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CAISTER CASTLE ISSUE

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Contents

Cover Illustration:

Caister Castle, Norfolk: the classic view of the west wall and the great tower.

Editorial:
Caister Castle, Norfolk

This issue of *British Brick Society Information* is mainly devoted to two articles about Caister Castle, one of the most important surviving brick buildings constructed in the fifteenth century. Building work at Caister Castle, West Caister, Norfolk, built for Sir John Fastolf, began on 6 January 1433 and was largely complete by about June 1444. Three years of building accounts, those for 1433 to 1435, were published some 64 years ago.

The building will be well-known to members of the British Brick Society; the classic photograph of the great round tower at its north-west corner has appeared in these pages more than once and reappears within this issue of *British Brick Society Information* and on its cover. Much of this issue of *BBS Information* concerns aspects of the brickwork of Caister Castle. In the first of the two papers, Terence Smith looks at the architectural origins of Caister Castle through considering the painting by Jacob van Ruisdael of the ruined, and now demolished, castle at Egmond aaf van Hoof, Noord-Holland, Netherlands. The second paper examines where the bricks came from and how they were taken from the kiln to the building site and contrasts the arrangements made for Caister Castle with those at Cow Tower, Norwich, erected a generation earlier.

For a future issue of *British Brick Society Information*, the writer is preparing a paper which examines possible influences on the design of Caister Castle, starting with an interpretation of the plan of the triple courtyard house based on a reconsideration of the inventory taken of Sir John Fastolf's goods at Caister Castle in 1448. Published in 1827, the inventory and some associated papers have been in print for a decade less than two centuries but only in the last two decades begun to be exploited by scholars of fifteenth-century buildings.

The British Brick Society held a successful Annual General Meeting in Chichester, West Sussex, in May 2016, having earlier had a walking tour of Stourbridge, West Midlands. Brief accounts of both days are included in the present volume. Unfortunately, due to recently imposed local transport cuts, which now prevent the organiser from reaching a London venue on a Saturday before 12.15, a walking tour of Chelsea, London, on Saturday 18 June 2017 had to be cancelled. Until the transport cuts are restored, it is unlikely that the organiser of this visit will be able to arrange meetings for the British Brick Society in London on a Saturday.

Although the British Brick Society did not sponsor a session at the Leeds International Medieval Congress in July 2016, the society was present at the congress' Historical and Archaeological Societies Fair. Much interest in the society's activities was raised.

If there are sufficient contributions, the society will be able to host a session at Leeds IMC 2017 which runs from Monday 3 July to Thursday 6 July next year, with the Historical and Archaeological Societies Fair as part of 'Making Leeds Medieval' on Thursday 6 July 2017, at which the British Brick Society hopes to be represented.

The British Brick Society regrets to announce the death in early May this year of a long-standing member Maurice Page of the brickmaker, W.H. Collier of Marks Tey, Essex. A tribute follows.

DAVID H. KENNETT,
Editor, *British Brick Society Information*
Shipston-on-Stour, July 2016

Fig.1 Caister Castle: internal view of the major surviving walls and the great tower at the north-west corner.

MAURICE PAGE: A TRIBUTE

Well liked and well-known by so many, particularly those within the world of brick, Maurice will long be remembered by all of us who knew him.

He moved to Marks Tey some forty-one years ago, seeing many changed over all these years as the business became part of Salvensen, then Chelwood, finally becoming part of Wienerberger.

Throughout the well-known name of W.H. Collier remained, and when Maurice led the successful management buyout in May 2005, he understood the importance of retaining the identity, keeping alive the long-standing traditions. This he enhanced further by reintroducing their Essex Primrose brick for which W.H. Collier have always been so well-known.

Maurice was a very active member of a number of organisations that included the British Brick Society, the Brick Development Association, and the British Clayworkers Confederation.

He also had a liking from cricket, and for a number of years joined in an annual cricket match between W.H. Collier and Bulmer Brick as part of our mutual support for each other, the last two remaining brickworks in Essex.

The British Brick Society have twice had the good fortune to visit the works, firstly in 1994 and more recently on a Saturday in 2010 when Maurice again played host, showing the party around the site, explaining much of its history and equipment.

Our deepest sympathy and sincere condolences go to his wife Jan and daughters Antonia and Nikki. As to the future, our support goes to Nikki who is taking over the reins, keeping the Maurice Page name alive with that of W.H. Collier.

PETER MINTER
Bulmer Bick and Tile Co Ltd
The Brickfields, Bulmer, Sudbury, Suffolk

St Nicholas Chapel, King's Lynn

David H. Kennett

When in about 1145 William Turbe, Bishop of Norwich, laid out the second 'new town' north of the Purfleet at the soon to be renamed Bishop's Lynn,[1] he provided a second and larger market place, Tuesday Market, and a new church on its eastern side.[2] This new church was not a parish church but only a chapel of ease[3] to the older St Margaret's church[4] on the south side of Saturday Market in the town founded by the first Bishop of Norwich, Herbert de Losinga, in 1095. This first 'new town' was north of the existing settlement of South Lynn with its church dedicated to All Saints.[5] The building of St Margaret's dates from around 1100: in 1101, it and the land around were given by de Losinga to monks of the Benedictine Priory at Norwich. But its ownership by the monks lasted just over a century: in 1204, the original grant was revoked when the then bishop bought back the land south of the Purfleet. The whole town was reunited as a single parish, much as the episcopal foundation of Great Yarmouth on the east coast of Norfolk remained a single parish until well into the nineteenth century.

Of the first chapel dedicated to St Nicholas,[6] founded by Bishop Turbe in 1146, only the tower remains. This was built later than the original body of the church; its conventional dating is at the end of the first quarter of the thirteenth century, as much as three-quarters of a century after the chapel was first dedicated: liturgically, there is no direct need for a tower in Christian worship. Probably the tower was heightened about fifty years after the lower two-thirds were built; doubtless, this was to accommodate the first bells bought for the chapel. This part, constructed *circa* 1275, now houses the bell chamber.

The main body of the church was completely rebuilt in the latest fashion in the fourteen years between 1405 and when it was called 'de novo edificato' in 1419. Internally, it now appears as a great preaching space: King's Lynn had four friaries.[7] But there was a rood screen which was not taken down until 1559, following Elizabeth's church settlement.[8] At St Nicholas nave and chancel are as one with now no division apparent in the eleven bays of this building which measures 203 feet in length. With the aisles, it is 82 feet wide.[9] With a floor area of 16,646 square feet, St Nicholas bears comparison with the largest parish churches in England. St Margaret, King's Lynn, has a length of 235 feet following its rebuilding in the thirteenth century.[10] Elsewhere, just to take three churches known to the writer, the late-fourteenth-century Holy Trinity, Hull,[11] is 285 feet long by 72 feet wide, a floor area of 20,520 square feet; St Mary, Luton,[12] an early-twelfth-century church rebuilt on the same cruciform plan in the 1330s but with a new west tower, has a length of 185 feet; and the much enlarged St Nicholas, Great Yarmouth,[13] which has a claim to be the largest parish church in England, has been recorded as having a floor area of around 23,000 square feet.

The considerable floor space for a chapel of ease, especially one rebuilt barely half a century after the ravages of the Black Death, needs an explanation.

The size of St Nicholas Chapel must be seen in context. Late medieval Lynn was a wealthy town, the only seaport for both western Norfolk and the large area served by the River Great Ouse and its tributaries. Amerced in 1334 for 1,360 shillings in the first taxation levied under the new system of fifteenths in the countryside and tenths in the towns, the town registered 3,217 people paying tax in the first Poll Tax in 1377. The most complete record for the town in the subsidy payments of the mid 1520s raised £576.[14] Under all three late medieval taxation systems, Lynn was one of the dozen most prosperous towns in England, far more affluent in the three hundred years after the Black Death than its east Norfolk rival, Great Yarmouth.

Norfolk is an area with only limited supplies of good building stone. Flint is common in many medieval churches. Apart from carstone, which is restricted to a narrow and not always accessible band in west Norfolk between Downham Market and Hunstanton, every other hard stone has to be shipped in before use and even with sea transport this adds to the cost.

At St Nicholas Chapel, six western bays of the south aisle and the south porch built of stone. The five eastern bays of the south aisle, the east end and all eleven bays of the north aisle are of brick. The west wall is stone but as the lower part of the tower, this is a remnant from the late-twelfth- and early-thirteenth-century church.

The use of brick poses an interesting question: was brick the favoured material for the new St Nicholas Chapel in the first two decades of the fifteenth century, or was brick the back up material as stone had ceased to be available or became too expensive? This is a question only documents could answer and detailed building accounts from which an answer could be gleaned do not appear to have survived. What one

would like to see is that the patrons were paying for stone at one period and for brick at another. Such details would shed light on the progress of rebuilding of this important building.

This note and the question posed in the previous paragraph have been prompted by a report in September 2015 that St Nicholas Chapel is to reopen after twelve months' closure for restoration work on its fine roof: the medieval carpenters who constructed it were highly skilled craftsmen. Assault from death watch beetle had ravaged the roof timbers and the pendant angels on alternate tie beams. The restoration which cost £2.7 million was financed by grants *inter alia* from the Churches Community Fund and the Heritage Lottery Fund.[15]

NOTES AND REFERENCES

1. The name 'King's Lynn' was adopted only after an exchange of lands between the Bishop of Norwich and King Henry VIII in 1536, whereby the lands which provided the income of the bishop were exchanged for the less extensive lands of the Abbot of St Bene't at Holme, a house whose last abbot, William Repps, became the Bishop of Norwich in 1536. See W.G. Hoskins, *The Age of Plunder: The England of Henry VIII 1500-1547,* London and New York: Longman, 1976, p.138.
2. N. Pevsner and B. Wilson, *The Buildings of England: Norfolk 2: North-West and South,* London: Penguin Books, 1999, p.460. Details, otherwise not referenced for the history of King's Lynn have been gleaned from *ibid.,* 459-506. For a detailed study of the town see V. Parker, *The Making of King's Lynn,* London: Phillimore, 1971.
3. A parish church has legal rights of baptism, marriage, and burial; a chapel of ease lacks the last and very often one or other of baptism or marriage. The priest at a chapel of ease is subservient to the incumbent of the parish church to which his chapel is attached.
4. Pevsner and Wilson, 1999, pp.465-468. See also D.P. Mortlock and C.V. Roberts, *The Guide of Norfolk Churches,* Cambridge: Lutterworth Press, 2007, pp.162-164.
5. Pevsner and Wilson, 1999, p.459 for terse comment on existing settlement at South Lynn and pp.470-471 for All Saints church, also considered Mortlock and Roberts, 2007, pp.161-162, whose comments make it clear that the brickwork of All Saints church would repay detailed investigation.
6. Pevsner and Wilson, 1999, pp.468-470; Mortlock and Roberts, 2007, pp.164-166.
7. D. O'Sullivan, *In the Company of Preachers: The Archaeology of Medieval Friaries in England and Wales,* Leicester: Leicester Archaeological Monographs, 2013, pp.183-191; M. Salter, *Medieval English Friaries,* Malvern: Folly Publications, 2019, pp.59-60. A brief note on the friaries is given Pevsner and Wilson, 1999, p.461, with comments on the existing remains of the Greyfriars building on pp.471.
8. Pevsner and Wilson, p.469 note; Mortlock and Roberts, 2007, pp.164-165.
9. Pevsner and Wilson, 1999, p.58. Only the length is given *ibid.,* p.468.
10. Pevsner and Wilson, 1999, p.465.
11. N. Pevsner and D. Neave, *The Buildings of England: Yorkshire: York and the East Riding,* London: Penguin Books, 1995, p.505; D. and S. Neave, *Pevsner Architectural Guides: Hull,* New Haven and London: Yale University Press, 2010, p.39.
12. C. O'Brien and N. Pevsner, *The Buildings of England: Bedfordshire, ...,* New Haven and London: Yale University Press, 2014, p.214. From the dimensions given by Sir Charles Peers in *VCH Beds.*, **2**, 1908, p.325, an overall floor area of around 9,320 square feet may be deduced.
13. N. Pevsner and B. Wilson, *The Buildings of England: Norfolk 1: Norwich and North-East,* London: Penguin Books, 1997, p.494.
14. Figures from W.G. Hoskins, *Local History in England,* London: Longmans, tables on pp.238-239, whence also the comments in the succeeding sentence. Great Yarmouth between 1330 and 1560 suffered no fewer than seven harbours silting up, each becoming unusable until recut. It also had two severe outbreaks of the plague.
15. BBC Teletext local news: East of England, 11-14 September 2015.

PICTURING THE PAST:
A Demolished Medieval Brick Castle in the Netherlands, its Seventeenth-Century Depiction, and its Relevance to England

Terence Paul Smith

INTRODUCTION

In early January 2010 our editor, David Kennett, celebrated a significant birthday with a trip to Chicago, USA, which included a day spent in the Art Institute of Chicago, where he saw, *inter alia,* a painting of the ruined (and now demolished) brick castle at Egmond aan de Hoef, Noord-Holland, Netherlands, by the seventeenth-century artist, Jacob van Ruisdael (fig.1).[1] Intrigued by the lofty red-brick tower at the centre of the composition, David contacted me on his return to England, knowing of my interest in Dutch brickwork and in seventeenth-century Dutch painting. What, if anything, did I know of the castle and/or this depiction of it? It was a welcome query to one experiencing long hours of *ennui* in the snow-bound days of early 2010 and who had, in the words of Hercule Poirot, 'leisure — too much leisure'.[2]

From books on my shelves, I have been able to compile the following account of the artist, of the painting, and of its subject.[3] It may be of interest because there is nothing in English on this complex brick castle beyond the briefest of descriptions of its footings in guidebooks and because the building is of relevance to at least one English brick castle.

JACOB VAN RUISDAEL (1628 or 1629-1682)

Jacob Isaacksz. van Ruisdael belonged to a Haarlem, Noord-Holland family of painters of the Dutch 'Golden Age' (*Gouden Eeuw*), which included his father Isaack Jacobsz. van Ruisdael (1599-1677), his uncle Salomon van Ruysdael (?1600/03-1670), and his cousin, Jacob Salomonsz. van Ruysdael (1629/30-1681).[4] The family name (spelled in both ways recorded here) is connected with Ruisdael (or Ruisschendaal) Castle in the neighbourhood of Blaricum, Noord-Holland.[5] Sometime after 1590 Jacob van Ruisdael's grandfather settled in nearby Naarden, but the father and uncle moved to Haarlem, probably *circa* 1616. The father was a framemaker as well as a painter; sadly, none of his works are known, so that we cannot judge how far he influenced his son, though the latter was certainly influenced by his uncle.

Jacob van Ruisdael was born in 1628 or 1629 in Haarlem, where he worked before moving to Amsterdam *circa* 1656. He was precocious, his earliest known paintings being dated 1646, when he was a youth of only seventeen or eighteen. He died in 1682, probably in Amsterdam, and was buried in St Bavo's Church, Haarlem, which he had drawn and painted on several occasions, for example in his panoramic *View of Haarlem with the Bleachfields* (*circa* 1670-75).[6]

He has been described as the 'greatest and most versatile of all Dutch painters'.[7] Unfortunately, his last works lack the emotive power of the earlier paintings, the late landscapes of Amsterdam, for instance, being especially bland. It is a sad conclusion to the career of one who began so early, who achieved so much, and who died in his early fifties.

But he was not without influence: on his pupil Meindert Hobbema (1638-1709) and others, inside and outside the Netherlands, and not least, if belatedly, on the beautifully evocative landscapes and seascapes of the nineteenth-century *Haagse School* (Hague School).[8]

THE PAINTING

Ruisdael's *Ruïne van Kasteel Egmond* (*Ruin of Egmond Castle*) is in oil on canvas and is of horizontal (landscape) format 129.9 × 98.9 mm (approx. 51 × 39 inches). It is signed 'JvR' at bottom right. It is undated but may be assigned to the 1650s. It was J.G.N. Renaud, the excavator of the castle, who first identified the painting as being of Egmond.[9] And yet, as with all such paintings, it is important to remember that it 'is not intended as a topographically accurate depiction of the castle and its setting'; specifically, the 'impressive hill, which [Ruisdael] painted behind the ruins is fanciful [*berust ... op fantasie*]'.[10] It is possible too that Ruisdael

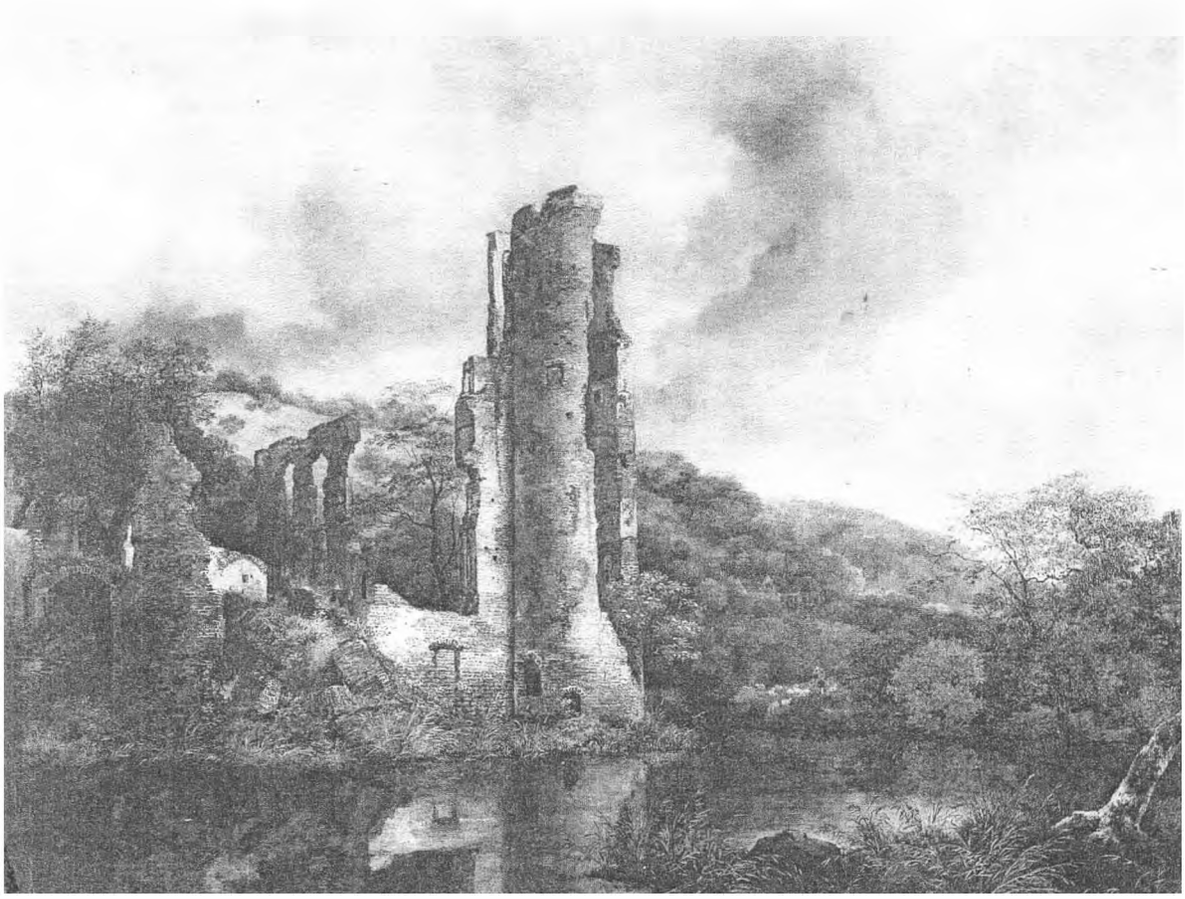

Fig.1 Jacob van Ruisdael, *Ruin of Egmond Castle,* 1650s, oil on canvas, Chicago: Art Institute of Chicago, with the dominant south-east tower of the main building (*cf.* fig.3).

has exaggerated, for dramatic effect, the *height* of the tower — contrast figures 1 and 3: the latter, drawn on site, appears to show it somewhat shorter. Ruisdael, one should remember, was not a topographical recorder in the manner of, say, Paul Sandby (1730/31-1809) or J.C. Buckler (1793-1894 [*sic*]) in England.

In front of the (imaginary) hill, the painting is dominated by the tower, identified by Renaud as the south-east tower of the main castle building (fig.2, top right), which divides the composition into halves. To its left are other ruined walls and blocks of brickwork tumbling towards the moat, which occupies the foreground and in which the castle ruins are reflected. The outer bank of the moat, at bottom right, serves as a *repoussoir.* The picture includes a shepherd tending his sheep (indiscernible in reduced monochrome reproduction, as here) right of the tower and just above the moat but dwarfed by the tower and the hill; his red jacket provides the only bright colour in the painting. Over all, and occupying about half the composition, is a typically Dutch liquid sky.

But if the painting is more than a topographical record, what does that *more* amount to? In the first place, the picture has close affinities with the artist's dune and forest landscapes, without, strictly, being either. We may thus apply to it some words of Wolfgang Stechow on Ruisdael: 'a *rara avis* among Dutch seventeenth-century painters who by minimizing the role of man [in such paintings] sometimes achieved a ... near-romantic effect', which in this case is heightened by the ineluctably nostalgic aspect of the ruin.[11] No wonder that Ruisdael appealed to such artists as J.M.W. Turner (1775-1851). But there may be (or may have been at the time) other renonances too.

In the troubled early twenty-first century it is, perhaps, natural to see it — with its dark, louring clouds over a ruined building — as a kind of *memento mori,* an expression of the transitoriness of human life and achievement, which was, indeed the dominant twentieth-century interpretation: 'the moral message of the uncertainty and impermanence of all things earthly'.[12] But a different understanding is also possible as E. Haverkamp-Bergemann has insisted: because *something* survives, such paintings 'may also be interpreted as the visible demonstration of the *endurance* of human creations'.[13] My inclination is to accept the earlier

interpretation.[14] The work is, in other words, what is known as a *vanitas* painting — though the term is typically used only of still-lifes.[15] The term picks up the words of Ecclesiastes 1.2: 'Vanity of vanities, saith the Preacher, ... all is vanity'.[16] Inhabitants of the Protestant (predominantly Calvinist, though generally religiously tolerant) Dutch Republic knew Scripture, and in particular the Old Testament, in a way that we no longer do.[17] And Ruisdael's painting of a ruined high-status building (as others of his depictions of ruins) may well have recalled further texts: 'How are the mighty fallen' (II Samuel 1.25) and 'Ichabod ... The glory has departed ...' (I Samuel 4.21).[18] The picture thus becomes a comment on the *hubris* of mankind, perhaps even suggesting, in the centrally placed lofty tower, that other aspirant brick tower which, Bible readers are told, God brought to deserved destruction — the Tower of Babel (Genesis 11.1-9).[19] But let us turn from such speculations to the castle itself.

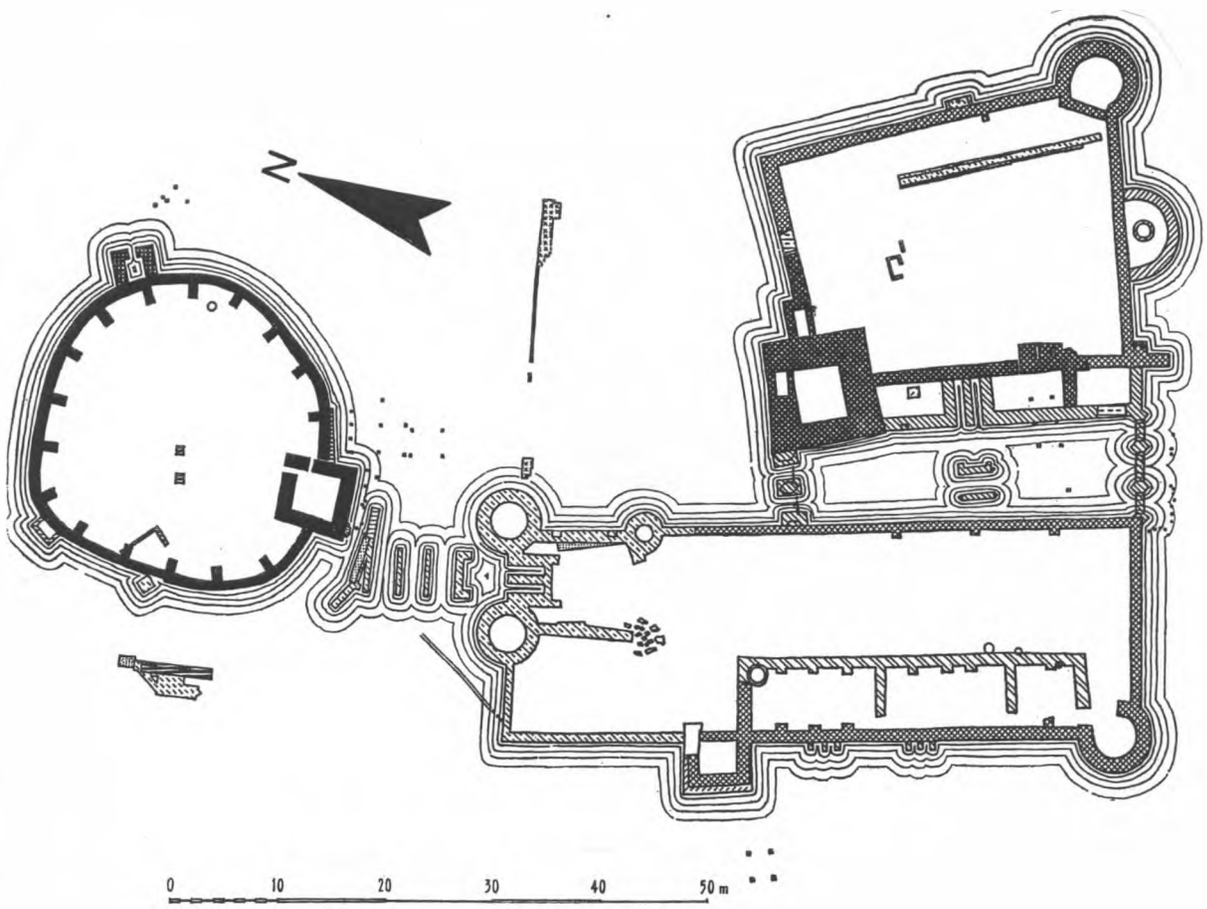

Fig.2 Egmond Castle: plan.

EGMOND CASTLE

Egmond Castle, 4½ miles (7 km) west of Alkmaar and 2½ miles (4 km) from the North Sea coast, was built for the lords (later counts) of Egmond. In all periods, from the thirteenth to the sixteenth centuries, it was constructed of red brick. There are now no upstanding walls, only excavated footings (fig.2).

The older part, north of the site (fig.2 left), probably dates from *circa* 1210 or 1220, making it one of the earliest brick buildings in the province of Holland.[20] Its bricks, as commonly in early Dutch brick buildings, are of large format, measuring 310-330 × 150 × 80 mm (12¼-13 × 5⅞ × 3⅛ inches).[21] These large bricks were first used in monasteries and are therefore known as *kloostermoppen* — 'monastery bricks'.[22] The early building, like the rest of the castle, was surrounded by a lake-like moat and comprised an irregular ring-wall (*ringmuur*) with internal supports for a wall-walk.[23] On the south side, athwart the ring-wall, was a square dwelling-tower (*woontoren*). Later in the thirteenth century a small square tower, probably for a garderobe, was provided. This round castle must have looked like the contemporary but slightly larger and

more regular brick castle (partly rebuilt later in the century) at Teylingen, Zuid-Holland.[24]

In the early fourteenth century the early castle was replaced, or possibly augmented, some 130 ft (40 m) to the south, by a stout square keep (*hoofdtoren*) with walls between 7 and 10 ft (2.1 and 3 m) thick. Parts of the flanking footings exist to the east and south, the western side of the *enceinte* including a gatehouse: the full picture of this phase of construction, however, is not clear, for later in the same century there was more rebuilding. The result was a sub-rectangular building with the earlier keep at the north-west and a three-quarter round tower at the south-east. It is this that is depicted in Ruisdael's painting; the interior of the tower is shown in one of his drawings (fig.3); another shows it in the background of a depiction of the badly damaged east wall of the main building.[25]

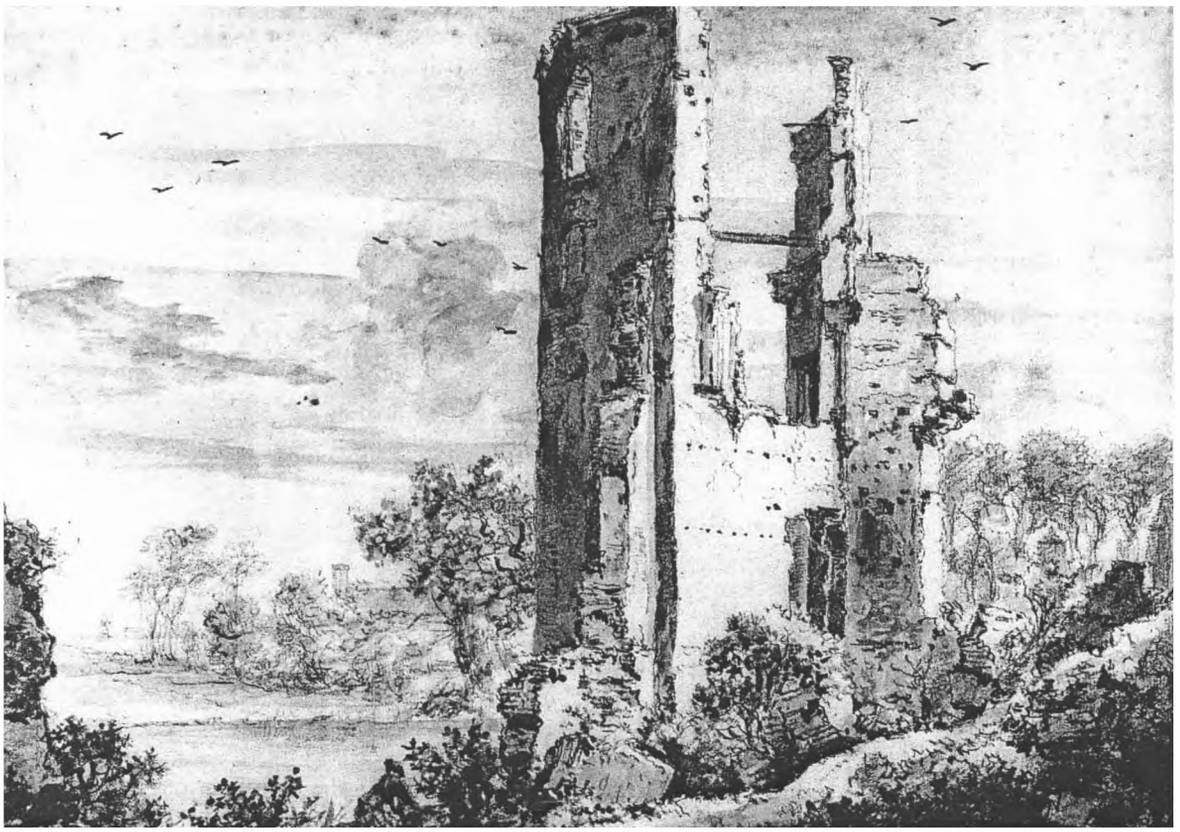

Fig.3 Jacob van Ruisdael, *The Ruin of Egmond Castle,* mid-1650s, black chalk and grey wash on paper, Groningen: Groningen Museum, showing the interior of the south-east tower of the main building (*cf.* fig.1).

It is strikingly reminiscent of the north-west tower of the brick-built Caister Castle, Norfolk, of 1432-?1446 (fig.4). W.D. Simpson compared the Caister tower to that at Schloss Kempen in the German Rhineland and the general form of Caister to Rhenish *Wasserburgen* (water-castles).[26] Colin Platt finds this interpretation 'over-ingenious', and some others have been less than warm in their reception of it.[27] More positively, Stuart Rigold wrote of the 'water-castles with two moated enclosures, after the Dutch or German pattern, that occur occasionally in eastern England, the finest being Sir John Fastolf's castle at Caister ...'.[28] I am inclined to accept Simpson's thesis, so long as one extends the area of influence, as Rigold does, beyond the Rhenish *Wasserburgen* to include the cognate Dutch *waterkastelen.* Egmond certainly offers a geographically closer parallel to Caister than Schloss Kempen. One may add that the low-lying nature of the Dutch landscape — albeit disguised by that imaginary hill in Ruisdael's painting — made it a natural context for the development of this type of castle, which may indeed have originated with round water-girt examples like the earliest phase of Egmond.[29]

Contemporary with the fourteenth-century *enceinte,* and to its west, was a large rectangular barbican (*voorburcht*), with fairly thin walls and a three-quarter round tower at the south-west and a square tower at the

north-west. The barbican must have been entered through its north side, though no footings survive. The south-west tower of the barbican appears in the foreground of one of Ruisdael's drawings, the foreground of which shows the severely damaged south-west angle of the main building; the tower was lower than that at the south-east angle of the main building and appears to have had its topmost stage corbelled out.[30]

In (probably) the early fifteenth century a semi-circular well-tower was built against the south wall of the main castle, and somewhat later in the same century the west frontage of the latter, including the gatehouse, was remodelled. By then, the bricks were of smaller format in conformity with a general diminution of brick sizes in the fourteenth-century and later.[31]

In the early sixteenth century the barbican was extended to the north and was connected by a bridge, on brick piers, to the earlier round castle. Asymmetrically placed at the northern end of the new rectangular enclosure was a strong gatehouse with large drum towers at the front and smaller circular towers at the rear. The front of the gatehouse, with outer walls and towers in the background, is shown in an engraving after a drawing by A. Rademaker.[32] There was provision, between the drum towers, for a turning-bridge, a form of drawbridge in which two counter-weighted beams descended into slots within the gatehouse passage.[33] Also in the early sixteenth century were internal alterations to the barbican.

Like some other castles in this low-lying region, Egmond was built on marshy ground, and the problem of stability that this presented was overcome by 'the laying of a stout platform of beams on which the first course of bricks was laid'.[34]

In 1573-4 the castle was occupied by Spanish troops.[35] Shortly after their leaving, it was set on fire by Diederik Sonoy, Governor of Noord-Holland, to prevent any further occupation by the Spaniards.[36] It was left as an uninhabitable ruin, though with some of its walls still standing, as shown by Ruisdael's painting and drawings and in various other illustrations.[37] The whole was demolished *circa* 1840, but the foundations were excavated in 1933.[38] Since the footings are all that we now have, Ruisdael's painting is of particular value (always remembering that it *is* a painting, not a photograph) in helping us to picture what this medieval brick castle looked like.

To the west of the castle is the brick-built Dutch Reform church, which in the Middle Ages served as the castle chapel. It too was burned in the 1570s, but was rebuilt in 1633. The interior, though added to, 'still has the atmosphere of the castle chapel'.[39]

CONCLUSION

As stated, this contribution has been compiled from books on my shelves — which irresistably prompts a further quotation from the 'Queen of Crime', particularly pertinent to myself: '"You could read about it in a book," said Terence'.[40] Since only the excavated footings remain, this is not the flaw that it would be had I been writing of a *standing* building that I had not bothered to visit.[41]

NOTES AND REFERENCES

1. Art Institute of Chicago, catalogue no. 47,475. The painting is reproduced, in colour, in S. Slive and H.R. Hoetink, *Jacob van Ruisdael,* Amsterdam: Meulenhoff/Landshoff, 1981, p.64, with (Dutch) text at pp.65-6; this is a translation by F.J. Duparc and H.R. Hoetink of the English edition, New York: Cross River Press, 1981, which I have not been able to consult. Both are catalogues of an exhibition held at the Mauritshuis, Den Haag (The Hague), 1 October 1981 - 3 January 1982, and at the Fogg Art Museum, Harvard University, Cambridge MA, 18 January - 11 April 1982.
2. A. Christie, *Mrs McGinty's Dead,* London and Glasgow: Collins, 1952 and subsequent editions, chapter 1.
3. 'Ah yes,' says Poirot disparagingly, 'things out of books': *ibid.,* chapter 6.
4. Ruisdael's life and work are discussed in Slive and Hoetink, 1981, *passim.*
5. *Ibid.,* p.17.
6. Colour photograph in *ibid.,* p.127; the best painted depictions of the church are by the architectural painter Pieter Saenredam (1597-1665).
7. I. Chilvers, ed., *The Concise Oxford Dictionary of Art and Artists,* 2nd edn, Oxford and New York: Oxford University Press, 1996, p.465; for confirmation see the paintings by Ruisdael and others in P.C. Sutton and J. Bruyn, *Onze meesters van het landschap: schilderijen uit de Gouden Eeuw,* Zwolle: Waanders, 1988, *passim.*
8. R. de Leeuw, J. Sillevis and C. Dumas, eds, *The Hague School: Masters of the 19th Century,* London: Royal Academy of Arts in association with Weidenfeld and Nicolson, 1983, and J. Keirs *et al., Een eeuw apart: het Rijksmuseum en de Nederlandse schilderkunst in de 19de eeuw,* Amsterdam: Rijksmuseum-Stichting, 1993.

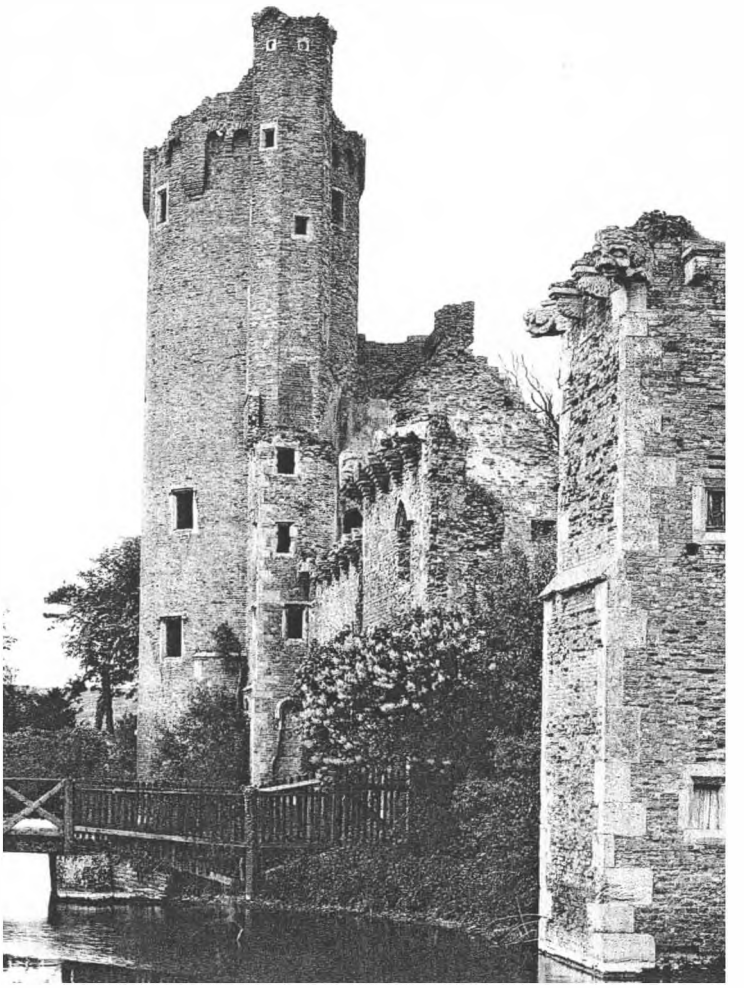

Fig.4 Caister Castle, Norfolk: north-west tower.

9. J.G.N. Renaud, 'De iconografie van het slot te Egmond', *Maanblad voor Beeldende Kunsten,* **17,** 1940, pp.339-41. Earlier, it had been assumed to be of Brederode Castle — of which there are impressive remains open to the public — at Santpoort, 3 miles (5 km) north of Haarlem. Ruisdael did paint Brederode *c.*1655: Slive and Hoetink, 1981, p.65, fig.26 with text at p.66; his pupil Hobbema painted it in 1671: W. Stechow, *Dutch Landscape Painting of the Seventeenth Century,* 3rd edn, Oxford: Phaidon, 1981, p.155; M.M. Kahr, *Dutch Painting in the Seventeenth Century,* corrected edition, New York, etc: Harper and Row, 1982, p.220, fig.168.

10. Slive and Hoetink, 1981, p.66.

11. Stechow, 1981, p.111; the unthinking sexism of 'man' was, of course, normal at the time.

12. H. Guratzsch, *Painting of the Low Countries,* English edn, London: Jupiter Books, 1981, p.287; perplexingly, these exact words are also in Kahr, 1982, p.214.

13. Slive and Hoetink, 1981, p.66 (my italics).

14. The case is put persuasively in R.H. Fuchs, *Dutch Painting,* London: Thames and Hudson, 1978, pp.131-5.

15. But see Kahr, 1982, p.214 on the Detroit version of Ruisdael's *The Jewish Cemetery,* (*cf.* n.18 *infra*): 'among the motifs [of the painting are those] that lend themselves to the overall idea of *vanitas* .... This is a theme frequently [depicted] in Dutch still-lifes, but it is rare to have a landscape painting that can be so clearly read as having the same moralizing intention'. At p.15 she perceptively suggests that perhaps 'such considerations enriched ... Dutch landscape painting to a degree that has not been fully recognized'; and on the moral (allegorical, symbolic) meaning not only of still-lifes but also of landscapes see J. Rosenberg, S. Slive and E.H. ter Kuile, *Dutch Art and Architecture 1600-1800,* Pelican History of Art, 3rd edn (1977), new impression, New Haven CT and London: Yale University Press, 1993, p.168.

16. The point is explicit in a late still-life by Jan van der Heyden (1637-1712), *Room Corner with Curiosities* (1712): amongst exotic objects, and offering comment on them, is a Bible open at the beginning of Ecclesiastes: colour photograph in M. Westermann, *The Art of the Dutch Republic 1585-1718,* London: Weidenfeld and Nicolson, 1996, p.58, with discussion at pp.59-60.

17. There are valuable accounts of religion in the Dutch Republic in P. Zumthor, *Daily Life in Rembrandt's Holland,* trans.S.W. Taylor, reprinted edn, Standford CA: Stanford University Press, 1994, pp.79-94; and in J.L. Price, *The Dutch Republic in the Seventeenth Century,* Basingstoke and London: Macmillan, 1998, pp.86-107. Roman Catholics were tolerated, such as the Utrecht painter Hendrick Terbrugghen (1582-1629), as, remarkably for the time, were Jews, including the far from Orthodox Baruch Spinoza (1632-1677), 'the noblest and most loveable of the great philosophers': B. Russell, *History of Western Philosophy* (1946), London: George Allen & Unwin, 1961, p.552.

18. This is clearest in the two versions of *The Jewish Cemetery*: colour photographs in Slive and Hoetink, 1981, pp.67, 76; but for a note of hope (especially regarding the version in the Detroit Institute of Arts) see J. Kiers and P. Tissink, *The Golden Age of Dutch Art: Painting, Sculpture, Decorative Art,* London: Thames and Hudson, 2000, p.227.

19. [For a recent discussion of the Tower of Babel, including the art generated by it, see the contributions to the section entitled 'The Tower of Babel' in I.L. Finkel and M.J. Seymour, eds,, *Babylon: Myth and Reality,* London: The British Museum Press, 2008, pp.124-141. DHK]

20. J. Hollestelle, *De steenbakkerij in de Nederlanden tot omstreeks 1560,* 2nd edn, Arnhem: Gysbers & Van Loon, 1976, p.113.

21. *Ibid.*, p.77.

22 *Ibid.*, pp.20-21.

23. The present description is based on P.E. van Reijen, *Middeleeuwse kastelen in Nederland,* 4th edn, Haarlem Fibula-Van Dishoek, 1979, pp.59, 97-8, 151. The fullest account is J.G.N. Renaud, 'Uit de bouwgeschiedenis van het Slot op den Hoef [= Egmond]', *Bulletin van de Koninklijke Nederlandse Oudheidkundige Bond,* 4th series, **4,** 7, 1938, pp.65-83. The layout and moat are shown in an aerial photograph — unfortunately reversed — in E. Elzenga, *Nederlandse monumenten in beeld: Noord-Holland / Zuid-Holland / Zeeland,* 2nd edn, Boorn: Bosch & Keuning, 1978, p.114; there is a slightly less satisfactory aerial photograph, but the right way round, in H.M.J. Tromp, *Kijk op kastelen,* 2nd edn, Amsterdam and Brussels: Elzevier, 1980, p.62.

24. As noted in Tromp, 1980, p.62; there is a plan in van Reijen, 1979, p.61 and an aerial photograph at p.63; there are two excellent photographs, one showing the wall-walk, in A.I.J.M. Schellart, *Kastelen,* Deventer: Ankh-Hermes, 1974, pp.140-141.

25. Slive and Hoetink, 1981, pp.200, 198; both drawings are in black chalk with grey wash: 'chalk' in this context is not used in its geological signification but refers to soft dark stones such as carbonaceous shale.

26. H.D. Barnes and W.D. Simpson, 'Caister Castle', *Antiqs J.,* **32,** 1-2, 1952, pp.35-51; W.D. Simpson, *Castles in England and Wales,* London: B.T. Batsford, 1969, p.137.

27. C. Platt, *The Castle in Medieval England and Wales,* London: Secker and Warburg, 1982, p.167; M.W. Thompson, *The Decline of the Castle,* Cambridge: Cambridge University Press, 1987, p.81; N.J.G. Pounds, *The Medieval Castle in England and Wales: a Social and Political History,* Cambridge: Cambridge University Press, 1990, p.270.

28. S.E. Rigold, *Baconsthorpe Castle, Norfolk,* London: HMSO, 1970 edn, p.7; *cf* R.A. Brown, *English Castles,* 3rd edn, London: Batsford, 1976, p.139, which is more receptive to Simpson's thesis than the works cited in n.27. See also H.G. Slade, 'Caister Castle', *Archaeol.J.,* **137,** 1980, p.295, and A. Hawkyard, 'Sir John Fastolf's "Gret Mansion by me late edified": Caister Castle, Norfolk', in L.M. Clark ed., *The Fifteenth Century V: Of Mice and Men: Image, Belief and Regulation in Late Medieval England,* Woodbridge: Boydell and Brewer, 2005, pp.39-67. I am grateful to David Kennett for this last reference.

29. van Reijen, 1979, pp.54-70.

30. Slive and Hoetink, 1981, p.202.

31. Hollestelle, 1976, p.82.

32. Reproduced in van Reijen, 1979, p.97.

33. For this and other drawbridge types: J.R. Kenyon, *Medieval Fortifications,* Leicester and London: Leicester University Press, pp.90-93.

34. van Reijen, 1979, p.151.

35. It is interesting that at this late period medieval castles could still play a significant military role, though largely superseded by triangular bastions and associated elements spread low over the landscape. For a succinct general account: I. Hogg, *The History of Fortification,* London: Orbis Publishing, 1981, p.110-131; for the Netherlands specifically: W.H. Schukking, *Vestingwerken in Nederland,* Zutphen: Uitgeverij Terra, 1988, p.42-69.

36. Tromp, p.62; Slive and Hoetink, 1981, p.66. The context for this is the Dutch Revolt against Spanish hegemony, specifically the Second Revolt of 1569-76, for which see G. Parker, *The Dutch Revolt,* pbk edn, Harmondsworth: Penguin Books, 1979, pp.118-168.

37. Besides those already cited, there is an engraving by H. Spilman after a drawing by Cornelis Pronk in Tromp, 1980, p.62.

38. Renaud, 1938, pp.65-83; van Reijen, 1979, p.98; Slive and Hoetink, 1981, p.66.

39. G. Verheul, *De oude dorpskerken: boven de grote rivierien,* Haarlem: De Haan, 1982, p.184; the words are repeated in G. Verheul, *Een zwerftocht langs tien yaar kerkepad,* 2nd impression, Kampen: Uitgeversmaatschappij J.J.H. Kok, 1986, p.139.

40. A. Christie, *The Hollow,* London and Glasgow: Collins, 1946 and subsequent editions, chapter 5.

41. Saving me, I hope, from a stricture from A.E. Houseman, *A Shropshire Lad,* LXII, line 1: 'Terence, this is stupid stuff'!

Contrasts in Procurement, Contrasts in Transport: Caister Castle and Cow Tower

David H. Kennett

INTRODUCTION

Caister Castle, West Caister, Norfolk,[1] and Cow Tower, Norwich,[2] the two late medieval buildings considered in this study, have many things in common, not least being early examples of the use of brick, but also significant differences, amongst which are purpose, patronage, and date (see below). Significantly, both buildings have surviving building accounts but these are partial: the first three years for Caister Castle[3] from a probable period of twelve years of construction, and a single year, possibly the final year of building activity, at Cow Tower.[4] Both accounts have been printed in full. From these, the source or sources of the bricks used by the builders of these two structures can be elucidated and it is possible to investigate the means whereby the bricks were transported from kiln to site.

Fig.1 Late nineteenth-century photograph of the west wall and north-west tower of Caister Castle, West Caister, Norfolk. The original is sepia-coloured. The rectangular building in the foreground is a garderobe tower connected to the first-floor great chamber in the south wing.

THE BUILDINGS: PURPOSE, PATRONAGE AND DATE

Caister Castle (fig.1) was built as the principal private house of a successful soldier, Sir John Fastolf (1380-1459);[5] when he retired from fighting wars he became a major landowner in Norfolk and elsewhere and a successful businessman with interest in farming, shipping, brick manufacture, and trade. Work on the double moated courtyard house began on 6 January 1433 and continued until 1444 or possibly a year or two beyond.[6] However, it is not clear for how many years after 1436 brickmaking and bricklaying were integral to the construction process. Several years may have been spent in decorating the new house while some, and on occasion all, of Fastolf, his wife Dame Millicent, step-son, Stephen Salter, and their household were in full-time residence. Fastolf had inherited the site from his mother in 1404[7] and he may have received a licence to crenellate in 1413[8] but did not begin work on building a new house until the old manor house on the site was demolished in January 1433.[9]

Cow Tower, Norwich (fig.2),[10] on the other hand, was part of the city defences, an isolated tower beside a bend in the River Wensum where the river turns sharply to the south, having flowed in a generally easterly direction through the two parts of the city. Between the eastern end of the city wall on the north bank of the city and the boom towers at the foot of Carrow Hill, the river itself formed the line of defence. Whilst the area on the east side of the stream to the south of Cow Tower is low lying and was generally marshy in the late middle ages, with on the west side buildings of the medieval city adjacent to the waterfront, there is an

area of high ground overlooking the city from the north and east above the bend in the river and where the majority of the land to the south and west, then as now, was largely without buildings, forming part of the precincts of the Great Hospital and Norwich Cathedral. Cow Tower was therefore part of the defences against intruders into the city, a role it would fulfil in Ket's Rebellion in 1549.

Cow Tower, financed by and built for the Corporation of the City of Norwich, was built on the remains of the stone foundations of a ruined tower which were there when the site was purchased by the city corporation in 1378. Cow Tower is a circular tower, 43 ft 6 in high, with a circular stair turret on the south-west side. The external diameter narrows from 47 ft 6 in to 33 ft 9 in; the internal diameter is a consistent 25 ft (Table 1). The narrowing of the width of the walls is mostly within the ground floor; wall width narrows from around 11 ft at ground level to about 4 ft 4 in at battlement level, enough to provide for a wall walk behind the battlements.

Fig.2 Cow Tower, Norwich from the landward side. The entrance is visible to the left of the stair turret.

Although both externally and internally, the tower appears to be of brick, Cow Tower was constructed of brick facings to a flint core. If it is assumed that the flint core narrows as the building rises but that the number of rows of bricks laid in each course to enclose the core is consistent in each year's building programme, it might be suggested that a structure which has an internal circumference of around 80 feet and an external circumference of 150 feet would need approximately 120 bricks per row and 225 bricks or slightly more per row for the outside. Given that the sixteenth-century internal chasings in Cow Tower reveal that the

TABLE 1
COW TOWER, NORWICH: SOME DIMENSIONS

Location	Internal Diameter	External Diameter	Wall Width
At base	25 ft	47 ft 6 in (14.5 m)	11ft 3 in (3.5 m)
At first floor	25 ft	36 ft 3 in (11.05 m)	5 ft 9 in (1.8 m)
At second floor	25 ft	34 ft 4 in (10.5 m)	4 ft 9 in (1.6 m)
At battlement level	25 ft (7.625 m)	33 ft 9 in (10.3 m)	4 ft 4 in (1.3 m)
Height	43 ft 6 in (13.25 m)		

Source: B. Ayres, R. Smith, and M. Tilllyard, with an Appendix by T.P. Smith, 'The Cow Tower Norwich: A Detailed Survey and Partial Reinterpretation', *Medieval Archaeology,* **30,** 1989, pp.184-207.

interior wall was at least two and more probably three bricks thick, and one can assume three bricks was the minimum for the exterior, a conservative estimate is that each brick course on the ground floor of Cow Tower would have required at least 800 bricks, although each course of brickwork probably took nearer 1,000 bricks to complete.

Brick size at Cow Tower was around 8 inches in length, 4 inches in width and 2-2¼ inches in height; the most recent publication on Cow Tower gives 200 × 100 × 50 mm as the brick size.

The surviving accounts show that 36,850 bricks were delivered in 1398/99, the sole accounting period for which accounts survive in detail. Assuming, as is argued below, that the accounts relate to one of the later building seasons, possibly the last season, and for a year when the ground floor was being built, a wall 5 feet thick with an external diameter of around 35 feet and a flint core having three bricks on the outer face and two on the inner face would require approximately 250 bricks per course. At this thickness, a solid wall would take between 600 and 650 bricks, something which certainly applied at the top of the structure below the battlements. For a wall with a flint core, the quantity of bricks purchased would have built no more than 14 ft 9 in of wall height; 36,850 bricks would have been used to construct 11 ft 6 in of solid wall.

The accounts do not reveal to which building season in the construction sequence they apply. But it is clear from the number of bricks purchased that no more than one third of the tower and possibly as little as one quarter of Cow Tower was built in the accounting year 1398/99.

THE ACCOUNTS

For both buildings partial accounts survive: three years at Caister Castle,[11] a single year at Cow Tower, Norwich.[12] Both sets of accounts are annual summaries, unlike the weekly accounts set out over the four years of its construction in the early 1480s which have been published from Kirby Muxloe Castle, Leicestershire,[13] or the single year's accounts for the North Bar at Beverley, East Yorkshire.[14] In being summary accounts, the documents from Caister Castle and Cow Tower, Norwich, resemble the discontinuous accounts relating to the building of Tattershall Castle, Lincolnshire.[15]

The accounts for the building of Caister Castle are in the archive collection of the British Library and were published in 1952 by H.D. Barnes and W/D. Simpson, who elsewhere in the same year had published their investigation of the cultural and stylistic affinities of the building.[16] The accounts cover the first three years of the building of Caister Castle and consist of three rolls, one for each year, of summary accounts. The first roll is paper and is 5⅞ inches wide and 33¾ inches long. It begins:

> Accompt of William Gravere from the feat of the Holy Epithany of the Lord in the 11th year of the reign of King Henry VI to the same feast of the Epithany next following in the 12th year of the same king for a whole year.[17]

Following the death of his father, Henry V, from dysentery on 31 August 1422, the infant Henry VI ascended to the thrones of England and (supposedly) France on 1 September 1422; thus the eleventh year of his reign started on 1 September 1432 and ended on 31 August 1433, with the feast of the Epithany in that year occurring on 6 January 1433.[18] The second roll beginning on 6 January 1434 is parchment and has a width of 6 inches and is 29 inches in length. The third roll for 1435 is paper and 5⅞ inches wide and 50 inches long.

As noted, the accounts cover the first three years of the construction of Caister Castle. Each account ends on the feast of the Epithany (6 January) and records expenditure in the twelve months immediately preceding this. For the first year this 6 January 1433 to 6 January 1434. As it is unlikely that much manual work would have been done in the twelve days of Christmas which end either on Epithany Eve (5 January) or on the feast of the Epithany itself, depending on whether Christmas Day or St Stephen's Day (26 December) is taken as the first day of Christmas,[19] each account may be taken as a yearly account for the calendar year preceding the day on which it was drawn up, in the first case 1433. Henceforth, as the likelihood of work in the two weeks following Christmas was minimal, the accounts will be seen as referring to the calendar year which they cover.

There is a depth of incidental detail in these summary accounts. Although surviving only as the three yearly summaries for 1433, 1434, and 1435, the accounts permit us to examine the earliest years of the building of Caister Castle as though it were a modern construction project.

A single year's summary accounts for the building of Cow Tower, Norwich survive in the records of the Chamberlains of the city of Norwich. These rolls are bound in the Chamberlains' Book for the period 1384 Treasurers' Rolls for some of these years. Those for 1395/96 and 1397/98 survive but neither has expenditure attributable to the building of the Cow Tower and the Treasurers' Roll for 1396/97 is missing. However, there is detailed documentation in the Treasurers' Roll for 1398/99. The Latin original with some words in English appears in a translation by Margot Tillyard, with the words originally in English reproduced in italics, in the most recent discussion of the building.[20]

Before 1398/99, there are some records of work being done at Cow Tower. As noted above, the site was purchased in 1378 and had the remains of an earlier tower on it; this tower had a stone foundation which was re-used in building the Cow Tower. The first mention in the Chamberlains' records is in 1386/87 which notes the purchase of 8,000 bricks with carriage and labour. Two years later, in 1388/89, the chamberlains paid for the carriage of a last of *Tyle* and 5,500 *Tyle* from St Bene't's Abbey, with lighters to the tower with *tyle* and labour for carrying the *tyle*. In other words, 15,500 tiles, or more probably bricks, were purchased from the abbey brickmaker at St Bene't's Abbey, on the River Bure and brought to Norwich by water. In 1394/95 the chamberlains bought a thousand bricks and paid for roofing the tower at the hospital.[21] The land on which Cow Tower stands was originally part of the estate of the Great Hospital at Norwich.

More purchases followed in 1395/96. These includes spars, ropes, lime, and bricks as 'stone for the tower' as well as the use of two lighters taking materials to the tower. Neither numbers of bricks nor quantity of stone is given but what this record suggests is the purchase of a year's supply of materials, including scaffolding, thus implying that what was bought in 1395/96 was for work being done above ground level.

It is therefore infuriating that none of the Treasurers' Roll or the Chamberlains' Book or other records are extant for 1396/97. The lack of anything directly attributable to work at the Cow Tower in the extant Treasurers' Roll for 1397/98 might imply no work was being done. This could, of course, be due to a deliberate policy of having a year in which the building was allowed to settle before proceeding with further construction.

PROCUREMENT OF THE BRICKS

Caister Castle

In 1433, William Gravere, the accountant, in subsequent years described as 'Master of the new work', a position roughly equivalent to a modern clerk of works, paid out:

In the costs of the kiln	£5 16*s.* 7½*d.*

In fuel bought for the kiln £11 19*s.* 4½*d.* [22]

The number of firings and the quantity of bricks produced in the first year is not known, except that when the counterwall at the postern gate collapsed into the moat, one of the items for which William Gravere could not claim reimbursement was

> 25*s.* of the price of 10 lasts of bricks spent on the same work and disallowed in the said account[23]

Elsewhere in the accounts, it is clear that a last was 10,000 bricks; ten lasts of bricks implies production of 100,000 bricks in 1433 although it is not absolutely clear whether these were produced at the kiln or bought in, possibly from another brick kiln owned by Sir John Fastolf.

In 1434, the first item in the accounts concerns the production of bricks. William Gravere accounted for

> £134 8*s* 10*d* received from John Grene, bailiff of Castre, in this year as the price of 53 lasts, 7,765 bricks of the lord, received by him for the new work at Castre and Heylesdone, the price of each last 50s.[24]

This was money received but it also recorded as money spent out. In addition, there was also expenditure on firing and maintaining the kiln:

In 560 stakes bought for burning bricks	£0 17*s.* 5*d.*
In 1,340 faggots bought for the same	£3 1*s.* 9½*d.*
In 64 lasts of turfs bought for the same, the price of each last 7*s.*	£22 8*s.* 0*d.*
In 1,090 stacks of rushes bought for covering the said bricks, the price of 100 stacks 10*s.* 6*d.*, less in all 10½*d.*	£5 12*s.* 0*d.*
In divers instruments and necessaries bought for maintaining two kilns of the lord, burning 3 times this year	£2 7*s.* 1½*d.*
In wages of John Ede and John Cook in making 55 lasts of bricks this year, for each last 15*s* by contract	£41 5*s.* 0*d.* [25]

In addition to the price of the bricks paid to John Grene, the bailiff of Caister, production costs added a further £75 11*s.* 4*d.*, making total costs for 550,000 green bricks of £210 0*s.* 2*d.* suggesting a unit cost of 7*s.* 7¾*d.* per thousand bricks, whereas the unit cost for a thousand fired bricks was in the order of 7*s* 9½*d.* A generation earlier, at Cow Tower, the cost of a thousand bricks was between 4*s.* 0*d.* and 5*s.* 6*d.*, depending on supplier (Table 2) but four of the six brickmakers charged 5*s.* 0*d.* per thousand; carriage was extra but fairly minimal (see below). In house production for Caister Castle seems to have added about 2*s.* 8*d.* to the unit cost of one thousand bricks.

The accountant William Gravere (spelt 'Gravour' in the 1435 accounts) resigned as 'Master of the new work' on 3 June 1435, part way through the year, to be replaced by John Elys, Clerk [in Holy Orders], but it was Gravere who signed for

> £160 12*s.* 6*d.*, which the same William acknowledged to have received from John Grene, bailiff of Castre, as hereafter, the price of 63 lasts 4,500 bricks bought by him (from the store) made in Castre manor this year for the same work.[26]

But in the expenditure account the entry reads:

> And in 63 lasts of bricks and 4,500 bought from the bailiff of Castre for the said work this year, price 50s the last, with 2 lasts, 6,000 thereof used at Heylesdone this year £158 12*s.* 6*d.* [27]

TABLE 2
BRICK SUPPLIERS AT COW TOWER, NORWICH, IN 1398/99

Name	Number of Bricks Supplied	Total Cost	Price per 1,000 bricks
Ralph Rieder	23,000 bricks	£5 15*s.* 0*d.*	5*s.* 0*d.*
Robert Perkyns	1,000 bricks	5*s.* 6*d.*	5*s.* 6*d.*
William Chaundler	1,000 bricks	5*s.* 0*d.*	5*s.* 0*d.*
Thomas de Fyncham	3,000 bricks	12*s.* 0*d.*	4*s.* 0*d.*
Richard Wibergh	3,500 bricks	17*s.* 0*d.*	5*s.* 0*d.*
William Blakenhomme	5,350 bricks	£1 7*s.* 3*d.* plus 67 trays of lime	5*s.* 0*d.*
Total in 1398/99	36,850 bricks	£9 2*s.* 3*d.*	
Average price per 1,000 bricks		4*s.* 11¾*d.*	

Source: M. Tillyard, 'Appendix 1: Chamberlains' Accounts 1398/99', *Medieval Archaeology,* **30,** 1989, pp.202-206.

Later in the expenditure account, the building costs for the manor house at Hellesdon include £6 10*s.* 0d. for 2 lasts, 6,000 bricks at 50s the last. Between money received and money spent there seems to be a discrepancy, perhaps a slight miscalculation.

Fewer details are given for incidental expenses for making bricks in 1435, except for two sums paid to John Grene, the bailiff at Caister:

> And in money paid to John Grene for making the bricks at Castre manor this year £84 6*s.* 10*d.*
> And in money paid to John Grene for making turfs in Castre manor this year £5 14*s.* 4½*d.* [28]

Apart from the turf for the fuel, the Caister accounts in 1435 give no details of stakes and faggots uses as fuel or of rushes used to protect the bricks. Brickmakers' wages are not individually recorded, nor how many firings were made at each of the two kilns. The quantity of useable bricks produced is given as 634,500, which might suggest that one of the kilns was fired four times in 1435 and the other only three times. In 1434, the three firings of both kilns produced a total of 537,765 bricks which could be used, or around 90,000 bricks per kiln firing. Thus, the record of 63 lasts does seem to imply an extra firing at one of the kilns.

In 1435, placed after the note of expenditure on building Hellsesdon Manor, there is a curious note which suggests that some bricks were purchased from an outside supplier, rather than produced at one of the lord's kilns. This reads:

> And in *lathes* and *lathenaylles* and bricks bought in for the hall at Castre this year £6 6*s.* 9*d.* [29]

These may have been specials for use in the great hall, where laths and nails specifically for use with laths suggests wood panelling. However, no account appears to mention wood for panelling.

Apart from these outside purchases, an obviously small number, the 1,372,265 bricks recorded as produced and in the main used at Caister Castle were produced at the two kilns at the Brick Pits on the banks of the River Bure. It would have been accessible from the castle site both by road and by water (see below).

As these accounts make clear, Fastolf's kilns were also used to produce the bricks for his new manor house at Hellesdon, north-west of Norwich. At least one other building is recorded as having been constructed of Caister bricks. This is a barn at West Caister for which 4,000 bricks were supplied raising 20*s.* 0*d.*

Cow Tower, Norwich

At Cow Tower, on the other hand, six outside brickmakers were used. Ralph Rieder supplied the majority of the 36,950 bricks purchased in 1398/99 but in addition to his 23,000 bricks another five men supplied quantities between a thousand and 5,350 brick. Robert Perkins and William Chundler supplied a thousand

bricks each and Thomas de Fyncham 3,000 bricks, whereas Richard Wibergh supplied 3,500 bricks and the lime burner William Blakenhomme no less than 5,350 bricks as well as 67 trays of lime (see Table 2).

Whilst four men priced their bricks at 5*s.* 0*d.* per thousand, Robert Peryns charged more, 5*s.* 6*d.* for his thousand bricks. Thomas Fyncham's bricks were priced at considerably less, 4*s.* 0*d.* per thousand. Perhaps Perkyns' bricks were what we could call specials whereas those from Fyncham could have been used on internal rows rather than on an external face.[30]

No brickmakers are given as suppliers in earlier years although in 1388/89 some 15,500 *Tyle* came from the (unnamed) brickmaker at St Bene't's Abbey, 20 miles away by water.

TRANSPORT OF THE BRICKS

Caister Castle

It has been noted that the kiln at the Brick Pits beside the River Bure was accessible to the castle site by both road and water. In his brief note on the bricks, the late Lt-Col. S.E. Glendenning surmised that the kiln site 'was 1½ miles south of the castle by the old main road and a marsh track, and would have been 2½ miles by water when the Pykerell Fleet was navigable'.[31] Glendenning argued that

> As there are considerable charges for carting wood and peat-turves but little for cartage of bricks, its seems a fair assumption that the kilns were either close to the castle or somewhere where water could be used for bulk transport.[32]

But he notes also that the site debris, including full-size over-fired bricks, at the Brick Pits, corresponds more closely to the bricks used in the older, eastern, part of the castle complex rather than those used in the fifteenth-century work instigated by Sir John Fastolf.

The following paragraphs will challenge the late Col. Glendenning's assumption of water transport for the bricks used in building Caister Castle. He claimed that the accounts give no direct hint of how bricks were transported in 1433 to 1435, and although this seems not to quite to have been the case (see below), it is worth examining the arguments in favour of Glendenning's not unreasonable assumption.

First, water was available. Both the brickyard and the building site are beside the same navigable water and water transport was usually cheaper than road. Second, stone and plaster of Paris from France were imported directly to the site and could only have come by water. Third, it is recorded that Pykerell Fleet was deepened. However, it was not until 1434, the second building season, that anything was done about enlarging the Pykerell Fleet. Two different men are recorded at the end of the accounts for 1435 as having done work in the previous year but neither was satisfactory:

> Robert Stele of Clypesby for enlarging *le gateway* and cleaning the watercourse 10 rods in length at Castre manor square, as shown in certain indentures made thereof, at 2*s.* a rod, by contract made with the lord last year — disallowed because he did not fulfil the covenant of his indenture £1 0*s.* 0*d.*
>
> Robert Rede for dredging and cleaning *le Fleet* at Castre, extending from *le brodelay* to *mautby planke,* 16 standard feet in breadth, by contract with the lord made by indenture in the said last year — and disallowed, because he did not fulfil the covenant of his indenture £1 13*s.* 0*d.* [33]

Close examination of the Caister accounts reveal four words are used regarding the transport of building materials. They are "carriage", "carting", "freight", and "freightage".[34] Carriage is used only once: in 1433 to describe the transport of 'freestone and tiel'.[35] Likewise, freightage and freight are used sparingly; freightage occurs in the final entry of expenditure in 1433:

> And in money paid for the freightage of freestone, together with plaister de Parys and other small particulars £16 14*s.* 4*d.* [36]

In 1435, there is an entry which reads:

> And in carting of timber this year, with freightage of freestone £54 5*s.* 6¾*d.* [37]

In 1434, £12 14*s.* 2*d.* was spent on 'the freight of freestone'.[38] Freight and freightage both apply to water-borne materials: stone and plaster of Paris from France. Building materials from France could only have come by sea and thence down the rivers Yare and Bure to Caister Castle.

In the Caister accounts, carting is far more commonly used, implying road transport. The word is used when lime, mortar, and various types of timber are moved (see below). Specifically, in 1434 carts were used to transport bricks. Significantly, the entry in the accounts is that immediately following that recording the wages paid to the brickmakers, John Ede and John Cook. It reads:

> And paid for removing and carting the said bricks out of the kilns of the lord 3 divers times this year £8 3*s.* 4*d.* [39]

That the use of carts and wagons for transporting building materials required expensive repairs to the vehicles is shown by a subsequent entry in 1434:

> In oak timber bought with hard sparrys of oak for repairing *les waynes* and carts £30 19*s.* 7½*d.* [40]

In 1435, a much smaller sum, £3 4*s* 4*d.*, was spent on 'the costs of *les waynes*, with servants' wages': servants here meaning employees, perhaps more specifically those workers who repaired the vehicles.[41]

When Caister Castle was being built, the main road from Great Yarmouth to Norwich, which was the only landward route out of the town, passed on the east side of the castle site, separated from the building only by the castle moat.[42] The final mile of the journey from the brickyard at the Brick Pits would have been along this road. From the Brick Pits to the main road is a still walkable track,[43] one that today is capable of taking a Yarmouth troll cart, a cart where the wheels are beneath rather than beside the bed of the cart whereupon the cargo would sit. In places this raised track remains sufficiently broad so as to be able to take a cart with the standard 4 feet 8½ inches wheel gauge. Ruts from the carts following the same tracks over multiple journeys doubtless contributed to the erosion visible on parts of the track.

A cart would have held around 120 bricks. Assuming that each kiln firing was in the order of 90.000 bricks, which seems credible from production of around 550,000 green bricks for the three firings of each kiln in 1434, this suggests that around 750 journeys per firing were made; a total of 4,500 journeys in 1434 and 5,250 journeys in 1435. Carts, of course, can deliver bricks directly to where they are needed on a building site.

Cow Tower

We are well-informed about how some of the bricks bought for the Cow Tower reached the building site, by barge or lighter on the River Wensum.[44] In 1388/89, the *Tyle* from St Bene't's Abbey was conveyed on lighters, and purchases made in 1395/96 included bricks which came on two lighters.[45]

The word "lighter" might imply a barge, thus requiring either a horse or another river craft to pull it. However, the banks of the rivers Bure Yare, and Wensum make it unlikely that a horse was used. On the other hand, it is more likely that "lighter" is a late-fourteenth-century term for the once highly familiar Norfolk wherry, a river-going vessel built to carry cargo which is propelled by a single lug sail and steered by a rudder, although the medieval once could equally have used a steering oar mounted on either the port or the starboard side of the vessel.

It is certainly known that a wherry could be taken past the boom towers and going round the southern boundary of Norwich and under Bishop's Bridge to the Cow Tower. In about 1812, John Thirtle (1777-1839) exhibited a watercolour of *Boatbuilder's Yard near the Cow Tower, Norwich* (fig.3) which makes it clear that by removing the sail and lowering the mast the bridge could be negotiated.[46]

In 1398/99, at least four men transport bricks to Cow Tower. Thomas Wilmot carried 20,000 bricks at a price of 2*s.* 1*d.*, presumably the majority of Ralph Reider's bricks. Sampson Baxtere was paid 4*d.* for carrying 3,000 bricks, which may either the remainder of those bought from Ralph Reider or all of those

purchased from Thomas de Fyncham. John Goby, boatman, was paid 8*d.* to carry bricks, but the number was not specified in the surviving accounts. If the rate was the same as that for Thomas Wilmot, which was 1¼*d.* per thousand bricks, this could be those purchased from Thomas Fyncham and Richard Wibergh, but alternative combinations of the smaller quantities are possible. Paying 8*d.* suggests the carriage of either 6,000 or 6,500 bricks. An unnamed man was paid 3*s.* 0*d.* for 'carriage of' 5,300 bricks and 67 trays of lime, recorded as what William Blakenhomme sold to the chamberlains of Norwich, and although 'carriage' is the word used, water transport may be meant. However, this seems to leave the transport of at least 2,000 bricks unaccounted for; perhaps another boatman was employed whom the chamberlains failed to record in their summary accounts.[47]

Fig.3 John Thirtle, 'Boatbuilder's Yard near the Cow Tower, Norwich, *circa* 1812.

OTHER BUILDING MATERIALS

Apart from bricks and their transport, the accounts at both Caister Castle and Cow Tower have references to other building materials: lime, freestone, flint, plaster of Paris, timber, glass, and lead, all of which figure in the Caister Castle accounts.

Lime

Lime occurs in both sets of accounts. Lime is essential to making mortar. In 1434 at Caister Castle, lime came from three separate sources:

> In 491 trays of lime bought from Augustine Bange and Thomas Stalham of Norwich, the price of each tray 2*s.* 1*d.* with carting from Norwich to Castre this year £48 0*s.* 5*d.*
> In 13 trays of lime bought from the bailiff of Helyesdone, with carting the price of each tray 2*s.* 2*d.* £1 8*s.* 2*d.* [48]

The same year also has a reference to 'labourers making, carting and setting mortar' when discussing wages. But in 1435, the following year, the entry is less specific about the suppliers of lime:

> And in burnt chalk, viz. 265 trays, to make mortar, bought from Augustine Bange and others £25 14*s.* 0*d.* [49]

Earlier, in 1433, there is no definite mention of lime but 'cement from divers men' costing £30 19*s.* 8*d.* [50]

Lime at the Cow Tower in 1398/99 was supplied by William Blakenhomme, from whom 67 trays at 18*d.* per tray was purchased; the bill at £4 17*s.* 6*d.* is one of the largest in the accounts. Also a Michael *Lymbrennere* occurs being paid 4*d.* a day for seven days' work.[51]

Stone

Both freestone and plaster of Paris were purchased by Sir John Fastolf in France but their cost does not appear in the accounts for 1434 whereas purchases of the same materials in 1435 were charged to the accounts. In 1434, it was 100 tons of freestone and 4 tons of plaster of Paris; in 1435, £37 9*s.* 9*d.* was paid for 109 tons of freestone and £1 10*s.* 0*d.* for 3 tons of plaster of Paris. Assuming that unit costs were the same in both years — 6*s.* 10½*d.* for a ton of freestone and 10*s.* 0*d.* for a ton of plaster of Paris — we may calculate that 100 tons of freestone cost Sir John £34 7*s.* 6*d.* of the 4 tons of plaster of Paris a further £2 0*s.* 0*d.* [52]

The stone in 1435 was used for windows on the north and west walls. Which internal spaces were covered with plaster of Paris is not recorded.

It can be assumed that in both years these materials were transported directly from northern France to Caister Castle.

Stone, other than flint, appears only twice in the Cow Tower accounts and the mason, Robert Snape, supplied both '12 shotholes for *le Dungeon* at 9*d.* a piece' and '30 *Nowels* [newel-stones] at 3*d.* a piece'; he presumably installed them. On the other hand, five 'Stonemyners' are specifically recorded and each of them provides a specific number of 'carts of stone', implying carriage in a cart. This is confirmed by the eight carters to whom fourteen payments totally 40*s.* 7*d.* were made.[53]

Timber

At Caister Castle in 1434, apart from expenditure on wood for repairing the carts and wagons as noted above, £10 18*s.* 4*d.* was spent on 'carting of timber from Cottone';[54] one of Fastolf's minor estates was at Cotton, Suffolk, conveniently halfway between his house in Dedham, Essex, and his townhouse in Norwich. Cotton is also on the Roman road (the modern A140) which ran from Colchester to Caistor-by-Norwich.

It is a mistake to think that roads were not maintained in medieval England. At its upper reaches — of which Sir John Fastolf KG was a member — English society was intensely mobile; men and women needed the stamina to be able to travel around 30 miles in a day. Even on the last day of his life in 1529, an extremely sick and aged Thomas Wolsey *rode* from Nottingham to Leicester Abbey — a distance of 20 miles — and from the itineraries of late medieval bishops 30 miles in a day does not seem excessive.[55]

In 1435 there are several references to the purchase and carting of timber:

In oak timber without carrying bought for the same work this year	£32	13*s.*	5*d.*
And in beams of oak and poplar with carting and expenses of buying	£6	6*s.*	10*d.*
And in *botmels* and plankes bought for the said work	£0	3*s.*	0*d.*
And in carting of timber this year, with freightage of freestone	£35	1*s.*	8½*d.* [56]

Doubtless much of the last expense was for the transport of stone rather than the carting of wood.

The method of carrying wood was probably little different to that portrayed by Paul Sandy (1731-1809) at Luton Hoo Park in 1765 or the following year; one of his series of twelve watercolours commissioned by the third Earl of Bute shows a tree trunk being mounted on two axles being pulled by a team of horses along a road.[57] The latter method was used to transport tall but uncut blocks of stone to be carved into the pillars for the portico of the Minnesota Statehouse in St Paul MN in about 1899.[58]

At the Cow Tower, John Eldred was paid 8*d.* for two poplar boards and Hamon Barbour 10*d.* for 'a beam of ash for *le Dongeon*'. There are references to the purchase of hurdles and their carriage as well as to *spares,* but these fir poles may have been for scaffolding rather than for construction use.[59]

Glass and Lead

Both glass and lead appear in the Caister Castle accounts. As early as 1433, 8*s.* 11d. was spent on 'glass for windows' with £3 14*s.* 10*d.* being spent in the following year, including 'placing in divers chambers'. In 1434, £10 18*s.* 4*d.* was spent on 'lead for the work of the lord this year', which by the size of the sum, at least some of the new building was ready for roofing.[60]

Fig.4 Caister Castle, interior showing the Winter Hall (right) with three of the seven external windows, the great tower (centre) with the stair turret reaching above it, the great gable at the high end of the hall (centre right) demonstrating the existence of a second floor in the west range, and part of the surviving outer wall of the north range (right). The rooms here were probably those occupied by Dame Millicent Fastolf and her gentlewomen.

Quite which parts of Caister Castle would have been ready for roofing in 1434 is difficult to assess. However, as Sir John's wife, Dame Millicent Fastolf, would need to have high quality accommodation erected fairly rapidly in a complex building project, two areas might be suggested. The great hall on the west side had stone for windows purchased in 1435, but this seems less likely than the north range where the inventory of

1448 indicates high status rooms. Those on the ground floor, immediately adjacent to the Winter Hall, were most probably those which had been used by Dame Millicent and her ladies.[61]

Both areas are candidates for rooms covered with plaster of Paris or wood panelling.

CAISTER CASTLE AND COW TOWER: CONTRASTS IN PROCUREMENT AND TRANSPORT

Caister Castle and the Cow Tower present two very different ways of procuring and transporting bricks and other building materials. Sir John Fastolf was able to use the resources of his extensive estate, also drawing upon materials from sites at considerable distances from Caister. In contrast the City of Norwich had to use outside contractors.

Because of the need to use outside suppliers, the Cow Tower was built with bricks from several brickmakers in contrast to Sir John's use of his own kiln within a reasonable distance from his new house. Whilst the names of the brickmakers who supplied bricks to Cow Tower are known, the places where they made the bricks are not. Some of those found in the 1398/99 accounts may have been connected with St Bene't's Abbey, as was the case ten years before in 1388/89 but this is uncertain.

Bricks require lime mortar. Sir John had a lime kiln, perhaps a temporary one, on his Hellesdon estate.[62] Hellesdon is north-west of Norwich, where at the same time that Caister Castle was being built, he was reconstructing a manor house (now lost) as well as the hunting lodge at Drayton on top of the hill where Hellesdon is at the bottom. Bricks were sent to Hellesdon; lime came back on the carts to Caister. He also bought lime from outside his own resources. At Cow Tower, William Blakenhomme supplied 67 trays of lime as well as 5,350 bricks.

In the acquisition of other materials, Sir John, still engaged in the wars in France, imported Caen stone from Normandy as well as plaster of Paris from elsewhere in France. The source of the flint and other stone used at Cow Tower is unknown, although a relatively local source, even the hillside on the opposite bank of the River Wensum, might be suspected. The city authorities had to purchase timber, both for scaffolding and for floor joists, flooring, and the roof structure at Cow Tower; Sir John possessed several well-wooded estates from which appropriate trees could be selected for felling and coppicing, drying and seasoning, and ultimate use.

Where modes of transport are concerned, at Caister Castle, bricks, lime, and timber were all carted: that is carriage by road. But at Cow Tower, the bricks and the lime came by boat on the River Wensum. Water transport was definitely used on materials bought in France. The vessel carrying the Caen stone and plaster of Paris must have been capable of going to sea but also of sufficiently shallow draught to negotiate the River Bure and the Pickerell Creek. Something on the lines of the Bremen cog might be envisaged.[63]

APPENDIX
COW TOWER, NORWICH, AND NORTH BAR, BEVERLEY: A COMPARISON

A good comparison for the Cow Tower at Norwich is the North Bar at Beverley, East Yorkshire,[64] for which weekly accounts from 9 July 1409 to 4 April 1410 survive and have been published (summarised in Table 3). Both buildings are civic projects. At both sites one main supplier is used for the bricks: Ralph Rieder at Cow Tower (23,000 out of 36,850 bricks), William Rolleston, names as a merchant rather than a brickmaker (although he may have combined both functions), at Beverley (33,500 out of more than 107,800 bricks, including squinchons). Although Rolleston supplied more bricks, his proportion of the total number is much lower: 62.4% for Rieder in Norwich, 31.1% for Rolleston at Beverley. Both sites relied on a larger number of brickmakers: six at Cow Tower, no fewer than twenty at North Bar. But there is a difference. Whilst the minimum number of bricks at Cow Tower was a thousand bricks from both Robert Perkyns and William Chaundler, at North Bar fewer than a thousand bricks were supplied by William Katerynson on 20 September and 27 September 1409, John Tilson on 28 March 1410, and with squinchons on both 16 August 1409 and 8 November 1409 by John Elward. In 1409, Elward was the only supplier of squinchons to the North Bar; Peter Whitt supplied an unspecified but small number of bricks on 28 February 1410.

One interesting point about brick suppliers to the North Bar is that with the exceptions of William Rolleston and Thomas Whitt, none of those who supplied bricks in July to December 1409 also appear in the accounts for January to April 1410. To quote merely those who supplied bricks to the North Bar more than

TABLE 3
BRICK SUPPLIERS TO THE NORTH BAR, BEVERLEY, IN 1409-10

Name	Date	Number of bricks	Price
John Almote	4 April 1410	**	
Adam Barker	18 October 1409	5,500 bricks	£1 0*s.* 0*d.*
John Bentley	6 September 1409	8,000 bricks	£1 10*s.* 0*d.*
	1 October 1409	1,000 bricks	3*s.* 8*d.*
Thomas Dakett	6 September 1409	4,000 bricks	12*s.* 8*d.*
	11 October 1409	9,000 bricks	£1 13*s.* 0*d.*
	1 November 1409	2,000 bricks	6*s.* 8*d.*
John Elward	9 July 1409	6,000 bricks	£1 2*s.* 0*d.*
	16 August 1409	1,000 squinchions) 600 bricks)	6*s.* 0*d.*
	20 September 1409	1,000 squinchions	4*s.* 5*d.*
	8 November 1409	500 squinchions) 100 bricks)	2*s.* 3*d.*
John de Holme	4 April 1410	3,000 bricks	11*s.* 0*d.*
Thomas Jolyff	28 March 1410	2,000 bricks with carriage	7*s.* 8*d.*
William Katerynson	16 August 1409	2,000 bricks	7*s.* 0*d.*
	20 September 1409	100 bricks	5*d.*
	27 September 1409	700 bricks	2*s.* 7*d.*
Stephen Lekenfeld	21 February 1410	1,000 bricks	3*s.* 8*d.*
	4 April 1410	**	
John Mudfysch	23 August 1409	3,000 bricks	11*s.* 8*d.*
William Potter	6 September 1409	4,000 bricks	15*s.* 1*d.*
	13 September 1409	3,000 bricks	9*s.* 2*d.*
	1 October 1409	4,000 bricks	14*s.* 8*d.*
Robert Puttock	27 September 1409	3,000 bricks	11*s.* 1*d.*
	15 November 1409	roof tiles	£1 0*s.* 0*d.*
	13 December 1409	bricks (as final settlement)	13*s.* 2*d.*
William Rolleston (merchant)	20 September 1409	28,500 bricks) 59 lb lead)	£6 18*s.* 11*d.*
	28 February 1410	5,000 bricks) 1,000 laths) 1 timber from Riga)	£1 9*s.* 0*d.*
Agnes Tiler	16 August 1409	1,000 bricks	3*s.* 8*d.*
John Tilson	28 March 1410	800 bricks	2*s.* 10*d.*
Robert Warant	15 November 1409	1,500 bricks	5*s.* 5*d.*
John Wethirby	13 September 1409	1,500 bricks	5*s.* 0*d.*
Peter Whitt	28 February 1410	squinchions	5*d.*
	4 April 1410	**	
Thomas Whitt	1 October 1409	1,000 bricks	3*s.* 8*d.*
	10 January 1410	1,000 bricks	3*s.* 9*d.*
	4 April 1410	**	
William de Wode	16 July 1409	3,000 bricks	10*s.* 8*d.*
**	At the end of the accounts, under 4 April 1410, four suppliers — Peter Whitt, Thomas Whitt, John Almote, and Stephen Lekenfeld — supplied an unspecified number of bricks		1*s.*11*d.*

Source: A.F. Leach, ''The Building of Beverley Bar', *Trans. East Riding Antiquarian Society*, **4**, 1896, pp.26-37.

once, does this mean that John Bentley, Thomas Dakett, William Katerynson, William Potter, and Robert Puttock were no longer in business after Christmas 1409? In Puttock's case this is not so as he was called upon to assist with brickmaking at nearly Hull in 1424.

We have no indication of the timing of the supply of bricks to Cow Tower. However, at North Bar there is a definite pattern. In 1409, 6,000 bricks on 9 July and 3,000 bricks on 16 July, from different suppliers (John Elward and William de Wode) is followed by a lull in acquiring bricks or at least paying for bricks supplied until 16 August when three different suppliers provide 3,600 bricks and 1,000 squinchons. Brick supplies thereafter are more or less weekly until 18 October, with one exception, the week ending 30 August. In some weeks — those ending 16 August, 6 September, and 1 October — three suppliers were involved. In the ten weeks between mid-August and mid-October, no fewer than 79,000 bricks and 2,000 squinchons were purchased. The substantial purchases in late September and throughout the first three weeks of October 1409 suggest acquiring sufficient stock to keep going during the winter and to start up again after the two-week Christmas break. Thereafter, in November 1409 and the early months of 1410 only around another 15,000 bricks and maybe 600 squinchons were bought. The figures are slightly approximate: the entries for 13 December 1409 from Robert Puttock and 4 April 1410 from four brickmakers are not specific about the number of bricks purchased.[65]

NOTES AND REFERENCES

1. H.D. Barnes and W.D. Simpson, 'Caister Castle', *Antiquaries Journal,* **32,** 1952, pp.35-51. See also A. Hawkyard, 'Sir John Fastolf's "Gret Mansion by me late edified": Caister Castle, Norfolk' in L. Clark, ed., *The Fifteenth Century V: Of Mice and Men: Image, Belief and Regulation in Late Medieval England,* Woodbridge: The Boydell Press, 2005, pp.39-68, for an additional primary account of the building and its construction. The description in J.A. Wight, *Brick Building in England from the Middle Ages to 1550,* London: John Baker, 1972, pp.116-122, is discursive and somewhat rambling; it needs to be treated with caution.
2. B. Ayres, R. Smith and M. Tillyard, with an appendix by T.P. Smith, 'The Cow Tower, Norwich: A Detailed Survey and Partial Reinterpretation', *Medieval Archaeology,* **33,** 1989, pp.184-207.
3. H.D. Barnes and W.D. Simpson, 'The Building Accounts of Caister Castle', *Norfolk Archaeology,* **30,** 1952b, pp.178-188.
4. M. Tillyard, 'Appendix 1: Chamberlains' Accounts, 1398/99', in Ayres *et al.,* 1989, pp.202-206.
5. Fastolf lacks a full-scale modern study; the most recent account of his post-military career is Hawkyard, 2005. For land acquisitions see K.B. McFarlane, 'The Investment of Sir John Fastolf's Profits of War', *Trans. Royal Historical Society,* 5th ser., **9,** 1957, pp.91-116, reprinted K.B. McFarlane, *England in the Fifteenth Century: Collected Essays,* London: The Hambledon Press, 1981, pp.175-198, and '"The Greatest Man of That Age": The Acquisition of Sir John Fastolf's East Anglian Estates', in R.A. Archer ad S. Walker, eds, *Rulers and Ruled in Late Medieval England: Essays Presented to Gerald Harriss,* London and Rio Grande: The Hambledon Press, 1995, pp.137-153. Because of the author's ready access to the Fastolf papers in Magdalen College, Oxford, Sir John figures heavily in K.B. McFarlane's Ford Lectures, 'The English Nobility 1290-1536', delivered Hilary Term 1953 which form the basis of K.B. McFarlane, *The Nobility of Later Medieval England,* Oxford: The Clarendon Press, 1973, pp.1-141.
6. Fastolf entertained the Duke of Norfolk at Caister in 1444, by when it has been assumed that the main body of construction work and final decorations were complete. An inventory of the building's contents was taken in October 1448, see T. Amyot, 'Transcript of two rolls, containing an inventory of the effects formerly belonging to Sir John Fastolfe', *Archaeologia,* **21,** 1827, pp.232-280, summarised C.M. Woolgar, *The Great Household in Late Medieval England,* New Haven and London: Yale University Press, 1999, Table 5, on p.67, with annotated plan, *ibid.,* fig.4, on p.66; the present writer differs in his interpretation of the location of specific rooms from Woolgar's and will be presenting his findings in a future issue of *British Brick Society Information.*
7. Barnes and Simpson, 1952, p.35; Hawkyard, 2005, p.40; Wight, 1972, p.119.
8. Hawkyard, 2005, p.48 with nn.64-66 discusses the evidence for and against the issue of a licence. The assertion of a licence to crenellate was first made by Francis Blomefield, the Norfolk topographer, in the eighteenth century. A licence to crenellate was a medieval form of royal planning permission specifically granting licence to build a *fortified* place.
9. The accounts (see below) make it clear that they date from the commencement of the new work and the demolition of the old.
10. Details from Ayres *et al.,* 1989, for materials in this paragraph and those succeeding.
11. Barnes ad Simpson, 1952b, *passim.*
12. Tillyard, 1989.
13. A. Hamilton Thompson, 'The Building Accounts of Kirby Muxloe Castle, 1480-1484', *Trans. Leicestershire Archaeological Society,* **11,** 1913-20, pp.193-345.
14. A.F. Leach, 'The Building of Beverley Bar', *Trans. East Riding Antiquarian Society,* **4,** 1896, pp.26-37.

15. W.D. Simpson, ed., *The Building Accounts of Tattershall Castle 1434-1472,* being *Lincoln Record Society,* **55,** 1960, *passim,* reprinted 2010. Simpson prints both the Latin originals, pp.1-39, and an English translation, pp.41-78.
16. Barnes and Simpson, 1952b, for the accounts; Barnes and Simpson, 1952, for the building itself.
17. Barnes and Simpson, 1952b, p.181. The present writer follows Alasdair Hawkyard's form of the surname of the keeper of the accounts rather than Granere and Granour favoured by Barnes and Simpson, 1952b; see Hawkyard, 2005, p.41, with n.19.
18. As noted Hawkyard, 2005, p.41, n.19.
19. In the late 1970s, more than one Norfolk farmer recalled the tradition of 'Plough Monday' continuing into the early twentieth century when the village plough was ceremonially dragged to each public house in the village or group of villages and a pint of good strong ale drunk at each one before starting work on the next day. Plough Monday was the first Monday after the feast of the Epithany. For sixteenth century practice of over a week's break at Christmas in the building trade see the entries for 1537-38 in V. Harding and L. Wright, eds, *London Bridge: Selected Accounts and Rentals, 1381-1538,* being *London Record Society,* **31,** 1995, pp.204-207. In the week ending 15 December 1537 the two bricklayers worked 5 and 6 days respectively; in that ending 22 December 1537, they worked 5 and 3 days; in that ending 29 December 1537, they worked no days; in that ending 5 January 1538, they each worked 4 days; in that ending 12 January 1538, one worked 4 days and the other 6 days. Thereafter, except for days of religious obligation, which were many, the norm was a 6-day working week. A similar pattern of interrupted work at Christmas can be traced in the Kirby Muxloe accounts, see Hamilton Thompson, 1913-20, *passim.*
20. Tillyard, 1989, pp.202-206.
21. Tillyard, 1989.
22. Barnes and Simpson, 1952b, p.181.
23. Barnes and Simpson, 1952b, p.182.
24. Barnes and Simpson, 1952b, pp.182-183.
25. Barnes and Simpson, 1952b, p.183.
26. Barnes and Simpson, 1952b, p.184.
27. Barnes and Simpson, 1952b, p.184.
28. Barnes and Simpson, 1952b, p.185.
29. Barnes and Simpson, 1952b, p.185.
30. Tillyard, 199, pp.202-206.
31. S.E. Glendenning, 'Appendix: Caister Castle — Origin of the Bricks', in Barnes and Simpson, 1952, p.51.
32. S.E. Glendenning, in Barnes and Simpson, 1952b, pp.187-188. Quotation from the latter, p.187.
33. Barnes and Simpson, 1952b, pp.185-186
34. See the discussion in the opening paragraphs of D.H. Kennett, 'Caister Castle, Norfolk, and the Transport of Brick and other Building Materials in the Middle Ages', in R. Bork and A. Kahn, eds., *The Art Science and Technology of Medieval Travel,* Aldershot and Burlington VT: Ashgate, 2008, pp.55-67.
35. Barnes and Simpson, 1952b, p.182.
36. Barnes and Simpson, 1952b, p.182.
37. Barnes and Simpson, 1952b, p.185.
38. Barnes and Simpson, 1952b, p.183.
39. Barnes and Simpson, 1952b, p.183.
40. Barnes and Simpson, 1952b, p.183.
41. Barnes and Simpson, 1952b, p.185.
42. See Henry Swinden's 1760 plan of the location of Caister Castle, reproduced Barnes and Simpson, 1952b, pl. opp. p.178, and Barnes and Simpson, 1952, pl.17a. This plan also makes it clear that the west court separated from the main court by a moat was integral to the building plan, as will be argued by the present author in his forthcoming study of the rooms and their uses at Caister Castle, see also n.6 *supra.*
43. Personal observation, unrecorded date in the early 1980s, when the writer lived in Bradwell, a village south of Great Yarmouth; his house stood on land once owned by Sir John Fastolf and subsequently by Magdalen College, Oxford.
44. Tillyard, 1989.
45. Tillyard, 1989.
46. A. Hemingway, *The Norwich School of Painting 1803-1833,* Oxford: Phaidon, 1979, p.34 with pl.26 reproduces the painting at approximately half size. The original, Norwich: Castle Museum, measures 44.5 cm × 65.4 cm (17½ × 25¾ inches).
47. This account has been modified from that in Kennett, 2008, pp.61-62.
48. Barnes and Simpson, 1952b, p.183.
49. Barnes and Simpson, 1952b, p.185.
50. Barnes and Simpson, 1952b, p.181.
51. Tillyard, 1989.
52. Barnes and Simpson, 1952b, pp.182 and 184.
53. Tillyard, 1989, p.203.
54. Barnes and Simpson, 1952b, p.183.

55. V. Davis, *William Waynflete: Bishop and Educationalist,* Woodbridge: The Boydell Press, 1993, pp.139-174 prints the bishop's itinerary from 7 October 1447 to his death at Bishop's Waltham on 11 August 1486. His palaces at Southwark, Esher, Farnham, Winchester, and Bishop's Waltham, were approximately 20 miles apart. Thomas Rotherham, as Archbishop of York, in 1488, rode from York House in Whitehall (Westminster) to Bishopsthorpe, outside York in 4 days; analysis by the present writer of the published volume of Rotherham's Register, E.E. Barker, ed., *The Register of Thomas Rotherham, Archbishop of York 1480-1500, Volume I,* being *Canterbury and York Society,* **142,** 1974-75, *passim.* The second volume has never been published, and the transcript of the original manuscript, completed by Sister Josephine Murray of the Sisters of Notre Dame in the 1950s, appears not now to be extant: information from the Canterbury and York Society, July 2014.

56. Barnes and Simpson, 1952b, p.185.

57. J. Bonehill, catalogue no.91 in J. Bonehill and S. Daniels, eds., *Paul Sandby: Picturing Britain,* London: Royal Academy of Arts, 2009, pp.214-215 with detail on cover which shows the swingletree carrying the tree trunk very clearly. On the eve of writing these notes, the 'Countryfile' programme on BBC1 showed a demonstration of how the horse was used to manoeuvre a tree trunk on to a swingletree. The man demonstrating the procedure used the alternative term whippletree for the bar between two axles.

58. L. Roethke, *Minnesota's Capitol: a Centennial Story,* Afton MN: Afton Historical Society Press, 2005, p.2.

59. Tillyard, 1989, pp.205-206.

60. Barnes and Simpson, 1952b, p.183.

61. Woolgar, fig.4 (on p.64) tentatively puts these rooms in the great tower; my reading of the inventory places them on the ground floor of the north range with a room between Dame Millicent's chamber and the hall; this room is specified as such in the 1448 inventory. The high end of the hall was to the north.

62. Barnes and Simpson, 1952b, p.183.

63. Literature on the Bremen cog, an actual medieval vessel found in the mud of the River Wesser at Bremen, was unfortunately not accessible at the time of writing. Such vessels were "the dirty British coaster" of the thirteenth to mid-sixteenth centuries. Their carrying capacity where bricks are concerned would have equalled those required to building a large garage with office at the rear. The writer returned from a visit to Bremen in the mid-1980s to find the bricks for his neighbour's new building stacked on his drive.

64. Details of brick purchases for Beverley North Bar are taken from Leach, 1896. The accounts accompany J. Bilson, 'The North Bar, Beverley', *Trans East Riding Antiquarian Society,* **4,** 1896, pp.38-49; *ibid.,* pp.48-49 is a table of 'Prices of Bricks and Tiles' from Hull, Beverley and York between 1303 and 1457.

65. This paper represents the presentation made to the British Brick Society's session at Leeds International Medieval Congress, July 2010. The comparison of Cow Tower, Norwich, and Beverley North Bar was not made in the lecture. An earlier presentation on brick provision and transport, was given at an AVISTA session at The International Congress of Medieval Studies, University of Western Michigan, Kalamazoo MI, in May 2006 and published as Kennett, 2008, with references to other sites where the kiln and the mode of transport is known. In the lecture in 2006 I agreed with previous scholars that water transport had been used to take bricks from the kilns in the Bure Marshes to Caister Castle; by the time of writing a revised draft of the paper that became Kennett, 2008, I had revised my thesis. In the intervening decade, I have seen no reason to change my mind from carts on the road as the means to taking bricks to the building site at Caister Castle.

Book Review: A Brickmaker's Story

Peter Minter, *The Brickmaker's Tale,*
Bulmer: The Bulmer Brick and Tile Co. Limited, 2014,
112 pages, 110 colour and 35 black and white illustrations, 2 maps, 2 plans,
ISBN 978-0-95634-986-6, Price, Hardback, £30-00, including postage and packing,
Available from Peter Minter % The Bulmer Brick and Tile Co. Ltd, The Brickfields, Bulmer, Sudbury, Suffolk CO10 7EF
Cheques payable to Peter Minter, please

Peter Minter is a long-standing member of the British Brick Society and well-known to members, many having enjoyed visits to his handmade brickworks on the Essex-Suffolk border on a number of occasions.

In recent years there has been a significant increase in the history of brickmaking, brickworks, and brick buildings. This has resulted in a number of publications, to which has been added *The Brickmaker's Tale* by Peter Minter, a director of Bulmer Brick and Tile Co. Limited. This excellent hardback is well illustrated and includes photographs, many in colour, of the brickworks, brickmakers, and buildings where Bulmer bricks have been used. Some historic illustrations are of the brickworks and former employees throughout the last century.

The brickyard at Bulmer in north Essex was purchased by Lawrence Minter in 1936 when his son Peter was a young boy. The book contains his recollections, more fact than tale, of nearly eighty years. The many craftsmen and characters employed over the decades with their memories and anecdotes, makes fascinating reading. Of particular interest is the war years, its difficulties and the blackout regulations applying to brickworks and kilns. During the war many drainage pipes were made at Bulmer for the construction of airfields in Essex and Suffolk. The relevant airfields are shown on maps of both counties. Towards the end of the war and during the immediate post-war years, pottery was also made at Bulmer.

The comparatively recent rebuilding of one kiln and the construction of a second kiln are fully detailed and illustrated. These are both downdraught kilns, but former updraught kilns not used since the 1930s remain on the site. The Minter family also farm surrounding land and their farming activities at Hole Farm are also recorded. It was whilst ploughing in 1958 that a medieval tile kiln was discovered and carefully recorded by archaeologists. The previous year, a Bronze Afe burial urn and other artefacts were discovered. These finds indicate that the area around the brickyard has been occupied, albeit intermittently, for some three thousand years.

Bulmer bricks are still made by hand in the traditional method, which has existed for many years. These bricks are now used mainly for restoration work on many buildings throughout the country, including Hampton Court Palace, Oxburgh Hall, Layer Marney Towers and Long Melford Hall to name but a few. Considerable quantities of bricks were supplied for renovations and extensions to St Pancras Station after it was chosen as the terminus for Eurostar. It was found that the original bricks had been made *circa* 1870 by Allens of Ballingdon, only three miles from Bulmer. When bricks were provided for Claridges Hotel in London it was discovered that the facing bricks had been supplied by Mark Gentry, a master brickmaker of Sible Hedingham, just four miles from Bulmer. Interestingly, some of Mark Gentry's moulds from the late nineteenth century are now in the possession of Bulmer Brick and Tile Co. and are still used occasionally. As other brickworks in Essex and Suffolk closed, Lawrence and later Peter Minter purchased moulds, machinery, and many other items. One example, detailed in the book with photographs, is the closure of Corder's Brick, Tile, and Pottery Works at Sible Hedingham in 1942, when Lawrence purchased numerous lots at the auction.

Brickmaking by hand is often of interest to television producers. This started some fifty years ago with Anglia Television's *Bygones* programme and has continued with numerous other programmes including BBC's *Pebble Mill at One.* Even pupils from Bulmer School were filmed in Victorian costume "working" in the brickyard for BBC's schools programme *Then and Now.* A chapter suitably titled 'In Front of the Camera' is devoted to these numerous television programmes.

Fortunately, Bulmer Brick and Tile Company Limited survived, despite struggles and petty regulations. It is still providing an extremely valuable service to property owners, builders, architects, and other clients by producing much-needed handmade bricks for essential restoration work. Long may it continue! I commend this important record of archaeology, agriculture, brickmaking, brick buildings, and social and local history to members of the British Brick Society and a wider readership.

ADRIAN CORDER-BIRCH

BRICK IN PRINT: NORFOLK AND BEYOND

Between March and July 2016, the Editor of the British Brick Society received notice of a number of publications of interest to members of the society. 'Brick in Print' has become a regular feature of *British Brick Society Information*, with surveys usually two or three times a year. As this issue of *BBS Information* concentrates on one major brick building in Norfolk, those included here mainly concern Norfolk buildings. Members who are involved in publication or who come across books and articles of interest are invited to submit notice of them to the editor of *BBS Information*. Websites may also be included. Unsigned contributions in this section are by the editor.

D.H. KENNETT

1. Penny Churchill, 'Property Market: Follow the stars of the East'
Country Life, 27 April 2016, pages 102-104.

It is not the usual custom of *British Brick Society Information* to draw attention to houses for sale. An exception may be made for the five brick houses in this "East Anglia" edition of *Country Life*. Penny Churchill provides brief but useful accounts with exterior photographs of Spains Hall, Finchingfield, Essex, which also has an interior view; High Hall, Nettlestead, and Thorpe Morieux Hall, both in Suffolk; and two smaller Norfolk properties: the Old Rectory at Weston Longville and the Mill House at Burnham Overy Town. Spains Hall, Thorpe Morieux Hall, and High Hall appear in the advertisement section at the beginning of the issue (pp.14-16, 17 and 1, respectively).

These buildings range in date from the sixteenth century onwards. Thorpe Morieux is probably the oldest: a timber-framed, jettied range of *circa* 1525 to which a two-storeyed brick porch was added. Spains Hall is multi-period: a core building of brick built in about 1570, but incorporating a moated house of the first half of the fifteenth century, to which additions were made in each century up to the present day. High Hall is much disputed as to its date: Historic England favour the 1620s with an earlier core and 1930s additions. Both Norfolk houses are eighteenth century in date. Parson Woodforde, the diarist, resided at Weston Longville Rectory and ministered to his country flock therefrom: Churchill's caption, 'classic elegance', sums up the proportions.

Also in this issue of *Country Life*, the garden article by Leslie Geddes-Brown, 'Docks and nettles are no longer required' (pp.66-71), deals with Columbine Hall, Stowupland, Suffolk. The timber-framed house sits in a moat on a brick platform (see also the cover of this issue of *Country Life*). The property includes a 1960s farm office in Woolpit whites (p.71).

2. Richard Hewlings, 'Urbs in Rus: Raynham Hall, Norfolk, Part I',
Country Life, 30 March 2016, pages 40-46.
Richard Hewlings, 'A Turnip's Touch: Raynham Hall, Norfolk, Part II',
Country Life, 6 April 2016, pages 48-54.

Almost four decades ago, a young man less than half the age he is now walked up the long, ascending drive of Raynham Hall to be met by the Marquess Townshend's head gamekeeper, gun in hand, to counter the array of cameras swinging from the other's neck. A request to take photographs of the exterior of the house was politely refused.

The present Raynham Hall began as the third set of building works attempted to provide a new home for Sir Roger Townshend; building work progressed between 30 August 1619 and 1 January 1637, when Sir Roger died. The first set were additions to Raynham Old Hall, a fifteenth-century brick house of which there are extensive ruins in the valley beneath the present house. Second, building work was commenced in March 1621 on a completely new house but after accidents it was abandoned early in 1622 in favour of the site occupied by the present house, work on which was begun on 25 March 1622 under the direction of William Edge, Sir Roger's master mason: earlier that year the joiner, Thomas Moore, had presented a wooden 'modell of the newe house'.

The patron was eight when he inherited the Townshend estate in 1603: at twenty-two, in 1617, he was knighted and awarded a baronetcy, the hereditary knighthood instituted by James VI and I partly as a means of raising much needed cash. At twenty-five Townshend was permitted to go abroad for almost six months; on his visit to Italy, Sir Roger was accompanied by William Edge. Edge is a man of many talents: master mason, supervisor and instructor of carpenters, draughtsman both of plans for Raynham Hall and views and plans of contemporary houses, including Sir Edward Cecil's Wimbledon House. Sir Roger had serious architectural

interests: his purchases for his library included 'many Italian and French books of architecture' and he made repeated visits to buildings by Inigo Jones in Newmarket, in London, and in Northamptonshire; his travels with his master mason took in buildings by Jones' subordinates, Nicholas Stone and Edward Carter.

In the first article, Hewlings makes a persuasive case for William Edge as the designer of Raynham Hall on the basis of a payment for '22 days for "platting" [making designs], three for the bridge over the River Wensum and 19 for the new house' (I, p.42). The designs were strongly influenced by Inigo Jones and, to a lesser extent as far as taste was concerned, Sir Roger Townshend.

Neither main façade at Raynham has survived as it was originally built. Hewlings includes two of the drawings made in 1671 (I, p.42) when Charles II was entertained by Townshend's grandson. The features shown on the drawings are ones common in houses built for aristocrats to the designs of Inigo Jones and his circle in the two decades before the English Civil War. Hewlings shows that in many cases, these individual features were used for the first or second time at Raynham Hall.

The second article examines the changes to the house in the second half of the seventeenth century and in the eighteenth century. After a political career spanning the first decade and half of the Hanoverian kings, Charles, second Viscount Townshend (1674-1738), devoted his life in the 1730s to agricultural improvement on his extensive estate, thereby earning the soubriquet 'Turnip Townshend'. His improvement of the house had begun much earlier. As a young man freshly home from the grand tour, in the middle years of the eighteenth century's initial decade, he had the exterior of Raynham Hall remodelled: Hewlings has a colour photograph of the west front of the house in its park (II, pp.48-49). The west front retained the earlier grand temple frontispiece in the centre although a door replaced the central ground floor window here. The other change from 1671 and earlier was the complete replacement of the fenestration: sash windows were inserted where there had been mullions and transoms in the outer two bays and the centre. In the recessed portions immediately flanking the centrepiece, new pairs of sash windows replaced the arrangement of a door flanked by two windows on the ground floor and the multiple mullions of the single window on the first floor. Except in the outer bays and the centre, the attic storeys have been removed.

On the east front (I, pp.40-41), the doors at each end of the great hall were replaced by a single central door and sashes replaced mullions and transoms in the windows. The single attic storey was retained on the east front; after all, the servants do have to sleep somewhere! On both fronts, the attractive round windows in the shaped gables were retained. Hewlings gives details of the probable internal changes done in 1704-07 and tells us that Matthew May was in charge of the work, with Miles Pomeroy as chief mason and William Edge as foreman carpenter; the last-named probably a relation of William Edge who had designed the house in 1622. May had previously worked for Townshend's father-in-law, Lord Pelham, at Halland Place, Sussex, the replacement for Laughton Place, the house built in 1534 for Sir William Pelham; it illustrates the importance of family (and political) connections in architecture.

The major internal alterations of 1724 to 1732 were to designs by William Kent but executed under the supervision of Thomas Ripley. Simultaneously, Ripley was working elsewhere in Norfolk: at Houghton Hall for Sir Robert Walpole, Townshend's political associate and brother-in-law, and at Wolterton Hall for Lord Walpole, the politician's brother. Workmen, particularly senior ones, appear at all three houses and at Narford Hall, then under reconstruction for Sir Andrew Fountaine. After 1727, Ripley added a service range north-east of the house.

In subsequent decades of the eighteenth century, the stables by Old Raynham Hall were enlarged, with William Goodwin as the bricklayer in charge, and proposals in 1767 by Robert Adam for a drastic redesign did not proceeded. The nineteenth century was a quiet one for the house but it returned to being inhabited by the family in 1921. Work done in the late 1940s and since 2010 have been to make the house a family home.

The two articles produced some lively correspondence in subsequent issues of *Country Life*. A letter from James Bettley on 20 April 2016 reproduced a watercolour of Somerleyton Hall, Suffolk, before it was drastically refashioned by the sculptor James Thomas for Morton Peto, the Victorian railway contractor. The house is conventionally dated to 1610 and was visited by William Edge in 1619. The watercolour shows concave sides and scrolled feet to the gables on the towers at either end of the house. Bettley also drew attention to the 1931 doll's house made by the estate carpenters for the fifth birthday of Mary Crossley and to a drawing by Henry Davy, published as an engraving in 1827. Robert Pawson's letter, published in the edition of 11 May 2016, notes another engraving 'drawn by J.P. Neale' engraved by R. Acon and published by Jones & Co, Temple of the Museum, Finsbury Square, London.

3. Judith Hill, 'Pot-walloping Palladianism: Kilshannig, Rathcormack, Co. Cork [Ireland]', *Country Life,* 15 June 2016, pages 60-65.

As Hill remarks, one aspect of 'the grandeur' of this house derives from 'the use of brick on the main front, a material still possessing a degree of novelty in this region' (p.63). Brick is used for the main front except for the quoins and a Doric frontispiece of cut stone, and also for the curving walls enclosing the front courts either side of the house continued into the side walls beneath the hipped roof of the five-bay front outbuildings. Most of the walls of these are of roughly-cut stone. The house is even bays of two-and-a-half storeys above a basement, but the mezzanine between the two main floors is two small rooms only.

The title of the article derives from one of its purposes: to act as a viable centre for the patron's political activities. Rathcormack was one of eleven boroughs sending members to the Parliament in Dublin where the franchise was open to 'any man with a hearth to boil (or "wallop") a pot: hençe 'pot-walloping', a term of abuse for a parliamentarian elected by a small electorate, in Rathcormack a mere seven persons in 1783 (p.63, caption).

The building's patron was Abraham Devonsher (1725-1783) who was raised a Quaker but in April 1756 rejected his family's religious affinity and was disowned 'for his conformity to the world and because he has offered himself as parliamentary candidate for Rathcormack', to quote Quaker Testimonies of Disownment (p.61). In 1757, Devonsher secured his first election victory, because as he was described after his fourth and final success in 1772, he was one among the 'very few who stoop so low as to conciliate a free popular vote … He came in here [the parliament in Dublin] by constantly residing and entertaining & drinking with the people; it is a pot-walloping B[orough]' (p.62). The entrance hall was created as a one-and-a-half storey space in which to entertain constituents. But in the 1770s, Devonsher was living 'a recluse life with a Harlot' (p.64). Thereafter, he lost his seat in the 1776 Irish election.

Devonsher was fortunate in his architect, Daviso de Artcourt (*fl.*1761-1788), recorded in Ireland as Davis Ducart, who was a mixture of surveyor, canal engineer, and architect. Of Italian origin, he was familiar with Andrea Palladio's works, not least *The Four Books of Architecture* (1570) which recommended that a villa was for 'seeing at a distance and being seen'. The main hall has views across the valley beyond Rathcormack and the house, approached by steps up to a podium, is set above the surround ground.

Ducart provided a family home, even though the client was nominally a childless bachelor. The ground floor has the main hall, flanked by a library and a dining room. Service rooms were in the basement. Bedrooms occupied the full second floor.

4. Tim Longville, 'Surprises around each corner: Thorpland Hall, Thorpland, Norfolk,
Country Life, 30 December 2015, pages 38-43.

Actually an article about the gardens, tended by the present chatelaine, Annabel Savory. Members may wish to look at several of the photographs which show different views of the house and its clusters of brick chimney stacks. The house, built by the Fermour family of nearby East Barsham Manor, in about 1500, had 25 hearths in 1664.

5. Tim Longville, 'The Beauty of Continuity: Heale House, Middle Woodford, Wiltshire',
Country Life, 2 March 2016, pages 58-64.

Another article on the garden rather than the house, but it has a double-page spread showing the multi-period house of red brick in English Bond with much stone used for the quoin, the doorcases, the mullions and transoms of the windows as well as their surrounds, the cornice, and the pediments. Originally built in the sixteenth century, Heale House was extended in the succeeding one but partly destroyed by fire in the Victorian years. In 1894, the Hon Louis Greville engaged Detmar Blow (1867-1939) to rebuild and extend the house, retaining the original work at the south-west end. It is difficult to tell which is late Victorian and which is much older.

The late Victorian garden was laid out by Harold Peto (1854-1933). After Greville's death in 1941, the new chatelaine, Lady Anne Rasch, enhanced the garden over the next four decades. In the garden, a Japanese theme predominates and can be visited on Wednesdays to Sundays.

For an architectural account of Heale House see N. Pevsner, rev. B.K. Cherry, *The Buildings of England: Wiltshire,* 2nd ed., London: Penguin Books, 1975, page 595.

In the same issue of *Country Life,* an interview with Julian Thomas, the new headmaster of Wellington College, has on page 37 a fine photograph with the brick buildings of the school in the background.

6. David Robinson, 'England's Nazareth: Walsingham Priory, Norfolk'
Country Life, 23 March 2016, pages 34-41

Low church Anglicans may find the tourist trap of Little Walsingham unattractive: it smacks a little too much of Mariology. However, the remains of the priory can be appreciated architecturally.

The article is thorough and has an important photograph (p.36) of the surviving part of the vault of the undercroft of the eastern cloister range; the three southernmost three bays of the nine-bay undercroft with twin naves of the dormitory range were incorporated in the eighteenth-century Abbey House. The stone central pillars are octagonal but the wall-shafts are semi-circular. Between the single-chamfered, quadripartite ribs in stone, the infill of the vault is carefully laid red brick in courses which more or less precisely meet to give neat angles. Whilst the lower parts of the eighteenth-century north wall are of re-used rubble stone also incorporating some early brick re-used, its upper part within which are two recessed windows are of red brick in English Bond.

The surviving part of the undercroft is beneath the room with a large oriel window on the north side of Abbey House (see photograph on pp.34-35). The 1720 house of brick was largely rebuilt in 1806-16 for the Rev Henry Lee-Warner by the architect, John Haverfield; at some point in these ten years, stucco cut to resemble ashlar was installed.

The use of brick as the infill of a stone vault in an early-fourteenth-century undercroft in north Norfolk should not come as a surprise, although no previous commentator appears to have mentioned this use at Little Walsingham Priory. Ten miles east, in the coastal port of Blakeney, the Guildhall had a brick-vaulted undercroft with four bays of brick, quadripartite rib vaults on central octagonal stone piers. The surviving remains of this building also includes a brick-arched doorway and a brick-built chute to a garderobe on a now missing upper floor.

In Norwich, the surviving remains adjacent to the church of the Dominican Friary, now St Andrew's Hall and Blackfriars Hall, include an undercroft at the south-east corner of the cloister. The undercroft formed an entrance chamber to the lower part of the now destroyed Becket's Chapel. The square undercroft has a single central stone pillar but with a brick vault, and dates to 1307 or soon after.

Formerly in Suffolk, the remains of St Olave's Priory include the undercroft of the refectory range, built around 1300. It has octagonal piers of Purbeck marble, actually a black limestone, and a vault, both ribs and infill, of red brick. These remains were visited by members of the British Brick Society in 1990.

7. Matthew Symonds, 'Curtain Call: an Elizabethan Playhouse',
Current Archaeology, **316,** July 2016, pages 36-41

This article describes a recent excavation in Shoreditch, London EC2, by my erstwhile employer, Museum of London Archaeology (MoLA; formerly Museum of London Archaeology Service). It was directed by Julian Bowsher (a much respected ex-colleague and the author of *Shakespeare's London Theatreland: Archaeology, History and Drama,* London: MoLA, 2012) and Heather Knight.

A wall of typical pre-Fire London red bricks in English Bond seems to have been a garden wall later incorporated in The Curtain theatre, which is known to have been in use by 1577. (Curiously, it does not have an entry in S. Wells, assisted by J. Shaw, *A Dictionary of Shakespeare,* Oxford: Oxford University Press, 2005.) The reused wall apparently separated the stage from the backstage area — the 'green room' to put it anachronistically. Against it were added dwarf walls of 'subtly different' red brickwork (p.38): it would be good to know about the difference. These walls supported timber-framed galleries on three sides of a rectangular courtyard. The principal entrance was in the site opposite the stage.

Of particular interest is the fact that this theatre — accepting that it *is* such, for the article offers more assertion than evidence — is different from the polygonal type — the 'wooden O' of *Henry V,* Prologue, 13 — long known and now familiar from the reconstructed Globe on London's South Bank. It 'evoke[s] another form of venue where Elizabethan audiences had grown used to seeing plays: inns. So, is the Curtain a missing link in theatre architecture …?' (p.39). More probably, I think, it simply represents an alternative theatre type, already known, archivally if not archaeologically, as the article acknowledges, 'in the Elephant and Castle area' (p.39). Since that has long been known, the article seems a little over-excited.

It will be good to see the final report in due course. From that, we may learn more about the bricks and the brickwork — including that subtle difference — and about the evidence for identifying these meagre footings as those of The Curtain. By the time of that report, incidentally, one hopes that MoLA will have learned the difference between x metres square and x square metres (or x m^2: see Bowsher, 2012, pp.98, 133, 170): it is not, as they say rocket science!

T.P. SMITH

Brick for a Day

The British Brick Society has held two meetings in Spring 2016: a walking tour of Stourbridge, West Midlands, on Saturday 16 April 2016, and the society's Annual General Meeting in Chichester, West Sussex, on Saturday 21 May 2016. Due to unforeseen circumstances, the London Meeting in Chelsea on Saturday 18 June 2016 had to be cancelled.

DHK

STOURBRIDGE, WEST MIDLANDS

Stourbridge proved a happy hunting ground for members of the British Brick Society allowing the examination a range of secular and ecclesiastical buildings. An article is in preparation for a future issue of *British Brick Society Information* on the brick churches, chapels and mosque in the area of the former Borough of Stourbridge. Brick buildings whose exteriors were seen included two for the Methodist Church (1886; and 1927, Crouch, Butler & Savage) and one for the Roman Catholic Church (1864: E.W. Pugin; 1890, G.H. Cox), both on New Road; the parish church dedicated to St Thomas (1728-36: William Westley); and the Unitarian, formerly Presbyterian, chapel of 1788 on Lower High Street. In Amblecote, the group saw the buildings of Amblecote Christian Centre Brettell Lane; the Amblecote and Wordsley Methodist church of 1993; and the Anglican Holy Trinity, whose stamped bricks aroused much interest.

A notable public building seen early in the walk was the former Library, Grammar School for Girls, School of Art, and Technical Institute, currently used as art studios and commercial offices on the corner of Hagley Road and Church Road, constructed in 1904-05 to the designs of town surveyor and architect, Frederick Woodward. In a dull red brick laid in Flemish Bond, the building was ornamented with buff terracotta. Rear walls are less elaborate and plain.

In the town centre, the group viewed the former Town Hall of 1887, by G.T. Robinson (1827-1897), a man with practices in both Wolverhampton and Leamington Spa. In red brick laid in Flemish Bond, the decorative accents are provided by the extensive use of unglazed red terracotta. The building is now used as offices and a public hall. The façade is approximately symmetrical but the tower is placed away from the exact centre.

On Lower High Street and facing the gyratory are the buildings of King Edward VI College, founded in 1430 as the guild school and refounded in 1552 after the suppression of chantries. In 1862, local architect Thomas Smith (*fl.* 1845-1872) designed a school hall with a main frontage to Lower High Street. Additional buildings were erected adjacent to this in 1908 and 1911. More recent buildings face the gyratory. All buildings have their public face using a light yellow brick, allow the exact shade varies.

Also on Lower High Street are a number of interesting houses, not least a three-storey, five bay house, with two canted bays; it has Gothick windows. Mike Kingman commented on similarities to a house in Brewood, Staffs., built from the profits of a bet on the winning horse The Derby.

Outside of the town centre, the group saw the only remaining complete glass cone in Britain, the Red House Cone. They were also shown the mural of glass cones picked out in a dark brown brick on a yellow brick background on the side of a wall of a supermarket in Amblecote, a neat touch to remind visitors and local inhabitants of the source of employment and wealth for the town.

CHICHESTER, WEST SUSSEX

The Editorial in *British Brick Society Information,* **133,** May 2016, was an extended article on some of the most noteworthy brick buildings of Chichester. After the Annual General Meeting, members were taken on a tour of the town led by Anthony Preston. Dr Preston informs me that he managed to show the party most of the buildings considered in the article, including Pallant House, the brick houses on East Pallant, the buildings on North Street, and John Ede's House, West Street.

Due to a sudden illness, the writer was unable to attend the Annual General Meeting. The society's thanks are due to Dr Preston for organising what was a most enjoyable afternoon.

Fig.1 Pallant House, North Pallant, Chichester, now an art gallery is the grandest eighteenth-century house in the city. It was built for a wine merchant, Henry Pelham, in 1712-13. He stored his wine in the semi-basement, the windows of which are visible in the outer wall topped by the iron railings.

Brick Query

From time to time, the British Brick Society receives enquiries about bricks, brickmaking, other ceramic building materials, and brick buildings. These are printed when space is available in *British Brick Society Information.* Responses are also included when these are forthcoming.

DHK

THE BRICKWORK OF ASHBURNHAM HOUSE, CITY OF WESTMINSTER

Ashburnham House, City of Westminster was built on the site of the Prior of Westminster Abbey. The date and architect are unknown. However, in an essay in *Westminster: The Art, Architecture and Archaeology of the Royal Palace and Abbey,* Leeds: Maney for the British Archaeological Association, 2015, the writer suggested that a possible date for the construction of the building was 1667/68 and that the architect was John Webb.

The view which is seen by the majority of people today is of the north front; the entrance to the house is now on this front. This is built of London stocks, now pointed with a mixture of light-coloured and very dark mortar. But, it is more probable that the original entrance was on the south side where red bricks are used and these are gauged bricks. At some stage, date unknown, the whole façade was repointed using a dark mortar but where this mortar has come away, it is clear that the original mortar was red. The brickwork on this side would have presented a uniform red wall.

Three questions which have occurred to me are:

- What was the likelihood of red brick being used in the 1660s and more generally in the second half of the late seventeenth century in London and Westminster?
- What was the prevalence of the use of red mortar in the late 1660s and more generally in the second half of the seventeenth century?
- Did John Webb use such brickwork and make use of red mortar?

Not being an architectural historian, there may be other questions which could be relevant.

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BRITISH BRICK SOCIETY
MEETINGS in 2016 and 2017

Saturday 1 October 2016
Brickworks Meeting
Wienerberger, Kingsbury Works, Staffordshire
The works adjoins the Birmingham to Derby railway line, and is near Wilnecote Station between Tamworth and Burton-on-Trent. It is one of only two works still producing Staffordshire Blues.

A Saturday in May 2017
Annual General Meeting
Port Sunlight, Wirral, Merseyside
Estate village erected for the workers at the Port Sunlight factory of Lever Brothers in the late nineteenth century and the first decade of the twentieth. Bromborough, an estate village for the workers at Price's candle factory is nearby.

Planning for visits in 2017 is in progress and dates will be announced in the next mailing: one will be to Stafford in on a Saturday in June 2017 and it is hoped to arrange a visit to one of Slough, Alvechurch, Worcs., or the industrial area of Worcester on a Saturday in July 2017.

At the 2016 Annual General Meeting in Chichester it was agreed to hold the 2018 Annual General Meeting in St Albans, Hertfordshire, on a Saturday in May 2018.

All meetings are subject to attendance at the participant's own risk. Whilst every effort is made to hold announced meetings, the British Brick Society is not responsible for unavoidable cancellation or change.

Details of the Brickworks Meeting are enclosed with this mailing.
Full details of future meetings will be in the subsequent BBS Mailings

The British Brick Society is always looking for new ideas for future meetings.
Suggestions of brickworks to visit are particularly welcome.
Offers to organize a meeting are equally welcome.
Suggestions please to Michael Chapman, Michael Oliver or David Kennett.

Changes of Address

If you move house, please inform the society through its Membership Secretary, Dr Anthony A. Preston at 11 Harcourt Way, Selsey, West Sussex PO20 0PF.

The society has recently been embarrassed by material being returned to various officers from the house of someone who has moved but not told the society of his/her new address.