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at the Co-op

mosaic pavement

Gosbecks dig

3-d computer modelling of temple

ancient pollen under the microscope

Lexden in antiquity

gladiators! reproduction Roman

reproduction Roman glass special offer

plus town life in old Essex and a historical 'whodunit

Michael Wood in conversation —

the travels of Alexander the Grea



Michael Wood on location in the Hindu Kush

a pot in the hand

Trust volunteer David Grocott holds on to a complete Roman pot from the new Sovereign Crescent in Lexden

— and news of the latest archaeology in Colchester

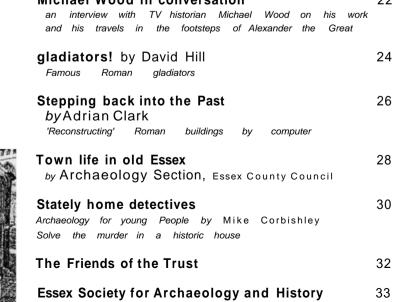


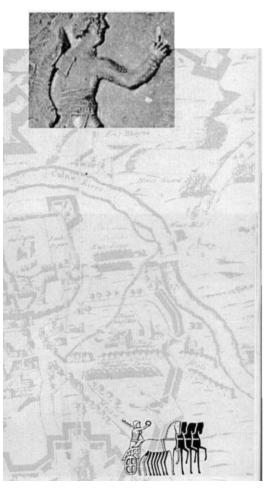
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'treasure trove'

Former Poultry Market

A large Roman foundation was revealed during a limited archaeological investigation by the Trust on a building site next to North Bridge. The site is on the north side of the river, on North Station Road, where various earlier discoveries including a mosaic pavement show the area to have been a large suburb in Roman times. The recent find appears to be too wide for an ordinary house foundation. It may have been part of a Roman bridge where North Bridge is now (unlikely) or it may have formed part of a public building such as a temple.



The Essex Heritage
Trust has given a
grant towards publication of the results of the extraordinary Stanway
site, where finds
included the famous gaming board
and surgical instruments in the 2,000
year-old grave of a
British doctor. The



grant from the Essex Heritage Trust will fund the initial cataloguing of the finds and other discoveries. Trustee Rory Watson is pictured above examining an Italian copperalloy pan from the 'doctor's' grave.

Longinus

It used to be thought that Colchester's magnificent tombstone of the Roman soldier Longinus was carved out of Bath stone, but it is questionable if the Bath quarries were operating as early as AD 43-50 when it seems Longinus died. One of the hundreds of chips from the stone which were discovered in 1997 along with the face (see The Colchester Archaeologist, 10) has been thin-sectioned and identified by geologist



R W Sanderson as being Lincolnshire limestone from quarries at either Ancaster or Great Casterton. This would mean that the stone was transported from the quarry by road starting on Ermine Street which was near both quarries (assuming Ermine Street had been built then) or it was taken to the Wash and brought to Colchester around the coast.

Four-thousand-year-old arrowhead

People lived, farmed and hunted in the Colchester area long before the Romans arrived. One of the latest finds which shows this claim to be true is this fine flint arrowhead. (See further on pages 8-9.) It is about 4,000 years old which means that it was made about 2,000 years before the Roman invasion of Britain in AD 43.

The arrrowhead is of the 'barbed-and-tanged' type. The central lower projection is the tang, which was slotted and fixed on to the shaft of the arrow. There were two barbs, one to either side of the tang, but the left-hand barb has snapped off and is missing. The barbs made it difficult for the arrowhead to work loose when completely embedded in the animal's body.

The arrowhead was found by James Fawn of the Colchester Archaeological Group in 1998. It comes from the site in Beverley Road where the gravestone of Roman soldier Longinus was found, (see above)





Roman baths

Part of an apsidal Roman bath (left) was recently uncovered on a Head Street site in Colchester. The bath was first found in 1934 (right) during the archaeological dig which preceded the building of the post office (now closed). Although structures such as these are normally referred to as 'plunge baths', they are usually too shallow to dive into. Instead, bathers would simply have stepped into the water and either paddled about or sat down. The water in the bath would have been cold. The recent excavation was carried out by AOC.



Roman burial rite

A decapitated body was one of three burials carefully uncovered by the Trust during building works for an extension for the Trust's auditors, Beaumont Seymour and Co in Butt Road. The head had been placed above one of the legs of the body. In cases such as this elsewhere, where the bones are well preserved, it has been shown that the heads were detached with a scalpel so as not to cut into any of the neck vertebrae. One of the other burials included a group of five inter-looped copper-alloy bracelets.

Essex Book Awards 1996/7

City of Victory, the Trust's book on the history and archaeology of Colchester, an award for the best commercially-published book on Essex for the years 1996 and 1997. The award ceremony was held Ingatestone Hall, and the awards were sponsored by the Friends of Historic Essex, Waterstones Booksellers of Colchester, and Essex County Council Libraries. Copies are still available in paperback for £9.95 from bookshops or direct from the Colchester Archaeological Trust.

Roman pottery volume

The Trust's major technical volume on Roman pottery from Colchester will be available in April 1999. It was written by Robin Symonds and Sue Wade and edited by Paul Bidwell and Alexandra Croom. The 500-page report includes a CD-ROM for site data. The volume can be obtained from the Trust for £39 plus post and packing.

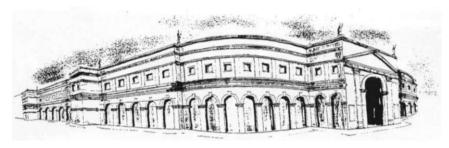
Gifts

The Trust was delighted to received various donations in 1998 including two substantial sums of money and runs of archaeological periodicals for its very modest 'library'. Thank you again to all concerned.

Ground probing Park survey

Colchester's Castle Park is arguably the most archaeologically-rich municipal park in the country. It includes the castle and its defences, the Temple of Claudius, the town wall, a gate, and the remains of Roman streets, houses, and other buildings. This means that, although the setting and atmosphere of the park are enriched by the remains, its day-to-day management and long-term development are more complicated than normal, especially since it is a protected ancient monument. The position of new trees and other plantings needs to be considered in relation to the buried archaeology, as would any groundworks or new building.

The Borough Council commissioned a review of the park possibly leading to



Ben Hur Colchester-style

Plans have been announced by Patrick Murphy of Medieval Tournaments Ltd to built a Roman circus on a site on the outskirts of Colchester. It is to have a capacity of 1,200. Top of the bill, six days a week, will be Roman chariot racing.

Spear blade from an East Mersea beach

Paul Sealey writes:



Some vears ago the sharp eyes of Terry Butcher noticed a spear blade on the foreshore on Mersea Island. Terry had no idea how old it was but he took it home and put it in his tool box. There it remained until his friend Monty Bush saw the weapon and realised - to his credit what it was. Terry generously donated the spear to Colchester Museum and Monty himself proudly brought it to the Museum Resource Centre. So anyone who cares about the past has aood reason to be grateful to both of them.

But how did the spear end up on a beach at East Mersea? Because of sea level changes, there is a submerged prehistoric landscape off parts of the Essex coast. Much of it is Bronze Age. The spear will have come from this landscape and been washed up on the beach by sea action. The proof is

inside the hollow socket of the spear. There one can still make out part of the wood that secured the blade to its shaft. Normally of course wood that old would have decayed long ago, but the water-logged conditions preserved it.

We already know enough about prehistoric weapons to date the Mersea Island spear to the middle Bronze Age, to about 1600-1200 BC. Along the sides of the socket of the spear Terry found there are two side loops. It has been suggested they were used to hold textile ribbons or streamers in place. Obviously this would not affect the effectiveness of the spear but it gives a clue to how people felt about weapons and fighting in the Bronze Age. Weapons of the period are often finished with an elegance that is unnecessary if judged on purely utilitarian grounds. This had not happened before in human history and suggests that people did not always fight as a last desperate resort but positively revelled in warfare. Weapons like the Mersea spear tell us that the society that created them was beginning to see warfare as a legitimate and glorious activity and the scene was set for the conflicts that have plagued humankind ever since.



major improvements, and, as part of this process, the Trust was asked to carry out a geophysical survey. Howard Brooks used a magnetometer (right) of the kind made famous by Time Team. The results were limited, the only new information of substance being some ditch-like features in the Lower Castle Park.

In general, the remains proved to be too deep, and too heavily masked by metal objects such as park fittings and discarded bottle tops. There are more sensitive machines on the market which can be tried, and a sample area has been tested using an alternative technique unaffected by buried metal. But for now, it looks as if, for the Park at least, there is no substitute for a good old fashioned hole or two.



household god. One of the pots had a pottery lid, and another was covered by a piece of tile. There was nothing over the third one (see back cover) suggesting that it had been covered with something organic such as wood or cloth.

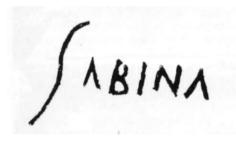
Offerings of this sort have occasionally been found before in Colchester. Generally the pots are empty, any organic or liquid contents having long disappeared, although there was one under the floor of a

One of the votive pots being uncovered. The photograph shows the lid and the empty pot below

cellar at the Lion Walk site which contained the bones of three puppies. One of the pots at the Co-op site was particular interest, because some cattle bones lay next to it showing that the original deposit included parts of a butchered animal. The bones consisted of a scapula (shoulder blade), vertebrae, and ankle bones, showing that only poor cuts had been sacrificed.

The Colchester Archaeological Trust gratefully acknowledges the support of the Colchester and East Essex Co-operative Society who commissioned and funded the excavation and the preliminary dig which preceded it.

What's in a name?



Roman pots occasionally have words or numbers of various sorts scratched on them. Mark Hassall, an expert on Roman graffiti, reviews the significance of a name carved on the outer surface of bits of two broken bowls from the Co-op site.

Sabine scratched her name on a couple of rather undistinguished bowls and 1700 years later, Howard Brooks and his team found the broken bits during excavations on the site of the Co-op in Long Wyre Street.

Who was Sabina? We don't know, but if someone offers to beam you back to Rome in



the first century AD, don't be overheard whispering her name in the corridors of Nero's Golden House, or you might just find yourself having to answer some pretty searching questions from a centurion of the Praetorian Guard: Poppaea Sabina was the beautiful and licentious mistress - and later wife - of Nero. Her mules were shod with gold and she was reputed to take a daily bath in the milk of 500 asses (yuk). So watch your tongue. And watch it too if, half a century later, you find yourself cracking jokes with the imperial biographer, Suetonius, at the court of Hadrian. If he starts telling you the latest gossip about Sabina, you'd better remember something you'd forgotten pretty fast and make your apologies: Sabina was Trajan's great niece and Hadrian's wife and he couldn't stand the woman, but this didn't excuse insolence, and Suetonius got the sack because he said something out of

Whose wife was Co-oppaea Sabina? Was she beautiful like Nero's mistress or did she have a temper like Hadrian's other half? We don't know. We do know that she had a 'couple of black burnished type bead rim bowls' - and that she could write. She can't have been the mistress of a very wealthy

household - you wouldn't catch your Roman Hyacinth Bucket scratching her name on those black burnished type thingies in the kitchen - well would you?

On the other hand, she probably wasn't a slave either. For one thing she could write - though slaves could often write too - but statistically it's also unlikely. CIL, the corpus of Latin Inscriptions from all over the empire {Corpus Inscriptionum Latinarum), includes 512 occurrences of the name Sabina of which 496 were the names o f 'free' women,

opposed to only 32 of slaves or exslaves. The figures for men are 742 as against 33. See how the men are mentioned more times than the women. What does that tell us about Roman society? Is it the same with slaves and freedmen? Are they underrepresented? Yes probably, but if one compares the Sabinus/Sabina figures with some other names you can see that certain ones were proportionately more popular with slaves. That Eutyches now - name means Lucky in Greek of course - but he's no Greek you can tell a slave a mile off - cheeky sod - watch it! You'll drop the blooming thing! Which brings us back to those broken bits of 'black burnished type bead rim bowls'. What can we say about them? Better ask Howard, but I can tell you one thing - they certainly belonged to Sabina.

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FOUNDING COLCHESTER'S CO-OP

by Andrew Phillips

The Colchester & East Essex Co-op, today a multi-million pound success, began in 1861 with 28 shillings, a sack, of flour and a borrowed pair of scales. It was one of those epics of working class self help which epitomise our view of the 'respectable' artisan. It flourished on the rising living standards and lower food prices of late Victorian England.

The idea for it came from a man called Dand (we don't know his

Christian name) who seems to have lived in Colchester for only a brief while. He urged and finally persuaded John Castle, foreman of a small local silk factory, to front the movement. Eleven working men, chosen for their perceived business ability, were summoned to Thompson's Coffee House in Wyre Street and over the next two months they drew up rules, invited a public meeting to buy one shilling

shares, and rented an empty shop in Culver Street, selling bread and flour on three evenings a week. The first week's takings were under £5.

The infant Co-op was fortunate in the ability of several of its founders, notably John Castle himself, whose moving autobiography appears in Arthur Brown's book 'Essex People 1750-1900'. Also significant were James Paxman, founder of the firm which eventually became the town's largest employer and James Goodey, architect and builder of the 'New Town' estate, that home of the upwardly mobile, which he planned as an experiment in socially mixed housing. In 1861, both Paxman and Goodey were still foremen of other men's businesses.

Goodey designed and Paxman supervised the Co-op's first building on the site of a decrepit butcher's shop in what is now Culver Street East, a site which until recently still housed the main Co-op grocery store. As well as a shop, there was a bakery, for the Co-op produced its own bread. It was also a cardinal principle, then as now, that the Co-op should offer a social and educational programme. The 'upstairs' at Culver Street rapidly became the centre for a rising labour movement in the town. At this stage, it was loosely aligned with the Liberal Party, but by the 1890s it was actively promoting trade unionism and, in a defining moment in 1918, it voted to back the Labour Party's candidate at the General Election that year.

The early Co-op had its problems. Non-grocery business was difficult to get going, but eventually a flourishing clothing department was born, with the Co-op operating its own clothesmaking unit. Shoe shop, drapers and chemist were also established in Wyre Street. Indeed, the present rebuilding programme is carefully preserving the facade of yet another 'Goodey' building and one of the society's beehive logos. Trading was especially boosted by the opening of branch stores in Goodey's infant New Town, on North Station Road, at Lexden, at Rowhedge - all before 1900.

So central did the Co-op and its 'divi' become to the lives of countless Colcestrians, that many over-50s reading this will still recall their childhood Co-op number, learnt by heart almost before their street and house number. So universal were its services that during World War II, when rationing required householders to name their grocery, over half the local population chose the Co-op. Today, several structural changes and take-overs later, the Colchester & East Essex Co-op is still a major retail outlet in the area.

How old is Colchester?

Colchester is proud of its claim to be the 'oldest recorded town in Britain', but this refers to its Roman predecessor, and Colchester is certainly much older than that.

Camulodunum: defended settlement

Perhaps pre-Roman Colchester does not qualify for the description of 'town' in the modern sense, but it was certainly a large population centre of regional if not national significance. As we shall see, there is tantalising evidence that Colchester was an important settle-ment at least a thousand years before the Romans invaded Britain in AD 43.

The Roman town at Colchester was built inside the British settlement known as Camulodunum, the 'dunum' meaning fortified place in reference to the system of defensive dykes which protected it. The earliest known reference to the name Camulodunum is on some coins dated to around 25-15 BC which were issued by a king called Tasciovanus. In other words, despite its size and obvious importance at the time of the Roman invasion, it is not possible on present evidence to make Camulodunum - the settlement defended by dykes that is - predate the Roman invasion much more than a mere 50 to 75 years, which is rather hard to believe.

The main archaeological evidence for Camulodunum can be thought of as being made up of several different components, namely the occupation sites at Sheepen (now largely covered by the Hilly Fields) and Gosbecks, the system of earthwork defences (dykes), the burials, and its coinage. The late Iron Age occupation at Sheepen, excavated on a large scale in the 1930s and then again in 1970, cannot be made much earlier than the end of the 1st century BC, and the recent excavations at Gosbecks (see page 20) have produced a similar sort of picture at least for the peripheral areas of Gosbecks. The Lexden Tumulus, the grand burial place possibly of a king or chief called Addedomaros (see page 10), is datable to c 15/10 BC, and none of the nearby more modest burials seem to predate c 50/25 BC. Thus all in all, there is a convergence of evidence of say 50-25 BC for the foundation of Camulodunum.

Julius Caesar came to Britain in the mid 1st BC and had important contacts

with senior men of the Trinovantes, the tribe which inhabited this area. He records that he entered their territory, but makes no mention of a place called Camulodunum which he might be expected to have done given its tribal importance. Of course, we cannot take this to mean that Camulodunum did not exist by this stage, even although it would be surprising if it did not.

The British kings, including perhaps for a time Tasciovanus, probably lived in the farmstead which formed the core of the Gosbecks site and which has been recognised from aerial photographs of cropmarks. No excavation has been carried within its interior, but it is here that the best dating evidence for the origins of Camulodunum is likely to exist.

However, the most interesting site at Stanway, which the Trust finished excavating in 1997, hints that Camulodunum was indeed older than we presently think. Although Stanway in its final stages belongs to the crucial c 25 BC to mid 1st century AD period, it seems to have started off much earlier when, in the 3rd or 2nd centuries BC, it was farmstead, like the one at Gosbecks but much smaller. Thus it seems likely that, with excavation, the farmstead at Gosbecks will prove to be just as early as the one at Stanway, if not even earlier. And of course, what applies to Gosbecks, will apply to Camulodunum too.

Before Camulodunum..?

The situation is more complicated still. because there may have been phases of major settlements in the area before Camulodunum. In particular, there is much evidence of Bronze Age occupation in the Colchester area in the form of ring ditches (parts of barrows), cremations, pottery, and flints. Practically every large excavation in Colchester will produce remains or traces of prehistoric occupation. For example, flints and pottery from what is now Culver Precinct in the town centre showed that there once had been a late Neolithic site there over 4,000 years ago. The problem is that there

res, area.
their
n of a lich he e given The remarkable Sheepen cauldron, dated to

The remarkable Sheepen cauldron, dated to between 1400 and 1 100 BC.

Photograph © Colchester Museum.

are prehistoric sites all over Essex and how can we tell if any of them were more important than the others?

A big clue that Camulodunum was an important place long before the end of the Iron Age comes from the Sheepen site. During the excavations there in the 1930s, lots of pottery dating to around 1,000 BC was found scattered over the hilltop. A spectacular discovery was a large bronze cauldron, which seems to belong to this earlier settlement. The cauldron is one of the earliest in the country, the only directly comparable example being from Feltwell Fen in Norfolk. It is a truly extraordinary object. It has a capacity of about 15 gallons, and technologically stands at the start of sheet metalworking in this country. The cauldron is thought to have been made

Post holes excavated at Sheepen in 1971. The hilltop is likely to be covered with similar post holes which, if uncovered over a larger area, would show the sizes and positions of 3,000-year-old houses and



between 1,400 and 1,100 BC, so that it may have been several hundred years old when it was disposed of in a pit at Sheepen.

The presence of such an extraordinary and rare object at Colchester suggests that the Late Bronze Age settlement may have been special and of a high status. Unfortunately we cannot rule out the possibility that the cauldron was in fact buried in the days of Camulodunum when it would have been over a thousand years old. (This is not as unlikely as it may seem because the Lexden Tumulus, dated to c 15/10 BC, contained an equally old Bronze Age axe head.) However, even if the cauldron was not associated with the Late Bronze Age settlement, the quantity and widespread distribution of the pottery at Sheepen show that this had been a substantial settlement. The 1930's excavation was done by trenching which, although the standard technique of the time, meant it was easy to miss vital evidence for structures such as post-built houses. A small area excavation in 1970 showed that a different excavation technique would probably reveal the remains of many different buildings over the

Despite the ample evidence for prehistoric occupation in the Colchester area, there is surprisingly little material to bridge the gap between the Late Bronze Age settlement and Camulodunum. Was the large Late Bronze Age settlement at Sheepen simply a one off or was Colchester a major place long before its defences were built and it became known as Camulodunum? Much more digging is needed to tell

* Thanks to Paul Sealey for his views on the cauldron.





PLACES TO VISIT BY THE WATERSIDE

Harwich Maritime Museum. Low Lighthouse, Harbour Crescent, Harwich, Essex (in lighthouse built in 1818 on sea front) [Harwich Society]. Tel. (01255) 503429. Open May 1-Aug 31, 10.00-5.00. Entrance adults 50p, accompanied children free.

House, Timberfields, Harwich, Essex (Victorian lifeboat house with 37 ft lifeboat; history of Harwich lifeboats) [Harwich Society]. Tel. (01255) 503429. Open May 1-Aug 31, 10.00-5.00. Entrance adults 50p, accompanied children free

Harwich Lifeboat Museum, Lifeboat



Harwich guided tours of old Harwich for groups of 10+, by the Harwich Society, any time by prior arrangement. Tel. (01255) 502668. Cost varies according to requirements.

Individuals or small groups are invited to call in at Ha'penny Pier visitor centre for information

Guided tours most Weds at 2.00.

Redoubt Fort, behind 29 Main Road, Harwich, Essex (circular, moated Napoleonic War fort, built in 1808, under renovation; collection of big guns in emplacements; small historical displays in casements; views over town and harbour, Continental ferries) [Harwich Society]. Tel. (01255) 503429. Open May 1-Aug 31, 10.00-5.00; Sept 1-April 30, Sun only, 10.00-12.00 and 2.00-5.00 (closed Christmas and New Year)-entrance: adults £1, accompanied children free.

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Tide Mill Trust on the picturesque Woodbridge quayside with stunning views of the River Deben. Photographers' paradise.

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(support the charity)

Mersea Island Museum, High Street, West Mersea, Mersea Island, Essex (local interest, including local history, natural history and social history, marine tools, wildlife, fossils, fishing and a fisherman's cottage of 1920-30; special exhibition each year). Tel. (01206) 385191. Open May 1-Sept 26, Wed-Sun 2.00-5.00. Admission 50p/25p. Visits to Mersea Barrow by arrangement; tel. (01206) 383598

Essex Secret Bunker, Crown Building, Shrub-lands Road, Mistley, Essex (former county [Essex County Council] nuclear war HQ in vast concrete bunker, fully renovated audio/video effects: shows how Essex would have operated during a nuclear attack; central underground operations room, radio room and telephone exchange, dormitory and offices, generator and ventilation plant all hidden deep inside bunker: sound effects, video and films bring the bunker to life as you discover the secrets of the Cold War in Essex; shop; cafe; picnic site, play area, free car park). Tel. (01206) 392271 (24hour information line). Open 10.30-4.30 all year (last admission 30 minutes before closing), Good Fri-30 Sept daily; Feb/Mar/Oct/Nov, Sat/Sun. Entrance £4.95/ £4.35/£3.65, family (2+3) ticket £15.00; groups of 1 1 + less 50p per person; evening tours, curator's tours and young persons' visits can be booked throughout year, please tel. for details.

Tilbury Fort, No 2 Office, The Fort, Tilbury, Essex (largest and best-preserved example of 17th-century military engineering in England, commanding the Thames and showing the development of forts over 300 years, near site of Queen Elizabeth's famous pre-Armada speech; parade grounds, gun-powder magazines, casements; opportunity to fire a 3.7" antiaircraft gun of 1943; special events and firing days; exhibition; shop). Tel. (01375) 858489. Open April 1-Oct 31 daily, 10.00-1.00 and 2.00-6.00 (5.00 in Oct); Nov 1-March 31 in 2000, Wed-Sun, 10.00-4.00



Lexden is exceptionally rich in archaeological remains and standing monuments of the past. Today it is a desirable place in which to live. Almost two thousand years ago, it was similarly favoured, but as a prestigious place for the dead rather than the living.

Above: The Lexden Tumulus - buriol place of a British king who died 2,000 years ago.

Above right: Milestone where London Road meets Lexden Road outside the Lexden Evangelical Chapel.

Even before the Romans, the Lexden area was exceptional. It was the burial place of at least one British king. He was probably the king called Addedomaros and he died around 15/10 BC. His cremated remains and many of his worldly possessions were placed in a large grave under a burial mound which survives today. Although now badly degraded, the mound is still clearly visible and is shared by two gardens in Fitzwalter Road. The objects from the

grave make up the most important group of their period found so far in Britain.

The earthwork defences protected preand early Roman Colchester form largest system of their kind in the country. The system in its final form consisted of well over 12 miles of bank and ditch (dyke). Time has taken its toll on them. and large sections have been levelled or reduced to near invisibility. However the best preserved section is to be found at Lexden some impressive parts of the Lexden Dyke survive protected in private woodland.

Various roads crossed Lexden in

Roman times including the original version of the A12 - the road from Colchester to London and the west. This major thoroughfare corresponded to today's Lexden Road/London Road although it was not quite in the same position. In all there seems to have been at least four Roman roads, and these radiated out from a spot under the southern end of the main building forming Colchester Grammar School

Most human burial was not permitted in built-up areas which is why large cemeteries existed just beyond the defences and suburbs of towns such as Colchester. Hundreds of Roman burials have been found in the Lexden area for this reason. Many were accompanied by a wide range of domestic and other artefacts showing this was where the wealthiest of Colchester's Roman citizens were buried. A famous example of burial from the Lexden areas was found near the junction of Cambridge and Creffield Roads and is the so-called 'child's grave' with its remarkable collection' of pipe-clay figurines, coin hoard, pots, and remains of a couch.

The main road into town was lined with fancy memorials and tombs to impress travellers and remind locals of their most illustrious dead. These monuments included the tombstones of the Roman centurion Facilis and the cavalry officer Longinus (p 2) which were discovered in the Beverley Road/ West Lodge area in 1868 and 1928 respectively. Not far from the junction was a tomb which included a monument in the form of a sphinx. The tomb stood on the south side of the road linking the junction with the Balkerne Gate. The sphinx was found in 1820/1 on the site of Essex County Hospital. The sphinx was a mythical hybrid being, in this case combining a human head with a winged feline body. The head which she holds with her front paws symbolises the soul of the dead whose tomb she guarded.

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spotlight on Lexden...

The Colchester Vase

Paul Sealey explains why the Colchester Vase, found in Lexden 150 years ago, still has no equal.

The Colchester Vase is arguably the most famous single pot from Roman Britain. This year sees the one hundred and fiftieth anniversary of its discovery in 1848 at West Lodge Road, off the Lexden Road.

It was found in a cremation grave with other pottery dated c AD 150. The pot itself is a large colour-coated jar made in the Colchester potteries, which were at the height of their fame and success in the 2nd century AD.

The whole of the outside of the pot is decorated in relief with human and

animal figures. Two men can be seen baiting a beat with clubs and a whip. An inscription cut in the pot after it had been made gives their names: Secundus and Mario. This is a scene from one of the public fights staged between men and wild animals in the Roman world. Further on a hunting dog is in hot pursuit of two stags and a hare. But the centre-piece of the decoration is a fight between two gladiators. The victor is a fully-armed gladiator called a secutor, equipped with helmet, sword, shield and body armour. His opponent is holding

up a finger to show submission. No wonder because this particular gladiator (known as a retarius) only has a shoulder-guard to protect him and fights with a trident and net. His trident lies useless on the ground and the net is nowhere to be seen. As with the bear baiters, the names of these two are also scratched in the surface of the pot: Memno and Valentinus.

So far, so good. But the inscription goes on to add that Valentinus belonged to the Thirtieth Legion. Now this particular legion was based on the Rhine and never served in Britain. So why was a gladiator from a Rhineland legion well enough known in Colchester to be commemorated this way? We know that some gladiators became folk heroes with their own fans, just like modern football stars - perhaps Valentinus and Memno were two of the greats of their own day.

As a work of art, the Colchester Vase has no equal in northern Europe. Nowadays we may not have much sympathy with the cruelty so candidly portrayed on this famous urn but we must salute the extraordinary skill of its anonymous creator. Scenes like those shown here give us a vivid picture of the gruesome public entertainments staged all over the Roman world - including Colchester.



spotlight on Lexden...

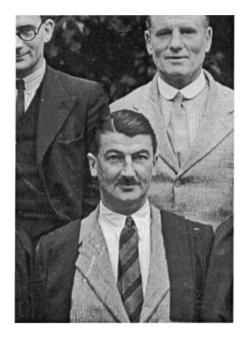
Digging to the end

A F Hall, who died in 1961, was a school teacher and an amateur archaeologist closely associated with Lexden. James Fawn, an amateur archaeologist himself.

The dedication of Camulodunum 2 published by the Trust is to three men: Christopher Hawkes, Rex Hull and A.F. Hall. As the book shows, they were responsible for much of Colchester's archaeology between the late 1920s and the 1950s. Although he was the head of the History Department at Colchester Royal Grammar School, Hall - A F to his colleagues - was surely too self-deprecating when he insisted that he was the amateur of the trio and subject to the professionalism of the two. His archaeological investigations may not have been to the standards achieved today, but he did obtain some remarkable results in the field bearing in mind that his main task was in the classroom.

Alexander Furneaux Hall was a member of a Bristol family of paint manufacturers. He completed his education at Clifton College and Cambridge just in time for the outbreak of war in 1914. As a matter of principle he chose to begin his army career in the ranks, but the heavy casualties of the conflict ensured that he was commissioned regardless. He ended the war as a major, with an MC.

He joined the school in 1926, the year in which Rex Hull became Curator of the Colchester Museum. Contemporaries who knew them both have expressed surprise that they got on with each other since they had differing characters, but obviously one link was their interest in archaeology. Hull recorded gratefully that A F 'placed his car at the service of the Curator .. conveying him on expeditions which would not otherwise have been possible.' Two such expeditions in 1929 involved excavations, a Roman kiln at Alphamstone and a site at Berechurch. These appear to be the earliest recorded digs by A F.



Also in 1929 he was one of three masters from the school who excavated in Colchester High Street at the site of the Roman pottery shop where 'fragments fell out in a tinkling shower when touched'

In 1933 the Grammar School purchased Beverley Lodge, adjacent to its premises, as an addition to its buildings and renamed it Gurney Benham House. The garden offered a splendid opportunity for excavation as it lay in the Roman west cemetery and straddled the line of the Roman road which had passed the sites of two famous tombstones, those of Facilis and of Longinus. At the request of the Museum Committee, the headmaster allowed A F to supervise the investigation of the garden between 1934 and 1938. The team of boys and masters uncovered the road in 1934/5 and showed that it had a substantial centre track (for wheeled traffic?), a lightly metalled north track (for pedestrians?) and a sand south track (for horses and livestock?). It was reasonable that this was the main road to Londinium, preceding the later one slightly to the north, now Lexden Road.

The garden also yielded a second (but single-track) road which joined the first from the north-west, a walled cemetery and other burials. A set of three furnaces on the south side of the 'Londinium road' may have been a Roman crematorium. The newly-acquired premises were thus not short of interesting features.

A F published a report on the three-tracked road in 1942, for which he was awarded the Reginald Taylor Gold Medal and Prize by the British Archaeological Association for the best piece of research work offered to the Association. He followed with a report on the walled cemetery in the

Archaeological Journal for 1944. He wrote short articles in the school magazine, *The Colcestrian*, from time to time and contributed to Hull's *Roman Colchester*.

A F investigated the garden of Gilberd House, the school premises in Beverley Road, and found not entirely convincing evidence of a third road (single track) running to the south-west. He pointed out that this lay on the alignment of the road at Gosbeck's, most recently excavated by the Trust in 1995, and so it appears on the plan in Gry of Victory, p 71.

Air raid shelters dug in the garden of Gurney Benham House in 1939 provided another section of the three-track road, but inhibited further investigation of it. Instead, A F examined the course of the north-west single-track road and after the war pursued it into the garden of No 12 Lexden Road, now, of course, the headquarters of the Trust, which is why the back lawn has so many bumps in it.

In 1938 the groundsman at the school playing field, Mr Worth, noted a cropmark at its southern end. A F found traces of wall at the time and in 1948, after the revealing dry summer of 1947, excavated enough to show that it was the site of a Roman temple, one of the ten found in Colchester.

His experience of trenches in the first world war does not seem to have dampened his enthusiasm for digging them for, in addition to his activities at the school, he investigated many of Colchester's Romano-British dykes. He discovered part of Heath Farm dyke while digging a tank-trap in 1940 during Home Guard service and with the aid of the grave-digger he followed the line of the Barn Hall Rampart in Colchester's modern cemetery.

Hall's pupils called him Hiram, presumably after the King of Tyre who gave Solomon cedar trees for the building of his temple. The reason for this Biblical nickname is not known unless it related to his stately bearing. He had idiosyncrasies; to have an altimeter in one's car seems unnecessary in the mountains of Essex, but perhaps he travelled. One ex-pupil describes his gown as disgusting, green with age and in tatters, but he may not have cared to replace it as he neared retirement in 1957.

With the labour of his excavations added to his schoolmaster's duties, it is perhaps unsurprising that he published sparingly. He joined the Colchester Archaeological Group which was formed in the year of his retirement and its Bulletin probably provided a suitable outlet as he produced three articles for it, the last being published shortly after his death at the age of 68. He was still digging to the end.

Down at the riverside

where a 200-year old water supply and a possible Roman landing area created a splash

Part of a Roman waterfront may have been uncovered during a recent archaeological investigation in St Peter's Street. It is no accident that Colchester is by the side of a river, so that discoveries of this kind are important in our understanding of how and why the town developed in the way that it did. Every major Roman town in Britain was similarly placed by the side of a river. Despite its modest size, the river Colne allowed waterborne trade not only around the coastal waters of Britain but also with the Continent via the Channel

The Roman town of Colchester started off as a legionary fortress for the Roman army. Its riverside location on the Colne meant it guarded an important river crossing, and at the same time goods could be shipped in and out of town by water. Large ships could not have penetrated far beyond the Colne estuary, so that only barges and small boats could have reached upstream as far as the Roman town and its military predecessor.

The St Peter's Street site is where the line of the main north-south street across the fortress, if projected northwards, would meet the south bank of the river Colne. Thus it is

Below Colin Austin croached on the mysterious gravel bank

Right: the wooden water-main.



possible that the site contains the remains of a Roman landing area which serviced the fortress and later the Roman town. It is therefore conceivable that it also contains part of the foundations of a bridge across the Colne which enabled the street to continue northwards.

The dig

The site is to be redeveloped so the Trust was commissioned by Jaygate Homes (the developers) to carry out an investigation. The aim was to see what, if any, archaeological remains survived on the site, and find out if they could be built over without serious damage.

Initially four trenches were dug by machine. The results proved to be very interesting. It seems that the river was closer to the town than it is today, so that the remains of the original south bank underlie the central part of the site. The early river bank seems to have incorporated an accumulation of gravel layer: of the sort which, if found anywhere ilse, we would have had no hesitation in identifying as a Roman street. An extra trench was dug to the south to test whether or not it really was a street leading northwards to the river's edge. But no metalling was found. It therefore appears that the bank of metalling was confined to the river bank, in which case it is probably the remains of a jetty or beaching area.

It should be possible to build on the site without much disturbance to the underlying archaeological remains. However, should the development go ahead, some deep holes and trenches will be inevitable, and these will be closely observed to try and find out more about this intriguing site in the Roman period.

Water-main

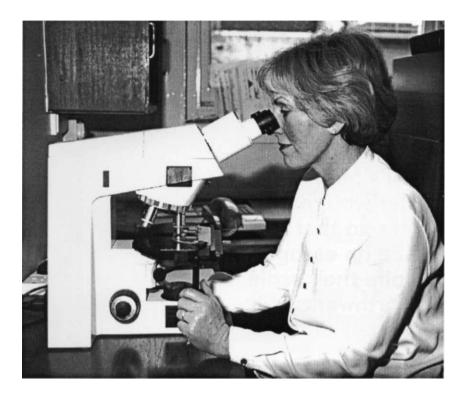
Being next to the river, the water-table is relatively high and trenches readily fill up with water. Water-logged conditions such as these suit the survival of buried organic materials like wood and leather, which in most places elsewhere in Colchester rapidly disappear. A well-preserved watermain was found on the site, cutting into the bank of gravel metalling. Although the main dates to around 1800 and is therefore relatively



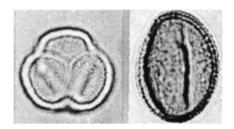
modern, it is nevertheless still of interest, particularly since it can be compared with Roman water-mains such as the one discovered at Gosbecks (see pages 18-21).

The main consisted of a series of pipes, each of which was made from a length of tree trunk, complete with its bark. A hole was bored down the centre of each trunk and one end was sharpened rather like a pencil. An iron collar was placed around the sharpened end and both were then driven into the 'blunt' end of the neighbouring pipe.

One of the last times a wooden water-main was laid in Colchester was in 1808, when the water station and two reservoirs were built at the bottom of Balkerne Lane to pump water uphill to a reservoir just behind the Balkerne Gate. The main was designed by Ralph Dodd, a civil engineer, using his own patented water-pipes. The opening ceremony was attended by the mayor of the time who later wrote that, on the first stroke of the engine, about 700 feet of the main 'rent asunder like rotten paper'. Not surprisingly, subsequent water-mains were cast iron.



Ancient pollen



Patricia Wiltshire of the Institute of Archaeology, University College London, explains how pollen from the Stanway site is revealing what the countryside around Colchester looked like two thousand years

The excavation of a medical practitioner's grave of 2,000 years ago at Stanway, Colchester, has produced many exciting finds, including a set of surgical instruments, vessels of various kinds, and a gaming board. These grave goods have enabled experts to piece together a great deal of information about the grave's occupant, but they tell us little about the kind of environment and landscape within which the 'doctor' and his patients lived.

Biological science can help the archaeologist to add colour to the picture conjured up by the artefacts. More precisely, the science of palynology (the study of pollen, spores, and many other microscopic entities) allows the reconstruction of vegetation prevailing in the landscape at any time in the past. If conditions are suitable, pollen and spores may be preserved for thousands of years in soils and sediments and, by studying these, it is possible to reconstruct past environments. We can gain information not only about the immediate locality, but also about the wider landscape. Palynology enables us to get a good idea of the activities and economy of people in the past, and the kinds of impact they had on their surroundings Within limits, we can determine the kinds of crops they grew, whether pasture was more important than arable agriculture, whether the area was wooded or open, and so on. These are important elements in building a picture of ancient people and the way they lived.

I recently assessed three sets of soil and sediment samples from the area of the 'doctor's' grave to see whether

pollen and spores had been preserved, and whether I could gain meaningful information from any that were present. I examined a sequence of sediments from a middle Iron Age ditch (2nd or 3rd century BC), another from a funerary enclosure ditch (dug in AD 25), and the soil from a turf covering the remains of a chambered grave. All contained pollen and spores which had been preserved for the last 2,000 years or so, although many had obviously lost through decomposition. Nevertheless, enough remained to enable me to gain some idea of what the landscape around Stanway was like in the middle Iron Age, as well as a couple of hundred years later around the time the 'doctor' was buried.

Preservation of pollen and spores was confined to the basal sediments in the middle Iron Age ditch. The assemblage showed that the area had been dominated by herb-rich grassland (probably pasture) with plantains, knapweed, daisies, and dandelions all growing near to the ditch. There were plants normally found in waste places and along paths, where soils are disturbed and enriched. such as mugwort and stinging nettle. Heather and bracken were also growing somewhere in the locality, and they might have been infesting pasture on the dry, acidic soils. The only woody plants to be recorded were oak and hawthorn and it is quite clear that the local landscape was largely cleared of trees. In fact, it was very similar to many areas around Colchester today, perhaps with even fewer trees.

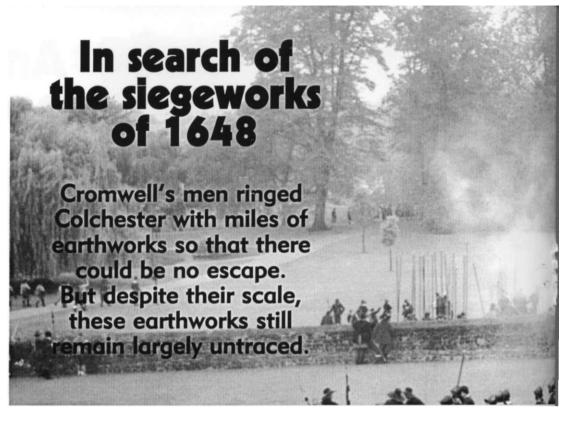
The sediments in the funerary enclosure ditch showed that the

landscape had hardly changed since the middle Iron Age. Oak and ash were growing somewhere in the vicinity (although probably a little distance away from the site) and the immediate area was covered with herb-rich grassland. However, cereal pollen was found and most of the herbs in the assemblage could also have been weeds of the cornfields. Another interesting feature was the relative abundance of bracken and other ferns, but without analysing sediments from another area of the ditch, it is difficult to know whether they were generally widespread or were only abundant close to the sampling site.

The turf sampled from chambered grave showed that portion of the grave-covering had probably been collected from an area near to the cornfields. Cereal pollen was relatively abundant and weeds such as poppy, corn spurrey, buttercup, and mugwort were present in the assemblage. These may have been infesting the crops themselves, or growing around field margins. Indicators of weedy grassland were also abundant, and the only trees recorded were oak, ash, and birch. Oak was the most abundant, but very few trees seem to have been growing around Stanway just before the Romans settled in the area.

The palynological evidence suggests that the 'doctor' had lived, and practised his skills, in an open countryside where pastoral and arable farming were well-established. Furthermore, the landscape had changed very little for at least 200 years.





Trust archaeologist Howard Brooks took to peddlling at the Colchester History Fair despite being overdressed for the job. He sold the Trust's reprint of the contemporary 'newspaper' (The Siege of Colchester 1648) giving an account of the siege in Colchester. It was on special offer that day for either a pound or a farthing (no change given).

Thanks to Costume Call of Unit A19, The Cowdray Centre, Colchester for providing the costume.

Last summer. Colchester commemorated the 350th anniversary of the Siege of Colchester, when the townspeople suffered cruelly in an eleven-week-long confrontation between the Royalist and Parliamentarian armies. The Royalists forced their way into the town against the will of the townspeople and effectively kept them hostage for the duration of the siege. Even when the Royalists eventually let them go, starved and disease-ridden, the Parliamentarians sent them back into the town thinking they were more use to them inside than out, rioting and competing with the Royalists for what little food there was in the town. And to cap it all, when it was all over and large parts of the town had been reduced to ruins, the victorious Parliamentarians levied a heavy fine on the townspeople for their supposed support of the Royalists.

The Parliamentarians constructed a ring of forts around the walled town from which they bombarded it with heavy cannon. The forts on the south and west sides were joined by a continuous trench three miles long to block off all escape routes, while forts to the north and east guarded the river crossings. Although the earthworks make up an important group of archaeological remains, they are very difficult to recognise on the ground. The sites of only two, possibly three, forts or gun emplacements have as yet been located, and the positions of the remaining 20 or so are still conjectural.

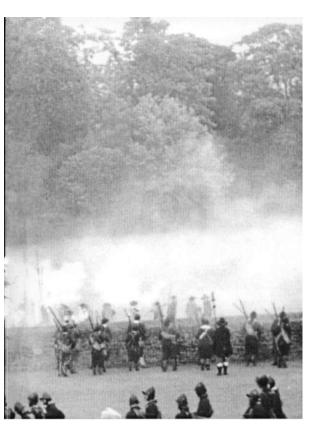
As its contribution towards the commeration of the siege, the Trust carried out a review of the evidence for the positions of the siegeworks, and incorporated a summary of the results in a special reprint of the apparently contemporary 'Diary of the Siege of Colchester' which includes the famous siege map. The review was

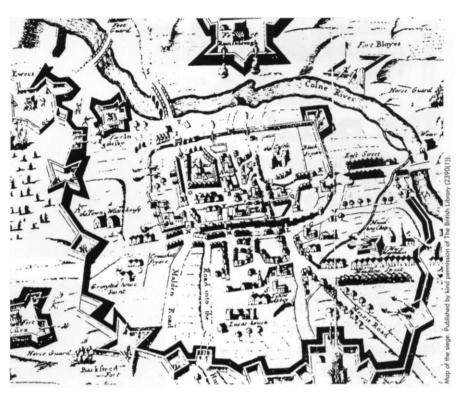
supplemented by some fieldwork on a number of sites to find out more about the siege and its earthworks.

The line of the siegeworks can be fairly well guessed at either end, ie between Lexden Road and the river Colne and between East bridge and Magdalen Street. However, the southern loop connecting these two sections is much more difficult to fix since it all depends on how close the line came to the precinct of St John's Abbey which, as a walled enclosure, was used by the Royalists as a makeshift bulwark.

In a preliminary attempt to locate this part of the line, part of the Abbey Fields was surveyed with a magnetometer. Unfortunately, the Abbey Fields has been heavily terraced over the years and many holes and trenches have been dug into it for various reasons by the army. However, some ancient features were located, although none seem likely to fit the missing line of the siegeworks. Nevertheless, the investigation did at least show that it would be worthwhile surveying a much larger area of the Abbey Fields, and it is hoped that this can be done in the not too distant future.

Elsewhere two other related investigations took place. At Brinkley Grove, an apparently ancient earthwork has mystified archaeologists for years, and was given long-term protection by being scheduled as an ancient monument. It takes the form of a large L-shaped ditch at the side of a wood. It has always been assumed that this was probably the corner of a rectangular ditched enclosure which, everywhere else, had been filled in and flattened. The only clue as to its date is contained in an account of the earthwork written in 1922 which mentions the discovery on the site of three pieces of 'apparently Bronze Age





Over 1,000 members of the English Civil War Society 'mustered' at Colchester to re-enact the Siege of Colchester and mark its 350th anniversary. Heavy rain marred the occasion but failed to dampen the members' enthusiasm or gun powder.

pottery'. The earthwork is placed at the top of a valley with a good view of the town centre, which is why there is a theory that is was the remains of Fort Suffolk, the Parliament- arian encampment shown on the siege map to the north of Ipswich Road.

To test this theory, it was decided to dig two small trenches into the earthwork, one in the bank and the other on the line of the bank where they would cause as little disturbance as possible to the plants and trees in the wood. The excavation only lasted two days, but nothing was found to suggest that the earthwork was of much antiquity. and there did not seem to be much evidence of the ditch in the trench positioned to cut into its fill. All in all, it appears that the earthwork never extended much beyond what can be seen of it now. Deeper trenches are needed to establish the date of the earthwork for certain, but these would cause unacceptable damage to the plants and trees. Until this can be done, the most likely explanation for the earthwork is that it is the remains of a clay pit connected with the manufacture of bricks and maybe tiles somewhere close by. Although not as interesting as a siege fort, the earthwork would still have some value as an example of industrial archaeology.

The best known of the siege forts lies on the Hilly Fields where, again, we have completed the first few squares of a magnetometer survey. The fort is known from aerial photography and was partly excavated in the 1930s. It is sometimes referred to as Colonel Ewer's fort, but is in fact the unnamed star-shaped redoubt

immediately south of it (see the siege map). Many of the finds from the fort are on display in Colchester Museum, and these include the head of a mattock for digging ditches, broken bits of clay pipe, and some musket balls. The fort was one of the earliest. It was built (or at least started) on the night of June 16th in 1648 on the Warren Field, the night after work started on Fort Essex which was south of the Lexden Road.

The fort was well placed to bombard the town. It was built on a high piece of land overlooking the west side of town with an especially good view of the town wall. The Parliamentarians were not the first to recognise the qualities of the location. About 1,600 years before, the hill was a major centre for manufacturing and trade in the years leading up to the Roman conquest, and a thousand years earlier still, it was the site of an important Late Bronze Age settlement (see page 8 for more details).

The magnetometer survey produced encouraging results which showed that the ground conditions favour the detection of buried features by this technique. It showed all four sides of the fort as well as part of the defences and various pits of the late pre-Roman settlement. The plan is to continue the survey in 1999 in the hope of following the ditch which linked this fort with Colonel Ewer's fort to the north. If successful, this should lead us to Colonel Ewer's fort too.

Thanks to...

The investigation in Brinkley Grove was supported and made possible by the Colchester Borough Council. The geophysical surveys on the Abbey Fields and the Hilly Fields were carried out by Peter Cott with the kind permission of Colchester Garrison and the Sixth Form College.

A special folded map has been published by the Trust to mark the 350th anniversary of the siege of Colchester. One side of the map features a reproduction of the contemporary news sheet which consists of a diary detailing the progress of the siege and the plan of the siegeworks. On the other side, there is an illustrated account of the archaeology of the event, which includes the latest view on the locations of the earthworks and a summary the Trust's most recent fieldwork on the siegeworks The map (The Siege of Colchester 1648) is avail-



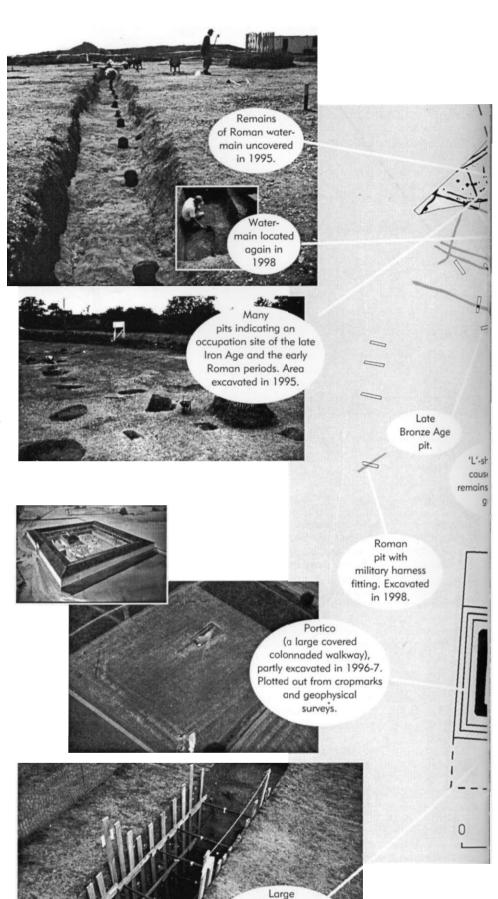
Gosbecks Archaeological Park

The puzzle of the Roman water-main

Over 250 m of water-main has been traced at Gosbecks, making it probably the longest length of Roman water-main yet discovered in Britain. But it is still not clear what the water was for and where its source was.

Gosbecks lies on the site of the centre of the original Colchester where the tribal leaders or 'kings' including the famous Cunobelin lived. Following the Roman invasion, the area became a major Romano-British sanctuary incorporating a theatre and a temple.

Today a large part of the area is covered by the Gosbecks Archaeological Park where excavations have been carried out every summer over the last four years. The creation of the park depended on land to the north being built over for houses, so that this area too has been the subject of recent archaeological investigation. Much of the previous work has been focused on the Roman elements at Gosbecks, but the recent excavations have provided opportunities to find about the nature of the site before the arrival of the Romans. Also the discovery of a Roman water-main points to the possibility of a bathhouse or waterworks in the area, and military horse fittings hint at the stationing of a cavalry unit in the nearby Roman fort. PTO.



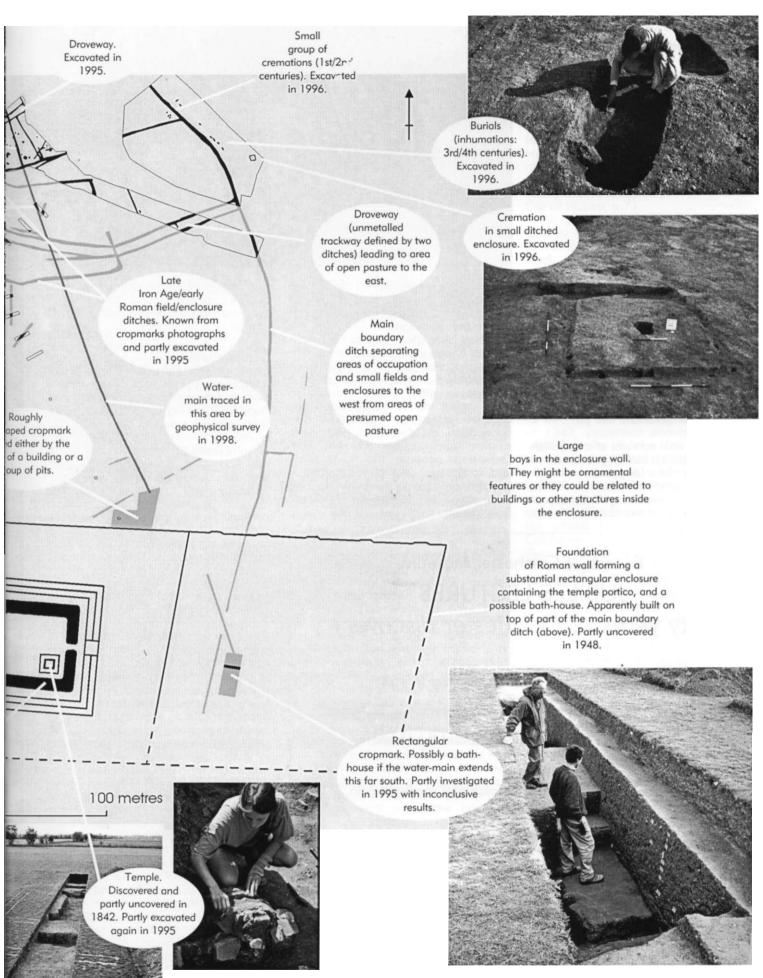
ditch (12 ft deep)

enclosing the precinct of

the temple. Probably predates

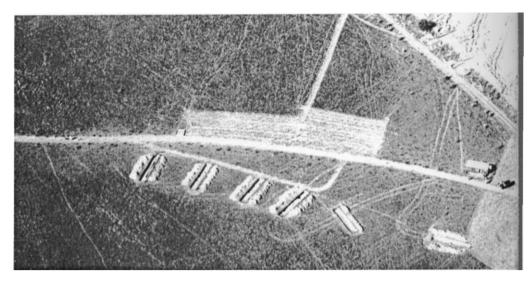
the temple and portico. Excavated in 1936 and

1997.





Latest discoveries



For the fourth summer in a row, Trust archaeologists were at work in the Gosbecks Archaeological Park, on the outskirts of Colchester. This time the task was to sample where the Colchester Borough Council is considering building a visitor centre and find out how construction work might affect the surviving archaeo-logical remains. The sampling strategy involved digging a number of trenches and test pits over a wide area.

Although little survives of any British or Romano-British buildings because of the effects of long-term plough damage, a variety of pits and ditches confirm the impression given by aerial cropmark photographs that the site was

typical of the areas around the temple and theatre. It seems that there had probably not been any major buildings within the investigation site, but the area had been given over to fields with pockets of occupation dotted around it. The occupation seems to have been concentrated to the west of a large north-south ditch which appears to have acted as a major boundary between areas of cultivation and occupation on the west and open pasture for grazing on the east. Droveways between the small fields and enclosures west of the boundary enabled animals to be taken to and from areas of pasture to the east. Droveways such as these were

unmetalled trackways defined on each side by a bank and ditch which prevented the animals from straying off course.

Cavalry equipment?

Some of the finds are of particular interest and significance. These include pieces of horse harness and the iron heads of spears and balista bolts. (Balistas were a sort of cross-bow). Bits of military equipment are often found in early levels at Colchester, but this is not surprising since the town was preceded by a large military base for up to 5,000 men and itself was populated to a large extent by retired Roman soldiers. Clearly, there must have been tens of thousands of pieces of equipment of this type in the area in the AD 40s and 50s. Although the total number of finds from the recent excavations is tiny by comparison, the proportion of bits of military equipment within that small group seems high compared with other finds which suggests that most of them belonged to soldiers garrisoned in the small Roman fort which lay about 300 m to the west. In general, it is no easy matter to infer the type of garrison in a military base from the equipment found in it, although in this case the pieces of horse harness are especially significant since they would appear to support the view that the garrison was a cavalry unit rather than an infantry one.

The fort is only known from cropmarks. No excavation has ever taken place there. It is four acres in size which is considered about the right size for a standard military unit of about 500 men but a little too small for a cavalry unit. However excavations in the 1970s and 1980s have shown that the barracks in the main fortress on the site of the Roman town (see *City of Victory*) were unusually narrow and closely packed together. If the fort at Gosbecks was similar, then its small size need not rule out a cavalry unit for

Friends of Colchester Museum JUBILEE LECTURES Fifty years of Colchester discovery

May 11th Philip Crummy on the Colchester Mercury

May 25th Ros Niblett on Iron Age Colchester and St Albans

June 8th Len Drinkle on the Friends and the Museum.

1949 to 1998

June 22nd David Clarke on the Colchester medieval coin

hoards

July 6th Jerry Heath on natural history

July 20th David Stenning on medieval Colchester buildings

Tuesdays at 7.30 pm at Lion Walk Church, Colchester

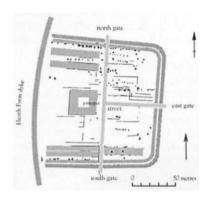
All welcome.



Excavations in the Gosbecks Archaeological Park in the summer of 1 998.

Photograph by D Strachan, Essex County Council Archaeological Section.

the garrison. And of course, we can guess which cavalry unit this would be from the fine tombstone of Longinus, found near Beverley Road in 1928. The inscription tells us that he was an officer of the First Squadron of the Thracian Cavalry. This unit was raised in Thrace, now adjacent parts of Bulgaria and Greece.



Plan of the Roman fort at Gosbecks.

Water-main

A recently-discovered Roman watermain at the ancient British site of Gosbecks is a vivid reminder of the fact that the Romans introduced much new technology into Britain. Until the arrival of the Romans, the Britons obtained their water from such places as wells, springs, and rivers. Water engineering as practised in the Roman world was unknown in Britain until after the Roman invasion in AD 43.

The Roman water-main at Gosbecks has been traced for over 250 m. It is not the first to be found from Colchester. Several examples have been found in and around the walled Roman town, although none have

been traced for anything like this distance. The interest in the main at Gosbecks thus comes not so much from the main itself, but in where it was leading and where it came from.

Water-mains such as these were designed to convey water under pressure. They consisted of a series of pipes held together by iron collars. Each pipe was made by drilling a hole down the centre of a straight piece of timber. The walls of the pipes were thick so that the collars could be hammered into them to form pressureresistant, water-tight junctions. Although the wooden pipes making up a water-main would have slowly rotted and disappeared, the position of the main is usually shown by the iron collars which still survive upright in the ground in their original positions.

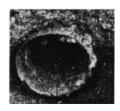
The water-main at Gosbecks was discovered in 1995 during excavations on land just north of the park that was to be built over for housing, when about 28 m of the trench which contained the main was emptied. There was no surviving wood of course but 16 iron collars were still upright in position, thus giving an average length of 1.7 m for each section of pipe.

In 1998, a short part of the watermain was found further south during the investigations on the proposed site of the new visitor centre. The watermain was then traced further south still, this time with the aid of a geophysical survey so that its position can now be plotted over a distance of 250 m.

The water-main at Gosbecks seems to stop at a spot near the head of the little valley where, on aerial photographs, there is a large L-shaped mark. The valley was a source of water in antiquity so the mark might indicate the presence of a waterworks. A small trial pits was dug inside the L-shaped mark in 1998, but it was too small to be of much help. However, there was

Right: the remains of the Gosbecks water-main showing the iron collars *in situ* on the bottom of the trench which was dug to lay the main in.

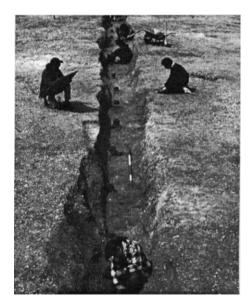
Below: close-up of an intact, well-preserved iron collar *in situ* at the Balkerne Lane site. Excavated in the 1970s. Fragments of the wooden main can be seen in mineralised form adhering to the sides of the collar.



no obvious indication of ground water in the trench, so it seems unlikely that the mark indicates the site of some kind of waterworks. Thus the valley-location of the mark may be of no significance and the water was being brought to the spot by the water-main from a source some distance to the north. This would mean that the L-shaped mark showed the site of a building such as baths or a private house.

The L-shaped mark may have something to do with a long rectangular mark about 100 m to the south-east of it. The rectangle has a short straight line leading from its north-west corner straight towards the L-shaped mark. The rectangle was investigated in 1995 when a trench was excavated across the width of it. It was suspected beforehand that the rectangle indicated the site of a building which had something to do with water and that the straight line showed the position of a drain or a water-main Various possibilities had been considered for the rectangle, such as an open-air pool, or part of a bath-house or waterworks. In the event, the rectangle proved to be a deep, verticalsided pit with substantial slots along the bottom. It looks as if it had been part of a large timber building which, given the sandy, free-draining nature of the ground, is hard to reconcile with a usage involving large quantities of water.

In Gaul, major native sanctuaries like Gosbecks frequently included bathhouses, so it would be no surprise if such a building was found here too. The tracing of the water-main this summer at Gosbecks shows that the L-shaped and rectangular marks may indeed have been associated in some way with water, but the explanation for these marks still remains a mystery which only further investigation is likely to solve.



Michael Wood

In conversation...

Television's travelling historian and best-selling author talks to Philip Crummy about his adventures making the TV series in the footsteps of Alexander the Great, which was shown in summer 1998.



I was born and brought up in Manchester and I went to university at Oxford. I did a modern history degree and then I did three years of doctoral research on the early 1 Oth century, the period of the creation of England under King Athelstan. I was nowhere near finishing it, and I just thought, I'd done a little bit of journalism and I applied for a job with a television company. I got a job as a junior reporter and, in no time at all, I found myself interviewing Arthur Scargill on the miners' strikes! I did six years of current affairs' iournalism before I said to my boss. I've got an idea for a film on Offa of Mercia...

and archaeology

I was always fascinated by archaeology, from when I was a kid. I even started doing a 'dirt' archaeology course in my spare time at Manchester, in the days when I was making films for the BBC up there. There's nothing quite like an archaeological dig, is there (laughing)?! I remember sitting camping out on the dig at Hen Domen, the Norman castle our near Montgomery around the camp fires at night, and the being with people all of whom were passionately interested in the subject.

In Alexander's footsteps we were trying to devise a kind of history-traveladventure, if I can put it that way, that would go into the kind of slot that Michael Palin does. Having made 70-odd documentaries of history, archaeology and culture, one has tried almost every form of films from almost traveladventure to detailed critiquing of archaeological sources. When we did the original Dark Ages series, we filmed a lot of archaeologists on location. In



Michael Wood, the film crew and local guides in the Khawak Pass in Afghanistan. Photograph courtesy of Maya Vision International Ltd.

Alexander the Great we did do a few sites, for example, the new excavations in Alexandria. But there aren't any really active excavations going on at the moment in Iran or Pakistan. And Afghanistan, of course, has just been devastated, so the last two years were not a good time to go if you were looking for excavations!

You can dig for the past physically, as you do, or you can excavate the past through the texts. The job that I happen to have ended up doing is being a kind of populariser - in between the general public and people like you and the textual scholars. People like me plough a furrow where we try and popularise what you lot do.

Alexander the man

I don't think the films did idealise him, looking at them all in all. In Samarkand I used a very hostile source, which has one of the most gripping portraits of him to come down to us; whether it's true or not, it's so powerful. But I'm not sure he was 'a nasty piece of work'.

The great thing is the story, you're swept along with the story in the beginning, but then gradually it starts to turn. We picked up Zoroastrian traditions in Iran which are totally unrecorded by the Greeks. There's Alexander's massacre of civilians in the Indus valley too. I told the story of the destruction of a city in Central Asia which hadn't been believed by most scholars until very recently. It's only recorded in one source, a Roman source, but there's no doubt that it happened, and now everybody's beginning to accept that it did.

I suppose it would be interesting to meet Alexander, but I found myself always sympathising with the people whose countries he was devastating, or the people who were purged by him. I think he was a man of his time, and they were brutal times.

why Alexander?

It's a fantastic story, and a very interesting biography of a very enigmatic figure. And also it is one of the great events in the history of the world really, because of its legacy - the mixing of Greek culture with Jewish and Iranian and Egyptian and Indian. And it's a tremendous adventure, the spread of Greek culture into Asia.

The reason for doing Alexander was the same as what drew me to do some earlier films in China and Iran and other places. Globalisation is happening so fast that all the traces of the ancient world are being erased. I think it's fascinating, and moving, to spend time in cultures where something has come down. Tamil culture, for example, is one of the few classical cultures which have survived to the 20th century. And probably we won't be able to see these things for very much longer.

the big adventure

We broke the journey up into bits, but we were on the road for about six months. I think it was about 20,000 miles. Obviously we did far more than that, but Alexander's actual journey given that you lose him in Tajikistan in the second year of the war in Central Asia - is probably somewhere between 17 and 20,000 miles altogether.

The film crew was Peter the cameraman, Lynette the camera assistant, John who does the sound, me, and David the director. In most countries you take a translator who is your go-

between. In the Afghanistan film, we were a four-person crew, but we had Hanif, a friend from Pakistan who works for BBC Radio. He speaks all the four main languages of Afghanistan, and he basically volunteered to do it with us.

from Greece to India

In our Alexander films there are 16 countries and four war zones. The journey goes from Greece to India, and includes the Near East, South Lebanon, and Egypt, of course. We filmed some material in Northern Iraq, but I didn't go into Baghdad because I've been involved in Iraqi human rights' work on the side for the last eight years, and I did a film called Saddam's Killing Fields about the destruction of the Marsh Arabs in South Iraq - as a result I'm persona non gratis in Baghdad, so I didn't feel it was worth the risk trying to get in there. Everything else was fine, I just don't think you mess about with Saddam.

In some cases, I think, we followed Alexander's route very accurately. I mean, take the path through the Zagros mountains, the Persian Gates; it's a very interesting part of the story, and you can actually find the exact path, as we did. The Khawak Pass over the Hindu Kush mountains, used by Ghengiz Khan and Tamburlaine, which was probably the one he took, is still there. His route across the Salt Range into the Punjab, the exact crossing place - if you follow the Greek directions - you can actually find. There were many cases where we were able to clarify the events on the ground, and find what has not been found by the scholars because of course most of them have never been there. On one very well-known part of the journey, it doesn't make sense on the map but it does make sense on the ground, and every landmark in the source is actually there! That was one case where with a little bit of ferreting with the sources you can locate the exact route, and that also goes for some major sites like the site of his great battle in the Punjab.

If I'm doing a piece about the text, then usually I scribble something beforehand - but the best bits to me were when we were bouncing the Land Rover up the Hindu Kush and you just turn round and switch the camera on and say something improvised. I think it's got more oomph than something that's over-prepared.

We stayed in private houses; we slept on people's floors, in stables, in tents on mountain-sides, on station platforms, on boats - and sometimes in hotels! I remember the hotel we had in the Kalash valleys in the North-West Frontier. It didn't have electricity or running water, but it was terrific.

Alexander's wars in the Persian empire

Alexander the Great (356-323 BC), king of Macedonia, took his army out of Greece in 334 BC, across the river Kocabas and to the towns of Sardis, Ephesus, and Miletus in Asia Minor. He moved east via the countries of Lycia, Pamphyllia and Phrygia. He won the battle of Issus in 333 BC against the Persians, and then crushed Tyre and Gaza. After winter in Egypt (332/1 BC), he invaded Mesopotamia and won a battle at Gaugamela in modern Iraq. He took Babylon and Susa. He forced the Persian Gates and occupied Persis during the winter of 331/0. At Persepolis he took the financial reserves of the Persian empire - the Persians were defeated.

But Alexander moved on, through east Iran and west Afghanistan, crossed the Hindu Kush (mountains in Iran), and invaded Bactria in spring 329. After an uprising in Uzbekistan and the battle of Samarkand, with harsh tactics he colonised his way on into India (leaving a trail of colony towns called 'Alexandria'). A brutal progress in the Punjab and then by water across to the Southern Ocean was followed by a lull in 324. Coastal conquest was continued by his fleet. He declared himself king of Asia, but caused a rift with the Greek world.

Walking across the Hindu Kush mountains, you would simply wash in the stream in the morning. Lovely!

There were a lot of hassles. We got arrested by the Iranians at one point and our film was confiscated, and of course that's the worst thing. You don't particularly fear for your own safety on trips like this, but what you fear is that all the videotape you've gone to such efforts to get will get destroyed. Or are they going to boot you out? You couldn't make an Alexander series without Iran, the centre of the story! So there were moments like that, when you think, how did we get into this? But not many.

...across the Hindu Kush

Crossing the Hindu Kush mountains was the most exciting, because we'd been in Kabul for a couple of weeks the city was under siege. refurbished a Land Rover that had belonged to a famous archaeologist in Afghanistan in the old days. We got out to the Pancheer valley, and it took us about two days to go up the valley. The vehicle broke down, and there was a landslide. We got a lift up to the point where you walk, and then you just hire horses, and they put the gear onto the panniers of the horses, and you walk. And it was absolutely wonderful. You're walking up to the pass (it's not terribly high, just below 12,000 feet), but it's wonderful air, ethereal light. The weather was beautiful - cold, but great - and you're travelling light, which is terrific, because one of the worst things about filming is the number of heavy boxes that you have to carry around

with you all the time. Each of us had just a jacket and a pullover and a small rucksack, and our pockets stuffed with dried fruit and nuts - just in case (laughing), and the lightest camera gear possible. We slept above the horses in a stable, with bowls of gruel, and I read Arrian by lamplight. We got up to the top of the pass, and, you know, it was pure elation! It was freezing, but exhilarating. At that we moment we were right there in their footsteps.

feedback

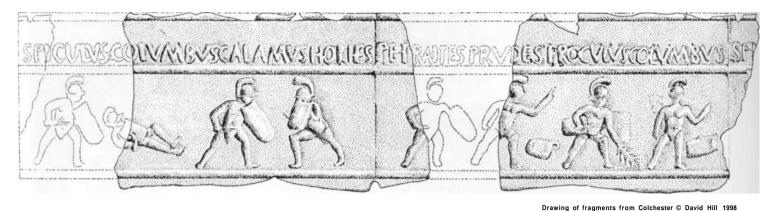
I think all my television films have got good things in them in their different ways - even the ones that didn't work. The public reaction to the Dark Ages, the very first series I made, was very warm. People still talk about it, so I always feel very fond of that. In terms of ambition, the Legacy series was the best. It's been shown in almost every country in the world, and it's been successful worldwide. There are bits of that I'm very proud of - and I still get letters from people all over the world who've seen it.

the chance to travel

I make films and I write books on history. I also run an independent film company. I've got all sorts of plans. I'm just finishing a book of stories about early British history, and especially early English history, and Englishness in relation to Britishness (a mixture of stories, famous legends, mysteries). It's not to do with TV, and it comes out in spring 1999. I'm also doing a film for BBC2, about the Spanish conquest of Mexico.

Sometimes I have a sneaking feeling of regret that I didn't continue professionally with my love of Anglo-Saxon history, although I have written one or two popular books on the subject and also one or two academic articles as well over the years. But, you know. I wouldn't have seen the things that I've seen. I would never have had the chance to travel, as I have for the last 20-odd years, and spent a lot of time in different cultures, like China, Iran, India, Egypt, Iraq, all these different places. And all those other great archaeological sites mysteries that one was fascinated by as a kid, the Indus valley civilisation, and the cities of southern Iraq, you know, Uruk and Eridu and Ur, extraordinary mystic places - to get a chance to see those has been privilege. But I love English history best of all.

Michael Wood talked to Philip Crummy over the 'phone in October 1998. Many thanks to Michael for giving some of his time to the Trust and producing such a fascinating piece.



brawing of fragments from conducted a partial film 1990

Gladiators like 'Sting' and 'Arrow' were household names in Colchester long before Gladiators on TV. David Hill shows how nothing changes and that fans could buy their 'souvenir merchandise' even in Roman days.

gladiators!

Colchester Museum is fortunate in possessing fragments from a bluegreen mould-blown glass beaker decorated with fighting gladiators. Roman glassmakers were not slow to take advantage of the increased popularity of blood games throughout the western provinces, and beakers from this same mould-type are the most common variety of the so-called 'circus beakers'.

The Colchester fragments were found in a pit dated between AD 49-60/1 and it is generally accepted that most of these beakers were made in the third quarter of the 1st Century AD Although only about two thirds of the vessel has survived, many other examples have been found in Britain and on the Continent, including an intact example found in France (now in the Corning Museum of Glass, New York), which enable us to reconstruct the missing areas.

Four pairs of gladiators are shown in different stages of fighting — Spiculus ('Sting') has defeated or possibly killed Columbus (The Dove'), whilst Calamus ('Arrow') and Hories fight defensively with their shields to the fore. On the other side of the beaker Petraites ('Rocky') has disarmed Prudes ('The Careful One'), who has dropped

his shield and submits by raising his left hand. In the final quarter of the frieze, victorious Proculus (whose nickname possibly means 'Hammer') holds his winner's palm, whilst his defeated opponent Cocumbus appeals for quarter using the same gesture as Prudes. (It seems likely that the name usually misread as Cocumbus is actually Columbus' name repeated, and the vessel may be recording the 'decline and fall' of a once famous combatant. The historian Suetonius describes how at the games the Emperor Claudius on hearing the cry 'Bring on the Dove!' replied, 'Certainly, but he'll take some catching!' which implies that Columbus may have been recently slain, perhaps by Spiculus.)

Like the famous charioteers named on other circus cups (see the Colchester Archaeologist, no 11), these gladiators were household names, a fact confirmed by by their mention in contemporary literature (not to mention graffiti scrawled on the walls of Pompeii). Petronius twice refers to Petraites' many fights 'Trimalchio's Feast' section of his Satyricon. As well as alluding to Columbus, Suetonius also mentions Spiculus, whom Nero spoiled as a favourite, conferring on him wealth,

land and property (to the author's obvious disdain). In his last desperate hours, Nero called for Spiculus to come and put an end to his life, but even he had deserted the last of the Julio-Claudians.

Unlike the charioteers, the gladiators used nicknames, which helped to mask their less than honourable status most were condemned men (and women, one should sometimes remember), or prisoners of war, given the dubious choice between execution or taking their chances in the arena They were schooled in fighting at a ludus gladiatorius, and were assigned different arms according to their skills. The gladiators on the Colchester beaker are all Samnites, fighting with a large shield (scutum) and sword (spatha), and all wear plumed helmets. Thracian gladiators fought with a smaller round shield (parma) and wielded a dagger (sica), while the Murmillones, their helmets adorned with large sea fish, were usually set

Bone figurine of a gladiator (a murmillo) from Lexden.





Fragment of painted wall plaster from Balkerne Lane, Colchester showing a gladiator (a murmillo in this case) having been defeated and dropped his shield.

against Retiarii, who used a net and trident.

The gladiatorial Hoplomachia began with grand feast for the combatants on the evening before their fights, to which the public were invited. The next day the gladiators would be driven in chariots from the ludus to the amphitheatre (the Colosseum had not yet been built at the time of these gladiators), where thev paraded hefore cheering crowd. When they reached the imperial box or pulvinar they addressed Caesar with the famous chant of: 'Ave, Imperator; morituri te salutantl' (Hail, Emperor: those who are about to die salute thee!').

The games commenced with a mock battle or prolusio with dummy or padded weapons in the manner of a warm-up before the main event began in earnest and the individual fights were often interspersed with clowns and dwarfs parodying the real gladiators' battles, or reenacting famous struggles from mythology, such as Hercules and Antaeus. Each pair of combatants had been selected by the casting of lots, and to the accompaniment of trumpets, horns, drums and hydraulic organ each duel took place, usually to the death. When a gladiator submitted (as Prudes and Cocumbus do on the Colchester beaker), it was the victor's right to choose whether his opponent was spared to fight again or dispatched, although if the emperor were present, the gladiator deferred to him, and he usually consulted the opinion of the crowd with the famous 'thumbs-up' or 'thumbs-down' voting.

The winner received a palm for each victory, but he would have to win many of these before being awarded the rudis, the wooden sword which granted him freedom from the arena. Very few gladiators, however, would have survived to enjoy retirement. The epitaph of one has come down to us, which tells how he was killed by an opponent whose life he had spared in a previous encounter. It concludes with a solemn warning to all who fought in these dreadful events: Moreo ut quis quern vicerit, occidat — give no quarter to the fallen, no matter whom he be!

For further details on this and other Roman circus beakers see 'Decorated mould-blown glass tablewares in the 1st Century A.D.' by Jennifer Price in "Roman Glass — Two Centuries of Art and Invention", edited by Martine Newby and Kenneth Painter (published by the Society of Antiquaries in 1991). The Colchester gladiator cup was first published in 'The Glass' by D.B. Harden in "Camulodunum" by C.F.C. Hawkes and M.R. Hull. Society of Antiquaries 1947.

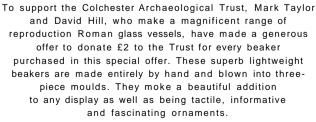
Special offer

for readers of the Colchester Archaeologist **gladiator beaker**

Following the success of last year's offer of the Colchester Olympe chariot-race beaker, readers of the Colchester Archaeologist can now purchase a version of the gladiator beaker at a similar reduced price. This reproduction is an accurate, handmade copy based directly on the Colchester fragments and other examples. The beakers are 6.6 cms high and are made in blue-green glass.

at **£1 1** each (including post & packing)

usual price £16 each (including p & p)



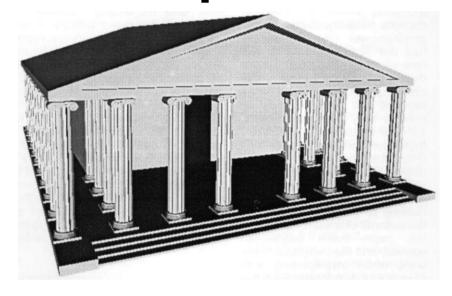
This is not an offer to be missed - and it helps the Trust as well!

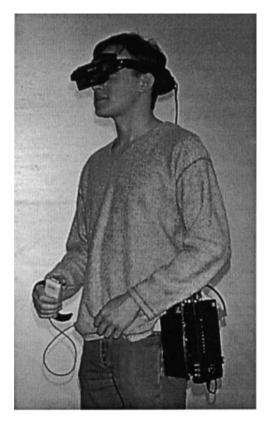


Please make all cheques payable to Colchester Archaeological Trust Ltd:
send your order, with cheque for £1 1 per item required
(inclusive of postage and packing), to
Mark Taylor and David Hill: Glassmakers,
Unit 11, Project Workshops, Lains Farm,
Quarley, Andover, Hampshire SP11 8PX.
Orders will be dispatched direct from the workshop as soon as they are
received, and will be sent individually boxed. (Catalogue sent on
request. Last year's offer of a Colchester Olympe chariot-roce beaker
is still available at the same price, ie £11 incl p & p.)

Offer ends December 1999

Stepping back into the past





Computers are increasingly being used to recreate archaeological sites for the archaeologist and the public alike. Computer modelling can be verydemanding in terms of hardware resources, even for today's PCs, so that intricate models can take a long time for a PC to produce. Adrian Clark and the VRML team at the University of Essex are working on fast, 'live' modelling so that users can wander at will inside the model. Adrian explains the way in which he plans to help visitors to places like the Gosbecks Archaeological Park literally step back into the past.

Aficionados of television programmes such as Time Team will be familiar with idea of producing computer reconstructions of buildings and artefacts based on evidence gathered from archaeological sites. These types of reconstructions are valuable in helping the viewer visualise the complete structure or artefact and how the remains relate to it. Often, these reconstructions have significant visual detail, which means that rather powerful computers are required to perform the calculations necessary to convert a three-dimensional (3-D) model of the object into a picture. In the last few years, however, the computer games market has catalysed the development of graphics cards for PCs that bring these types reconstruction within the reach of the home user. Hence, the Colchester Archaeological Trust has been working with a team of virtual reality researchers at the University of Essex for about two vears to produce computer reconstructions of Roman buildings in the Colchester area. These downloaded and viewed by anyone with an Internet connection and the appropriate (free) software.

The university team consists of the author, Dr Christine Clark (3-D modelling), Neill Newman (hardware) and David Johnston (GPS and integration). The reconstructions use the 'virtual reality modelling language' or VRML, which is a way of describing 3-D scenes to the computer. These VRML models are made available over the

World-Wide Web, an information distribution system that runs on the Internet.

Almost everyone who has used the Internet will have used a 'web browser', probably either Netscape's Navigator and Microsoft's Internet Explorer. The vast majority of web pages contain only text and pictures, so browsers have built-in facilities for viewing them. VRML models are still quite rare, so browsers use suitable 'plug-ins' to let the user view them. The best VRML plug-in for Netscape is called Cosmo Player and can be downloaded and installed free of charge from the website http://www.cosmosoftware.com/. Microsoft also have a VRML plug-in for Internet Explorer. With a plug-in installed, when a web page containing a VRML model is encountered, the model is downloaded over the Internet into the web browser and the plug-in allows the user to move his or her viewpoint around the model

Public and ceremonial Roman buildings normally follow a set of rules. One description of these rules, due to Vitruvius, has survived to the present. Armed with these and some measurements taken from the site, it is possible to produce a reasonable model of how the buildings should have looked. The university team has produced software to apply these Vitruvian rules to measurements taken from plans provided by the Trust and hence produce VRML models.

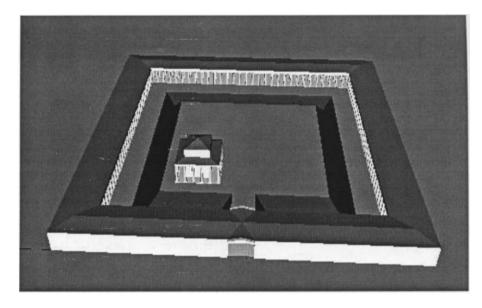
The first building modelled was the

Temple of Claudius, the remains of which were used as the foundations of the current Colchester Castle (see far left). The model uses only archaeological evidence and hence omits details like statues positioned at the top of the stairs, paint on the walls, and so on. Nevertheless, it gives a good idea of how the temple looked almost two millennia ago.

In 1998, the university team produced a reconstruction of the portico - the giant colonnaded building which is featured today in the Gosbecks Archaeological Park. A view from above the model is shown right and views from within the model are given below. As with the Temple of Claudius, the Gosbecks model deliberately omits visual detail so that it can be viewed on a PC (it is a big model). However, the model does let one gain an impression of the scale of the portico and the temple which it encloses.

Computer reconstructions such as these are quite interesting, but the problem with them is that they have to be viewed at a computer miles away from the actual archaeological site. When one visits a site, it is difficult to relate the model to the remains. (This applies even when there are models in visitor centres at sites.) At Gosbecks, where there is little visible evidence above ground, this is a particular problem.

The university team is in the process of doing something about this using state of the art computer technology. It is possible to shrink a fully-functional PC into a package of about the size of a video cassette. The idea is that a visitor to the Gosbecks site is able to carry with them a so-called 'wearable' computer, which contains the model of the site. He or she wears a virtual reality headset in which the model is superimposed - from the correct viewpoint, of course - on the real world, and this changes as the user walks around the site. Wearable computers, such as the one shown in the photograph



on the left, are a recent innovation. Currently quite bulky, they may well be little larger than a wristwatch within a decade. Indeed, much of the space in the current prototype is taken up with control unit for the headset, which tracks the orientation of the wearer's head as well as displaying the model in front of his or her eyes, and the position sensor.

We use GPS for positioning. This uses signals from groups of American satellites to calculate position and can be accurate to a few centimetres! (Global positioning system or GPS for short was originally conceived for military purposes such as cruise missiles, but is now used very widely for maritime, and even in-car, navigation.)

If you have Internet access, visit the web-site http://vase.essex.ac.uk/ to view the VRML models and to find out more about the 'virtual tour guide'. Who knows, in a few years' time, you might be walking around the Gosbecks site wearing one!

Far left: Temple of Claudius model.

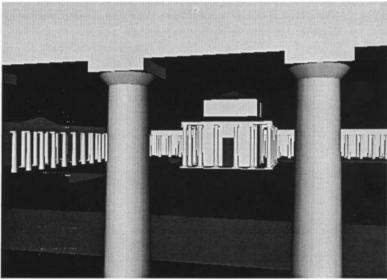
Left: a 'wearable' computer, which we are using to produce 'virtual guided tours' of the Gosbecks site, including eventually the temple, the portico, and the theatre.

Above: aerial view of the model of the portico at Gosbecks.

Below: two views from inside the model of the portico at Gosbecks.

Dr Adrian F. Clark, VASE Laboratory, Electronic Systems Engineering, University of Essex, Colchester, CQ4 3SQ.







Town life In old Essex



Nationally town centres are under all sorts of development pressures, yet heritage aspects are not to be ignored. English Heritage is funding a nationwide project on historic towns, which includes a survey of the towns of Essex. The Archaeology Section of the Essex County Council reviews the development of town life in the county.

What is a town?

The historic towns of Essex include Roman, late Saxon, medieval and early post-medieval towns, some of which are no longer urban in character. To be accepted as a 'town' for this survey, a settlement had to display five or more urban characteristics: having been granted a town charter; having town defences; having religious buildings such as a friary or temple or public buildings such as a moot hall, courthouse or market-hall; or having a role as an administrative centre.

Roman towns

The Romans introduced towns as we know them to England, although there were already some large late Iron Age settlements here. In Roman Essex, the dominant town was of course Colchester. However, there were also a number of smaller towns, many of which were based on sites previously occupied in the late Iron Age. At Great Chesterford and Chelmsford Roman occupation appears to have begun with the building of a fort, and there may also have been a fort at Kelvedon. These forts were only occupied for a short period before being each superseded by a civilian settlement. All three had defences enclosing them. There were smaller towns at Braintree and Great Dunmow. in the form of ribbon development along a routeway, with little town planning. The towns of Heybridge and Harlow seem to have had a primarily religious focus since at least the late Iron Age.

What was life in a Roman town like?

This depended on which town you lived in, with Great Chesterford or Chelmsford being considerably more sophisticated than Great Dunmow. However, they must all have served as market centres for the countryside around

them. In Heybridge, the site of the market-place has been identified by excavation, and the aerial photos for Great Chesterford suggest that all the roads led into an open space, probably a market-place. In Chelmsford there is evidence for industrial bone- and hornprocessing within the town, suggesting that live cattle were brought in for resale and slaughter. The discovery of figs, coriander, lentils, walnuts, mulberries, grapes, dates and containers for Italian wines at Colchester provides evidence for a Romanised way of life within the towns, and it is probable that the equally exotic foodstuffs found on the rural site at Boreham (including pine kernels, olives, sweet chestnuts and Mediterranean fish) came via the market at Chelmsford

Most buildings were timber-framed with plaster or wattle infill. Some had tiled roofs, but most roofs were either thatch or shingle. Only important public buildings were in masonry, like the mansio (official posting station) in Chelmsford, and temples (such as the Temple of Claudius at Colchester).

Outside the town were the cemeteries, often with little clusters of what seem to be family grave-plots. At Billericay, one group of cremation burials contained four children under the age of twelve, two young women each buried with a newborn baby (presumably childbirth fatalities), two adult men and three adult women.

Different religious practices are reflected in the archaeological record of Roman towns. There are personal religious items, such as statuettes of Venus. Offerings which were dedicated to the temples range from everyday items such as personal jewellery to specialist items such as the miniature axes and spearheads found at the temple at Harlow. At Harlow, and possibly also at Heybridge, it is thought that much of the town's economy may

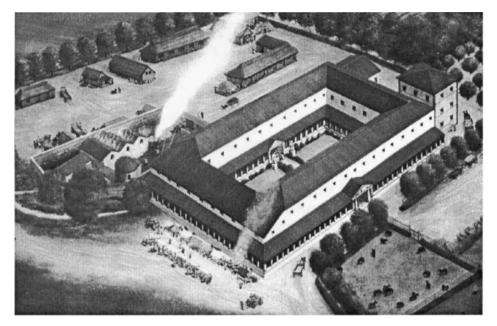
have been directed towards the manufacture and sale of specialist temple offerings. In addition there were animal sacrifices; at both Chelmsford and Great Chesterford. Bone found at the temple sites shows that young sheep from special herds were sacrificed.

Saxon towns

By the end of the Roman period, many of the towns appear to have been in decline. Although there is some evidence for Saxon activity within the Roman towns, it may not have been urban in nature. The towns that were founded during the Saxon period can be divided into three groups: those that were founded as burhs (defensive centres) by Edward the Elder at the beginning of the 10th century (Maldon, Witham), those that were based on foundations (Waltham monastic Abbey, St Osyth), and those that appear to have had a primarily market function (Horndon-on-the-Hill). All the towns were located on royal estates. The Domesday Book shows that many of the medieval towns were thriving villages by the end of the Saxon period, although not necessarily urban in character

Medieval towns

The medieval towns of Essex were mainly small market towns, but with variations. There are towns which were closely associated with castles, as at Castle Hedingham, Pleshey, Rayleigh and Chipping Ongar. There are towns which were associated with large monastic institutions as at Waltham Abbey, St Osyth and Hatfield Broad Oak. There are towns which were founded as a commercial venture (usually by the ecclesiastical authorities) as at Epping and Brentwood, which were intended to derive their income from passing trade (pilgrims



Above: Grand posting station and bath-house in Roman Chelmsford (Frank Gardiner). Opposite: Thaxted.

and weekly market rents). There are also the port towns, which include the larger ports of Harwich and Maldon and the smaller ports of Wivenhoe and Burnham-on-Crouch. Some of the medieval towns, once flourishing market towns, are now villages. Their decline was due to a number of factors, including the closure of the abbeys during the Reformation, the abandonment of castles at the end of the feudal period, and fluctuations in the Essex wool trade.

buildings were largely built of timber and plaster, with stone being reserved for the most important structures, usually churches and castles. In Saffron Walden there are 105 surviving timber-framed buildings dating from the 12th to the 16th centuries, including domestic dwellings, shops (often with residential quarters above), moot and court halls, and inns and public

buildings which could be hired out to

the guilds or for marriage-feasts or any

other public activity requiring a roof.

What was life in a medieval town like?

As in the Roman town, the medieval

The conventional stereotype of medieval life is of squalor and dirt, and this has some basis in fact. Medieval court documents demonstrate a preoccupation with discarded rubbish from market stalls and shops (in particular butchers' shops) obstructing traffic or causing a health hazard. In Saffron Walden, industrial waste (the crocus petals from the saffron industry) were piled so high in the High Street that they blocked the route. In addition the courts dealt with many cases of pigs rooting up the highway, boundary encroachments, and poor maintenance of ditches, ponds and eaves leading to surface water problems. In some towns the town 'bombey' or midden has been located. In both Maldon and Thaxted, the midden - which served as the official refuse disposal system - was located to the rear of the properties

which fronted on to the High Street, whilst in Chelmsford it was located in the centre of the market-place (presumably to encourage the market traders to use it)

Ιn addition to the people living in the town, there were horses and donkevs for transport, cats and dogs as pets, and pigs and fowl in the yard consuming refuse and supplementina household diets. At a number of towns. areas of pasture were made available for the exclusive use of the townsfolk's stock (usually cattle). In Harwich the use of the seamarshes for this purpose was known as the right of 'cowgoing'. In addition livestock was brought in

market days; Brentwood specialised as the market-place for geese intended for London whilst at Waltham Abbey cattle predominated in both places the stock was penned in yards behind the inns.

The earlier medieval period was a turbulent time. In the years immediately following the Conquest of 1066 the new Norman overlords built castles, some of which form the basis for later towns as at Rayleigh (one of the earliest Norman castles in England). Pleshev. Saffron Walden, Castle Hedingham, Chipping Ongar and Colchester. All of these towns, except Rayleigh, were also defended by town enclosure ditches. The civil war in the first half of the 12th century led to further defensive building, followed by the deliberate destruction of some castles. The Peasants Revolt of 1381 began in Essex in Brentwood, followed by other uprisings around the county, and culminated in the murders of local officials and the sacking of great houses. In Harwich the threat came from outside Essex, first from the men of Ipswich whose trade the building of Harwich had affected, and secondly from France and the Low Countries with raiding parties of 'Dunkirkers' even burning the boats at anchor in Harwich harbour itself.

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University of Essex

Archaeology for young people

STATELY HOME DETECTIVES

by Mike Corbishley

Historians often have to play detective to find out what happened hundreds of years ago. What sort of detective would you make? Find out by playing Murder in the Billiard Room. In this game, a murder has been committed in a grand, historic house and your job is to piece together the clues and catch the murderer. You can play alone or get friends or family to help.

The plot thickens

We have chosen the ruined 18th-century Appuldurcombe House on the Isle of Wight as the scene of the crime. No one lives there now, but you have to try to imagine it as a beautiful stately home owned by John and Olivia Blake. They have a maid, Jane Reynolds, and three guests, James Smith, Sebastian Fogey and Pauline Prince, who have come to stay for the weekend. On Saturday evening, a murder is committed in the Billiard Room. James Smith is dead!

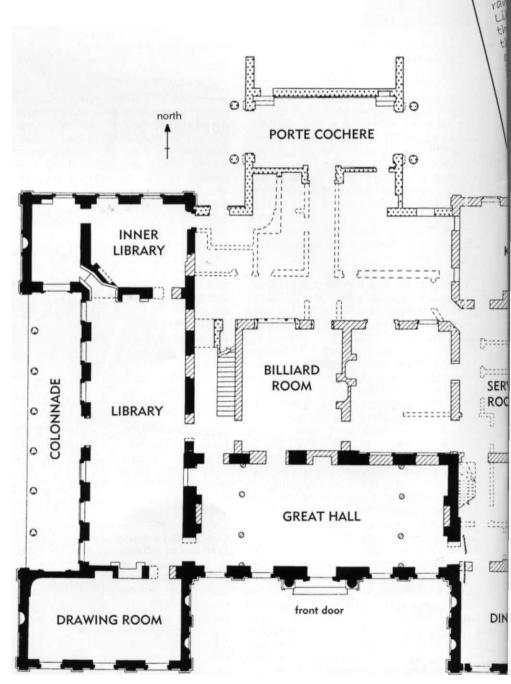
A 999 call is logged at 10.28 pm and the police - that's you - arrive at 10.45 pm. You inspect the room. James Smith is lying, shot dead in the Billiard Room, which has four doors, north, south, east and west (see plan). There is one billiard cue on the green baize table but two cigar stubs in the ashtray. There is no sign of the murder weapon.

You quickly establish that only John Blake, Olivia Blake, Sebastian Fogey, Pauline Prince and Jane Reynolds were in the house at the time of the murder: you take them into the Drawing Room one by one and take their statements (right).

You might like to use coloured counters or buttons to check the suspects' stories about how they moved round the house.

As you weigh up the evidence, your assistant tells you a gun and silencer have just been found in the bushes under the Dining Room window

Do you have enough evidence to arrest someone?



when I through

french

CHEN

G ROOM

Olivia Blake

A the Library I went
he Great Hall, opened the
indows and went out onto
indows and wear Jane clearing
indows I walked to the
sining Room and heard her
windows. I walked to the
and to bed and overheard Nor
and the bear stairs. I saw
ary. It was empty so I ran into
ary. It was empty so I ran into
ary. It was empty so I ran was
ary. It was empty so I ran

The suspects' statements

Pauline Prince

I had been embroidering this cushion cover in the Drawing Room for about half an hour when I heard a shot. I ran into the Library and called Mr Blake. We went into the Great Hall in case it came from there. That was empty so we went on into the Billiard Room where we found Mr Smith. And look - where I've laid my needlework by the ashtray in there, it's been singed by those cigar butts!

Sebastian Fogey

James wanted to practise billiards. I was going out to the porch thing, Porte Cochere I think it's called, to smoke one last cigar (Mrs Blake doesn't allow smoking anywhere but the Dining Room) and said, when I'd finished my cigar, I'd give him a game. But when I went back to the Billiard Room, he'd been shot. I went through the Service Rooms to the Dining Room, called the maid, rushed to the front door to see if anyone was escaping (there was no one) and came back again.

Jane Reynolds

I was clearing up after dinner. I took some dishes back into the kitchen then, as I was crossing the Service Rooms, I opened the door into the Hall. I could see into the Billiard Room; Mr Smith was standing with his back against the door opposite. He was talking with someone - I couldn't see who. I closed the door and went back to clearing the Dining Room. I opened the windows to clear out the cigar smoke - it makes the curtains smell terribly if you don't and Mrs Blake hates the smell. Then Mr Fogey ran in and said, 'Someone's been shot!' I ran after him and, as we passed the door of the Billiard Room I saw Mr Smith lying on the floor.

John Blake

The last time I saw James alive, all our guests were together in the Library after dinner. He said he wanted to practise his billiards. That must have been just after 10 o'clock because I heard the library clock strike. I strolled out onto the Colonnade for a breath of fresh air.

After about 10 minutes I heard Pauline shout that she'd heard a shot. I ran into the Library and we went into the Great Hall. There was no one there so we went into the Billiard Room by the east door and saw the body. A minute later, Olivia arrived through the south door of the Billiard Room and Jane through the north door. Sebastian came through the north door a minute later. I picked up

Solution

heard a gunshot from the Drawing Room! gun. It proved she couldn't possibly have was to forget to remove the silencer from the she had spent sewing. But her fatal mistake Billiards Room and she exaggerated the time there would have been no ashtray in the him to the Great Hall and Billiard Room. What tripped her up? Well, she didn't realise went to the Colonnade, called John and took Library through the open door. Then she return for his game, keeping watch from the into the bushes. She waited for Sebastian to

the police) and dropped it out of the window cigar butts and making up an excuse to give sewing (noticing the scorch marks from the the Drawing Room, wiped the gun on the by the south door, leaving it open, went to Sebastian. She put down the ashtray and left in the Dining Room, hoping to incriminate two cigar butts in an ashtray she'd picked up had used her sewing to hide the gun, plus closed it behind her and shot James. She round to the west door of the Billiard Room, When John left the Library, Pauline crept in,

the Friends of the Colchester Archaeological Trust





Friends at the Butser Ancient Farm (above) and being given a guided tour at Fishbourne Roman Palace (left).

Peter Berridge sharing the joy of 40,000-year-old flints from Clacton with Friends of CAT at the 'hands-on flints' session in Colchester museum.



Out and about...

The year started off as usual with a series of illustrated talks outlining the main discoveries of the previous year. In the past, we have come perilously close to running out of space in the Castle lecture room, so this time the event was held in the Lion Walk Congregational Church. Later in the year, there were four outings, a site visit, and a hands-on session, all of which the members seemed to greatly enjoy.

Tom Plunket of the Ipswich Museum gave a most interesting tour of his museum, and showed that there is a great deal more to Ipswich Museum than the splendid woolly mammoth which greets visitors near the front entrance.

A conducted tour of Harwich also proved most enjoyable. Friends were shown round historic Harwich by a member of the Harwich Society. We visited the Redoubt, the Electric Palace, the Low Lighthouse, and the Treadmill Crane. A most memorable day finished with a superb tea provided by the ladies of St Nicholas Church in aid of the church restoration fund.

The annual churches trip was conducted by Martin Stuchfield who is a well known expert on church brasses. Churches visited included Holbrook, East Bergholt, and Little Wenham.

The most ambitious of the trips was an all-day visit to Hampshire and West Sussex to see Fishbourne Roman palace and Butser Ancient Farm. It was a day of stark contrasts: the reconstructed round houses at Butser in which the Britons lived, and the huge, overblown palace built by the Romans to impress and intimidate their relatively new subjects. Peter Reynolds, director at Butser, gave a most memorable talk in the great roundhouse which he had largely built himself. Here he explained to an entralled audience how Butser started and how it vas not a reconstructed prehistoric farm, but an open-air laboratory. Great stuff.

One summer's evening, over seventy Friends turned out to be given a special guided tour of the Trust's excavation in Long Wyre Street (see pages 4-6). These days, it is rare to see exposed Roman remains in Colchester town centre and Howard Brooks of the Trust was glad of the chance to explain what had been uncovered.

The final event of the year was a hands-sessions called 'The joy of flints' where Peter Berridge (who is in charge of the Castle Museum) explained with infectious enthusiasm the intricacies of that most ancient of crafts, flint knapping. He insisted that we had to share the flint 'experience' by handling the flints and taking a turn to help polish a new flint axe.



future issues of our magazine Colchester Archaeologist sent to you direct, then why not consider joining the Friends of the Colchester Archaeological Trust? The Friends of the Colchester Archaeological Trust is a group which exists to keep interested members of the public in touch with the work of the Trust in and around the historic town of Colchester. Members receive a yearly magazine, attend an annual lecture about the previous year's work, are given conducted tours of current sites, and can take part in a programme of visits to archaeological sites museums, historic buildings and ancient monuments in the Colchester area and beyond.

The Colchester Archaeologist is published with funds provided by the Friends.

The annual subscription rates are as follows:

Adults and institutions £3.50
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The Essex Society for Archaeology and History: Past and Present

Chris Thornton

Founded as long ago as 1852 by forty or so Essex ladies and gentlemen who met in Colchester Town hall 'for the purpose of reading papers, exhibiting antiquities, discussion, etc', the Essex Society for Archaeology and History has had a long and productive past. The modern society aims to bring together all those who share a common interest in Essex and to support and encourage the extension of knowledge about the county's past. While it is neither as well-endowed nor as large as some long-established archaeological societies in other counties, it continues to provide many services for its c 350 personal members including a regular programme of excursions and events. Although members now tend to travel independently to meetings rather than en masse by charabanc or bicycle as they did in the past, these outings are still social as well as educational. The programme committee trys to arrange visits to places of interest to which access is normally restricted, and most trips are accompanied by an expert and Forthcoming tea. attractions in 1999 include visits to the Tudor and Georgian mansion at Gosfield Hall and one to Little Braxted Church and the detached medieval kitchen at Little Braxted Hall. In addition, the society holds an annual lecture and an annual dinner on separate occasions to celebrate the 18th-century county historian, Philip

Although the society no longer conducts archaeological excavations, its membership is still heavily involved in both original research and the dissemination of information. Each year it publishes a journal, free to full members, known as Essex Archaeology and History. The journal, typically over 300 pages long and produced to a very high standard, is full of the latest research findings and excavation reports by county historians and archaeologists. The next issue, due out in the spring of 1999, contains a wide range of interesting material including 'A Late Bronze Age hoard from Vange', 'Peasants in Essex c 1200 - c 1340', and Warwick Rodwell's nationally important article on Holy Trinity Church, Bradwell-juxta-Coggeshall. A newsletter is issued at least twice a year and the society is currently

considering the commission of a series of occasional pamphlets on special subjects which will be free to members.

Recently the society has launched a fascinating research project into the history of Essex field- and place-names (the Essex Place-Name Project, or EPNP for short) which has attracted a great deal of interest. Over 100 hundred volunteers have extracting field names from 19thcentury tithe awards for entry into a computerised database in collaboration with the Essex County Council's Sites and Monuments Record. Funding grants have been forthcoming from Essex Council, the Essex Heritage Trust and. most recently, the Council for British Archaeology 'Challenge Funding' scheme. The project is about to start publishing the tithe award details with accompanying maps in conjunction with the Essex Record Office, and an annual seminar is held with an invited expert speaker. Later stages of the project will investigate the earlier documentary evidence for the fieldand place-names and will also encompass on-the-ground inspection for landscape or archaeological features that may be linked to the recorded names.

The early archaeological collections of the society have grown into what is now the important Colchester Castle Museum, managed by Colchester Borough Council. Through a longstanding agreement with the Council, the society has accommodation for its library within Hollytrees Museum in Colchester. The society's library contains a comprehensive collection of books relating to the history and archaeology of the county, as well as the journals of many similar societies throughout Britain. It also subscribes to many specialist other publications. Members of the society can visit the library to study or borrow books.

General enquires to Honorary Secretary, 75 Victoria Road, Maldon, Essex, CM9 5HE.

Membership and EPNP enquiries: Honorary Membership Secretary, 27 Tor Bryan,



some small finds from Gosbecks





Roman

(top left): corroded iron head of a spear or a ballista bolt, and (above) a copper-alloy fitting, probably part of a military horse harness;

(top right): copper-alloy rosette brooch, and (above right) an unusual find, a copper-alloy brooch with ring.

British

(right): coin inscribed CAMV for Camulodunum, the original name for Colchester.



Colchester Archaeological Trust

Andy Letch of the Trust excavation team (above) excavating a Roman pot on the Co-op site in Long Wyre Street. Complete pots are rarely found in the town centre. This one had been buried just outside a Roman house as part of an offering to a god. The pot (left) was probably made in the 2nd century for domestic use. Its contents are to be analysed.



— and a pot in the ground!



