |
| Core tablet | 1 | 0.9 |
| Unclassifiable flake fragment | 11 | 10.1 |
| Flake | 26 | 23.9 |
| Blade | 18 | 16.5 |
| Blade-like flakes/broken blades | 16 | 14.7 |
| Trimming flakes (<15mm max diam) | 15 | 13.8 |
| Micro-burin | 1 | 0.9 |
| Tranchet axe sharpening flake | 1 | 0.9 |
| Retouched blade | 2 | 1.8 |
| Burin | 1 | 0.9 |
| Denticulate | 1 | 0.9 |
| Scraper | 2 | 1.8 |

later contexts was more variable, as may be expected from redeposited material, although there was little evidence to suggest that even these had moved far from where originally discarded.

The raw materials used consisted of a variety of opaque and translucent grey, black or brown flints of variable texture and quality. Cortex, where present, was mostly hard, rough and weathered with many thermal surfaces also present. The struck flints were mostly small; the average length of complete flakes was only just over 30mm and most pieces measured less than 40mm in maximum dimension. It would appear that the raw materials consisted of relatively small water-worn pebbles, as are present in the local terrace gravels.

The assemblage consisted mostly of knapping waste. Although no actual cores were recovered, evidence of core reduction was present in the form of decortication and core preparation flakes, small core-trimming flakes and two core tablets, one of which was subsequently reworked into a burin (see below). Blades formed around 16% of the assemblage with flakes showing blade characteristics, such as parallel dorsal scars and margins and narrow edge-trimmed striking platforms, contributing a further 15%. However, a high proportion of the assemblage consisted either of waste pieces or was broken which, given the absence of cores, would suggest that many of the more usable flakes and blades, as well as any serviceable cores, may have been removed from the site for use elsewhere. As well as flint reduction being represented, a range of other activities is indicated by the six retouched pieces that were present. These consisted of two retouched blades (fig 3, nos 3 and 5), a denticulated flake (fig 3, no 8), a burin (fig 3, no 4) and two scrapers (fig 3, nos 1 and 2). In addition to the retouched pieces, axe manufacture or repair was represented by a transverse sharpening flake (fig 3, no 7), and microlith manufacture by a micro-burin (fig 3, no 6).

Spatial distribution

The spatial plot of the *in-situ* lithic material from the sand layer at Point Pleasant does not reveal any great densities present, although two possible activity areas may be discerned – a larger concentration at the southern end of the excavated area and a lesser one at the northern end (fig 4) – although the area between has been the subject of truncation caused by later pitting. Four of the retouched pieces, the micro-burin and the tranchet axe sharpening flake were all found within or close to this southern concentration (the two other retouched pieces were recovered from later features), suggesting that it may have been towards here that the main flint implement usage area lay. It was, however, not certain whether the scatter of artefacts here represents the main focus of activity or only the margin of a much larger spread. It was clear from the relative lack of refitting pieces that much of the flintwork that must have been produced at the site had not been recovered, and the scatter representing the occupation was likely to have been significantly larger.

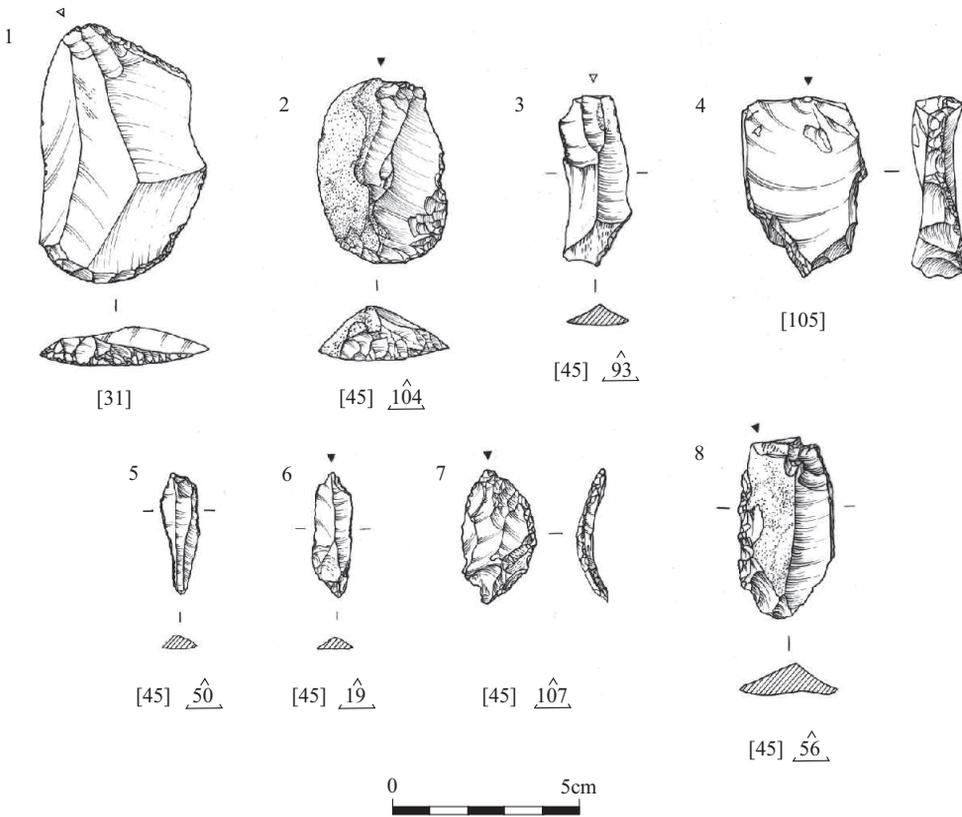


Fig 3 Point Pleasant and Morganite Works, Wandsworth. Retouched flints.

Discussion

The struck and burnt flint was indicative of a short-term encampment at the site during the Mesolithic period. The assemblage mostly comprises knapping waste and indicates that what were presumably locally obtained raw materials were being worked, although many of the resultant useful pieces, such as blades and productive cores, may have been removed for use elsewhere. The raw materials would have been abundant in the vicinity and easily obtained from the exposed deposits on the foreshore and in the riverbeds of the Thames and Wandle. The varied retouched implements present also indicated that a range of other activities was being undertaken. The nature of these activities is harder to identify because of the uncertainties in equating tool typology with actual use. Nevertheless, the retouched blades and the denticulated flake were most likely used for cutting, while burins are most commonly identified as antler- or bone-working tools. The micro-burin is a by-product of microlith manufacture, indicating the maintenance or repair of microlithic tool-kits, perhaps involving hunting equipment. The recovery of a transverse axe-sharpening flake is of interest; transverse axes are usually equated with heavy-duty wood working tools and while numerous examples have been recovered from the Thames and its margins (Field 1989), there is often less evidence for their actual manufacture or resharpening. In addition to the worked flint, small quantities of lightly burnt flint were recovered from the artefact-bearing sand layer and suggests that some of these activities may have been undertaken beside a hearth.

The quantity of flintwork was not high nor was it found in great densities but, taken together with the numerous findspots of Mesolithic material recorded from the banks of the

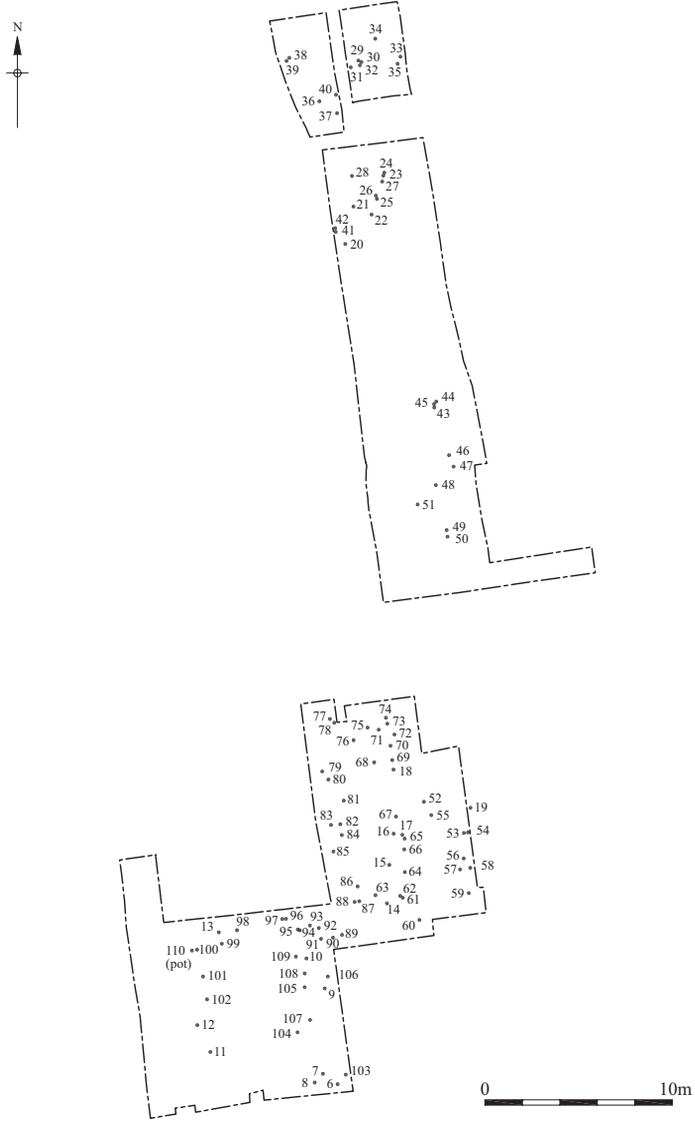


Fig 4 Point Pleasant and Morganite Works, Wandsworth. Spatial plot of flints at 11–13 Point Pleasant.

Thames and Wandle and around their confluence, sustained and persistent activity during the Mesolithic period along this marginal zone can be envisioned. This mirrors a pattern seen throughout the Lower Thames and its tributaries, where Mesolithic findspots concentrate along the river margins and suggests these may have been favoured locations, at least for flint-using activities. Few large accumulations of flint that may indicate ‘home-bases’ or the locations for larger or more persistent gatherings have been recorded (although the excavation record is uneven, at best) and the proximity of the river may indicate that short-term and task-specific activities connected with the river, such as raw material acquisition and the processing of resources gathered from these locations, were commonly undertaken.

The location of the sites

The Wandle has experienced heavy industrialisation during the last few centuries and widespread attempts at river management had probably begun by the Saxon period, making any confident reconstruction of the original topography of the river valley problematic. Compared with some reaches of the Lower Thames, relatively little is known of the environmental history of this area, in particular the history of vegetation succession, changes in the fluvial regime and the timing and nature of human activities in the vicinity (Branch *et al* 2005b). Nevertheless, the confluence of the Wandle with the Thames would probably have been a highly favourable location for early communities that were dependant on acquiring wild resources. Both rivers provided rich resources such as fish and wildfowl; until its heavy industrialisation the Wandle was noted as the best trout fishing river in Britain, prized by anglers for the size of its fish (The Wild Trout Trust 2006). The environmental work that has been undertaken indicates that diverse ecological settings would have been present in the vicinity. Radiocarbon- and artefact-dated alluvial sequences present at other sites in the vicinity of Point Pleasant demonstrate that during the early Holocene the area around the mouth of the Wandle would have comprised a complex mosaic of marsh and seasonally flooded land, interspersed with both fast-flowing streams and stagnant or sluggish aquatic environments (Branch *et al* 2005b; Cowie & Eastmond 1997a; 1997b; Maloney & Gostick 1998, 106; Saxby 1989; Thompson *et al* 1998, 257). Away from the valley floor, the Wandle has wide gravel terraces retaining light, well-drained soils, particularly on its eastern side, and these give way to the heavier soils of the London Clay deposits, traditionally regarded as being heavily wooded by the end of the Mesolithic. These complex and very variable environments would have had the potential to provide for an abundance of differing resources.

The lithic assemblage reported here was recovered from close to the edge of the gravel terrace, overlooking the lower, wetter ground that formed the flood plain of the confluence of the Wandle and Thames. The sand layer from which the worked flint was predominantly recovered was likely to have been deposited during the late Glacial or early post-Glacial period but, following that, the immediate area did not experience further fluvial conditions.

The location of the sites on the dry banks of the Wandle, but with immediate access to the varied environments present within its flood plain, would have been highly regarded by foraging communities; further evidence for Mesolithic occupation has been found along the edge of the higher ground close to the site. Immediately to the north of Point Pleasant, an assemblage of 33 struck flints of Mesolithic date, including two cores and thirteen blades, was recovered from a comparable silty-sand deposit, although this had been disturbed by later activity (Saxby 1989; Thompson *et al* 1998, 257). To the east of Point Pleasant similarly dated occupation is attested by the struck flints from the Morganite Works, while slightly further south, at Putney Bridge Road, a scatter of struck flints of Mesolithic or Early Neolithic date had been disturbed by medieval agricultural activity (Maloney & Holroyd 2002, 28). This pattern of occupation along the edge of the water continues along the banks of the Thames further upstream, and similar evidence has been recorded at Sefton Street (Warren 1977) and Barnes Common (Lacaille 1966). Similarly dated scatters in comparable locations have also been recovered from along the eastern banks of the Wandle, such as at Swandon Way and the John Watney Distillery site on York Road (Greenwood & Thompson 1992, 423). In addition, significant numbers of Mesolithic implements, mainly transverse axes but also rare antler and bone implements, have been dredged from the Thames around its confluence with the Wandle, and indicate relatively intense and sustained activity beside and perhaps upon the river (Field 1989; Lacaille 1961; 1966). This evidence, combined with other findspots recorded in the Greater London Sites and Monuments Record, demonstrates a widespread occurrence of Mesolithic or potentially Mesolithic flintwork and other artefacts from around the area of the confluence and, despite the later masking caused by alluviation and the frequent severe disturbance caused by the urban development of the area, a relatively dense palimpsest of activity can be envisaged. Interestingly, much less evidence of Mesolithic

activity has been found on the opposite side of the Thames from the confluence with the Wandle or away from the river margins. On present evidence, and at least in terms of flint-using activities, it would appear that Mesolithic communities preferred to set up their camps adjacent to rivers and wetlands.

In addition to the wide range of subsistence resources that the Wandle would have provided, it also constituted an important route linking the North Downs, at the headwaters of the Wandle, with the Thames Valley. The river itself could have enabled movement, using rivercraft on the water, and the relatively lightly wooded terraces lining the river may have provided for easier movement than the heavily forested 'claylands' found on either side of the Wandle valley. The river originates as a series of springs along the northern edge of the chalk highlands that form the North Downs in the Carshalton and Beddington area. Prodigious quantities of Mesolithic flintwork have been found in this area (eg Bagwell *et al* 2001; Cotton & Hayes 1980; Leary *et al* 2005; Proctor 2002; Turner 1966), indicating intensive activity throughout the Mesolithic period. The Wandle from source to confluence is only *c* 18km long and, even if difficult terrain were envisaged, its entire length could probably be travelled in little more than a day. Although both ends of the Wandle appear to be particularly favoured by Mesolithic communities, there is little evidence for Mesolithic activity between these areas. Indeed, Mesolithic findspots within Greater London appear to be concentrated either along the Thames flood plain or the northern edges of the North Downs, with very few finds so far made in between (MoLAS 2000, inset map 2). The absence of indications of activity along the main part of the Wandle valley may be attributable to a number of factors: poor reporting and uneven archaeological fieldwork, the burial of artefacts and land surface under alluvium or their erosion by meandering river channels, and the intense post-medieval industrial growth along the river margins combined with the relative invisibility of small scatters of small flint implements. Where archaeological work has been concentrated, such as around Merton Priory, flintwork, some of which may be Mesolithic, has been recovered (Barry Stow Architect 2007) although so far the quantities and densities seen around either the headwaters or the confluence have failed to materialise. This raises a number of possibilities. Was the main stretch of the valley actually avoided, with the populations remaining segregated either on the North Downs uplands or in the Thames Valley, or was the valley used as a corridor but in such a way that little was left in terms of archaeological traces? Another possibility is that the absence of evidence for a Mesolithic presence in the valley is an artificial construct of the variable intensity of archaeological fieldwork, combined with the effects of later natural and cultural activity, and that with more fieldwork the valley would be shown to have been as actively occupied as at either end. Further consideration of this relationship between these two points of activity could prove invaluable for studies of territoriality, mobility and the extent that quite widely different physiographic zones may have been used or avoided by particular communities.

EARLY BRONZE AGE–EARLY MEDIEVAL

On the Morganite site evidence of a north–south aligned channel was revealed cut into the natural sand along the length of the eastern side of the area during the watching brief on the general ground reduction. A trench was excavated along the eastern edge of the site which uncovered a sequence of alluvial and peat deposits within a palaeochannel (figs 5 and 6). No edges of the earliest phase of the channel were observed; the primary fills of the feature continued beneath the base of the trench and beyond the lowest step of the trench to both east and west. The basal deposits, which consisted of peaty gravel, were recorded utilising a power auger at a lowest height of -0.81m OD. The latest phase of peat extended for at least 4m east–west, while the overlying alluvial deposits were traced for 10.60m. Further alluvial deposits were recorded in plan extending *c* 9m to the west where they apparently cut through the natural sandy gravel at a height of 3.30m OD.

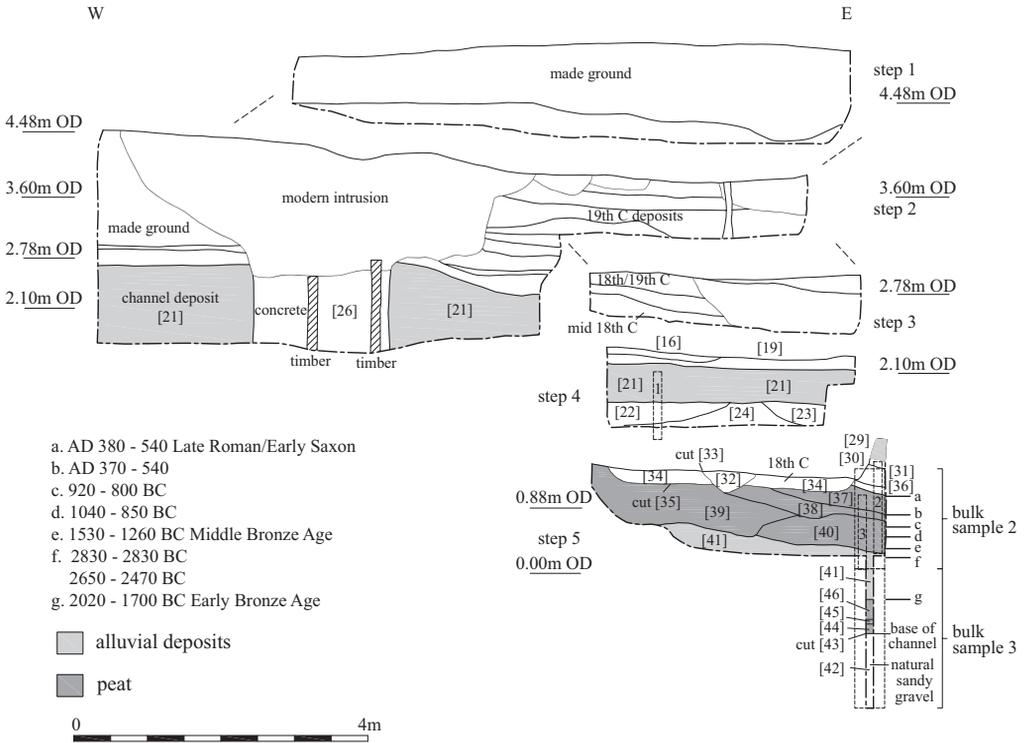


Fig 5 Point Pleasant and Morganite Works, Wandsworth. Section across the channel.



Fig 6 Point Pleasant and Morganite Works, Wandsworth. View of the channel (working shot).

The top of the lowest peat deposit was radiocarbon dated to the Early–Middle Bronze Age; this was covered by 0.64m of dark grey/blue alluvial clay. A further build up of peat, 0.84m in thickness, was recorded above the alluvial clay and was deposited slowly between the Middle Bronze Age and Early Saxon period. Sealing this were alluvial sandy fills *c* 1m thick which were probably laid down in the medieval and early post-medieval periods. Environmental analysis of the channel fills is covered below.

Environmental archaeological analysis of the channel, by Nick Branch, Enid Allison, Rob Batchelor and Chris Green

Introduction

A series of samples (three column samples (<1>, <2> and <3>), 36 bulk samples and a 2m borehole sample) was taken for environmental archaeological assessment and analysis from the deep channel. This assessment (Branch *et al* 2005b) indicated that prior to 2020–1700 cal BC mineral-rich sediments were deposited on the surface of a flood plain, probably of the prehistoric river Wandle. This continued until 1530–1260 cal BC when peat formation resulted in the formation of a terrestrial environment, possibly in a quiet back-swamp near the main river channel. The insect remains, in particular, indicated that the local environment was damp, with possible human activity eg pastoral farming, indicated by the presence of herbivore dung beetles. The radiocarbon date of *c* 1500 BC for the onset of peat formation was of particular interest because it is compatible with well-dated peat sequences from the lower reaches of the river Thames (Branch *et al* 2005a), which suggest a significant increase in surface wetness associated with changes in atmospheric precipitation and/or sea level rise. The continuation of peat formation until 380–540 cal AD, albeit with periods of significantly higher mineral sediment input due to intermittent flooding, was clearly an important localised event. During this time, the bog surface appeared to have been a mosaic of pools and decaying vegetation that was colonised by herbaceous plant taxa and some trees and shrubs (willow, oak and blackthorn; Branch *et al* 2005b). Overlying the peat, and sometime after 380–540 cal AD, the presence of mineral sediment suggests a renewal of fluvial sedimentation and flood plain formation, perhaps because of further migration of the main river channel and/or increased flooding caused by changes in the fluvial regime within the Wandle valley river catchment. These sediments may be compatible with other evidence for widespread flooding during the Roman period in lowland river valleys in southern England (Branch & Green 2004).

To enhance the palaeoenvironmental reconstruction resulting from the assessment, a detailed radiocarbon-dated insect analysis was proposed, which, in the absence of good pollen, plant macrofossil and diatom preservation, aimed to provide important new information on the Middle to Late Holocene environmental history of this part of the Thames Valley.

Methods

The methodologies employed are described in the assessment report (Branch *et al* 2005b). All sub-samples for radiocarbon dating were submitted to Beta Analytic Inc, Florida, USA (table 7; figs 9 and 10). The results have been calibrated and modelled using OxCal v4.0.1 Bronk Ramsey (1995; 2001; 2007) and IntCal04 atmospheric curve (Reimer *et al* 2004). Nineteen bulk and borehole samples from trench 1 were processed for the insect assessment, of which thirteen produced significant quantities of insect remains and are the subject of this analysis.

Results and interpretation of the lithological analysis (tables 2–6 and figs 7–8, see *Endnote*)

The deposits at Point Pleasant comprise the flood plain sediments of the river Wandle. The gravel at the base of the sequence is probably equivalent to the Kempton Park Terrace of

the Thames sequence of Late Devensian Late Glacial age (tables 2–6; figs 7 and 8). The overlying peat and sand are of Holocene age and equivalent to part of the Staines Alluvial Deposits of the Thames sequence. The mineral-rich sediments overlying the gravel indicate deposition within a fluvial environment. This interpretation is confirmed by the presence of fine-grained sediments (clay and silt) that would have been deposited from a suspended sediment load. The sequence indicates pronounced variations in the energy of the fluvial system, with the fine-grained sediments deposited in a virtually stationary ('low-energy') water body (eg -0.35 to 0.16m OD), while the coarse sediments represent a 'higher-energy' (fast-flowing) water body (eg context 31). The mineral deposits have occasional fragments of wood and organic detritus, representing either long-distance transportation of organic matter or *in-situ* deposition of detritus from plants growing within, or on the margins of, an open water body. These sediments are typically found within a meandering river system and represent the creation of over-bank deposits (flood plain deposits) and abandoned channel fills. These over-bank deposits were deposited on top of the former channel and their nature indicates significant variations in water flow velocity during subsequent flood events. The formation of peat and/or deposition of highly organic sediments are of particular importance since this represents a more terrestrial environment and stabilisation of the land surface. The presence of wood macrofossils suggests that the flood plain may have been stable for a prolonged period allowing the colonisation of woodland. The presence of reworked tufa debris between -0.62 and -0.35m OD is surprising because these deposits have been found only infrequently in the Thames Valley and their environmental significance largely ignored. Their presence is likely to indicate a low-energy, fluvial environment.

Results and interpretation of the radiocarbon dating (table 7 and figs 9–10, see *Endnote*)

The results of the radiocarbon dating indicate that the peat immediately underneath the reworked tufa debris deposit is 2020–1700 cal BC (-0.34 to -0.33m OD), and is therefore Early Bronze Age in date. Slightly above the base of the main peat unit, the radiocarbon age is 1530–1260 cal BC (0.31 to 0.32m OD) which is Middle Bronze Age and the top of the peat unit is 380–540 cal AD (1.04 to 1.05m OD). These dates suggest that the main peat unit started to accumulate during the Middle Bronze Age, and continued, possibly uninterrupted, until the late Roman/early Anglo-Saxon period. Intervening dates of 1040–850 cal BC (0.44 to 0.45m OD), 920–800 cal BC (0.57 to 0.58m OD) and 370–540 cal AD (0.81 to 0.82m OD) support this interpretation. The radiocarbon age for the base of the peat is 2830–2470 cal BC (0.20 to 0.21m OD). This date, while chrono-stratigraphically compatible with all dates of a later age, is incompatible with the date of 2020–1700 cal BC obtained from -0.34 to -0.33m OD. For this reason, two age-depth models have been produced for the site; figure 9 excludes the radiocarbon date at -0.34 to -0.33m OD, while figure 10 excludes the radiocarbon date at 0.20 to 0.21m OD. Figure 9 indicates that the sedimentation rate for the main peat unit was relatively slow, spanning *c* 3300 years, while figure 10 indicates a considerably faster rate of *c* 2000 years.

Results of the insect analysis

General remarks

The deposits sampled from 0.50 to 1.62m OD produced substantial and, in most cases, reasonably well-preserved assemblages of beetles and bugs, and a range of other invertebrate material. Preservation of insect remains varied somewhat throughout the sequence of deposits. Fragmentation of remains was generally quite high and some assemblages contained rotted or eroded insect sclerites (chitinous outer plate of

the exoskeleton). A full list of insect and other invertebrate taxa present in the flots is given in table 8 (see *Endnote*). All statistics used in the analysis are given in the Appendix (see *Endnote*).

Results from the individual samples

The results are described from the earliest deposits upwards.

0.55–0.60m OD

The flot contained a small assemblage of well-preserved beetles and bugs (49 individuals of 46 taxa). Water beetles represented were *Colymbetes fuscus*, *Helophorus* spp., Hydophilinae spp. and a donaciine leaf beetle found on aquatic plants. Other phytophages included *Prasocuris phellandrii* – found on waterside umbellifers, *Limnobaris pilistriata* – a weevil found chiefly on sedges (*Carex*), and *Chaetocnema concinna* – usually found on *Polygonum*. Decomposers accounted for 22% of the total assemblage and prominent among these was a group of beetles associated with foul decaying organic material: *Onthophagus* spp. – found on herbivore dung, *Cryptopleurum minutum* – often found in dung but also in foul vegetable material, and two *Aphodius* species.

0.65–0.70m OD

The flot from this sample was relatively rich in insect remains in a good state of preservation. The beetle and bug assemblage consisted of 181 individuals of 105 taxa. Aquatic taxa were well represented (11% of the assemblage) and included three taxa found in running water: the riffle beetles *Elmis aenea* and *Oulimnius*, and several *Hydraena nigrita*. The last of these is found in clear unpolluted running water usually among gravel and stones, and often in shady sites (Friday 1988, 149; Hansen 1987, 61). *Ochthebius minimus* is most often found in still water, usually in mud. Other taxa indicative of waterside mud and moss were *Dryops* (with seven individuals of two species) and *Chaetarhria seminulum*. Plant-feeding insects accounted for 16% of the assemblage. They included donaciine leaf beetles, *Prasocuris phellandrii*, the aquatic weevil *Bagous*, *Limnobaris pilistriata* and *Notaris acridulus* found on sedges (*Carex*), *Gastrophysa viridula* found on docks (*Rumex*) and *Chaetocnema concinna*. A further beetle worthy of note is *Oodes helopioides*, a virtually amphibious ground beetle living in swampy places among reeds and sedges by the margins of still and slow-flowing water. Taxa associated with foul organic material were again well represented among the decomposers. Fragments of *Aphodius prodromus* were common, and *Geotrupes*, *Onthophagus*, *Cercyon haemorrhoidalis* and *Cryptopleurum minutum* were recorded.

0.75–0.80m OD

The flot contained a beetle and bug assemblage consisting of 102 individuals of 70 taxa. Preservation of remains was rather variable. Many fragments were pale and eroded and fragmentation was very high. Aquatic taxa were well represented. A single *Hydraena nigrita* suggests an input from running water. *H. testacea* is found in stagnant water or muddy streams (Friday 1988, 149). Other taxa recovered are similar in implication to those described for the previous sample with evidence for waterside mud, aquatic plants including waterside umbellifers, and sedges. Ground beetles identified included *Pterostichus diligens* – found in moss and litter in damp habitats, often in shady sites (Lindroth 1986, 254).

0.80–0.85m OD

Insect remains were common in the medium-sized flot and an estimated 218 individuals of 112 beetle and bug

taxa were present. Preservation of remains was generally good. Aquatics accounted for 15% of the assemblage. The most numerous taxa within this component were *Ochthebius minimus* – found in all kinds of fresh water, usually shallow, and often in mud – and *Hydraena nigrita*. The latter, together with *Elmis aenea*, again suggest an input of running water. Damp ground taxa included *Limnobaris pilistriata* and *Notaris acridulus* – found on sedges and in general, the phytophages suggested a similar range of aquatic and waterside vegetation as indicated in the previous samples. Ground beetles included two *Odacantha melanura* – found at the margins of fresh water among a rich vegetation of tall plants, usually reeds (mainly *Phragmites*; Lindroth 1986, 416). Decomposers were proportionally more common than in previous samples, making up 28% of the assemblage. The most common among the latter group was *Anotylus rugosus*, represented by seventeen individuals. Taxa associated with foul organic matter were again prominent among this group, accounting for nearly one-third of the decomposer group. *Aphodius prodromus* was prominent among these with ten individuals present.

0.85–0.90m OD

An estimated 218 beetles and bugs of 120 taxa were recovered. Aquatics were well represented and accounted for 17% of the assemblage. *Coelostoma orbiculare* was common with eight individuals. It is found mainly by the edges of stagnant fresh water among moss and other vegetation (Hansen 1987, 128). *Hydraena nigrita* and *Elmis aenea* again represent beetles from running water. Ground beetles included *Oodes helopioides* and *Odacantha melanura* found by well-vegetated water margins. *Blethisa multipunctata* is found on swampy ground by stagnant or slow-moving water and is especially typical of mires with a rich vegetation of *Carex* and *Eriophorum* (Lindroth 1985, 82). Evidence for the presence of *Carex* is provided by the weevils *Limnobaris pilistriata* and *Notaris acridulus*. *Lixia juncoorum*, a psyllid bug, is found on *Juncus*. Mud continued to be abundant: there were twelve individuals of two species of *Dryops*.

0.95–1.00m OD

The flot was very large and contained much plant material. Approximately half of this was sorted for insect remains. They were found to be abundant and in a good state of preservation, although fragmentation was high, and a large assemblage of 299 beetles and bugs of 144 taxa was recovered. Aquatic taxa were very well represented and accounted for 24% of the whole assemblage. They were dominated by 29 individuals of *Coelostoma orbiculare*. Plant-associated taxa made up a further 21% of the assemblage. The most numerous of these were the aquatic leaf beetle *Plateumaris* with fourteen individuals. Feeders on waterside umbellifers and sedges were well represented, and there was a single *Brachypterus* found on nettles (*Urtica*). Ground beetles included *Blethisa multipunctata*, *Oodes helopioides*, *Odacantha melanura* and *Pterostichus diligens*. *Elaphrus cupreus* is a marginal species usually found on muddy ground with dense vegetation. Other indicators of waterside mud (*Chaetarhria seminulum* and *Dryops*) remained numerous. *Calathus fuscipes* suggests a somewhat different habitat

type; it is found mainly in rather dry, open country. *Grynobius planus* provides a suggestion of trees in the vicinity; it lives in dry wood on deciduous trees.

1.05–1.10m OD

The large flot contained a substantial assemblage of 195 beetles and bugs of 107 taxa. Fragmentation of the insect material was quite high, and some fragments were eroded and rotted. Aquatic taxa were less well represented than in the previous sample (8% of the assemblage). Within this group *Coelostoma orbiculare* was common, with eight individuals. Damp ground taxa were well represented, accounting for 15% of the assemblage and many of them indicative of muddy waterside habitats. *Pterostichus diligens* was common, with five individuals, and there were three *Oodes helopioides* and *Elaphrus cupreus*. Plant feeders indicated a rich vegetation of aquatic plants, waterside umbellifers, sedges (*Carex*) and rushes (*Juncus*). Foul decomposers were represented by *Aphodius ater*, *A. contaminatus*, *A. porcus*, *A. prodromus* and *Onthophagus ?joanna*. There were several individuals of the small chafer *Phyllopertha horticola*. It usually infests poor quality pasture where its larvae feed on turf roots (Jessop 1986, 29).

1.15–1.20m OD

The flot contained a fairly small and rather poorly preserved assemblage of 50 beetles and bugs of 41 taxa. Decomposers were relatively well represented (32% of the assemblage). In other respects, the assemblage contained a similar range of taxa to other previous samples. The ground beetle *Loricera pilicornis* was not seen in any of the other samples. It is usually found on muddy soil at water margins.

1.25–1.30m OD

The flot produced a moderately sized assemblage of 68 beetles and bugs of 58 taxa. Aquatics made up 10% of the assemblage. Plant feeders were relatively common and represented the same range of host plants as previous samples in the sequence. An additional record was *Cymus*, a bug found on rushes and sedges.

1.35–1.40m OD

The flot contained a small assemblage of 25 beetles and bugs of 24 taxa. The remains were highly fragmented and many were pale or pockmarked with holes indicating that decomposition or chemical erosion had taken place. Aquatics were represented by a single

hydroporine beetle. The deposit may have been drier (or less reliably wet) at this stage.

1.37–1.42m OD

A small assemblage of 45 individuals of 41 beetle and bug taxa was recovered in the flot. Fragmentation of sclerites was high, and many were pale, eroded and generally in a poor state of preservation. The assemblage included several aquatic taxa. *Dryops* indicates the presence of waterside mud and *Chaetarthria seminulum* is found in moss at mud at water margins. Plant feeders included taxa associated with aquatic or wet ground plants: Donaciinae sp., *Bagous*, *Prasocuris phellandrii* and *Notaris* sp.

1.47–1.52m OD

The flot contained a substantial assemblage of 136 beetles and bugs of 102 taxa. Fragmentation of insect sclerites was quite high. Aquatic insects were common and accounted for 21% of the assemblage. They included the riffle beetles *Elmis aenea* and *Oulimnius* found in running water. Damp ground taxa were less well represented than in some of the other samples, making up 4% of the whole assemblage. The range of feeders on aquatic and waterside vegetation was similar to previous samples with the additions of *Meligethes* found on crucifers, *Leiosoma deflexum* found on *Ranunculus*, and *Sciaphilus asperatus* a polyphagous weevil. Taxa attracted to foul matter were common within the decomposer component and included *Aphodius contaminatus*, *A. prodromus* and *Sphaeridium*.

1.57–1.62m OD

The flot contained an estimated 121 beetles and bugs of 85 taxa. The fragmentation of some taxa was quite high. Water beetles were very well represented (30% of the assemblage). *Elmis aenea* and *Oulimnius* from running water were present. There is some suggestion at this stage of a difference in the composition of the aquatic component: three hydroporines were present for example, while other species common earlier in the sequence are fewer or absent. Insects from aquatic and waterside plants were predominant among the phytophages. *Chaetocnema concinna* found on *Polygonum* and *Brachypterus* found on nettles (*Urtica*) suggest some weedy vegetation. Among the ground beetles was *Agonum albipes* found at water margins, generally in open locations on rather barren soil (Lindroth 1986, 279).

Discussion and conclusions

The insect assemblages obtained throughout the sequence of samples examined here indicate that deposition occurred in a semi-terrestrial and aquatic environment. The assemblage from the earliest sample at 0.55–0.60m OD, and during a period when peat formation had already commenced, is rather small but various plant feeding insects indicate waterside umbellifers, sedges and *Polygonum*. A range of beetles associated with foul organic matter was relatively common among decomposers and remained so throughout the whole sequence. Above 0.65m OD, the insect assemblages obtained were much larger. Aquatic taxa continued to be well represented. They included three species found in well-aerated running water together with others indicative of still or slowly moving water. Water margins would have been shallow

and well vegetated and there was waterside mud. The environment would generally have been rather swampy. Vegetation included umbellifers, sedges, probably reeds, and perhaps some weedy areas with docks. Insects present at 0.80–0.85m OD included *Odacantha melanura* a ground beetle found at the margins of fresh water among a rich vegetation of tall plants, usually reeds. Other taxa indicate that there was some shade. This is likely to be a result of the presence of tall vegetation such as reeds and umbellifers rather than trees or shrubs. In addition to the taller plants, there was abundant evidence from phytophages for the presence of sedges (*Carex*) and rushes (*Juncus*). *Blethisa multipunctata* recorded from samples between 0.85 and 1.00m OD is found on swampy ground by still or slow-flowing water and is typical of mires with a rich vegetation of *Carex* and *Eriophorum*. Mud continued to be abundant. The largest assemblage was obtained from the sample at 0.95–1.00m OD. Aquatic taxa were dominated by *Coelostoma orbiculare* suggesting that the prevailing water conditions were still. Other taxa suggest a muddy area with reeds and other tall rather dense vegetation. Insects from sedges were well represented and there was a single beetle found on nettles (*Urtica*). There is a slight suggestion for trees in the area at this stage. These records are entirely compatible with those from the sedimentary analysis, and suggest a period of peat formation that was subject to intermittent flooding, but which contained bodies of standing water, resulting in the colonisation of a rich flora consisting of tall grasses, sedges, rushes and herbs. This environment appears to have persisted at Point Pleasant from the Middle Bronze Age through to the late Roman period.

Above 1.15m OD, the abundance of insects declines somewhat although in many respects the range and implications of the taxa recorded was similar to deposits below this. Several taxa indicative of swampy reed beds were absent from this point onwards. Plant feeders associated with sedges and waterside umbellifers were still present. Aquatic insects were particularly poorly represented between 1.35 and 1.40m OD, but the assemblage from that depth was very small. Samples from between 1.47 and 1.62m OD produced substantial numbers of insects. Aquatic insects again included two species of riffle beetle *Elmis aenea* and *Oulimnius* found in running water. The range of feeders on aquatic and waterside vegetation was broadly similar to previous samples with the addition of species found on crucifers and *Ranunculus*. The uppermost sample studied, from 1.57 to 1.62m OD, had the largest aquatic assemblage of any of the samples and the taxa represented had a slightly different character to those in the earlier parts of the sequence. The presence of riffle beetles again showed that there must have been an input from running water. Insects from aquatic and waterside plants including umbellifers and sedges were predominant among the phytophages. *Chaetocnema concinna* found on *Polygonum* and *Brachypterus* found on nettles (*Urtica*) suggest some weedy vegetation. Among the ground beetles was *Agonum albipes* found at water margins, generally in more open locations on rather barren soil. Mud was still present at this stage. These records are also compatible with those from the sedimentary analysis, and suggest a period of fluvial inundation and flood plain formation from the late Roman period onwards, which caused a significant change in the local vegetation cover. The reason for this transition is unclear, but it may have been due to one or more of the following causes: (1) a change in base level status because of an increase in the height of relative sea level; (2) hydrological changes in the Wandle valley due to the long-term effects of Roman-period control and then abandonment of Roman rural management practices, and (3) localised, natural changes in channel formation and abandonment in the lower Wandle valley.

The continued presence throughout the sequence of taxa associated with foul organic matter is of interest. The most abundant taxa within this group were species of *Aphodius*. Most *Aphodius* are associated with herbivore dung but some, including *A. prodromus* the most common species in these deposits, and *A. ater*, are also attracted to foul rotting plant material such as would be abundant in a swampy well-vegetated area. The other identified species – *A. contaminatus* and *A. porcus* – appear to be more confined to dung (Jessop 1986, 21–23). *Geotrupes* and at least two species of *Onthophagus*, all distinct dung species, were recorded. It therefore seems likely that herbivores were grazing on land around the river Wandle

throughout the period represented by the sequence of sediments and the edge of the river could also have served as a watering place.

Comparison of the new data with previous investigations in the study area confirms the presence of organic sediments (peat and/or organic-rich sediment) associated with the prehistoric river Wandle, and a wetland environment dominated by plant and animal taxa indicative of open fen and swamp communities. At the former Shell Oil Terminal, Point Pleasant (Perry & Skelton 1997), these have been radiocarbon dated to 1690–1430 cal BC (3640–3380 cal BP; -1.2 to -0.7m OD) and 970–550 cal BC (2920–2500 cal BP). The geoarchaeological records provide evidence for lateral movement of the main channel, and the progressive infilling of abandoned channels during later prehistory and into the Roman period with fine-grained mineral sediment. At the Prospect Reach Foreshore site, Point Pleasant (Greenwood & Maloney 1996, 24; Perry & Skelton 1995), archaeological work revealed a peat and alluvial sequence radiocarbon dated to the Roman and post-Roman periods (AD 380–590), a similar date to the last recorded peat sequence at the Morganite site, with a pollen assemblage characterised by open mixed deciduous woodland and herbaceous taxa on nearby dry land, and wetland taxa including aquatic and marginal aquatic plants. At Garratt Lane, to the south of the Morganite site, the Museum of London Archaeology Service (MoLAS 2004) recorded a sequence of basal sands and gravels from 2.0 to 3.5m OD overlain by prehistoric mineral-rich and organic sediments. These sediments were recorded as post-Bronze Age in date (830–420 cal BC; 2780–2370 cal BP), and dominated by wet sedge fen, with shallow standing water, but with evidence for cultivation of cereals on nearby dry land. Outside the immediate study area, environmental archaeological records from Strathville Road, Wandsworth (Giorgi *et al* 1995) and Queenstown Road (Mackinder 2002) have provided evidence for local environmental conditions during the Holocene in this part of the Thames Valley. In contrast to the paucity of environmental archaeological records, the archaeological database indicates human activity from the Upper Palaeolithic onwards. In particular, there is evidence for Neolithic stone axes and scrapers (MoLAS 2000, 80 and inset map 3), Bronze Age spearheads, daggers, axes and swords from the Thames and the Wandle (*ibid*, 100 & inset map 5), and a postulated Iron Age occupation site on the south bank of the Thames (*ibid*, 117 and inset map 6). Therefore, the environmental archaeological data that exist for this part of the Thames valley broadly support the archaeological evidence by providing records for human modification of the landscape and environment, and in particular the cultivation of cereals. At Point Pleasant, the new records provide a significant contribution to the growing database of environmental archaeological information, with a reconstruction of not only the environmental context of human activities, but also evidence for use of the wetland margins of the river Wandle for animal grazing from the Middle Bronze Age onwards.

MEDIEVAL AND POST-MEDIEVAL PLOUGH SOIL/HORTICULTURAL LAYER

Across the Point Pleasant site was a layer of soil sealing the natural gravel that sloped from a height of 5.75m OD in the south of the site gently down to 5.23m OD in the north. On average the layer was 0.60m thick. The origin of the layer was probably over-bank flood deposits from the palaeochannel on the Morganite site to the east and a similar channel previously found to the north (Saxby 1989) together with the build up of marshland deposits. Very little cultural material was recovered from this layer, and apart from occasional flecks of oyster shell, the ceramics were wide ranging in date and included an abraded sherd of Late Bronze Age to Early Iron Age pottery, medieval Kingston-type ware, dated to 1240–1400, and local post-medieval slipped redware, dated to 1480–1650. The homogenous composition of the layer indicates that the land was ploughed and heavily cultivated as part of garden, horticultural or agricultural activity. Other excavations at or around Prospect House (site codes: PPW89 and PPT95) both produced medieval pottery, which on the PPW89 site came from a layer sealing the natural gravel and additionally contained earlier prehistoric and possible Saxon pottery (Perry & Skelton 1995; Saxby 1989).

17TH CENTURY AND 18TH CENTURY INDUSTRIAL ACTIVITY

Historical background

The Wandle valley has a history of industrialisation, particularly concerning the cloth industry and from as early as the 13th century cloth bleaching and hat making are recorded (Weinreb & Hibbert 1992, 947). Mills along the Wandle were concerned with corn processing and, at least from the 16th century, dye making, while other industries in the post-medieval period include fur processing, calico printing, brewing, gunpowder grinding, oil pressing and vinegar distilleries (Crocker 2004).

Edward Barker, who was thought to have been Dutch, erected an iron foundry on the land adjacent to the Thames, and then leased associated premises in *c* 1634 to Dutch workers skilled in the production of brass plate for kitchen ware manufacture (Gerhold 1998, 41). This was subsequently turned into skillets and frying pans etc, leading to the first names associated with the site 'Frying Pan Houses' which are named on Senex's 1680 map of the area and lay to the north of the areas of archaeological investigation. The Wandsworth foundry was located to take advantage of the easy importation of raw materials, particularly coal. The establishment of a large Huguenot refugee community in Wandsworth from the end of the 17th and start of the 18th century added a skilled hatter and dye-making labour force to these established industries. By 1712, the iron foundry had become one for copper (Gerhold 1998, 42), and is recorded in 1719 as being owned by John Essington, a copper merchant, who also owned the Frying Pan Houses. Essington was bankrupt by 1729 and eventually control of the estate passed to Joseph Gattey and William Waller, described as chemists and druggists.

Gattey and Waller were concerned with the distillation of vinegar and the research and production of chemicals and dyes used in the textile industry (Gerhold 1998, 45). The tithe map registers show that Gattey was not just confined to the Prospect House area, but rented land and buildings along the Point Pleasant roadway. In 1777 their buildings at Point Pleasant included 'an iron liquor house' and 'a madder house and mill'. In 1814 the firm was described as preparing iron liquids and sours (acids) for calico printers (*ibid*). Parts of these structures and associated pits were revealed during investigations in 1989 to the north of the present site (Saxby 1989).

17TH CENTURY ACTIVITY AT 11–13 POINT PLEASANT (fig 11)

On the west side of the Point Pleasant site the earliest archaeological evidence for this period was an apparent horticultural layer that had an average thickness of 0.30m and was recorded across the whole area. Only one fragment of pottery, a sherd of an early 17th century French red earthenware Martincamp flask, was recovered from this deposit during excavation, although two sherds of 19th century pot recovered from a section suggest a degree of reworking of this material.

Cut through the gardening soil were a number of mostly sub-circular or rectangular pits (fig 12), ranging in size between 1.5 x 1.60m and 0.80 x 4.10m, which were largely located in the northern area of the site. Not all the features contained datable material, while other features produced sherds of pottery with a long period of production, but later 18th century features stratigraphically cut some of these pits. The pottery assemblages that were recovered from these pits were small in size. Of note were local post-medieval redware distillation flasks, present in pit 106 together with 1162g of smithing hearth bloom. Other sherds of distillation flasks were also present with a small group of mid-17th century pottery, together with 388g of smithing hearth bottom in pit 80. Pit 110 was also dated to the mid-17th century by the pottery and also contained a contemporary 1660–80 clay tobacco pipe.

Distillation or receiving flasks were attached to the tubular spout of an alembic (which was set upon a cucurbit) and were used to collect nitric acid, made from a mixture of ferrous sulphate and potassium nitrate. Iron oxide, as a by-product is often found as a deposit

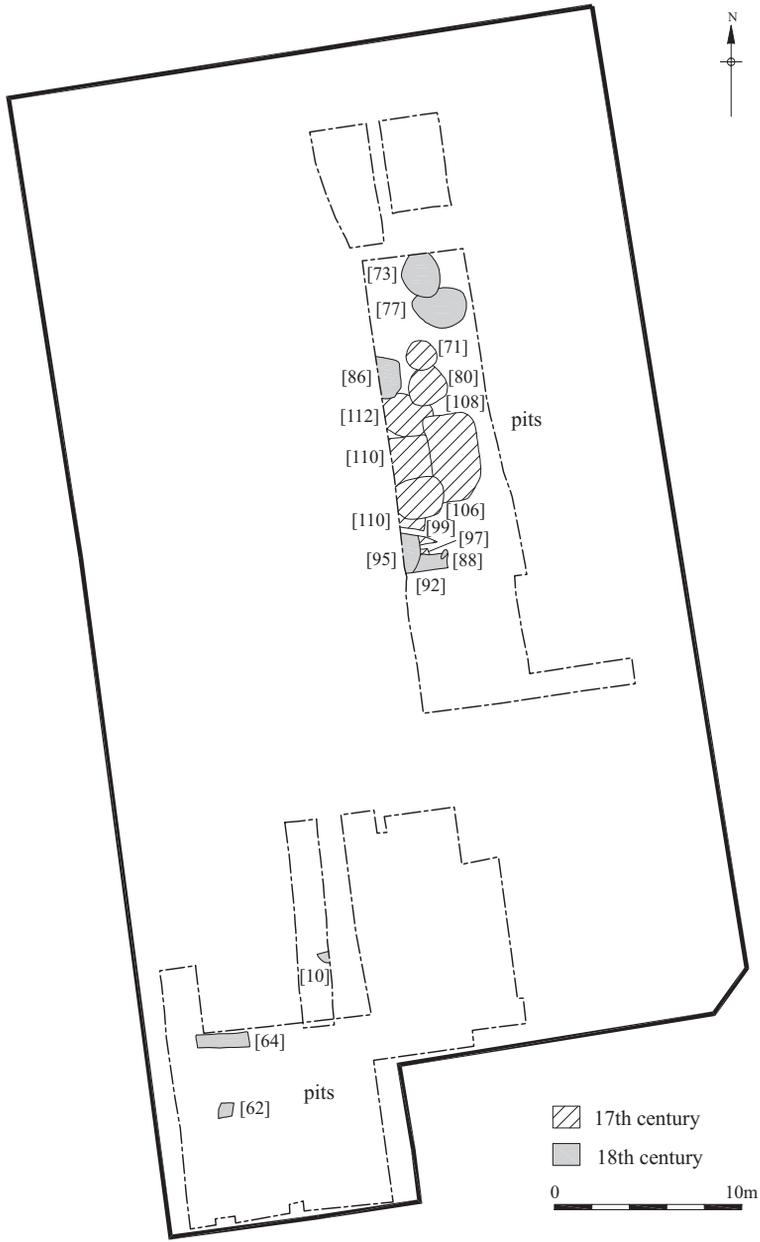


Fig 11 Point Pleasant and Morganite Works, Wandsworth. 17th/18th century features.

inside the flasks (Moorhouse 1972, 120–1, fig 33.13) and is found on some of the vessels from Point Pleasant. The most frequent occurrence of distillation vessels in London is from the City in the Aldersgate area, the Cripplegate ditch and beside the Tower of London (Bayley 1992; Jarrett 2001, 69–70; Pearce 2002a, 22–23; Sewart 1996). Nitric acid was used for the parting and assaying of precious metals since it dissolves silver, but not gold (Pearce 2002b, 62). The presence of distillation flasks and smithing hearth bottoms on the site must be associated with Frying Pan Houses and their metallurgical industry, located some 100m to the north of the site. It is probable that during the 17th century the POI05 excavation



Fig 12 Point Pleasant and Morganite Works, Wandsworth. View of the excavation of post-medieval pits (working shot).

area was within the southern extremity of the Frying Pan Houses properties and their associated grounds.

18TH CENTURY INDUSTRIAL ACTIVITY (fig 11)

On the Point Pleasant (POI05) site a number of 18th century dated features had either industrial vessels, waste or functions associated with them. In the northern area of excavation the primary fill of pit 77, which measured 2.10m north–south x 2.80m east–west and 0.36m deep, produced a delftware bowl dated 1680–1800, while an ashy secondary fill was overlain by a final fill containing some slag and a clay tobacco pipe heel dated *c* 1680–1710. Truncating the latter pit, oval pit 73 measuring 2.30m north–south x 2.00m east–west and 0.58m deep produced pottery dated to 1580–1700 and a clay tobacco pipe stem. Of note in this pit was a smithing hearth bottom fragment weighing 388g. Pit 86 to the south produced the neck of another distillation flask and part of a 17th or 18th century post-medieval redware jar, while a clay tobacco pipe bowl is dated to 1700–40. The primary fill also produced fragments of waste wrought iron. Pit 95 is interpreted as an industrial feature, but the processes associated with it are unknown. It was not fully excavated but measured 0.88m north–south x 0.94m east–west and 0.56m deep. It was clay lined and back filled with coarse sand and pottery dated to 1580–1700.

From the southern part of the site a rubbish pit 10, measuring 1.50m in diameter and 0.55m deep, was recorded that contained a sherd of Andalusian coarseware pottery, probably representing a container, chalk fragments, large pieces of ceramic building material, especially pan tiles, and a clay tobacco pipe dated to 1700–40. Particularly notable in the feature are post-medieval redware large ‘beaker’ shaped vessels (fig 13) with a total of eighteen sherds

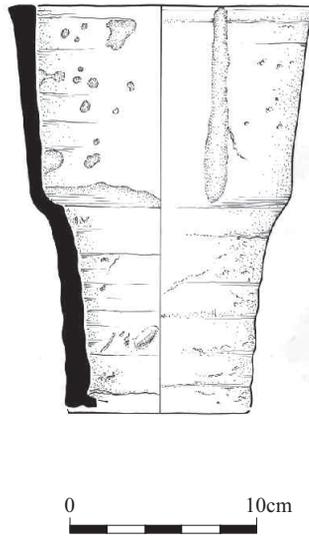


Fig 13 Point Pleasant and Morganite Works, Wandsworth. Post-medieval redware large 'beaker' shaped vessel.

representing some eleven vessels. These vessels were recovered as large fragments with only one vessel having a near-complete profile, but they are fairly consistent in their size with rim diameters ranging between 170 and 180mm. A non-ceramic material must have been used as a cover, perhaps some type of cloth secured with string. This form was made at Deptford where they were termed 'industrial pedestal beakers' and recorded in waster dumps dated *c* 1680–1750 and came in a range of sizes (Jarrett with Sabel 2004, 109, 111, fig. 77.1–3). Their function is uncertain, but rather than having an industrial purpose, the form was probably a container for a specific, but as yet unknown, product, either a colloid or solid substance, but no residues are associated with the form. Further evidence for the vessels probably being inexpensive containers are their poor production quality and variable, sometimes absent, internal glazing. The contents of the 'beakers' were probably used for a particular industry and the evidence here is that a quantity of the substance was needed, but once the containers were empty they were discarded. These 'beakers' are rarely recorded on archaeological excavations, but a sizeable group was found at Dunbar Wharf, Narrow Street, Ratcliffe (site code: NWT96) and a smaller number at Tabard Square, Southwark (site code: LLS02). What was in these 'beakers' is still something of a mystery, but one suggestion might be dyes perhaps for printing calico associated with the area. A new theory suggests they were for white lead production, where sheets of lead were placed in vinegar (F Meddens and D Cranstone, pers comm), vinegar also being made by Gattey and Waller. Continuity of manufacturing dyes on the site could be implied by Gattey and Waller's later industrial activities and ownership of the plot.

To the south of feature 10, a rectangular pit 64 contained a sherd of a post-medieval redware sugar cone mould with an internal white slip together with other pottery dated to 1710–60. Three other sherds of sugar cone moulds were present in a small rectangular feature (62) interpreted as an isolated posthole. Some of these features probably relate to the industrial activity associated with Frying Pan Houses, but the presence of the sugar cone moulds are difficult to interpret as sugar refining is as yet not documented in Wandsworth until the end of the 19th century (Mawer *nd*).

19TH CENTURY ACTIVITY

Historical background

Josephus Gattey had a new regency home, Prospect House (fig. 16), built on the site of Frying Pan Houses in *c* 1825, but he is first mentioned as the landowner, rather than a tenant in 1831 and died there in 1849, aged 78. Gattey disposed of his business in *c* 1820, but before doing so he made a philanthropic gesture and allowed one of the malt houses or outbuildings of his vinegar works to become the site of a 'British School' for educating children of every religious denomination. The 1838 Wandsworth tithe map shows the school on the site with a group of five terraced houses to its east fronting the road and north of this a group of four terraced houses on the same alignment. The school remained at that location until 1868, moving to new premises at Frogmore. Subsequently the building was called the Mission Hall and was so named on the 1894–6 OS map.

In the northern area of the excavation plot the 1830 tithe map shows four square, detached buildings evenly spaced along the east–west property boundary and accessed by an alleyway from the road. The map illustrates these buildings as a rank and they are named Fisher's Row on the 1939 OS map. The OS map of 1866 (fig 16) shows a change to the topography immediately to the south of the school, where a small street (Prospect Cottages) was lined with terraced houses that had been built by this date. The school is shown as divided into two with the girl's area on the north side. The housing on the front of the road appears to have been remodelled or rebuilt as a single terrace, while the four buildings in the alleyway have disappeared.

From the evidence of the 1841 and 1851 censuses the houses fronting onto Point Pleasant appear to be largely single occupancy residences. In 1841 women were quite often the head of the household and were employed as laundresses, a charwoman, a nurse and a schoolmistress (Clare Barker). The men in the households were employed as a gardener, agricultural labourer and draymen (TNA: HO/107/1069/42–3). The situation is little changed in 1851, with women mostly employed as laundresses, while the men were labourers, brickmasons, a 'bottom cloth weaver', carpenter, brickmaker and stonemason (TNA: HO 107/1578/78). The general impression of the residents from Point Pleasant during these two census years is of a working class community reflecting the local economy, with young families present as well as a notable number of the older generation. Primary sector employment is represented by a small number of agricultural labourers, while secondary sector jobs include a large number of males described only as labourer and fewer people employed in the building trade, clothing production, including shoe making and the brewing industry. Tertiary sector employment is poorly represented and less so in 1851, when Charles Dagnall, Prospect House, is recorded as a hemp merchant. By 1898–9 the area was described as of 'moderate poverty' on Charles Booth's map when the typical inhabitants were labourers, building workers, transport workers and industrial workers (Gerhold 1998, 70).

11–13 Point Pleasant excavation (fig 14)

On the Point Pleasant site most of the 19th century features consist of masonry structural remains. Foundations for the walls of three buildings could be identified and these can be related to 19th century properties, as can other features. All the building footings were of similar construction, the walls being 0.45m wide and built with an irregular English bond and a light greyish sandy mortar.

In the southern area of excavation, Building 1 was rectangular or square in plan. The uncovered walls (14, 42, 49 and 50) measured 12.50m square, but the western end continued beyond the limit of excavation. An internal division indicated two rooms with dimensions of 12.50m east–west and 6.25m north–south. The bricks used in the construction were unfrogged, but dated to 1820–80. This building relates to the British School, established in 1821, but it is documented that a malt house was re-used for the building, which would seem

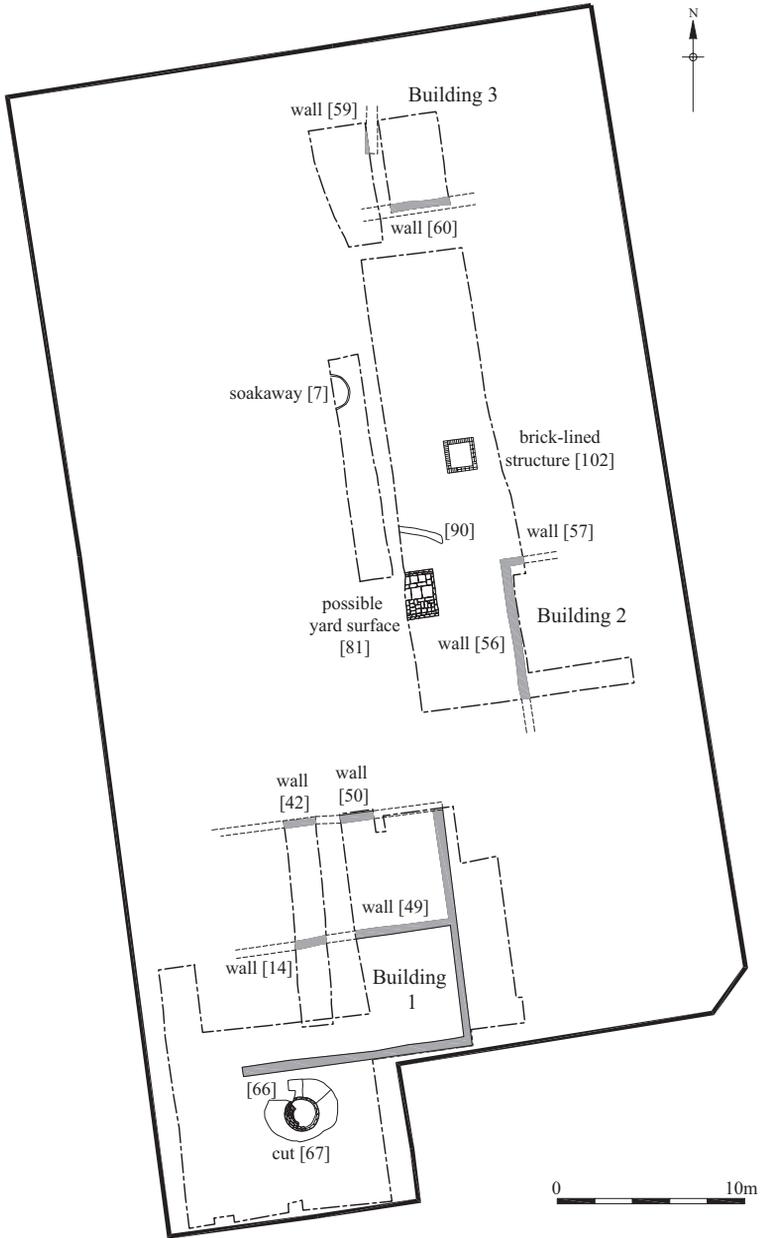


Fig 14 Point Pleasant and Morganite Works, Wandsworth. 19th century features.

to conflict with the dating of the brick forms. Pictorial evidence of the school shows a single-storey building with five large square windows on the south-facing wall and a double hipped, pantile roof each with a chimney. On the east-facing wall are shown two doors – one each for the boys’ and girls’ sections of the school – while an annexe is shown on the north and possibly the south side of the building. The perimeter of the school is shown with a picket fence.

Immediately to the south of the school building was a circular brick structure (66), 1.90m in diameter and at least 1.35m deep and constructed with unfrogged bricks mostly dated to

1666–1780 and a small number of a frogged 1820–80 type (fig 15). The construction cut for this masonry structure was conjectured as circular for the lower 0.86m and above this was a sub-circular, wider working area, 0.44m deep and up to 3.3m wide. The structure was built of irregular courses of headers and stretchers, but the lower thirteen courses were not bonded and only the top five courses, forming a dome, were bonded with mortar. There was no brick base to the structure, but the side and base were rendered with a dark grey silty clay lining, evidently intended to make the structure waterproof. The nature of the entrance to this structure is unknown as a later drain truncated it. Interpretation of this masonry feature was originally as an icehouse; however, its form does not fit the known range of structures for this type of building. Icehouses were usually high-status buildings and if one were to be found in the area, then it would have been located within the grounds of Frying Pan Houses or its successor Prospect House. Therefore the interpretation of this structure is somewhat problematic and although it could be associated with the school, it seems more likely that it belonged to Gattey's earlier malt house property and possibly had a storage function. Finds recovered from the infilling of this feature include pottery spot dated between 1780 and 1900 together with a copper-alloy farthing or token, possibly of the reign of William IV, 1830–7, which suggests that the structure was still in use and was not backfilled until after the school had opened.

In the northern excavation trench two buildings are recorded. Building 2 lay to the north of Building 1, consisted of a north–south 6.90m length of wall (19/56) made of bricks dated to 1820–80 and survived to a height of 0.35m; at the northern end of this wall was a return (57), which measured 1.30m east–west and 0.30m high. This building represents the rear and north-east corner of the end terrace dwelling in the group of five houses in the southern area of the site. A possible yard surface (81) is associated with this building consisting of York



Fig 15 Point Pleasant and Morganite Works, Wandsworth. View of feature 66.



Fig 16 Point Pleasant and Morganite Works, Wandsworth. 1866 Ordnance Survey map.

Stone flags edged with re-used bricks, but one large fragment was re-used from a stoneware kiln – probably either from Fulham or Mortlake, as it had glaze residues on broken edges and kiln furniture spacers fused to it (Brown 2005).

Building 3 at the northern end of the excavation consisted of two disjointed short lengths of walls at right angles to each other. The north–south wall (59) measured 1.60m north–south x 0.45m wide and survived to a height of 0.35m, while the east–west wall (60) was 2.90m long and survived to a height of 0.55m. The walls are aligned with the second detached house in the alleyway (later called Fisher Row) located in the northern part of the excavation area and shown on the 1830 tithe map. In evaluation trench 3 a sub-circular brick-lined soakaway (7) measuring 2.10 x 1.10 x 0.70m deep was recorded. The small amount of pottery recovered from it indicated a deposition date between 1825 and 1900.

To the rear of the terrace of four houses on Point Pleasant was a brick-lined feature, (36/102) that measured 1.65m² and had a depth in excess of 0.86m, as it was not fully excavated. Domestic pottery from this feature indicated a deposition date between 1830 and 1860 and consisted of a London stoneware blacking paste pot, its contents being used for the kitchen range, Pearl ware in the form of a plate and the lug for a vessel moulded in the shape of a lion. Post-medieval redware only occurred as the base of a flowerpot, while Refined white earthenware (china or Ironstone ware) included a ‘Cornish ware’ bowl, a teacup with a polychrome floral design and a saucer with a red band, the latter perhaps an indication of low socio-economic status. The blue transfer-printed wares are in the forms of a bowl, plates and saucers with geometrical or floral designs. Besides the Willow pattern, there are mid-19th century designs such as the Wild Rose border and possibly part of a service with the Albion design. Dating from *c.* 1825 are green, mulberry and purple transfer-printed designs and these occur on a teacup, pear-shaped jug and saucer usually with geometrical and floral patterns. A Yellow ware carinated or London shape bowl with a mocha design is also recorded. The clay tobacco pipes include a residual 1680–1710 bowl, but also present is a late 19th century Turks Head bowl (fig 17, no 2), the seams of the moulding being poorly finished. These pipe designs are usually associated with public houses and a Turks Head was located at Garretts Lane, Wandsworth in the mid-19th century (Kelly 1855, 767). Among the unstratified finds from the area was an Atkinson & Oswald (1969) type 30 clay tobacco pipe bowl, dated to 1840–1910 which is of a Masonic type (fig 17, no 1) and may infer that one of the residents or visitors to the site had connections with this secret society.

Morganite site

The palaeochannel recorded in the sondage was probably one of the many tidal creeks at the junction of the Wandle and Thames and these creeks formed islands to the north-west and east of the site. The channel continued to exist into the post-medieval period. It is shown on John Rocque’s 1745 map and is depicted on a number of 19th century maps of the area. A possible edge of the channel was revealed during the watching brief on the ground stripping, when blue/grey alluvial material was observed along the eastern part of the site with an apparent cut through the natural sandy gravel some 22.5m from the eastern boundary. Within the sondage across the palaeochannel alluvial deposits were observed the length of the section and it is probable that they represent infilling of the channel and silting of the flood plain into the post-medieval period. The layers above are interpreted as backfilling and dumping and produced cultural material such as 18th century Chinese porcelain and contemporary glass, including a phial or bottle and a mid-18th century French wine bottle rim. The final fills of the channel recorded in the sondage contained late 18th and 19th century pottery and suggest that the channel was backfilled at this time.

However, the cartographic evidence indicates that not only was the channel still in existence until the end of the 19th century but that during this period it was actually beyond the eastern boundary of the Morganite site. The watching brief revealed evidence that the channel may have been revetted at one time with posts and planks although the timbers that

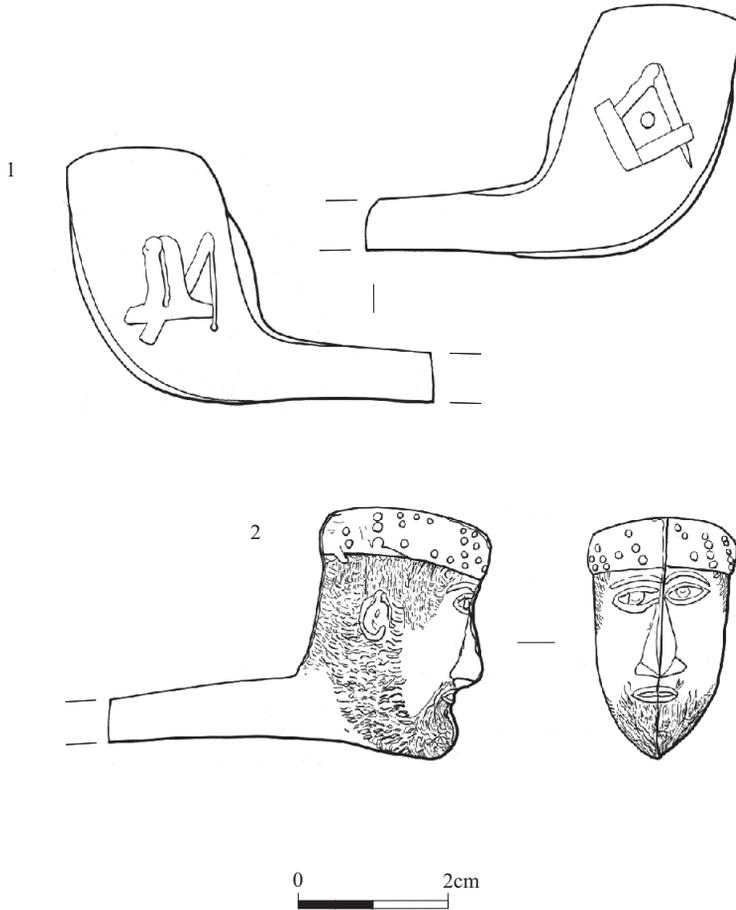


Fig 17 Point Pleasant and Morganite Works, Wandsworth. Clay tobacco pipes dated 1840–1910: 1) Masonic and 2) Turks Head type.

were exposed could only be recorded from the top of the trench because of health and safety concerns and no dating evidence was retrieved. The 19th century cartographic evidence shows the channel as very straight and regular compared to the earlier maps such as Rocque, which suggests that the 18th and 19th century dumped material may be evidence of the canalisation of the channel with these deposits representing the dumping behind the revetted sides of the creek. This revetting may have migrated to the east over time until the channel lay outside the site.

Conclusions

The sites at 11–13 Point Pleasant and the former Morganite Works have made an important contribution to our understanding of the archaeology and history of the area of the confluence of the Thames and Wandle. The Mesolithic flint assemblage adds to previous findings to the north and is consistent with the evidence for exploitation of the environment at the lower end of the Wandle valley during this period.

The palaeochannel found at the Morganite site provides evidence that the mouth of the Wandle was made up of several channels rather than one main channel and would probably have had the appearance of a delta, criss-crossed by streams flowing into the Thames. The

river and the land in the immediate vicinity would have been subject to repeated inundations with build-ups of peat intermittently from the Bronze Age into the medieval period. During the expansion of settlement of the area during the 18th and 19th centuries management of the channels was undertaken and finished with a canalised creek by the mid-19th century.

Prehistoric, medieval and early post-medieval pottery from layers at both the Point Pleasant (POI05) and Prospect House (PPW89) excavations indicate that the land use of the area, probably on the boundary of dry land and an area of creeks associated with the Wandle, was utilised for agriculture. From the early post-medieval period it is documented that a number of industries were operating along the Wandle valley. Finds of 17th century date, such as ceramic distillation flasks and smithing hearth bottom blooms, almost certainly reflect industrial activity associated with the Dutch migrant enterprise at the nearby Frying Pan Houses. Industrial activity continued in the 18th century at the 11–13 Point Pleasant site and the enigmatic contents of the local coarse red earthenware ‘beaker’ shaped vessels suggest a connection with calico printing, this product being famed in the Wandle valley, or possibly white lead manufacture. This activity may have been associated with Josephus Gattey and William Waller, druggist and chemists, who during the late 18th century, when the metallurgical industry ceased at Point Pleasant, are known to have set up a calico dye and vinegar distillery at Frying Pan Houses and probably rented, certainly in the early 19th century, the land and malt-house at 11–13 Point Pleasant. However, sometime after this land came into Gattey’s possession, he benevolently donated the malt-house to the British School and the land use in this area of Point Pleasant became increasingly residential, which is reflected in the final phase of activity represented by the masonry structures observed on site.

Endnote

The tables, appendix and figures listed below are available on the Archaeology Data Service website (<http://ads.ahds.ac.uk/catalogue/library/surreyac/v95.cfm>). Copies of this material will also be deposited with the Society’s library, Guildford and the Historic Environment Record, Woking. Photocopies can also be supplied by post – enquiries should be addressed to the Hon Editors, Surrey Archaeological Society, Castle Arch, Guildford GU1 3SX.

TABLES

- 2 Lithostratigraphic sequence from column sample <1>, Point Pleasant
- 3 Lithostratigraphic sequence from column sample <2>, Point Pleasant
- 4 Lithostratigraphic sequence from column sample <3>, Point Pleasant
- 5 Lithostratigraphic sequence from borehole sample <0–1m>, Point Pleasant
- 6 Lithostratigraphic sequence from borehole sample <1.0–2.0m>, Point Pleasant
- 7 Results of the radiocarbon dating of the borehole sample and column samples <2> and <3>, Point Pleasant
- 8 Invertebrate taxa recorded from the samples, Point Pleasant

Appendix: minimum numbers and percentages of individuals and taxa from each ecological group.

FIGURES

- 7 Point Pleasant and Morganite Works, Wandsworth. Lithostratigraphy of column samples <1>, <2> and <3> and the borehole sample, Point Pleasant, Wandsworth (MPP04)
- 8 Point Pleasant and Morganite Works, Wandsworth. Organic matter content of column samples <1>, <2> and <3> and borehole samples, Point Pleasant, Wandsworth
- 9 Point Pleasant and Morganite Works, Wandsworth. Age-depth model of column samples <1>, <2>, <3> and borehole sample from MPP04, Point Pleasant, Wandsworth,

created using OxCal v4.0.1 Bronk Ramsey (1995; 2001), IntCal04 atmospheric curve (Reimer *et al* 2004) and using a peat sequence algorithm programme (Bronk Ramsey 2007)

- 10 Point Pleasant and Morganite Works, Wandsworth. Age-depth model of column samples <1>, <2>, <3> and borehole sample from MPP04, Point Pleasant, Wandsworth, created using OxCal v4.0.1 Bronk Ramsey (1995; 2001), IntCal04 atmospheric curve (Reimer *et al* 2004) and using a peat sequence algorithm programme (Bronk Ramsey 2007)

ACKNOWLEDGEMENTS

Pre-Construct Archaeology Ltd (PCA) would like to thank Laing Homes South West Thames and Berkeley Homes (Southern) Limited for funding the excavations and Duncan Hawkins of CgMs Consulting for commissioning PCA to undertake the work. Diane Walls was the English Heritage (GLAAS) archaeological monitor, Tim Bradley was the PCA project manager and Jon Butler managed the publication. Thanks go to the supervisors of the excavations; Morganite site: Jim Leary (evaluation), Chris Pickard (watching brief), Stuart Holden (evaluation of the channel), while at the 11–13 Point Pleasant site the evaluation and excavation was supervised by Chris Pickard and Chris Mayo. Thanks are due to all the site staff who participated in the work.

Chris Jarrett compiled the publication and assessed the pottery, glass, clay tobacco pipes and researched additional historical documentation to Ian Barefoot's initial report. Illustrations were produced by Josephine Brown (AutoCAD) and Cate Davies (finds). The other specialists' grateful contributions were Märit Gaimster (registered finds), Lynne Keys (iron slag) and John Brown (building materials).

Nick Branch and his fellow authors of the environmental analysis would like to thank Gem Swindle, Alys Vaughan-Williams and Rowena Gale for participating in the assessment process.

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