



THE
GEORGIAN
GROUP

Anthony Geraghty, 'Nicholas Hawksmoor and the Wren City church steeples', *The Georgian Group Journal*, Vol. X, 2000, pp. 1-14

NICHOLAS HAWKSMOOR AND THE WREN CITY CHURCH STEEPLES

ANTHONY GERAGHTY

Three hundred years ago, as the seventeenth century drew to a close, Wren's architectural practice entered a remarkable final phase. These were the years of Greenwich Hospital, the Whitehall Palace schemes, the City church steeples and the skyline of St Paul's – projects which have a boldness of silhouette and intricacy of detail not encountered in Wren's earlier work. These late works coincide with the early career of Nicholas Hawksmoor, the greatest of Wren's pupils. Hawksmoor had arrived in Wren's office by 1684 and from the early 1690s he was receiving delegated commissions. But the extent to which he contributed to the older man's designs remains one of the unsolved mysteries of English architectural history. For Sir John Summerson, the 1690s was 'one of the most interesting and . . . difficult episodes in English architectural history',¹ whilst Kerry Downes, Hawksmoor's biographer, has written of the insoluble 'puzzles of the end of the seventeenth century'.² This article describes Hawksmoor's association with one category of Wren's architecture, the City of London churches, which lasted from c.1684, when he first appeared in Wren's office, to 1701, when he left to pursue an independent career. This decade and a half coincided with the completion of the churches and the commencement of the steeples, which, in their totality, once furnished London with the finest skyline in Europe. Hawksmoor's duties at this time are considered here, as is the possibility that he assisted Wren in designing some of the steeples. A handful of unsigned Wren office drawings will be attributed to Hawksmoor for the first time.³ These relate to the steeples of St Dunstan-in-the-East,

St Bride Fleet Street, St Magnus-the-Martyr and St Edmund-the-King.

Hawksmoor's obituary states that he entered Wren's service 'when about 18 years of Age'.⁴ As he was probably born in 1661 he is normally supposed to have arrived in Wren's office in the late 1670s.⁵ He can only be documented in London, however, from January 1684, when he witnessed Hugh May's will.⁶ In the years immediately before this he had travelled extensively in England. A topographical sketch-book, now at the RIBA, confirms that he visited Nottingham in 1680 and 1683, Bath in 1683, and Coventry, Warwick, Bristol, Oxford and Northampton at about the same time.⁷ Perhaps his drawings caught Wren's eye, who was then in need of a new draughtsman.⁸

Once in London, Hawksmoor rose steadily through the ranks of Wren's office. The office was located in Great Scotland Yard, Whitehall, where Wren, as Surveyor-General of the King's Works, had an official house.⁹ This was the closest equivalent in late seventeenth-century England to a modern architect's office, and, as such, was one of the few places where it was possible to receive a professional training in architecture. The office provided Wren with a base for his other projects, and it was from Whitehall that the rebuilding of the City churches was organised.¹⁰ Hawksmoor was associated, in one way or another, with most of Wren's major projects of the 1680s and 1690s. From 1689 he was Clerk of the Works at Kensington, from 1691 he was the draughtsman at St Paul's, and from 1698 he was Clerk of the Works at Greenwich Hospital.¹¹

Hawksmoor's initial duties in the office are impossible to define, but he was probably some sort of junior assistant. His signature is frequently apparent in the building accounts for the churches at this time, witnessing the craftsmen's bills and contracts. He first appears on 9 May 1684, when he witnessed a handful of payments to Matthew Banckes, carpenter,¹² and then again on 4 October 1684, when he witnessed a payment to the metal-smith Thomas Hodgkins.¹³ Between these dates, and perhaps at other times, he may have been at Winchester, where Wren's palace had been begun in the previous year, for his obituary states that 'In King Charles II's Reign, he was employ'd under Sir Christopher Wren, in the stately Buildings at Winchester'.¹⁴ Thereafter he can be documented in London on a near daily basis in 1685 and 1686,¹⁵ years that saw the start of work on the last of the City churches: St Andrew-by-the-Wardrobe, All Hallows Lombard Street, St Margaret Lothbury, St Mary Somerset and St Michael Royal. Hawksmoor's name occasionally features in the parish records of these churches. At St Mary Somerset, for example, £1 1s. 6d. was 'Paid & given Mr Hawksmore Sir Christopher Wrens Man' on 22 March 1686.¹⁶

His first promotion occurred in January 1687, when, probably aged 26, he succeeded Andrew Phillips as City church clerk. Phillips had died in late 1686,¹⁷ and from January 1687 the accounts were entered by Hawksmoor.¹⁸ As clerk, Hawksmoor took control of the day-to-day administration of the City churches – keeping the accounts, paying craftsmen, drafting contracts, negotiating with the parishioners, and probably much else besides, all of which no doubt provided an invaluable education in administration and executive organisation. Hawksmoor was a neat and proficient clerk, and it was during these years that he perfected the attractive copper-plate handwriting he was to retain all his life (this was probably learned from a copy-book). He was salaried at about £30 a year,¹⁹ and lodged with Wren at Scotland Yard.²⁰

It was during Hawksmoor's time as clerk that the rebuilding of the churches – though not the steeples

– was brought to a finish. The main account for the churches was closed in 1693, in May of which year Hawksmoor received £10 'for transcribing and engrossing all the books that containe all the Bills and Workmanship of the Parochiall Churches to bring them to one generall account for the Exchequer'.²¹ Funds were available, however, to continue work on the steeples, as the 1685 'Act for Rebuilding Finishing and Adorning of the Cathedrall Church of St. Pauls London' had allocated money for 'the Towers of some other [City] Churches not perfected'.²² As a result, a new phase of building was initiated in the mid-1690s. It was precisely at this stage, as Wren's attention shifted from the churches to steeples, that Hawksmoor was again promoted in connection with the City churches, succeeding Robert Hooke as one of Wren's two assistants (the other was John Oliver); the clerkship then passed to William Dickinson.²³ On 14 September 1695 Hawksmoor received a salary payment of £60, and from then until August 1701 he received similar sums.²⁴

During these six years – crucial years in the development of the English baroque style – Hawksmoor worked alongside Wren in a senior capacity. Easton Neston, the Writing School at Christ's Hospital and the unexecuted schemes for Warwick parish church confirm he was more than capable of architectural invention by the mid-1690s. The question arises, then, to what extent did Wren make use of him in connection with the steeples designed in 1695–1701?²⁵ Hawksmoor's authorship is never specifically documented, but something of his contribution can be deduced from the surviving graphic evidence. A handful of unsigned architectural drawings, all originating from Wren's office, can be added to the small corpus of early Hawksmoor drawings already identified.²⁶ These do not necessarily prove his authorship of the designs expressed, but they do provide evidence of a more general involvement in the design process in Wren's office in the years around 1700.

Hawksmoor had been Wren's draughtsman for a

decade in 1695. In 1686 he was drawing the internal fittings for Trinity College library, Cambridge; in c.1689 he completed the penwork of Wren's preliminary designs for Hampton Court (these are annotated in his early handwriting); and from 1691 he was salaried as the draughtsman at St Paul's.²⁷ His earliest surviving City church drawing is a handsome elevation of the Gothic tower and steeple at St Dunstan-in-the-East (Fig. 1),²⁸ which was begun in November 1695.²⁹ This depicts a steeple approximately 30 ft shorter than built and vividly conveys the complex forms of the design. The light falls from the left, defining the remarkable corona steeple, the polygonal corners of the tower, and the depth of the portal mouldings. The shading is highly naturalistic and exactly as the executed steeple appears in the midday sun. In terms of its function, this is a presentation drawing rather than a working drawing, and, as such, is not in itself evidence of Hawksmoor's authorship of the design. Wren remained at the head of the office, and it was to 'Christopher Wrenns' that 'Wine Bottles and Hampers' were sent by a grateful parish in May 1696.³⁰ What the drawing does prove, however, is Hawksmoor's remarkable skill as a draughtsman and his nascent sensitivity to the visual aspect of architecture.

The drawing is executed in pencil, wash and ink – in that order. This is significant, for whereas Wren applied his shading after completing his pen-work, Hawksmoor worked the other way round, only adding his outline at the end (a technique more characteristic of seventeenth and early eighteenth-century sculptors' drawings). This highlights an essential difference in their respective attitudes to architecture. For Wren, wash was principally a means of depicting contrasting materials – grey for stone, red for brick, blue for lead, yellow for gilding – and only secondarily a means of conveying three-dimensions on the page. For Hawksmoor, however, the three-dimensionality of form was everything, hence his evocative use of wash, employed to depict an architecture conceived in terms of light and shade.

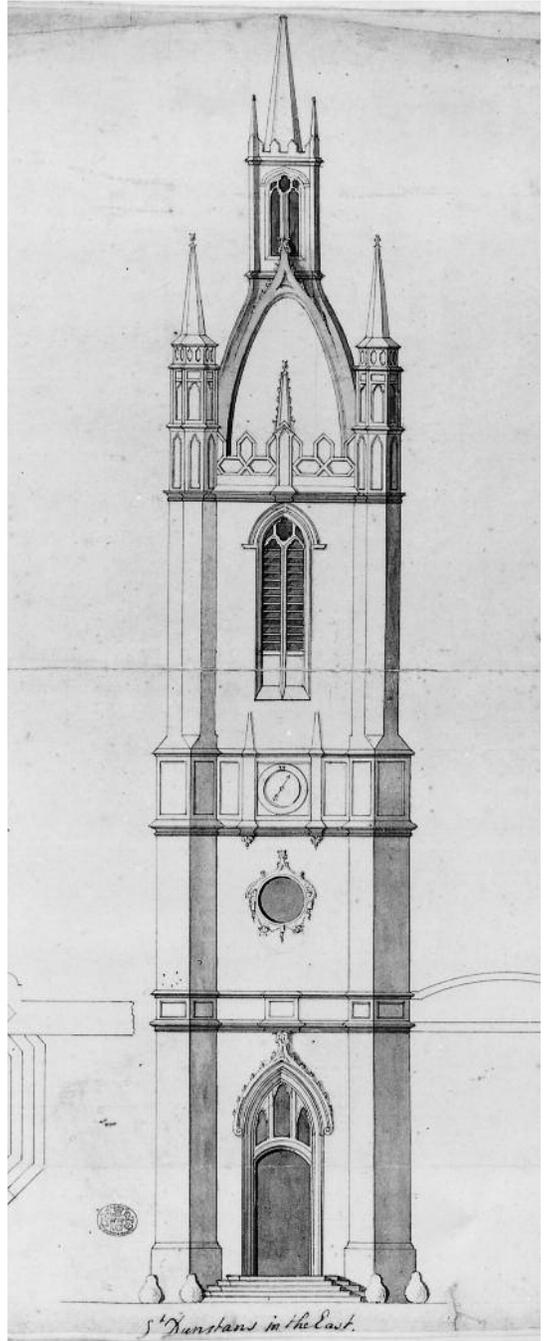


Fig. 1. Nicholas Hawksmoor, preliminary steeple design, St Dunstan-in-the-East, London, c.1693–95. *The British Library.*

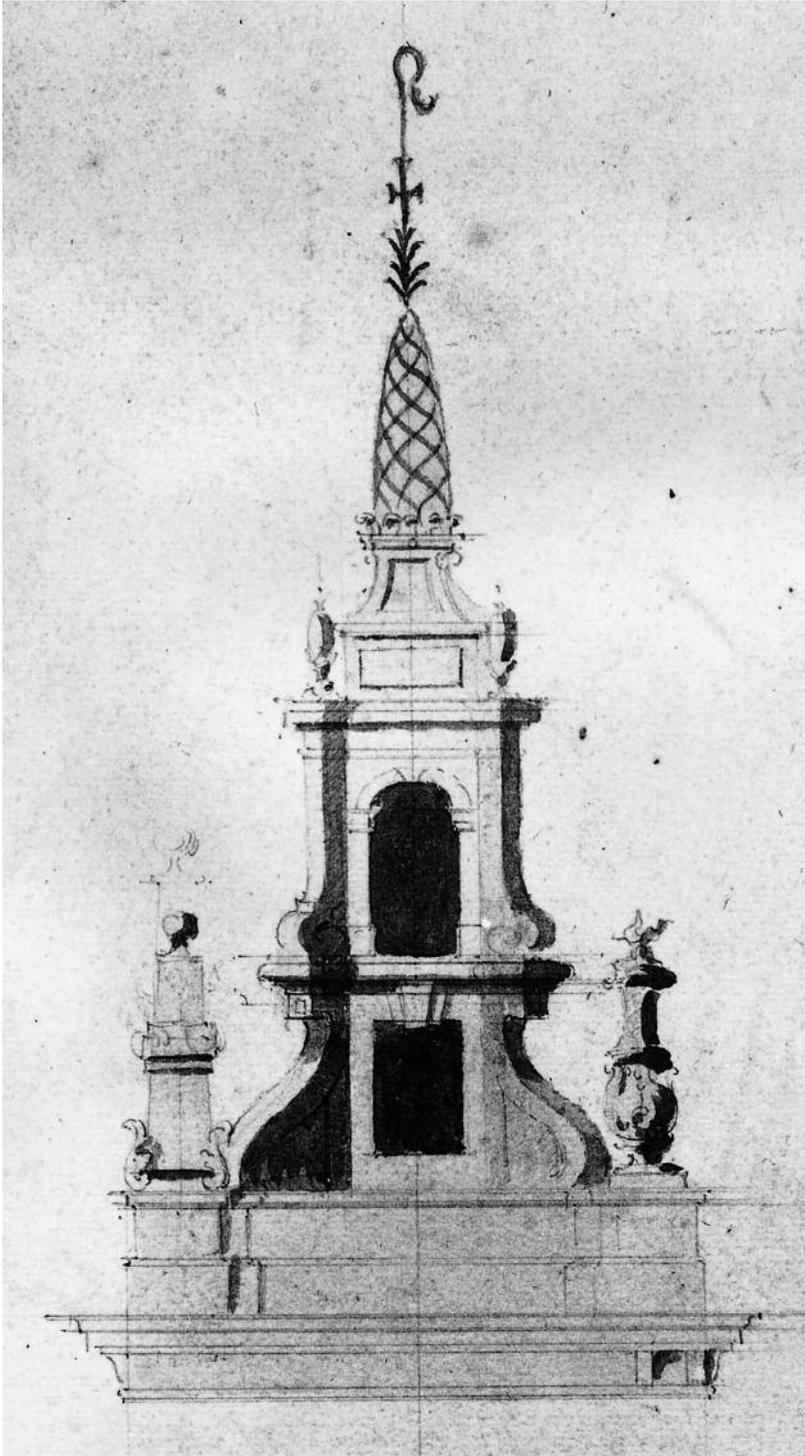


Fig. 2. Nicholas Hawksmoor, preliminary steeple design, St Augustine, Watling Street, London, c.1695. *All Souls College, Oxford.*

This is apparent in a series of breathtaking wash sketches of the 1690s in which Hawksmoor dispenses with ink outline altogether. This technique, though without precedent in English architectural draughtsmanship, is much in the spirit of seventeenth-century theories of vision and perception. ‘We have the ideas of figures and colours’, wrote John Locke, ‘by the operation of exterior objects on our senses, when the sun shows them us’.³¹ Hawksmoor indeed depicts architectural form as the eye perceives it – by means of light. This is true of a dramatic study for the west towers of St Paul’s, in which the design (based on Bramante’s *Tempietto*) is miraculously evoked in wash with only the faintest of pencil guidelines; this conveys the cylindrical geometry of the tower and the solids and voids of the peristyle.³² Hawksmoor continued to make wash sketches throughout his career. A late example, made a decade after he left Wren’s office, depicts an unexecuted design for University College, Oxford.³³

Two designs for the steeple of St Augustine, Watling Street, dating from the mid-1690s, fall into this category of drawing. These are today in the RIBA drawings collection and at All Souls.³⁴ Both depict a complex steeple rising in three stages. The geometry of the design is articulated and enlivened by the falling light, which was surely a determining factor in the design. Indeed, the design is so wedded to the method of representation that Hawksmoor’s authorship seems certain, as has long been recognized. The All Souls design (Fig. 2) is closer to the executed structure and includes motifs which appear in other towers and steeples executed in the 1690s (Figs. 3, 4 and 5). One feature in particular, the obelisk finial with leaf ornament, appears elsewhere: at St Mary Somerset (carved in 1692),³⁵ at All Hallows, Watling Street (1697–99)³⁶ and at St Margaret Pattens (1698–1702).³⁷ It would seem probable, then, that Hawksmoor was responsible for detailing these towers.³⁸

Hawksmoor was last paid in connection with the City churches on 6 August 1701.³⁹ His contribution towards the end of this period, and in 1700–1 in

particular, was probably less extensive than previously, for he received only £30 in 1700 and £25 in 1701.⁴⁰ Furthermore, his signature disappears from the accounts towards the end of the decade.⁴¹ Perhaps this was because of the time he spent at Castle Howard, where he was working with Vanbrugh from *c.*1699,⁴² and where his presence can be documented in the spring of 1701.⁴³

The celebrated steeples of St Bride, Fleet Street (1701–4), and St Magnus-the-Martyr (1703–6) had been under discussion for several years in 1701, and both were on the drawing-boards just as Hawksmoor was leaving the office. The tower of St Bride, Fleet Street, had been completed back in the 1670s, when Wren had hoped to surmount it with a simple cupola.⁴⁴ But this was never executed, and in October 1681 the City church commissioners reported that the tower was ‘lying open to the weather’ and ordered that a ‘Spire’ be put in hand.⁴⁵ The next we hear of the matter is twenty years later, in September 1701, when the vestry minutes record that ‘Mr Folks [Samuel Fulkes] the head workman’ was ‘about to Build the Spire’.⁴⁶ The laying of the first stone took place on 6 October.⁴⁷

A preliminary design for the spire survives at All Souls (Fig. 6). This remarkable drawing, densely packed with information, depicts the then existing tower in pen and the intended spire in pencil. The draughtsmanship is typical of Hawksmoor’s working drawings of the 1690s. The same meticulously ruled pencil drawing is apparent, for example, in a preliminary study for Greenwich Hospital, which was drawn, annotated and dimensioned by Hawksmoor in *c.*1697.⁴⁸ A particularly telling characteristic is Hawksmoor’s depiction of the small Corinthian order, which, in the top tier of the spire, is drawn in perspective, with the base of the capitals seemingly swelling outwards, a device which he used all his life.⁴⁹ This refusal to be straitjacketed by the conventions of orthogonal representation, which Wren, by contrast, strictly adhered to, perhaps testifies to a growing reluctance to conceive and depict architecture in two dimensions.

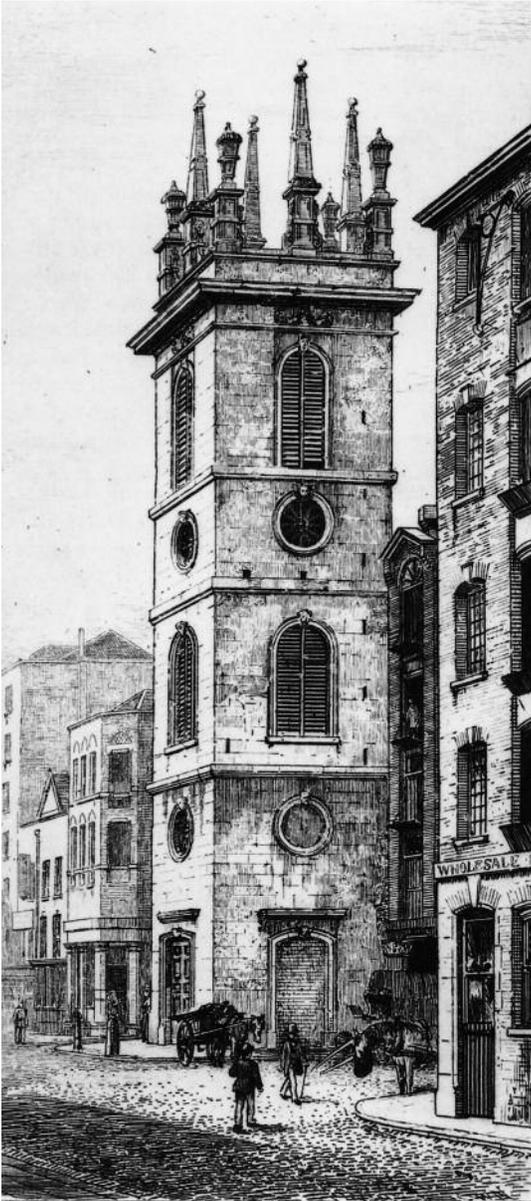


Fig. 3. Sir Christopher Wren, St Mary Somerset, London (from W. Niven, *London City Churches*, London, 1887).
V. Carvalho.



Fig. 4. Sir Christopher Wren, All Hallows, Watling Street, London (from W. Niven, *London City Churches*, London, 1887).
V. Carvalho.

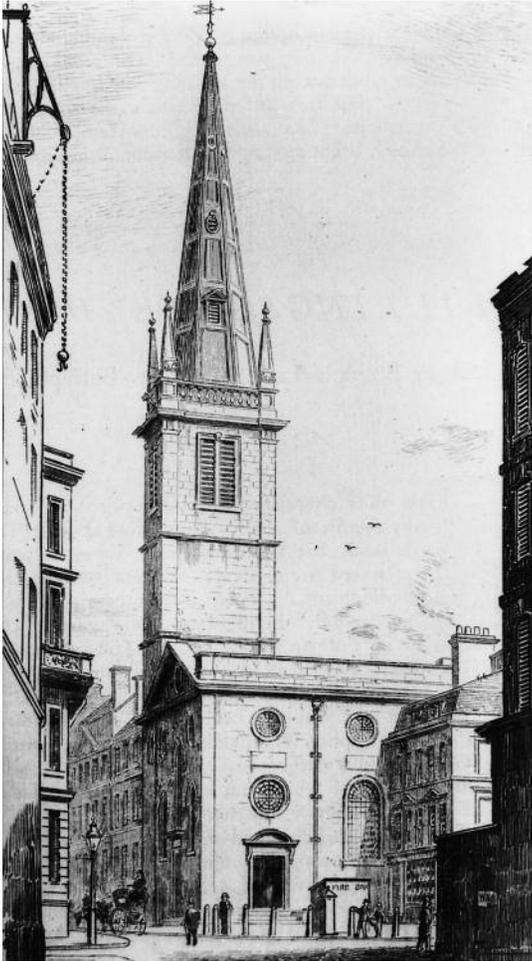


Fig. 5. Sir Christopher Wren, St Margaret Pattens, London
(from W. Niven, *London City Churches*, London, 1887).
V. Carvalho.

The same might be said of the design itself, which differs from the executed spire in two major ways. First: the core of the spire was intended to sit on a delicate ovoid of haunched stones, which ingeniously were to double as internal stairs, whereas the actual building has a substantial masonry zone at this stage, presumably to dissipate the downward thrusts of the spire. Second: the executed steeple is much taller than that depicted in the drawing, with a more attenuated profile. The drawing depicts four diminishing octagonal stages, each of which is exactly four-fifths the height of that beneath it (the dimensions are given on the drawing). This results in an outline slope of 9 degrees from the vertical, as ruled on the drawing (the second sloping line is a proportioning device, used to determine the projections of the several cornices). The left half of the steeple is merely blocked in, revealing the underlying geometry of diminishing squares (a similar blocking-out is drawn to a smaller scale in pencil on the verso). The classical detailing is identically proportioned at each stage, even though the orders progress from Doric to Corinthian as the steeple rises. In the executed design, however, this strict adherence to mathematical formula is abandoned, and additional height is introduced at the foot of each stage, so that the plinths, no longer proportioned with the orders, increase in height as the orders diminish. The result is a taller, steeper spire. The first three tiers of the revised design are lightly sketched in the drawing, so that the two designs are superimposed over one another.

A similar spire may have been intended for St Magnus-the-Martyr. The City church commissioners had ordered a 'stone spire' back in the 1680s,⁵⁰ when a wooden 'modell of the Spire' was made.⁵¹ But nothing was done until the next century, when the present lantern and cupola, very different in design, were put up. The laying of the 'first Stone of the spire' took place in June 1703 (or thereabouts).⁵² An unfinished pencil drawing at the RIBA (Fig. 7) depicts a twelve-sided spire in eight stages. The rate of diminution is again 5:4. The drawing is inscribed

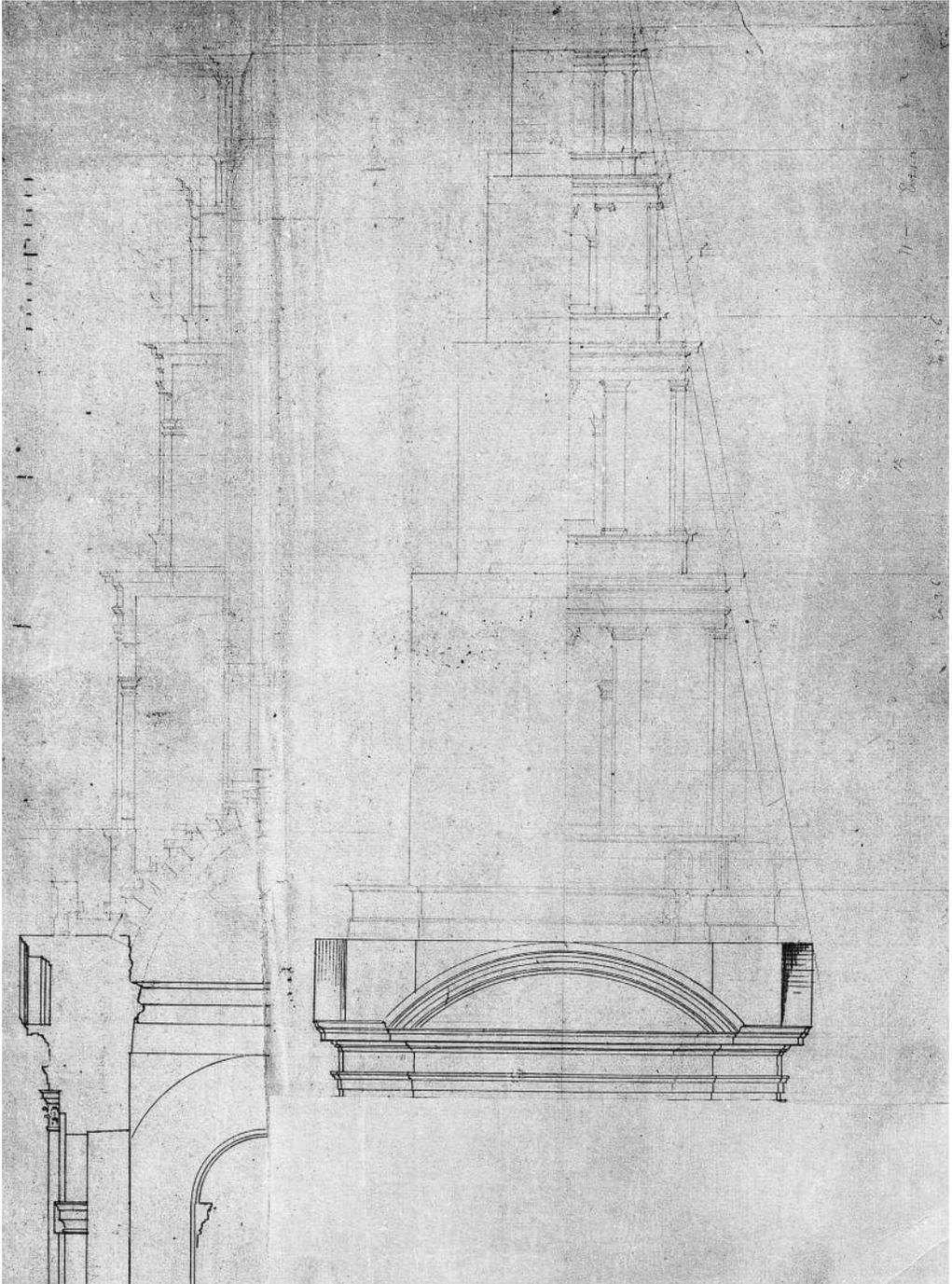


Fig. 6. Nicholas Hawksmoor, study for spire, St Bride, Fleet Street, London, c.1701.
All Souls College, Oxford, IV.85.

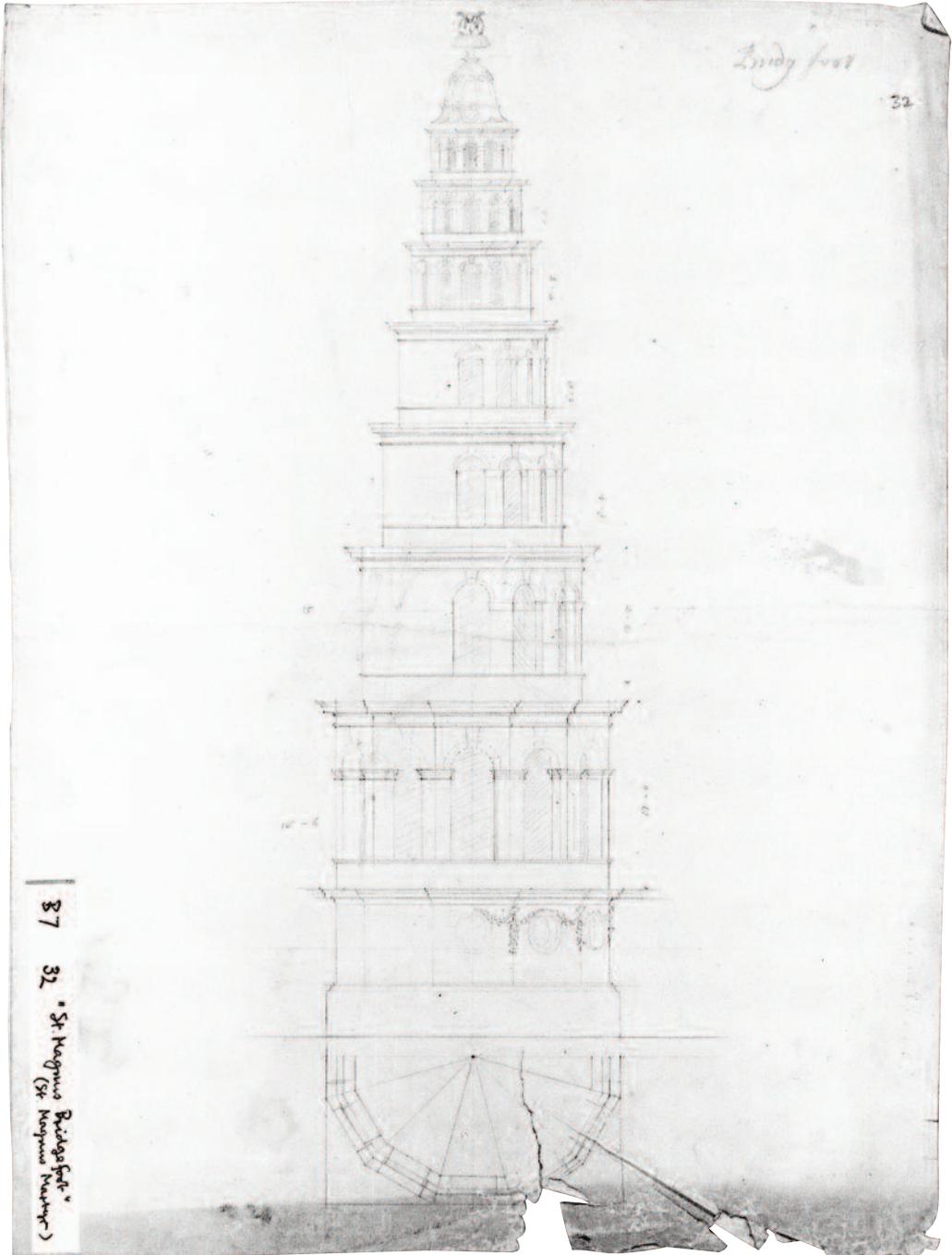


Fig. 7. Nicholas Hawksmoor, steeple design, probably for St Magnus-the-Martyr, London.
RIBA 1994 CC1/124. Conway Library.

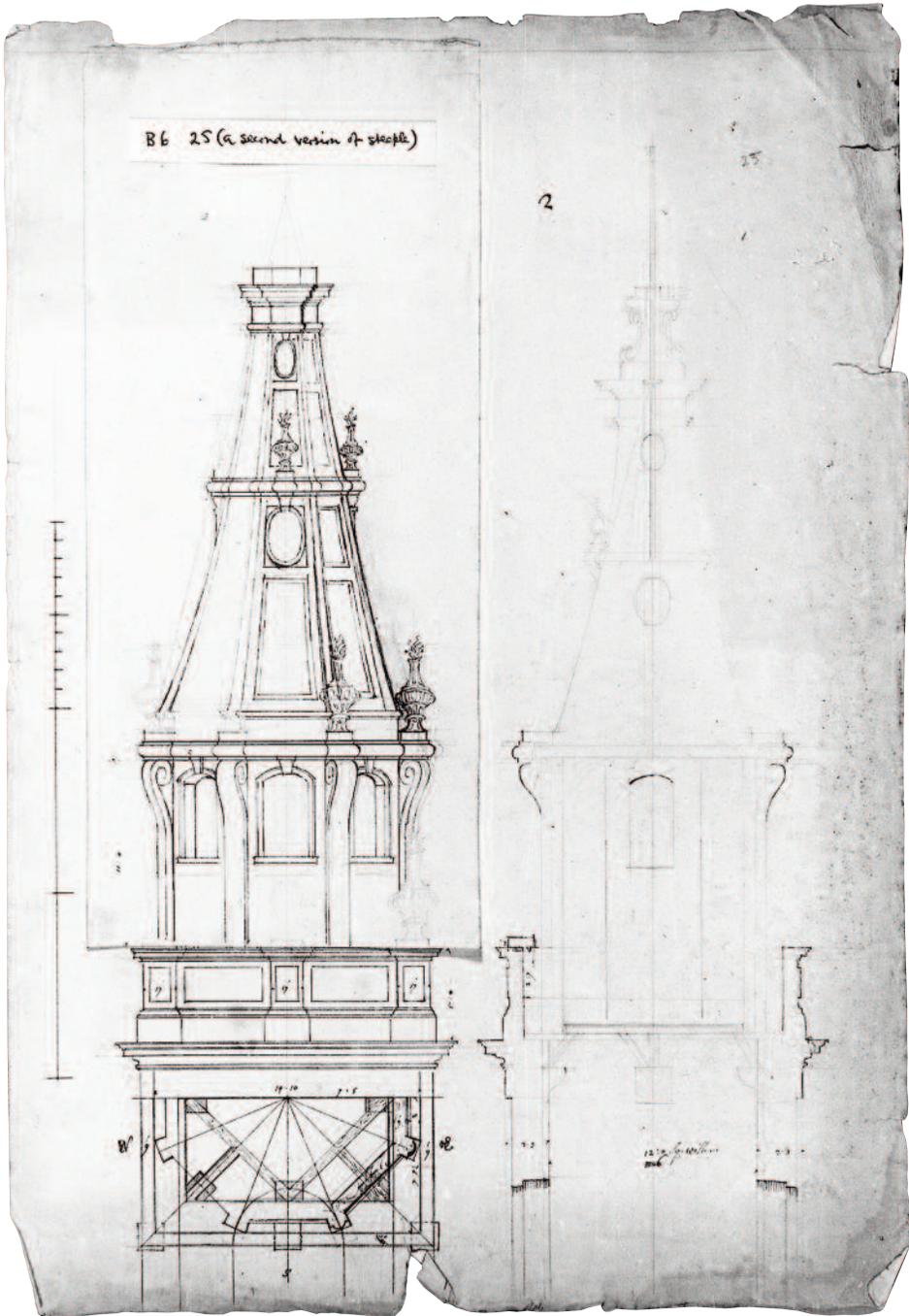


Fig. 8. Nicholas Hawksmoor, St Edmund-the-King, Lombard Street, London, c.1706.
Tweet Kimball Collection, Sedalia, Colorado, USA. Conway Library.

‘Bridg foot’ and endorsed ‘St Magness Bridgefoot’, but this could well be a later incorrect identification.⁵³ The draughtsmanship is again Hawksmoor’s. The pencil-work is consistent with the St Bride drawing, whilst the hatched shading of the arcades is consistent with drawings for the Writing School at Christ’s Hospital.⁵⁴ The dimensions are again in Hawksmoor’s handwriting. The design itself is not entirely successful, as the degree of repetition overly compresses the detail towards the top. Thus the abandonment of the scheme again probably testifies to a willingness to place visual considerations above mathematical *schema*. In both cases, the evidence of the drawings allows us to associate this trend with Hawksmoor.

Though no longer a salaried member of the office after 1701, Hawksmoor remained in regular contact with Wren through his positions in the Office of Works, Greenwich Hospital and St Paul’s. But did Wren continue to make use of him in connection with the City churches? The evidence is scanty, but one further drawing suggests that he did. This is a design for St Edmund-the-King (Fig. 8), where a new steeple was constructed in 1706–7.⁵⁵ The drawing depicts the steeple in plan, elevation and half-section, with an alternative elevation on a flap. The draughtsmanship is unquestionably Hawksmoor’s. The ink drawing is consistent with an exactly contemporary Hawksmoor drawing for the Bow Window Room at Castle Howard,⁵⁶ whilst the general method of representation, with the design shown in plan, elevation and half-section, is likewise apparent in Hawksmoor’s preliminary studies for the west towers of St Paul’s.⁵⁷ The perspectival depiction of the urns in an otherwise orthogonal drawing is also characteristic. The steeple was executed according to the alternative design, which more effectively continues the proportions of the tower. The basic silhouette is adorned with urns, since removed, which diminish in scale as the steeple rises.

It would seem, then, that Hawksmoor indeed continued to supply Wren with steeple designs after 1701. But as to his involvement elsewhere, one can only speculate. The plastic handling of form at St Vedast and St Michael, Crooked Lane, perhaps implies his hand. But as to the great trio of steeples executed in the 1710s – those of St Stephen Walbrook, St James Garlickhythe and St Michael Royal – can these really be from the same designer as the heavy, brooding ‘Fifty New churches’ then rising in the east end of London? The contribution of the elderly Wren, who continued to receive a salary in connection with the City churches until 1717,⁵⁸ should not be discounted.

St Edmund-the-King is the last City church steeple where Hawksmoor’s involvement can be demonstrated.⁵⁹ The design was made forty years after the Great Fire, when Wren was in his seventies and Hawksmoor was in his forties. The City churches had provided Hawksmoor with a regular source of income and early opportunities in architectural design. An analysis of the few surviving drawings suggests that he designed the steeple at St Augustine, Watling Street, and that he supplied much of the detailing elsewhere in 1695–1701. He also played a crucial role in finalising the spire of St Bride’s and, a few years later, designed the spire of St Edmund-the-King.

From 1705 Hawksmoor was working with John Vanbrugh at Blenheim Palace,⁶⁰ where the fantastical skyline perhaps testifies to a decade and a half of building and designing steeples in the City of London. That Hawksmoor spent his formative years associated with the City church steeples – functionless, abstract, sculptural forms – surely has a bearing on his subsequent approach to design. His sensitivity to the visual, three-dimensional appearance of architecture – already apparent in his City church drawings of the late 1690s – was an essential ingredient of the English Baroque style.

NOTES

- 1 Sir John Summerson, *Architecture in Britain, 1530–1830*, New Haven and London, 1993, 251.
- 2 Kerry Downes, *Hawkmoor*, London, 1959 (hereafter ‘Downes 1959’), 50.
- 3 The drawings relating to steeples are published in *Wren Society*, X, 1933, plates 1–10, and John Summerson, ‘Drawings for the London churches in the Bute Collection: a catalogue’, *Architectural History*, XIII, 1970, 30–42. In neither publication is any systematic attempt made to identify Hawkmoor’s draughtsmanship. Only two of the steeple drawings, both for St Augustine, Watling Street, have so far been attributed to Hawkmoor [Downes 1959, 52]. No further drawings were attributed to Hawkmoor in Paul Jeffery’s recent treatment of the subject [*The City Churches of Sir Christopher Wren*, London and Rio Grande, 1996, 127–50].
- 4 Downes 1959, 7–8.
- 5 Kerry Downes, *Hawkmoor*, London, 1969; repr. 1994 (hereafter ‘Downes 1969’), 12–14, where the evidence concerning Hawkmoor’s early years is set out.
- 6 Downes 1969, 17.
- 7 Jill Lever (ed.), *Catalogue of the Drawings Collection of the Royal Institute of British Architects, G-K*, Farnborough, 1973, 99–100.
- 8 Anthony Geraghty, ‘Introducing Thomas Laine: draughtsman to Sir Christopher Wren’, *Architectural History*, XLII, 1999, 240–45. Laine’s departure from Wren’s office c.1683 perhaps in part explains when and why Hawkmoor first came to Wren.
- 9 H.M. Colvin (ed.), *The History of the King’s Works*, V, London, 1976, 443–51.
- 10 This is apparent from the diary of Robert Hooke, who assisted Wren in connection with the City churches in 1670–96. See H.W. Robinson and W. Adams (eds.), *The Diary of Robert Hooke, 1672–1680*, London, 1935, *passim*.
- 11 Downes 1959, 2–3.
- 12 London, Guildhall Library (hereafter GL), MS 25544/7 (City Church Office, imprest books), pp. 22, 168, 209.
- 13 GL, MS 25539/4 (City Church Office, building accounts), fol. 3.
- 14 Downes 1959, 7. On 6 November 1684 Hawkmoor witnessed the brickmaker’s contract for Winchester Palace [*Wren Society*, VII, 42]. This probably took place in London, where Hawkmoor can be documented on 4 November [GL, MS 25544/7, p. 210].
- 15 GL, MS 25544/7–8.
- 16 GL, MS 5714/1 (St Mary Somerset, Churchwardens’ Accounts, 1614–1701), fol. 307v.
- 17 Phillips received a final salary payment of £10 on 30 November 1686 [GL, MS 25548 (City Church Office, Salary Account), p. 15]. His death is recorded in GL, MS 25541/2 (City Church Office, Balance Books), fol. 80.
- 18 Hawkmoor’s handwriting first appears in the building accounts on 13 January 1687 [GL, MS 25539/4, fols 32v, 111v]. His handwriting is likewise first apparent in the Office of Works accounts in 1686–87 [London, Public Record Office, WORK 5/40, *passim*].
- 19 Hawkmoor’s salary was paid from the coal tax, as recorded in GL, MS 25548, p. 37: 9 May 1687 (£10), 28 September 1688 (£20), 25 July 1689 (£50), 23 December 1690 (£20), 5 January 1691 (£10), 9 July 1691 (£10), 16 October 1691 (£10), 29 March 1692 (£20), 17 December 1692 (£20), 16 July 1694 (£20).
- 20 This is confirmed by a recently discovered book from Hawkmoor’s library, Michael Wright’s *An account of His Excellence Roger Earl of Castlemaine’s Embassy*, London, 1688, which is inscribed in Hawkmoor’s hand: ‘N Hawkmoor. at S.^r Chri: Wren’s in Scotland-yard. Whitehall: 1693.’ [Hugh Pagan Limited (London), *Architecture Catalogue* 33, 1999, 56–58.]
- 21 GL, MS 25543 (City Church Office, General Account), p. 55. Hawkmoor’s fair accounts survive at Oxford, Bodleian Library, MS Rawlinson B 387–9.
- 22 *Statutes of the Realm*, VI, 17.
- 23 Hooke was last paid in connection with the City churches on 1 August 1696 [GL, MS 25541/3, fol. 31]. Dickinson can be documented in Wren’s office from 4 July 1691, when his signature first appears in the City church accounts [GL, MS 25544/9, p. 75]. He was salaried as a clerk from July 1697 [GL, MS 25541/3, fol. 32].
- 24 GL, MS 25541/3 (1695–1700), fols. 29–55; GL, MS 25541/4 (1701), fol. 3: 14 September 1695 (£60), 14 December 1695 (£60), 1 August 1696 (£40), 4 March 1697 (£30), 17 July 1697 (£40), 16 December 1698 (£40), 22 June 1699 (£20), 28 September 1699 (£50), 25 April 1700 (£30), 6 August 1701 (£25).
- 25 The following towers and/or steeples were executed in 1695–1701 from accounts in GL, MS 25539/8–10: St Augustine, Watling Street (parapet and steeple, 1695–97), St Mary-at-Hill (steeple, 1695), St Dunstan-in-the-East (tower and steeple, 1695–1701), St Vedast (tower only, 1695–98), St Michael, Crooked Lane

- (tower only, 1697–98), St Margaret Pattens (tower and spire, 1698–1702), St Alban, Wood Street (tower, 1697–98), All Hallows, Watling Street (tower, 1697–99), St Margaret Lothbury (tower and steeple, 1698–99).
- 26 For a handlist of Hawksmoor’s drawings, see Downes 1959, 275–84.
- 27 *Wren Society*, V, pl. 24, bottom right; *Wren Society*, IV, plates 11–12; Downes 1959, 51.
- 28 London, British Library, King’s Topographical Collection, 23, fol. 13. The drawing is endorsed, in Hawksmoor’s hand, ‘Fair Drawings &c’. The draughtsmanship is consistent with contemporary drawings for the church of St Mary, Warwick [*Wren Society*, X, plates 14–18], which can be attributed to Hawksmoor on the basis of firm documentary evidence [Downes 1969, 28–30]. An identically ruled and figured scale-bar appears in Hawksmoor’s drawings of c.1692 for the Writing School at Christ’s Hospital [*Wren Society*, XI, plates 48–51]. The churchwardens’ accounts at St Dunstan-in-the-East record that £4 was ‘Given Mr Hawkmore Sir Christopher Wrens man as a Gift’ in late 1696 [GL, MS 7882/3 (churchwardens’ accounts, 1684–1705), p. 472], which may or may not have been in connection with drawing. An earlier pencil study for the steeple, formerly in the Bute collection, is also probably in Hawksmoor’s hand [*Architectural History*, XIII, 1970, Fig. 14a].
- 29 The first we hear of the new tower is in July 1693, when two of Wren’s staff visited the church [R.T. Gunther, *Early Science in Oxford*, X, 257; GL, MS 7882/3, p. 356]. In the same month, the parish records record that the steeple was about to be rebuilt ‘at the Public Charge’ [*Wren Society*, XIX, 18]. The parishioners called on Wren on 19 September 1695 [GL, MS 7882/3, p. 433] and work was underway by November [GL, MS 25539/8, p. 63]. Construction was finished in 1701 [GL, MS 25539/8, p. 88].
- 30 GL, MS 7882/3, p. 442.
- 31 John W. Yolton, *Perceptual Acquaintance from Descartes to Reid*, Oxford, 1984, 91.
- 32 Kerry Downes, *Sir Christopher Wren: The Design of St Paul’s Cathedral*, London, 1988, 140–1. A similar apparition features in the drawings for Whitehall Palace made c.1698, where a cylindrical tower looms ghost-like in the middle distance [All Souls, V. 7; *Wren Society*, VIII, pl. 3 (lower)].
- 33 H.M. Colvin, *Catalogue of Architectural Drawings of the 18th and 19th Centuries in the Library of Worcester College, Oxford*, Oxford, 1964, pl. 98.
- 34 These drawings have long been attributed to Hawksmoor [Downes 1959, 52, 276]. They are RIBA Hawksmoor [2] and All Souls, IV. 88.
- 35 GL, MS 25539/4, fol. 90^v. The churchwardens’ accounts record that the parish paid ‘Sir Christopher Wrenn’s Clarke’ 2 guineas on 12 April 1692 [GL, MS 5714/1, fol. 333].
- 36 Samuel Fulkes had executed ‘the Stone worke in the Parapett and Pinicles’ by 19 May 1698 [GL, MS 25539/10, fol. 15].
- 37 Samuel Fulkes had executed the ‘fower pinicles’ by 14 December 1699 [GL, MS 25539/9, p. 46].
- 38 Paul Jeffery makes a convincing case for attributing the upper portion of St Andrew Holborn, designed c.1695, to Hawksmoor [*The City Churches of Sir Christopher Wren*, 62, 129–30, 198]. A similar case can be made for the tower (though not the later steeple) at St Vedast, for which a sheet of architectural details survives at All Souls [*Wren Society*, IX, plate 30]. This is in the same hand as contemporary drawings for the choir-fittings at St Paul’s, several of which are annotated by Hawksmoor [Downes, *The Design of St Paul’s Cathedral, cit.*, 163].
- 39 GL, MS 25541/4, fol. 3.
- 40 GL, MS 25541/3, fol. 55; GL, MS 25541/4, fol. 3.
- 41 Hawksmoor last witnessed payments on 30 September 1698 [GL, MS 25544/10, pp. 7, 59].
- 42 Kerry Downes, *Vanbrugh*, London, 1977, 26–27, 32.
- 43 Downes 1959, 73, 234–35.
- 44 See Wren’s autograph drawing of c.1676 [All Souls, II. 46; *Wren Society*, IX, pl. 9].
- 45 GL, MS 25540/1 (City Church Commissioners’ Order Book), p. 61.
- 46 GL, MS 6554/2 (St Bride, Fleet Street, Vestry Minutes, 1681–1703), 19 September 1701.
- 47 GL, MS 6552/2 (St Bride, Fleet Street, Churchwardens’ Accounts, 1678–1701), 6 October 1701.
- 48 All Souls, IV. 23; *Wren Society*, VI, pl. 23. The draughtsmanship of this design has long been attributed to Hawksmoor [Downes 1959, 281, no. 363]. It contains letters and numbers also apparent in the St Bride drawing. Hawksmoor’s characteristic number ‘5’, for example, features in both. This occurs to the right of the second tier in the St Bride design and to the left of the dome section (amongst other places) in the Greenwich drawing. Similarly, the St Bride drawing contains the letters ‘En’ in several places, short for entablature. The same looped capital E is apparent at the words ‘mid Enter’ in the centre left of the Greenwich drawing.
- 49 See, for example, Downes 1959, plates 16b, 28b, 39, 46b, 78a.

- 50 GL, MS 25540/1, p. 67 (30 November 1686): ‘St Magnus Church standing contiguous to the Thames on one side, & being also one of the greatest roades from ye sea port on the other will be in sight of most passengers; We therefore would have a stone spire built there’ (signed by the Lord Mayor and Bishop of London).
- 51 John Thompson, the mason-contractor, received £5 14s. ‘ffor making the modell of the Spire’ on 15 December 1684 [GL, MS 25539/2, fol. 135^v].
- 52 The churchwardens’ accounts record that on 10 June 1703 19s. 6d. was ‘Spent upon the Chief Mason at laying the first Stone for the Spire and given the other Workmen att Severall tymes’ [GL, MS 1179/1 (St Magnus-the-Martyr, Churchwardens’ Accounts, 1638–1734), fol. 564].
- 53 ‘Bridg foot’ refers to London Bridge, which was immediately adjacent to the church.
- 54 Downes 1959, pl. 1a.
- 55 The parish records refer to ‘a Spire about to be Erected at the Publick charge’ in February 1706 [GLMS 4266/1/1 (St Edmund-the-King, Vestry Minutes and Churchwardens’ Accounts, 1680–1712), p. 325]. Building accounts are in GL, MS 25539/11, fols 8^v-11.
- 56 Downes, *Vanbrugh, cit.*, pl. 34.
- 57 Downes, *The Design of St Paul’s, cit.*, no 142.
- 58 GL, MS 25541/4.
- 59 Hawksmoor’s tower of St Michael Cornhill, though in the City of London, belongs to the later ‘Fifty New Churches’ campaign [Downes 1959, 157, 257, 277].
- 60 Downes 1959, 75–82.