DERBYSHIRE MISCELLANY

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A RE-EVALUATION OF THE DESTROYED CHURCH OF ST GILES

NORMANTON-BY-DERBY

(by Judith Raven, and the Normanton-by-Derby Local History Group, with notes on the tower by Jennifer Alexander, Department of Adult Education, University of Nottingham)

Introduction

The Normanton-by-Derby Local History Group has been researching the history of the district for a number of years and is currently investigating the history of the parish church. The present building dates from the 19th century and replaces a medieval building which was demolished to make way for it. As was common in those days little attention was given to the old building and the only record of its architecture and sculpture before demolition was one published article by Llewellyn Jewitt. J.C. Cox did not have first-hand knowledge of the building and relied heavily on this when he included St Giles' Church in his history of the churches of the county. Recent research by the Normanton-by-Derby Local History Group has centred on a water-colour drawing of the interior of the church which strongly suggests that the original church was older than had been appreciated and the building needs to be re-evaluated in that light. Whilst the building does not survive, its place in the development of the early architecture of the region requires that a record be made of it to ensure that the picture is more complete.

Part 1: The Present Church

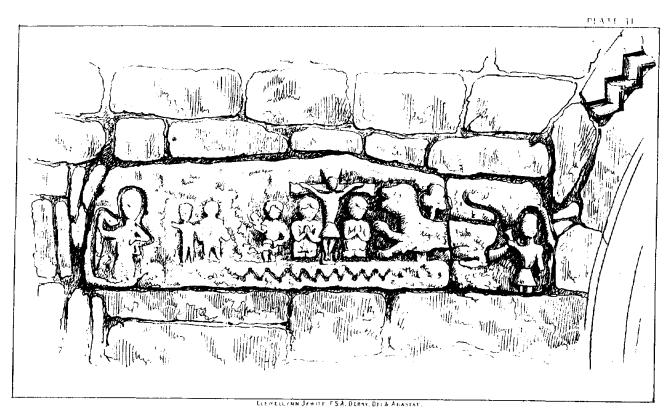
Starting with the history of the present building, in the *Derby Mercury* dated 18th July 1860, architects were invited to submit plans and specifications for the erection of a new church at Normanton, provide about 300 sittings, open pews and no galleries. Messrs. Giles and Brookhouse, Architects, of Victoria Chambers, Derby were entrusted with the work and the church was built to a design by F.J. Robinson, the pupil (and later partner) of Henry Isaac Stevens. Stevens was a well-known local architect who was responsible for the design of many churches in Derbyshire and neighbouring counties, including St Alkmund (demolished 1967) and St Michael, Derby and the village churches of Mackworth, Allestree and Mickleover. He also designed Osmaston Manor (demolished 1964) and Osmaston church. St Luke's church in Parliament Street, Derby is another example of Robinson's work.

The new church was opened amid great rejoicing on Tuesday, 13th May, 1862. The *Derby Mercury* reported that the weather was good and the villagers had decorated the streets of the village with triumphal arches and garlands. Over the entrance to the churchyard was a floral design, painted in Old English script - "Enter into His gates with thanksgiving and into his courts with praise". In 1893 the little church had to be extended, as in this short space of time Normanton was no longer a small village surrounded by fields but was on the edge of a large built-up area. In 1899 the vicar and churchwardens had launched an appeal to raise funds for a major extension to the church and the foundation stone of the new chancel and nave was laid by Fitzherbert Wright on 15th November 1902.

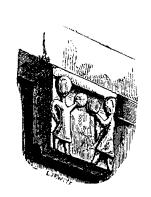
Part II: The Medieval Church

But what of the old church? Although there is no mention of a church at Normanton-by-Derby in the Domesday Book, we know that a chapel was there in the 13th century, perhaps built, or rebuilt, as a result of the manor of Normanton being given to the Canons of Darley Abbey in 1234. The first historical mention comes in 1288 when the Abbot of Darley, as Rector of St Peter's, Derby, had a dispute with the parishioners of Normanton and Osmaston respecting repairs to their chapels. It was settled by an award of the Archdeacon of Derby that "the canons shall repair the chancels of the said chapels..." (Cott MSS Titus C ix f101).

In 1861, with the exception of a sculptured stone, all evidence of the church's earlier history was destroyed, seemingly without a second thought. Fortunately for us, in *The Reliquary* of July 1861 Llewellyn Jewitt has given a detailed description of the building, illustrated with woodcuts. As he himself says "but for this, the building would have passed away, without any description or pictorial record of its architectural character remaining".



SCULPTURE BY THE SOUTH DOOR NORMANTON CHURCH, Derby shire.







Drawings by Llewellyn Jewitt of Norman features in the old Normanton Church

The Norman features of the old church included a corbel table, with carved heads, which ran the entire length of the nave on both sides. Jewitt made drawings of two of these heads and also of the two curious figures on one corbel, which was larger than the others, at the west end of the table, under the buttresses of the tower. However, he found the most interesting thing about the church to be the south doorway with its pointed arch of Decorated character and zig-zag dripstone and the piece of sculpture adjoining it. The sculpture stone he considered to have been the tympanum of the original round-headed doorway to which the zig-zag decoration had belonged. When this was taken down and a new doorway inserted the zig-zag moulding was re-used and the tympanum built into the wall.

This stone, which Jewitt records as being in a very dilapidated state, suffered further damage from the weather when it was again built into an outside wall near the base of the tower of the new building (J.C. Cox, *Notes on the Churches of Derbyshire*, Vol iv, p162). It was brought inside and set in the wall of the south porch when the church was enlarged in 1902-3. The design has almost entirely worn away but it is possible to see the Crucifixion represented in the centre. From the drawing made in 1861 it can be seen that the feet of Christ are shown separately side by side. As crossed feet were not introduced until the early thirteenth century this is understood to be an indication of earlier work.

In comparing Jewitt's drawing of the Normanton sculpture to tympana in other churches in the county we have found few similarities. However the figure of a bishop in the left-hand side is similar to one on the early Norman tympana in Hognaston church and the beast on the right corresponds roughly to the beast, or wolf, with long claws and its mouth open, on the tympanum, said to be Saxon, at Parwich church. The depiction on the Normanton tympanum or lintel of Jesus Christ in human form instead of as a lamb with the cross, as seen for example at Parwich, indicates post eighth century work.

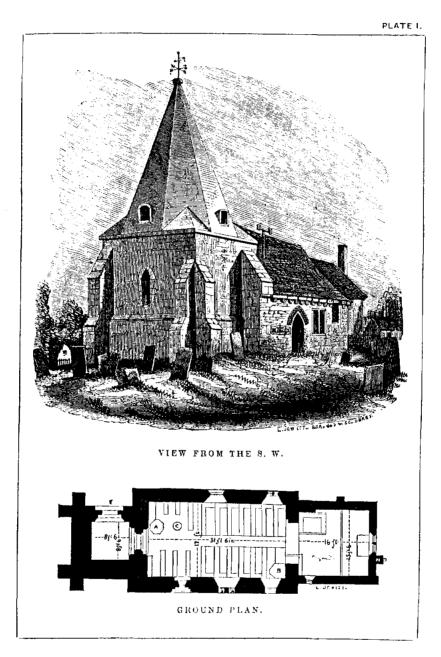
The Grangerised edition of Lyson's *History of Derbyshire* illustrated by Harriot Georgiana Mundy, wife of William Mundy of Markeaton Hall, has a water colour of the interior of the old church showing the tower arch, in Vol 3, p126A. It is dated 1856, the work of Mrs Mundy, whose initials appear under it. Our thanks are due to Derby Local Studies Library for permission to reproduce the picture here. Another example of Mrs Mundy's work is a copy of the Luttrel Psalter of the 14th century which she illuminated in 1842 in exact imitation of the original. This is also in Derby Local Studies Library.

Part III: The Drawings of the Previous Church

The destroyed church of St Giles is chiefly known from Jewitt's article in *The Reliquary* of July 1861 which had both recorded and illustrated the building's appearance before its destruction in May of the same year. Cox later published an account of the church which was largely dependent upon Jewitt and little further attention has been paid to this building (J.C. Cox, *Notes on the Churches of Derbyshire*, Vol iv, 1879, p161-2). The evidence is for a reworked Norman church that by the time of its destruction consisted of a nave and chancel with west tower and spire. The Norman material consisted of a corbel table that ran down both sides of the nave under the eaves and was possibly therefore *in situ*, several reset panels including a tympanum or lintel that was carved with figures and an order of chevron ornament that had been reused over a pointed arched door.

The west tower, shown in Jewitt's drawing from the exterior, had a lancet window in the west wall and clasping stepped buttresses to NW and SW corners. A large buttress on the SE corner of the tower had been created from the west wall of an earlier nave that had risen higher than the roof level of the south wall. Cox dated the tower to the EE period from the lancet window and the stepped buttresses and noted that the height had been reduced to its final 20ft at the period when the spire was added, probably in the 19th century. Jewitt's article, and watercolour drawings of the interior of the church, suggest that the tower had been earlier than the 13th century, and it is possible that it belonged to a pre-Conquest church.

To consider Jewitt's description first. His drawing of the tower from the exterior SW shows that the west wall of the south side of the nave embraced the south wall of the tower. This arrangement would have left the SE corner of the tower visible inside the west end of the nave and this is a feature more commonly associated with pre-Gothic west towers than with 13th century ones. More importantly Jewitt describes the tower arch rising to the height of the roof of the nave whereas the chancel arch, which he correctly identifies as a Norman arch from its scallop capitals and inset shafts, rises less than 6ft. On Jewitt's plan the tower arch is shown with a narrower



THE OLD CHURCH OF ST. GILES, NORMANTON, DERBYSHIRE.

inner order with a chamfer to both east and west faces. The wall thickness is given as 3' 3" and the internal width and length of the tower as 8' 6".

The tower arch is illustrated in a watercolour drawing in the Mundy Lyson's Grangerised edition of Lyson's History of Derbyshire, Vol 3, p126A. This shows the arch as a tall narrow opening of two stepped orders with imposts, but not capitals, that continue as a string course on either side of the arch. The head of the arch is covered by a timber beam but it was clearly round headed. Its marked height relative to its width and the absence of capitals would suggest an early date for this arch, possibly pre-Conquest, although a certain amount of caution is necessary. It is not possible to tell from the drawing how the arch has been constructed, there appears to be a coating of plaster over the surface, and the confirmatory details for an Anglo-Saxon date, such as the presence of through-stones are absent. Nonetheless the continuation of the imposts as string course can be found on a number of Saxon tower arches, from Barnack to Cambridge, Brigstock, Rothwell and Skipwith. The large size of the arch also demonstrates that the tower was intended to form part of the liturgical space of the church and function perhaps as a baptistery or sanctuary, rather than act as a porch to the building as would be case if the arch was small scale. Comparative examples are Bosham, Lavendon, Skipwith and Whittingham which also have no exterior door. Jewitt's plan shows an opening on the North side of the tower but his text describes it as newly inserted. In summary it may be suggested that the west tower of St Giles' church, Normanton-by-Derby contained fabric that was earlier than the evidence of the lancet west widow and stepped buttresses would indicate. The watercolour drawing shows a tower arch constructed to Saxon principles and this together with the dimensions of the tower would support an early date for the structure. It is unfortunate that the tower was reduced in height but from the evidence of the tower arch it was clearly a major structure. It is possible that the exterior west wall that Jewitt drew survived from a building earlier than the south wall of the nave although the evidence for this is slight. What can be suggested is that both the buttresses and the lancet window that Cox read as evidence for a 13th century date for the tower were additions made to an earlier building.

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FOUND: THE SITE OF AN EARLY WATER MILL IN SOUTH DERBYSHIRE

(By D.J. Baker,

Phillimore's Domesday Book for Derbyshire gives:

In STANTON. habuit Edward. 1. car træ 7 din ad gld. Tra
.11. car . Ibi tam st. 1111. car 7 dimid. 7 1111. fochi 7 1111. uilli
7 x1. ac pti. 7 molin. 11. folid. Ernui ten . Valuit 7 ual. xx. fol.
In Englesi. duæ partes. 1. bo træ. In Stantun jacet.

which is translated as:

M. In STANTON (-by-Bridge) Edward had 1½ c. of land taxable.
Land for 2 ploughs. However, there are 4½ ploughs.
4 Freemen and 4 villagers.
Meadow, 40 acres; a mill, 2s.
Ernwy holds it. The value was and is 20s.
In INGLEBY 2 parts of 1 b. of land. It lies in Stanton (lands).

Stanton-by-Bridge was one of only seven places in the Repton Wapentake recorded as having a mill. The others were at Walton-on-Trent (value 6s 8d), Melbourne (3s), Repton and Milton (two mills but no value given), Croxall (two mills valued at 18s), Foremark (2s) and Lullington (6s 8d). As the value of the Stanton manor was still the same in 1086 as it had been before the Conquest, it has been assumed that its mill dated from pre-Norman times; with a valuation of only 2s, it was one of the nine lowest-valued mills out of some fifty mentioned in the Derbyshire Domesday Book.

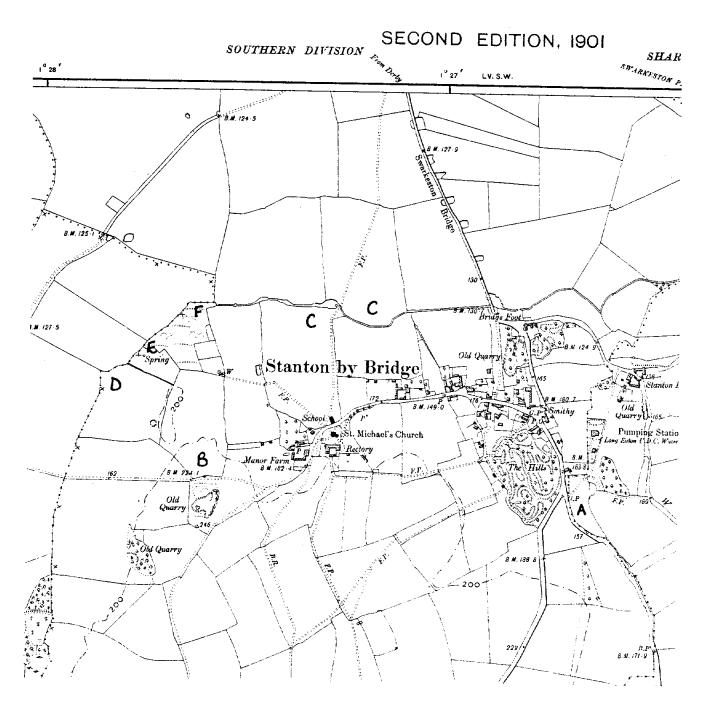
But where was this mill? It is only after extensive research which produced vague references to a mill in the area where none exists today that a final decision could be reached.

The first document examined was the Enclosure Award¹ of the mid-1760s. Here one of the open fields was known as the Dam Field; elsewhere it was referred to as Newton Field, so possibly there had been a mill on the eastern Kings Newton side of the parish. Puddle Dam Pool is shown on a map in 'The Survey of the Lands of Lord Theophilus Hastings' in 1753².

As the location map shows, two hundred and sixty years later a field of the same shape and area as this Puddle Dam Pool is still recognisable to the east of the present B587 Stanton to Melbourne road (Grid Ref. SK 375 270) and the dam can still be identified in spite of extensive disturbance of the ground when the Long Eaton Water Works were constructed in the early 1890s.

Earlier references to this area include a certificate of 1673/4 exempting payment of Hearth Tax³. It is for John Wright of Stanton-by-Bridge who is described as living in 'a poor smale house belonging to the Earl of Huntingdon at the poole hed called Puddle Dam, which house and a little croft belonging to it is but five shillings a year rent John Marshall, a baker, lived in it and so by useing the herth for his trade did pay, but this man is a weaver and a poore man.'





LOCATION MAP

- A Site of Puddle Dam Pool
- B Possible site of windmill in 1619 will
- C Water meadows identifiable in air photographs
- D Leat
- E Mill pond
- F Tail race

So it is clear that, if there had been a mill here, it was no longer in use as such in the 1660s. However, Mr. Sacheverell (who had a lease on the Stanton demesne and manor house) was renting the Pudledame in 1589⁴; earlier in 1526⁵ and in 1513⁶ Ralph Francis de Stanton was paying 'vjd' for the 'stagnum de Boddale'. Obviously Boddale had become Puddle in the course of the sixteenth century. But if there had been a water-mill on this site, it could not have been in the one mentioned in the Domesday Book as it would not have been in Stanton but on the very edge of Melbourne parish.

In his will drawn up in April 1619⁷ Richard Harpur left his manor of Stanton to his wife, Dame Isabel, and this included twenty messuages and gardens, a dovehouse and a mill as well as land. The inventory, dated 20 November 17 James I⁸ shows the mill was a windmill - so this could not be the watermill of 1086. But where was this windmill situated? The obvious place would have been on the higher ground to the west of the church and manor house, in the area marked Mylne Field on the 1608 survey⁹.

And so the matter stood until aerial photographs of the area were examined at the Royal Commission on the Historical Monuments of England at Swindon in February 1996. Taken on different flight paths, at different altitudes, different times of day and season over a period of fifty years, these photographs clearly showed many unexpected details. A series taken in December 1946¹⁰ was particularly informative, showing rather narrow water meadows below Stanton village on both sides of the brook which flows from Seven Spouts, Ingleby and on in an easterly direction under the southern end of Swarkestone Bridge and on to the Trent; it also showed medieval ridge and furrow on the slope down from the village to the water meadows. (By 1608 this area was enclosed as long crofts behind the houses.)

But the most satisfying information, as least for this present research, was the discovery of the site of the mill of the Domesday Book: the photographs showed a leat from the brook supplying a long narrow mill pond at SK 363 274, a dam and a long tail race to take the water back to the brook. The name Mylne Field of the 1608 survey must have originated centuries before Richard Harpur's windmill was constructed possibly towards the end of the sixteenth century.

It was now necessary to field walk the area. Part of the leat had disappeared, obliterated by modern farming as far as the present fence: Mr Spread, who farms this land, accompanied us on a later visit and explained that he had filled in the leat which had left the main brook at a point where the water flowed faster and had slightly changed and deepened the course of the brook itself to improve the drainage in the area. To the east of the fence the ground had not been disturbed to the same extent and the mill pond was still recognisable, lying parallel with and close to the brook; there was still evidence of the dam and the tail race which returned water back to the brook.

Aerial photography developed during the last war has opened up new sources for historical information and has helped to solve where a small Derbyshire mill working nine hundred years ago was situated, but unfortunately new evidence like this is fast being destroyed on the ground. Here in the parish of Stanton-by-Bridge the earlier photographs showed medieval ridge and furrow right down to the Trent in the meadows both sides of Swarkestone Bridge but by 1962 half the fields to the west of the bridge had succumbed to gravel extraction and by 1967 the rest had been worked and all sign of medieval farming had been totally obliterated. If the gravel deposits had been sufficient to encourage quarrying on land south of the brook it would not have been possible to check on the ground what the aerial photographs indicated in this area and the site of this Domesday mill would have been lost forever.

Notes

It must be pointed out that this site is on private farm land and I am indebted to Mr. N. Spread for permission to visit the area.

I wish to acknowledge help and advice from Mrs J. Spavold, Miss S. Brown, Mr H. Usher and my fellow field walkers, Mrs L. Spare, Mrs G. Kidd and Mr R. Hatton.

I also thank the staff at Derbyshire and Leicestershire Record Offices and at R.C.H.M.E. at Swindon for willingly producing the documents which have made it possible to write this article.

The small map of Puddle Dam Pool is reproduced by permission of Leicestershire Museums, Arts and Record Service: Leicestershire Record Office.

References

- 1. Derbyshire Record Office, D2375M/71/185.
- 2. Leicestershire Record Office, DG30/Ma/M/1.
- 3. Public Record Office, E179/328/8 quoted in Derbyshire Hearth Tax Assessments 1662-70.
- Leicestershire Record Office, DE658/25.
- Derbyshire Record Office, D2375/104/36.
- 6. Leicestershire Record Office, DE658/24.
- Derbyshire Record Office, D2375/126/3/12.
- 8. Derbyshire Record Office, D2375/126/3/13.
- 9. Derbyshire Record Office, D2375/33/1.
- 10. Royal Commission on the Historical Monuments of England, CPE/UK/1865.

SOME SITES FOR DERBYSHIRE LOCAL HISTORY ON THE INTERNET

For readers with access to the Internet or to Cyber-cafes the Internet can be a useful source of research material. The sites listed below either supply fascimiles of original material or details about information in print or both.

Peak District Mines Historical Society Ltd (http://www.ex.ac.uk/-RBurt/MinHistNet/pdmhs.htm)

The Peak District Mines Historical Society has an interesting Internet site. The material which can be assessed includes: Preservation Project at Pleasley Colliery, Mansfield; Exploration work at Horsebuttocks Mines, Winster; Derbyshire Mining Industry: list of coal mines and owners 1896; Derbyshire Mining Industry: list of metalliferous mines 1896. The contents of their Bulletin, *Mining History*' are also listed. In the summer 1996 edition, the twelve articles include 'John Gell and the Miners: Legal struggles over Tithes of Lead Ore in Early 17th Century Derbyshire' by Ron Slack, 'An Ashover Lead Mining Tithe Dispute of the 17th Century' by S.R. Band, 'The History, productivity and Mineralogy of Snelston Mines, Ashbourne, Derbyshire' by Philip S. Jackson and 'The Oldest Artefact of Lead in the Peak: New Evidence from Mam Tor' by Graeme Guilbert. Their publications can be obtained from the Peak District Mining Museum Shop, The Pavilion, Matlock Bath.

Steam Engine Library (http://www.history.rochester.edu/steam/)

This site at Rochester University, USA, comprises of a collection of historical documents relating to the history of the steam engine. It contains complete copies of some out of print books about steam engines (including illustrations) on the Internet and a searchable database. Some of the books already on line include:

Thomas Savery, The Miners Friend, or an Engine to Raise Water by Fire, London, 1702.

Dionysius Lardner, The Steam Engine Explained and Illustrated; with an Account of its invention and progressive improvement, and its application to Navigation and Railways; including also a Memoir of James Watt. 7th edition, London 1840.

John Lord, Capital and Steam Power 1750-1800, London, 1923. Good history on the economic history of the early steam engine. Includes a lot of material on Boulton & Watt.

Thomas H. Marshall, James Watt (1736-1819), London, 1925.

Florence Nightingale - letters in the Clendening Library (http://www.kumc.edu/service/clendening/florence/florence.html and */flochron.html)

A selection of letters written by Florence Nightingale held in the Clendening Library of the History of Medicine at the Kansas University Medical Centre. An ongoing site where so far about 35 facsimile letters have been made available on various subjects, including several relating to Lea School.

"BEAUTIFULL DUST"

An appraisal of The Allestrey Monument in Derby Cathedral

(by Maxwell Craven, Keeper of Antiquities, Derby Museum and Art Gallery, The Strand, Derby, DE1 1BS)

Attached to the north aisle of All Saints', Derby, now Derby Cathedral, is a flamboyant classical monument to William Allestrey of Alvaston Hall (1598-1655). Although it appears to lack sophistication in design terms, it is well executed from Chellaston alabaster and Ashford Black Marble, and is notable for being one of the very few monuments surviving in England to show a representation of a contemporary coffin (Fig. 1).

At present it consists of a convex podium, or sarcophagus, of inverted bell shape, spreading from a scroll and swag base, decorated at the angles and either side of the centre line with acanthus leaf straps, topped by a cornice. Upon this stands a columned double tabernacle enclosing the coffin. This is in the form of two entablatures supported by four Ionic columns with pronounced entasis, the outer ones in alabaster, the inner ones of black marble - an eclectic, but probably original combination. Each element of this contains an alabaster plaque inscribed with text. That to the left (as one looks at it) contains the <u>curriculum vitae</u> of William Allestrey and the corresponding one to the right the details of his wife, Mary, daughter of William Agard, formerly Mrs Edward Smith. Between these two tabernacles is essentially a void, inadequately filled, low down, by an alabaster arch on a frieze, the tympanum being of black marble, and a small plinth riding through its centre supporting a wreathed skull. At the upper level, the Allestrey arms (presently tinctured incorrectly), complete with helm, mantling and crest and affixed to a black marble rectangle, rests with its lower ends seemingly precariously balanced on the rear of the two entablatures below. This is enclosed by a pair of armorials on strapwork roundels with spire finials. That to the left represents the quartered arms of Agard; that to the right Allestrey impaling Agard. At the foot of the monument is an alabaster plaque commemorating the death of Allestrey's daughter Grace, added later.

Although beautifully executed in parts, the entire monument looks wrong and there can be little doubt that originally its appearance was somewhat different. In this context it is worth bearing in mind that after 69 years in situ in old All Saints, it had to be moved onto a wall in the new church, designed by James Gibbs and completed in 1725. Had the Allestreys been extinct by that date, it may be that the memorial could have been discarded, but in being transferred (and no doubt stored in between times) it must have become seriously damaged. What remained was rather randomly and carelessly replaced.

It is worth wondering, therefore, what the monument could have looked like originally. The detailing suggests that it was executed by the same hand that carved the nearby monument to Richard Crowshaw (1636). It was probably erected in 1638/9, for the inscription on the sarcophagus below the coffin model carried the following touching inscription:

"Beautifull Dust] [Mrs Sarah Allestree

1 [wth 4 of her deare children

A wife most richly adorned] [as wth outward garment(s)

1 [so wth inwar(d) graces

With a religious heart towards God

A Charitable hand towards yf poore

and wth tender affection toward

Her husband & children

Who died ye 20th of September

1638 & lieth below interred.

In whose memory her husband

Caused this monument

to bee set up"

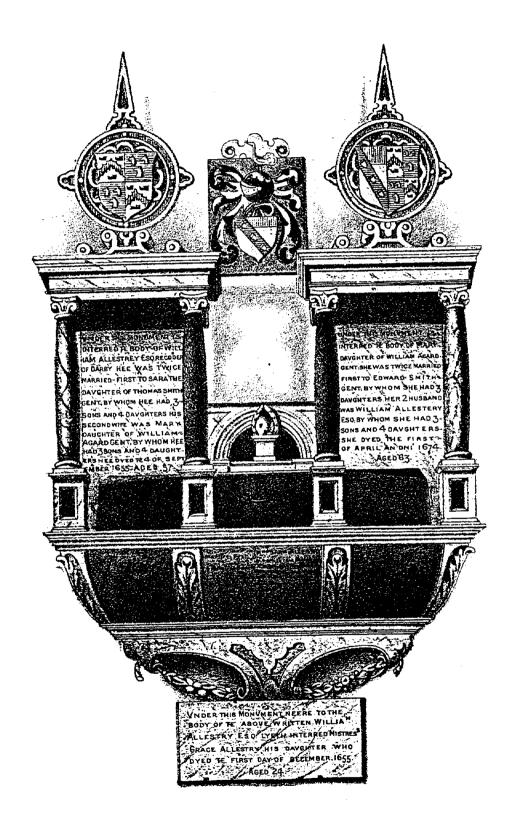


FIG 1: Allestrey Monument, Derby Cathedral, as it is.

Presumably the inscriptions to her husband and his second wife were cut onto the alabaster panels later, in 1655 and 1674 respectively. The sculptor could conceivably have been Edward Marshall (1598-1675) whoexecuted the extraordinary domed tabernacle to the 2nd Earl of Devonshire in 1638 (and which was destroyed in 1876). Allestrey's metropolitan connections might suggest that he obtained the services of a London man. Alternatively, it could have been Elias Grice the elder of Derby (d. 1661).

Fig. 2 represents a possible reconstruction of the monument as it would have looked originally. The armorials in the strap work roundels have been reversed so that the one illustrating Allestrey's arms as married to his second wife Mary Agard is over the inscription to Allestrey himself and that illustrating the arms of Agard alone is over the inscription commemorating the second wife. There are no armorials relating to his first wife because her father, Thomas Smith, a Derby merchant, was not armigerous.

It would also appear highly likely that the display of the full arms of Allestrey, now perching atop the monument, was intended to be shown centrally, between the two entablatured tabernacles. In its turn, this would displace the arched feature, which clearly belongs above the arms to link the two tabernacles, thus giving the effect of what we today call a "Venetian" window. The origin for this motif was presumably that at the liturgical east end of the Queen's Chapel, St James's', completed by Inigo Jones in 1627, and deriving from the <u>Serliana</u> used by Palladio, for instance at the Palazzo della Ragione at Vicenza, begun in 1549. The general effect resembles a Flemish 16th century altarpiece.

There being no other surviving portions, it is necessary to postulate a pediment, frieze and entablature to complete the central arch. Crowshaw's monument boasts a triangular pediment; the 2nd Earl of Devonshire's had segmental ones. In making the reconstruction I have quite randomly chosen the latter, although I accept that the former might be a more satisfactory solution, bearing Palladian precepts in mind.

It is worth noting, however, that the frieze supporting the central arch as surviving breaks forward at either end which suggests that it was originally supported by pilasters; if so - for I have not included them - the central armorial must have overlapped very awkwardly. The space below the arms may have been occupied by a further supplemental inscription as well.

William Allestrey was a most interesting local figure and it is worth putting him into context. It is possible to establish his descent from Elias, son of William de Allestrey, granted with some land at Allestree by the Touchets as a villein to the Canons of Darley Abbey c1248. We also know the name of his grandfather, which takes his ancestry back into the twelfth century. A few years later, Elias and Felicia, his wife, were granted their freedom by the Abbot, and thus became free tenants of the Abbey, gradually increasing their holdings over the following three generations.

At some stage they were granted the tenancy of an estate the Abbey had held for a long time at Alvaston, and they re-emerge in the late 15th century seated there, acquiring the estate at the Dissolution. At least two members of the family represented Derby in various parliaments at that time and Thomas, father of the man commemorated, acquired more land at Alvaston through his marriage with Anne, daughter of Roger Barker of Alvaston. He also acquired the Uppington Hall estate in Shropshire.

William Allestrey was the eldest son of this marriage, born in 1598. He was educated at St John's Cambridge (MA 1619) and went thence to Gray's Inn, being called in 1625. He was appointed Recorder of Derby on the resignation of Timothy Levinge of Parwich in 1636 and represented Derby in the Parliaments of 1640 and 1641. Unfortunately, his tenure in the second parliament (the notorious 'Long Parliament') was short for he was a keen Royalist, and was purged, with the connivance of his colleague, Alderman Hallowes, a radical. His place was given to Major Thomas Gell, brother of Derby's Parliamentary governor, Colonel Sir John Gell of Hopton, 1st Bt. Gell also succeeded in deposing Allestrey as town clerk in 1643.

Allestrey's first wife, Sarah Smith, was the sister of Edward Smith, whose widow he remarried at Alvaston on 8th March 1640; she was the daughter of another Royalist, destined to suffer a hard time under the Parliament, William Agard of Foston Hall. By the first marriage, there were two sons and three daughters, of whom only Grace, the youngest, survived to maturity, dying, the memorial tells us, unmarried, on 1st December 1655, almost three months after her father. By the second marriage there were three sons and three daughters of

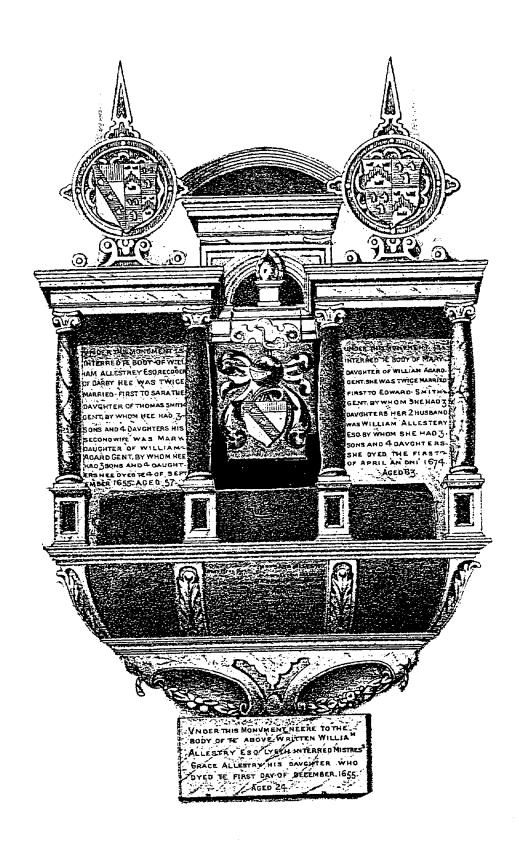


FIG 2: Allestrey Monument, Derby Cathedral, reconstructed

whom one son died young and none appear to have left issue. One son, Thomas (b1650, BA St John's Cambridge 1672, Gray's Inn 1675) married Joyce Sitwell of Renishaw and fades from notice; the other, Charles (b1651, Christ's College Oxford 1673, Gray's Inn 1674, MA 1677) became rector of Daventry in 1679 and also fades from record.

William's estates ultimately passed to his second brother Thomas and his posterity, and was ultimately lost to the family due to an inheritance wrangle in the 18th century, although numerous descendants through one or more female lines remain living locally. His political legacy passed to his fourth brother, Roger (1610-1665).

After the Restoration, Roger was made Town Clerk and County Clerk of the Peace (1660) and in 1661 was elected to Parliament. He married Sarah Bradshaw, daughter of a Derby mercer of hoary municipal ancestry. Roger died unexpectedly in 1665, thus extinguishing a promising career, and although his son William also sat as MP for Derby 1695-1700, he too died young and without issue.

Thus, the All Saints' monument is not only of great interest in itself, but is also one of a very few tangible memorials to a truly fascinating local family; traceably descendants of a freed serf with living posterity, and a rare Derby family which stuck doggedly to their support of the Crown during the vicissitudes of the Commonwealth and Civil War. It deserves further research, and in due course, a thoroughgoing restoration to something approaching its original appearance.

JOSEPH BANKS PAPERS ON THE INTERNET

A search for information about the Banks Archive Project at the Natural History Museum (see page 145) on the Internet revealed several sites on interest on the subject. The largest one is devoted to the publication of the Bank Papers held by the State Library of New South Wales, Australia (http://www.slns.gov.au/Banks) on the Internet which has been financed by the Sir Joseph Banks Memorial Fund, first raised by public subscription in 1909. Sir Joseph Banks accompanied Captain James Cook on the epic voyage in the *Endeavour* (1768-1771) when they discovered and named New South Wales and claimed the territory for Britain. In later years he exercised considerable influence in the development of the colony of New South Wales. The archive contains more than 10,000 pages of journals, letters etc.

The Internet site named above, which is still under development, contains a Table of Contents guiding the searcher to documents, images and a searchable database. There are 19 sections as follows: Journal, The first Pacific voyage of James Cook, The second Pacific voyage of James Cook, The third Pacific voyage of James Cook, Gardeners and collectors, Australia and the South Seas, Governors of New South Wales (includes William Bligh 1806-1808), The first breadfruit voyage of William Bligh, The second breadfruit voyage of William Bligh, The voyage of George Vancouver to the west coast of America, Sir George McCarthy's embassy in China, the voyage of Matthew Flinders, the discovery of Pitcairn Island, General Correspondence, Miscellaneous reports and articles, Banks' estates in Lincolnshire, Lady Dorothea Banks, Lady Sophia Banks. It would appear that no work has yet been done on the last 6 sections but the rest have several sub-sections which in turn lead to the related papers, correspondence etc. For instance, Series 03 of The first Pacific voyage of James Cook relates to the *Endeavour* journal of Joseph Banks, 25 August 1768 - 12 July 1771. The provenance note states it was originally offered for sale at Sothebys in 1886 by Edward Knatchbull-Hugessen, a collateral descendent of Banks. Three purchasers later it was bequeathed to the Mitchell Library in the then Public Library of New South Wales in 1907. This is followed by a biographical note on the voyage.

Other references include 'Sir Joseph Banks (1743-1820)' (http://www.pcug.co.uk/~ezine/harrow/banks.htm) - brief biographical notes by Harrow School where Banks was at school between the ages of 9-13, 'Historical Development and Democratic Growth in New South Wales 1770' (http://www.parliament.nsw.gov.au/gi/timeline/dev1770.html) and 'Dawson Turner (1775-1858), banker, botanist and antiquary' (http://www.trin.cam.ac.uk/TC/Wrenlib/ModernMS/Turner.html). The Dawson Turner archives held at Trinity College, Cambridge include his correspondence with Sir Joseph Banks.

OVERTON, ASHOVER AND SIR JOSEPH BANKS

(by Stuart Band,

Who was Sir Joseph Banks? He is probably best remembered for the part he played in the 'Endeavour' voyage of Captain Cook and more especially for the botanical discoveries made on the coast of Australia. He was elected president of the Royal Society at the age of 35, an office he held until his death in 1820 by which time he was its longest serving occupant. He was therefore at the centre of scientific progress in Great Britain and Western Europe for nearly half a century. From his house at 32, Soho Square he was involved in many other activities: the Royal Botanic Gardens at Kew; the foundation of the Ordnance Survey; the Breadfruit voyages of William Bligh; the origins of the penal colony at Port Jackson, New South Wales; the importation and improvement of the Spanish Merino sheep and its introduction into Australia to become the basis of the economy of that country and the African explorations of Mungo Park to name but a few.

Because his publications were few he has largely been overlooked in the century and a half since his death. His role was that of an organiser and enabler and his vast correspondence was seen more as a source of income by his ancestors resulting in its dispersal to libraries throughout the world. However this situation is now being remedied by the establishment of the Banks Archive Project at the Natural History Museum, the creation of which will go some way to improving our understanding of this eminent Georgian and his influence on the world of science and the arts in late eighteenth century and early nineteenth century England.

His associations with Lincolnshire have always been uppermost in any early accounts of his life. His estate at Revesby Abbey near Horncastle ultimately amounted to just over 9000 acres and produced the major part of his not inconsiderable fortune. However he had also inherited the Overton estate at Ashover in 1792 which had been a part of his life and his source of a substantial income since his youth. In fact the great Lincolnshire landowner and larger-than-life public figure of late Georgian England, London born, first and last Baron of Revesby Abbey, was three-quarters bred Derbyshire and one quarter bred Yorkshire.

The Banks' ancestors had originated at Ribblesdale, North Yorkshire and more particularly from Giggleswick where in 1665 was born Joseph I, great-great-grandfather of Sir Joseph. He was the founding father of the fortune which was to lead the family out of Yorkshire to join the rising gentry of Lincolnshire. As a boy of 16 this first Joseph Banks was sent to Sheffield to be articled as a clerk to a busy lawyer in a town of fast-growing business. By the turn of the new century he had become agent for the Dukes of Norfolk, Leeds and Newcastle. Much of his money had been made by shrewd property speculation and at age of 37 he was able to settle down to semi-retirement at Scofton Hall near Worksop which he had acquired sometime previous to 1702. He had already been buying up land in Lincolnshire and this was to culminate in 1714, in the purchase of the Revesby Abbey estate¹.

Joseph Banks I had married, in 1689, Mary Hancock, daughter of a non-conforming minister who had formerly been Vicar of Ecclesfield. They had two children, Mary the eldest, and five years later in 1695, Joseph II, son and heir. The dynastic ambitions of Joseph I were consolidated further in 1714 with the marriage of Joseph II to Anne Hodgkinson only daughter and heiress of William Hodgkinson of Overton Hall, Ashover, merchant.

The Hodgkinson family were one of the breed of Derbyshire yeomen who had moved into the lead-smelting industry during the seventeenth century and William had extended their enterprises well beyond that industry into other diverse areas of trade. He was exporting Derbyshire lead to the Baltic ports and importing iron and timber together with lesser commodities. As his fortune increased he was lending money on interest to his neighbours and the local gentry as well as acting in the role of banker. The Overton estate had been bought by his father George Hodgkinson in the late 1650s from William Woolley of Riber and William had developed it further following his father's death in 1692. The earlier house had been rebuilt soon after and construction was probably still in progress when William married Elizabeth Ferne of Bonsall in 1693, daughter of another smelting family².

The link was firmly established between the Banks and Hodgkinson families when the aspirations of the shrewd Yorkshire lawyer and the Derbyshire lead merchant came to fruition with the birth of a son to Joseph II

and Anne at Overton on 27 February 1715 (o.s.) who was duly baptised Joseph at Ashover on 27 March. Five more children were to follow: Letitia Mary, William, Elizabeth, Robert and Eleanor Margaret. William Hodgkinson died in December 1731 and under the terms of his will, the Overton estate was to be settled on the second son of his daughter Anne with the proviso that he changed his name to Hodgkinson. A memorial inscription on the chancel of Ashover church remembers him as follows:

William Hodgkinson of Overton, in this parish, esquire He was bred a merchant and added considerably to his parental estate by his industry and frugality, virtues which he practised himself and greatly encouraged in others. His whole estate, improved with and honest and fair character, he left to Mr William Banks Hodgkinson second son of his only daughter Ann (whom he survived) by Joseph Banks, of Revesby Abbey in the county of Lincoln, esquire who in gratitude erected this monument to his memory.

He died 6th December 1731, aged 70.3

The first son of the marriage, Joseph III was heir apparent to the Revesby estate and therefore William became William Banks Hodgkinson of Overton or sometimes Banks Hodgkinson Banks, a move which was to occasion much confusion among historians of later years. The uncertainty of life in the early eighteenth century removed Joseph Banks III from the scene in 1740 leaving the way clear for William to inherit Revesby which resulted in the Overton inheritance passing to the youngest of the brothers, Robert, who now became Robert Banks Hodgkinson of Overton until finally with his death in 1792 the estate became the property of Sir Joseph Banks.

Joseph Banks, subject of this article, was born in London in 1743 the first child of William Banks, the newly-installed gentleman of Revesby Abbey, and Sarah Bate of Foston in South Derbyshire. His birth was followed two years later by a sister, Sarah Sophia. His education followed the normal pattern for the son of a gentleman of the period - Harrow, Eton and finally as a gentleman-commoner at Oxford. In 1761 the early death of his father brought him the Revesby estate, the family wealth and all that this implied. He was then in his first year at Christ Church, Oxford, a youth of eighteen and therefore still a minor, and as such his affairs were put into the hands of two guardians, his mother Sarah and uncle Robert Banks Hodgkinson, until he came of age in 1764. It was the latter who was to educate him in the practical world of affairs and estate management and indeed the two were to remain close friends during the rest of Robert Banks Hodgkinson's life.

The early years of his inheritance were supervised closely by his uncle and although he was not kept short of money he was certainly not the spoiled and wealthy young heir. His allowance was tight and carefully accounted. Vacations from Oxford were usually spent at Overton or Edwinsford, Carmarthenshire, which had been brought to Robert Banks Hodgkinson when he married Bridget, the eldest daughter of Thomas Williams of Edwinsford near Tally in Carmarthenshire in 1757. Under the terms of his wife's marriage settlement he took charge of the estate four years later when his father-in-law died.

It is however primarily the Overton estate with which we are concerned. The young Joseph spent his vacations from Oxford there, as has already been mentioned, and for the young man with an enquiring mind there would have been much of interest, not least the lead mines which had long been worked in, around and under the estate and produced a considerable income for its incumbents⁴.

Overton: The house and estate

Overton was first recorded in a charter of 1293. By 1323 the site was occupied by William de Hunte whose descendants sold the property to Richard Hodgkinson of Northedge in Ashover parish in 1556. It was then sold again and ultimately came into the hands of William Woolley of Riber from whom it was purchased about 1658 by George Hodgkinson. His son William was responsible for a building programme started in 1693 which brought the house to the form which we see today. It is a large rectangular building originating in the form known as the "high house" and was one of the latest examples of its type. Because of its situation on

sloping ground the house exhibits four storeys on its west front and three on the east. In 1798-9 Banks paid tax on 75 windows and it was by far the largest house amongst the 203 in the parish. The enclosed land of the estate amounted to 1058 acres in 1783 and following enclosure of the commons reached its zenith in the first decade of the nineteenth century with a total of 2586 acres⁵.

This then was the core of the estate inherited under the terms of his grandfather's will, by Robert Banks Hodgkinson. There is very little documentation on the estate during this period although Robert Banks Hodgkinson appears to have spent more time in residence than his nephew in later years. He was responsible for adding more land during his custodianship but the major input was in the continuing development of mining in the area and in particular that of the Gregory, Cockwell and Overton mines. Lead mining had provided the foundation of the fortunes of the estate. By the end of the seventeenth century most of the major veins in the parish had been discovered and exploited to some extent with the Hodgkinson family closely involved in their development. In 1695 William Hodgkinson had been one of four promoters of a mile-long drainage level known as Cockwell or Nether Sough which was designed to unwater veins around Cockwell in the Milltown area of the parish. Between 1734 and 1737 the vein was being followed until the workings reached a point near Ravensnest House when it was abandoned in the belief it was unprofitable. Attention then turned to the veins around Overton when the mine was opened out with its main shaft only a hundred yards from the house. During this period a branch was driven out of the main sough to reach the developments around Overton. In 1758 work was re-started on the Gregory vein and a new partnership was formed in which Robert Banks Hodgkinson and his nephew held 12 of the 44 shares and the Wilkinson smelting interests 11. The remaining 21 shares were divided amongst nine other individuals. In his first visit in 1762 the young Joseph Banks would have seen much activity with Gregory mine entering its second and most profitable phase. He may well have inspected the underground workings, which he certainly did in later years, but he would also have been able to observe the preparations being made for the two new shafts which were to be sunk, one for drawing water, the other for raising the ore. In spite of the sough having drained the earlier workings, the extent of the mine's development was such that the water table had been reached and by this time horse gins and hand pumping were having to be employed to cope with the encroaching water. Things had reached such a pitch that by 1768 the situation was becoming intolerable but in spite of these hardships the mine was steadily increasing its production, topping the 1,000 ton mark in 1767. The solution to the problem was the purchase and installation in 1768 of a second hand Newcomen-type pumping engine from Old Millclose at Darley.

Between 1770 and 1775 Gregory mine reached its peak of profitability with the zenith in 1772 when the total profit to the partnership amounted to £15,024 8s 10d. This had occurred when the Gregory and Overton veins had met and produced large quantities of good quality ore. From 1775 to 1778 a gross profit of £40,000 was made but in the fickle way of mines the next two years ran at a loss before a return to profitability in 1781. The profits from this period would have produced a healthy income for Robert Banks Hodgkinson and Joseph Banks. Banks Hodgkinson was also receiving payments for his share of the cope payable to the Lords of the Manor as well as composition which was paid for sough, which ran mostly under his land. By the end of the decade problems with water were again becoming serious as the workings penetrated further under the gritstone escarpment and the limestone dipped away towards Matlock. The solution was the erection of a Boulton & Watt pumping engine on the plateau behind the mine. This necessitated the sinking of a shaft 888ft deep although the water was only being lifted to a level which ran through the hillside where it was pumped up to the sough by the old engine. Banks had played an important role in the negotiations with Matthew Boulton and James Watt for the provision of their pumping engine and had acted as intermediary between them and the Gregory partners when acrimony had developed over certain aspects of the comparative merits of their engine over the earlier Newcomen type. James Watt had made several visits to Ashover at the time of these deliberations. During this period two significant events had occurred in Banks' life - his marriage in 1779 to Dorothea Hugesson and his knighthood in March 1781. In fact only weeks after the latter he travelled to Overton with his wife and sister to inspect the working of the newly commissioned engine. Although the engine was a success the mine was failing and by 1803 the mine had closed after various attempts to restore profitability, effectively bringing to an end lead mining on a large scale in Ashover⁶.

Robert Banks Hodgkinson was still firmly in control at Overton and divided his time between the Welsh estate, London and Derbyshire where the social niceties were not forgotten. The high spot of the social calendar seems to have been the Chesterfield races which all the local gentry attended. Banks Hodgkinson was steward to the races on at least one occasion as was his nephew in later years. Visits were made to the homes of the other

local gentry amongst whom were the Gells at Hopton and the Hunlokes at Wingerworth. Indeed there had been a long-established friendship between the Hodgkinsons and the Hunlokes since the lifetime of William Hodgkinson, and Robert Banks Hodgkinson refers to Sir Harry Hunloke and his family in a number of letters to his nephew⁷.

In 1792 Robert Banks Hodgkinson died at the age of seventy. His passing removed a sincere friend as well as a kindly relative and in a letter to a family friend Lady Banks commented that they had been 'much distressed for the loss of our most valuable Uncle's. His will left the Overton estate to Sir Joseph Banks who paid his first visit there in full possession in 1793. It was subsequently used by him as his working base for two or three weeks in the late summer for the next 20 years, on the annual migration from Soho Square to Revesby Abbey.

He kept notes of his annual visits, the originals of which are now in the Sutro Library, San Francisco, but he was kept informed of estate and mining business by his agent in Ashover, William Milnes of the Butts House. One of his first acts was to instruct the surveyor John Nuttall to prepare a map of the parish paying particular attention to the land at Alton where coal was supposed to be. This was soon developed with the sinking of a pit and a short drainage sough. He descended the shaft and made measurements of the strata to the coal which had just been uncovered. Some of the coal he took with his newly-arrived visitor, Matthew Boulton, to the Boulton and Watt engine where he observed it to burn 'with much smoak and great heat' but to be 'very bituminous and cake a little'. There then followed a visit to Westedge where a new lead mine was being developed and a beam engine 'on the old plan' which was being assembled from parts bought secondhand. On Tuesday 27 August 1793 after breakfast he climbed down the stemples into Overton mine a few hundred yards from his front door to view 'the Self open which had lately been discovered it appears spacious and Probably Contains Ore in the Soles'. Here is Banks, at the age of 50, and between two periods of gout that was later to cripple him, making one of his last direct observations of the earth's strata. Thereafter his observations would be restricted to specimens brought by the miners themselves or surveyors such as Nuttall and later John Farey. During this visit socialising was catered for with a breakfast visit from 'Sir H and Lady Hunloke, Mr Holland and Mr Gell of Hopton so that the morning was spent in Conversation'. A return visit was made to 'Sir H Hunloke at Wingerworth and his Mother's at Birdholme. Called at Chesterfield accepted the office of Steward at the next Chesterfield Races.° Lady Dorothea Banks comments on the races the following year when during the two day event they were at 'Sir H Hunloke's two miles from Chesterfield. They are a very good humoured family, have several Sons and Daughters. The Race Ground is very indifferent; the Ladies drive about in Carriages - there is no stand for them to go into. There is a pretty Assembly Room, in which we had two very pleasant Assemblies & very well attended'. The ladies were catered for in visits to Matlock Bath but not before Dorothea Banks had spent some of her time exploring the Overton area on foot and visiting neighbours. 'We had charming weather whilst at Overton (Aug. 1794); it is very romantick about us & I had great amusement in walking about, which I did a vast deal. We spent one day at Matlock which is 6 miles off'.

In the previous year, during the fortnight's stay at Overton, two visits were made to Matlock 'from which we are only an hour's Drive. That romantick spot look'd in great Beauty this Year'. Their visit some years later (1801) took them on 'pleasant little Excursions to Matlock & Mr Arkwright's which is very near' [Richard Arkwright, son of Sir Richard, Willersley Castle]. Matlock Bath would then have been at the height of popularity with the upper strata of society before it became the resort of day trippers of later years¹⁰.

This can only give a very brief flavour of Banks' activities during his visits. There was much time given over to visiting tenants either alone or with William Milnes, and commenting on the state of the husbandry, good or otherwise. But I will try to give a brief mention to some of the more interesting points. By 1796 some land at Kelstedge near the site of the former lead smelting mill had been leased for the purpose of constructing a dam and mill and a visit revealed that 'they now make Rope for Packing cords Their buildings are made with much Solidarity, as a landlord I have much reason to Praise them'.

The beginning of the new century brought with it problems for the work people in the area. The price of corn had remained high and there was a fear of riots and unrest in the towns and villages. The Ashover miners were determined to make their protest at Chesterfield Market and on 6 September 1800 they 'assembled this morn at 7 & passed through Ashover for Chesterfield. Mr Milnes met them & Remonstrated Seriously with them but could not stop them. They promised to be sober and orderly & to do no mischief this day They return'd at 3 all sober & Quiet they said that the gentlemen in the Town had assembled them in the inn yard & given to each man a Quart of Ale & that one Gentlemen said they had been Clamd long enough. They sent the cryer to cry wheat at 30/- a

load, Oats at 30/- a Quarter, oat meal at 1/6 a Peck.... Potatoes at 8d per Peck, Butter 11d a Pound & Mutton 4½d. It is remarkable that these prices seem to be pretty fairly Calculated at 50 pr ct higher than the usual prices of Plentiful times. The Ashover miners had been joined by contingents from Matlock and Derby to the number of some 300, a fact which must have caused some anxiety for law and order in the town.

By 1802 Banks was giving consideration to better communications with the local markets between Ashover and the Chesterfield Canal 'either by a Canal or Rail Road or Partly the one & Partly the other. The measure seems a most desirable one Mr Nuttall says we have not water for a Canal possibly however we might raise enough for a 4 miles Level which will reach Sir Harry Hunlokes Coals & open a great & advantageous Trade between them & the Line. A Rail Road may go thence to the Chesterfield Canal..... Sir Harry's agent Mr Butler says that Sir Harry will have nothing to do with it unless he Mr Butler is allowed to Lay the waggon way which he will do at his own charge if he can have 4d a Ton for goods carried on it. This seems inadmissible. The Tonnage seems high & the Profits ought in all cases to be divided among a set of Proprietors who will have only one interest on the Rail way, that of maintaining & attracting business. Mr Butler may have many interests in the Line which he may advantage himself & do harm to the County by preferences'.

Banks seems to have formed a poor opinion of Joseph Butler of whose methods he did not wholly approve. This is borne out some years later (1810) in problems which arose during the promotion and construction of the Tupton to Milltown turnpike when Butler undertook the construction of a section. 'It appeared that his view had been to rid his works of a vast mass of cinders he had Laid above 6,400 tons on a little more than a mile of Road, Enough to Cover it more than 2 feet thick his Road is reported to be very bad on account of the Evil Quality of the cinders'¹¹.

I would finally like to turn briefly to another aspect of the Banks influence on the development of the science of geology and its relation to Overton and Ashover. This originated from a meeting with John Farey which resulted in Banks inviting Farey to join him at Overton in early September 1807 for a week. The product of this first visit was a section across Derbyshire which Farey allowed White Watson, the Bakewell mineralogist to copy in November 1807 and which Farey himself relates was 'mostly the result of a Survey in the County of Derby and its environs, which was undertaken in the summer of 1807, at the instance of the worthy President of the Royal Society in order to examine minutely its Stratification and Mineral Treasures' 12.

Running in parallel with this work was the section of the strata across England starting at Overton and passing through Banks's Revesby Abbey estate to end on the Lincolnshire coast at Trusthorpe. The section, nine inches wide and nearly ten feet long was exhibited in London in February 1808 and was the first extended section of British strata, dedicated to Banks and explicitly noting that it was done at his proposal and implicitly at his expense.¹³.

At the same time as he was engaged in the transect across the county, Farey had been asked by Banks to collect material for a report to the Board of Agriculture. Funding for this project had been provided by Banks initially but was later taken over by the Board when Farey agreed to develop his original findings into a fully fledged report which we now know as a *General View of the Agriculture and Minerals of Derbyshire*. These volumes form the most comprehensive report in the county reports for the Board of Agriculture and have been described as 'magnificent', which they surely are and represent one of Banks's most significant contributions to the county in recognising the worth of John Farey and the value of his observations. Another milestone was to be reached in 1811 when Farey was again employed to produce 'a minute Mineral Survey of the Parish of Ashover and its environs for Sir Joseph Banks Bart'. The large mineral map of Ashover was ready by December 1812 and by the end of that same year a smaller scale version was also ready. By the beginning of 1813 all was finished except for the detailed description of the 24 strata exposed in the Ashover. The great tragedy is that nearly all the work has been lost, like most of Farey's other manuscripts and the only fragment to survive is the reduced map of Ashover. It has been described by one geologist as a miracle of detailed geological mapping for its date, especially when it is remembered that there still a considerable argument regarding geological theory amongst the scientists of the day¹⁴.

After 1812, Banks's visits to Overton became less frequent as age and the ravages of gout took their toll and in June 1820 he died at his other London house, Spring Grove. His passing removed one of the most remarkable figures of Georgian England and it is only in the last two decades that the work and worth of Sir Joseph Banks has been recognised for what it was.

Acknowledgements

I am particularly indebted to Harold Carter for supplying me with a copy of the notes made by Sir Joseph Banks whilst at Overton and now scattered through the papers in the Sutro Library, San Francisco, and the Banks Archive Project at the Natural History Museum for copies of material from other collections.

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THE BANKS ARCHIVE PROJECT

When Sir Joseph Banks died in 1820 he may have written and received as many as 50,000 letters in his life, of which approximately 20,000 remain extant but dispersed across the world. The letters give an unique view of the life of an eminent Georgian and it is the aim of the Banks Archive Project (see page 140) is to collect together copies and organise them for public use. There is a pressing need to understand the work of a man who did so much to contribute to the life of the nation both at that time and subsequently. However, he published so little that he has remained something of an enigma.

It has been increasingly recognised that full recognition of the scale and significance of Banks' contribution to our understanding of the natural world is hindered by the wide dispersal of his papers. Only a detailed cataloguing and transcription for publication of his correspondence (and additional papers) will reveal the depth of Sir Joseph Banks' influence. The Natural History Museum currently holds many of Sir Joseph Banks' valuable collections, purchased or acquired during his travels. After Banks' death some 22,000 books and charts, as well as many important specimen collections and Banks' herbarium, were donated to the British Museum, where the Natural History Museum collections were originally held. The Banksian herbarium and his entomology collections are now held by the Natural History Museum; his books survive both in the British Library and at the Department of Library and Information Services at the Natural History Museum which also holds other material.

The Banks Archive Project welcomes any support and interest that can be offered. Enquiries should be sent to:

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THE CATTLE PLAGUE IN DERBYSHIRE 1865 TO 1866

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The BSE crisis which began in early 1996 calls to mind previous events which have resulted in the enforced slaughter of animals. Of particular significance was the outbreak of cattle plague which occurred in 1865 and 1866 and it is the aim of this paper to trace the progress of the plague in Derbyshire as revealed through reportage in the weekly *Derby Mercury* newspaper. It affected all parts of the country not least those which, like Derbyshire, had developed a strong livestock industry. Indeed by this stage of the nineteenth century all but the north of Derbyshire was firmly established as a specialist dairy area with the making of farmhouse cheese as the major enterprise. However a rapid change of emphasis towards the marketing of liquid milk for urban consumption was imminent while cheese making was to continue on a limited scale and mainly in the small factories for which Derbyshire became well known. In part these changes were influenced by the outbreak of cattle plague but at a national level its major legacy was the development of policy for the management of such events.

Cattle plague was the common name for rinderpest. In the modern world rinderpest is endemic in Tropical Africa, the Middle East and India. It is a highly contagious, viral disease which affects ruminants and is characterised by high fever, gastro-enteritis and dehydration with a mortality rate of up to 90%. The outbreak of the 1860s, which began in London in July 1865, has been discussed in outline by Orwin and Whetham [1971]. It was at a time when cattle were being moved in increasing numbers between Britain and the continent and also within Britain as a consequence of the strong evolution of the shipping and rail networks. New levels of intermixing of stock from different sources may have been important in the spread of the disease in the stages before the seriousness of the outbreak was fully recognised.

The initial attempt to limit the impact of cattle plague was made in Privy Council using powers under an Act of 1848 to empower local Justices of the Peace to close fairs and markets, to ban the movement of diseased stock and to slaughter and bury diseased animals on farms. By the end of September the number of reported cases had reached 14,000 and in the face of a growing emergency the Government established a Royal Commission to report and make recommendations. The Commission found that the measures to date had been seriously inadequate in their application but was unable to advise Government as to what new action should be taken. There was a clear division of opinion among the Commission's members between those who advocated a ban on all cattle movement and those who believed this to be impracticable in terms of enforcement and the potential inflationary effect on meat prices and consequent public reaction. During the subsequent period of inaction the disease continued to spread rapidly, the number of reported cases reaching 73,000 by the end of 1865 and rising to 120,000 by the end of January 1866. At this stage the pleadings of agricultural societies including the Royal Agricultural Society supported by veterinary officers persuaded Government to reconvene the Royal Commission. It rapidly produced a second report on 5 February which resulted in the equally rapid passage through Parliament of 'The Cattle Diseases Prevention Act' on 20 February. As a result measures which controlled the movement of cattle and empowered their slaughter more effectively were put in place. Perhaps most importantly the payment of compensation to farmers from the county rates was allowed at £20 per animal slaughtered. This may well have encouraged farmers to report occurrences of the plague more promptly. Certainly a fall off in cases began and the epidemic came to an end during the summer months of 1866.

Reportage in the *Derby Mercury* indicates that cases of cattle plague were not confirmed in Derbyshire until December 1865 at which stage the disease was confined to the 'north of the county'. Prior to this items in the newspaper had traced the developing national crisis including the Bishop of Oxford's prayers for deliverance in mid September. Various actions were taken in the county to mitigate the impact and spread of the disease. In September a Cattle Plague Insurance Society was set up and in October the Duke of Devonshire as President donated £1,000 to its funds. In addition a restriction on stock movement at Derby market was imposed by the local justices $[13/9/65]^2$ but it is not until November that the exclusion of all cattle from all markets unless for slaughter was ordered [1/11/65] and [5/11/65]. Despite the clear existence of some level of concern the

Derbyshire Agricultural Society's Annual Show had gone ahead in September [20/9/65] and the Bakewell Show in October [11/10/65].

In January the outbreak of cattle plague spread to the south of Derbyshire and from the range of farm locations indicated it would appear that no part of the county was immune. Cases were first noted at Stanton-by-Bridge and Melbourne [24/1/66] followed by a successions of reportings through succeeding months. Locations cited are Mammerton near Longford [6/2/66], Kedleston, Hartington, Bakewell and Cauldwell [7/3/66], Sutton-on-the-Hill and Brailsford [21/3/66] and Repton and Linton [4/4/66]. In mid April, by which time the national total had exceeded 200,000, further cases were recorded at Ashbourne, Bakewell, Belper and Wirksworth. All agricultural events in the county were affected, for example as early as March the Derbyshire Agricultural Society agreed to exclude all stock from its 1866 annual show. The situation began to improve in June as Derby Corporation relaxed movement orders as applicable to the market [13/6/66] but rather belatedly required all stray dogs to be seized lest they were potential carriers [21/6/66].

From January 1866 until May when the epidemic had passed its height the spread of the cattle plague was featured at length in every edition of the *Derby Mercury*. It is clear that there was speculation as to the nature of the disease itself and the mechanism by which it was spread so rapidly. Remedies were also discussed at length and it is not surprising to find the *Derby Mercury* carrying advertisements for patent medicines and treatments. In January [24/1/66] Harwoods of Derwent Street in Derby were offering McDougalls Patent Disinfecting Powder. In February farmers were being urged to use a mixture of pepper, vinegar, saltpetre and nitre [6/2/66] which would seem as potentially harmful to stock as contracting the disease itself, while in May [23/5/66] Bakers Preventive Medicine described as 'inexpensive, harmless and infallible' featured in the advertising columns.

It is difficult to judge the impact of the outbreak on the farming scene in Derbyshire. While at the time the normal seasonal rhythm of activity was seriously interrupted and it must be assumed that a number of farmers lost stock through the disease itself or the slaughter policy, there is no way of knowing cattle numbers in Derbyshire before the first agricultural census of 1866. The early censuses were not conducted in a consistent manner so comparisons are imprecise yet a steady increase of 1000 head a year is indicated for Derbyshire during the period up to 1880. It would appear that any loss was quickly restored. The report of the autumn Derby Cheese fair for 1866 [3/10/66] indicated that there 'was a full supply' and that for 1867 an 'unusual large supply'. The implication must be that the major stock-based enterprise which characterised the agriculture of the county at the time had not been affected adversely. Principal items of agricultural reportage in the Derby Mercury from the 1770s were the sale notices relating either to the stock or other effects of tenant farmers who were relinquishing their tenancies or to surplus stock to be sold off by breeders. Even during the epidemic such notices continued to appear relating to sales in Derbyshire and adjacent counties. It is to be presumed that such sales went ahead even though legally stock could not be moved from farms. However the total number of sales advertised in both 1866 and 1867 show a reduced rate of about 45 per annum compared with the approximate 75 of earlier and succeeding years.

In the passage of time the cattle plague epidemic appears as an extremely uncomfortable episode from which the livestock industry was able to recover quickly. Its lasting significance is as a bench mark in the development of policy in terms of coping with subsequent crises of a similar kind such as those associated with foot and mouth disease or swine fever. First of all Government came to recognise that swift and drastic measures were necessary to deal with occurrences of disease in livestock which, by their rapid spread and severity of impact, could have a devastating effect on both farming and food supply. Secondly Government acknowledged the need for the collection of agricultural statistics so that it could be informed as to the basic and changing characteristics of the agricultural scene so in 1866 the long argued-for annual agricultural census was initiated.

A further effect of the epidemic evident in Derby as much as other towns in Britain was the ending of the tradition of town cowhouses and dairies, which up to 1865/6 had played a dominant role in British urban liquid milk supply. These dairies, where cattle lived in close proximity, were the worst affected by the plague. The way was thus opened for the rapid maturing of the marketing system, being developed by the railway companies, for the rapid transit of fresh milk to towns from rural areas. Derbyshire milk was being transported by rail to Birmingham, Manchester and Sheffield in the late 1860s but it was the opening of the Midland Railway's terminus at St Pancras in the autumn of 1868 which was the all important event. Milk could then be transported direct to London on Midland tracks. The traditional farmhouse cheese industry collapsed

rapidly, the Derbyshire/Staffordshire cheese factory system was initiated³ and a new manner of dairy farming was established. In the process of change the cattle plague had played a particular and significant part.

References

- 1. Orwin, C.S. and Whetham, E.H., A History of British Agriculture 1846-1914, (Newton Abbot 1971).
- 2. Dates in the text refer to the issue of the Derby Mercury in which the report was made.
- 3. There was much interest in the Derbyshire cheese factory experiment during the 1870s in such agricultural publications as the Agriculture Gazette, the Farmer's Magazine and the Journal of the Royal Agricultural Society. See for example Morton, J.C., 'On Cheese Making in Home Dairies and in Factories', Journal of the Royal Agricultural Society, Second Series, Volume 11, 1875, pp261-300.

BUTTERLEY COMPANY BEAM ENGINES IN EAST ANGLIA - A NOTE

(by J.E.P. Heath

The Butterley Company was noted for building beam engines for the drainage of the Fens and other low-lying areas, particularly during the 1820s and 1830s.¹ The examples referred to in Riden are extended by R.L. Hill.² Further information can be found in Ronald E. Clark's sequence of articles published in *English Mechanics* between February and October 1936. He cites one at Mildenhall Fen (Suffolk) built in 1844, and the supply of boilers for a single cylinder condensing beam engine (makers not known) at Lakenheath. In about 1870 Butterley supplied two Lancashire boilers for the engine at Waterbeach Level at Stretham (built in 1831) and, possibly in 1861, J. Walley of Derby supplied a Cornish boiler for a beam engine at Halvergate in Norfolk.

On the 'Lark' engine house at Burnt Fen (Suffolk):

"In fitness for the urgent hour Unlimited untiring power Precision, promptitude command, The infant's will the giant's hand; Steam, mighty steam, ascends the throne. And reigns lord paramount alone. 1842

The 'Hundred Foot engine house at Pymore (Cambridgeshire) has the following:

'These Fens have oft times been by water drown'd Science a remedy in water found The power of steam she said shall be employed And the Destroyer itself destroy'd. 1830'

References

- 1. Riden, P, The Butterley Company 1790-1830, 1990
- 2. Hills, R.L., Machines, Mills and uncountable costly necessities: a Short history of the drainage of the Fens, Norwich 1967