

The London Cutler ‘Benjamin Stone’ and the Hounslow Sword and Blade Manufactories

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The London cutler Benjamin Stone is one of the very few sword and blade producers and arms manufacturers to appear in the first edition of *The Dictionary of National Biography*, published in 1898. In this entry, the author drew on several surviving 17th-century records, such as the Court Minutes of the London Cutlers’ Company and the State Papers Domestic of Charles I. Since then, a number of other writers have looked again at Stone’s career and at the Hounslow Heath project with which it appears he was most associated, in particular, Clement Milward, Charles Trenchard, Martin Holmes, J F Hayward and, more recently, the late John Tofts White, who, as a long-time resident of the Hounslow area of Middlesex (thirteen miles west from the City of London), had an in-depth knowledge of the history and geography of the district. This present account examines all the evidence again to see if more can be learned about Stone and his business dealings, his life and activities; and also to provide new facts about the Hounslow sword and blade manufactories and the men who worked in them.

Stone’s early years

Benjamin Stone, the son of John Stone, a yeoman of Arundel in Sussex, was probably born in 1592 (no baptismal date is recorded for our subject at Arundel and the date is calculated from the information below). On 19 February 1604/5 (his father now deceased),¹ Stone was indentured for nine years to the London cutler, William Ball, and was sworn free of the Cutlers’ Company by servitude on 2 December 1613, aged about 21. It was normal for apprentices to be bound for seven years and to be aged fourteen, when indentures began (although there were exceptions to this practice). The fact that Stone had been indentured for nine years suggests that he was young, probably aged about twelve or thirteen, when bound. Moreover, an apprentice had to be at least 21 to become free of a company (there were no exceptions to this rule), which shows that Stone (having completed his nine-year term) was aged 21 or upwards on 2 December 1613. This calculation points again to Stone having been

probably born in 1592. Five months after becoming free, Stone indentured his first apprentice, Robert Salisbury, on 12 April 1614, and, twelve years later, on 31 January 1625/26 (somewhat later than normal), he became a Liveryman of his company.

Stone between 1613 and 1630

Between taking his freedom in December 1613 and 1630 (when his connection with Hounslow is known to have begun), Stone is found in a number of references both in the Cutlers' Company Minutes and the Debenture Books of the Office of the Ordnance. The Cutlers' records show him to have been an energetic, but somewhat fractious and troublesome individual, one intent in bending the rules for his own ends and also intent on succeeding, by whatever means, in a very competitive business in an age of Continental and national warfare.

On 14 July 1618, Stone first appears in the Court Minutes for being fined ten shillings for striking others men's marks and for other abuses and, four months later, in early November, he was committed to prison by the Lord Mayor for the additional offence of Contempt in not having appeared before the Court although warned to do so. Two years later, on 2 May 1620, he was warned to stop buying knives, which were not made within the City of London, items which might be counterfeit; and, on 17 October following, again fined half a mark (6s. 8d.) for going to Stourbridge Fair without having his goods inspected. The following year, on 14 June 1621, he was fined again for disorderly behaviour and uncivil speeches to the Master and other prominent Court members, when he delivered a consignment of swords to the Ordnance Office at the Tower. He refused to pay the fine and was committed to the Counter (prison). On 24 January 1621/22, he was in dispute with widow Fulwater, wife of the cutler, Jacob. Stone had received 30 swords from Jacob, which he had not paid for but then had sold, without paying Mrs Fulwater any money. Two years later, on 26 April 1624, he refused to pay a fine of 33 shillings and 4 pence for not enrolling his apprentices and for paying them wages as though they were journeymen. Following being made a Liveryman in 1626, he was again fined three years later, on the last day of April 1629, for abusing the Master and Wardens before the Lord Mayor, over wrongs against a fellow cutler, Richard Briginshaw. Several months later, on 14 December 1629, Stone refused to allow one of his apprentices, William Hall, to become free until he had returned some goods entrusted to him; and on 21 January 1629/30, he demanded that the Court grant him his old master's mark, a Bunch of Grapes, which they refused to do until he had paid his outstanding fine of ten shillings, which he did a year later.

Not every cutler was given a lucrative contract to supply swords or other weapons of war to His Majesty's Office of the Ordnance at the Tower, a privilege usually granted to a favoured few. Stone first appears in the Debenture records for the year 1627–28. These documents show Stone delivering two large consignments of imported swords to equip English forces (under the command of the Duke of Buckingham) for an expedition to France and others for the defences on the Island of Scilly. Stone's

delivery for the expedition was part of the 15,000 swords urgently ordered from the London Cutlers on 13 August 1627.²

Stone's first known debenture, entered in the Bill Books on 27 June 1628, reads: 'A Debenture made unto Benjamin Stone of London Cutler for the some [sum] of two hundred three score and nyneteen pounds eleven shillings & eight pence vizt for 300 qt [quantity] Venice Swords with Irish hiltes at vjs iiijd [6/4d] a pece cx℥ xvjs viijd and for iiijC [400] qty Dutch Swords wth Irish hiltes at vijs vjd a pece [7/6d] clxviij℥ xvs by him provided and brought into his Maties Stores towards the arming of vj thousands Souldiers bound for the relief of [La] Rochell with the rates before said amounteth to the said some of cclxxix℥ xjs viijd [£279-11s-8d]. Swordes for ye arming of 6000 men bound for the relieffe of Rochell to be pd for by a Pri: [Privy] Seale dat[e] 6 Novembris 1627' (figure 1).³ Three days later, on 30 June 1628, a second payment was made for a separate order: 'A Debentur made unto Benjamin Stone of London Cutler for the some of fiftie six powndes fyve shillings for cl [150] Dutch Swords with Irish hiltis by him provided and brought into his Mats Stores towards the furnishing of a proportion of Munition to be sent for supply of the Isle of Silley [sic] wth at viijs vjd [8/6d] a pece amounted to the said some of lvi℥ vs [£56-5s]. Dutch swordes with Irish hiltis'.⁴ These entries, detailing the swords delivered by Stone (and of the other cutlers who regularly supplied swords to the Ordnance), reveal that these large consignments of weapons were not of English manufacture, but imported from abroad, mainly from Venice and Holland.⁵

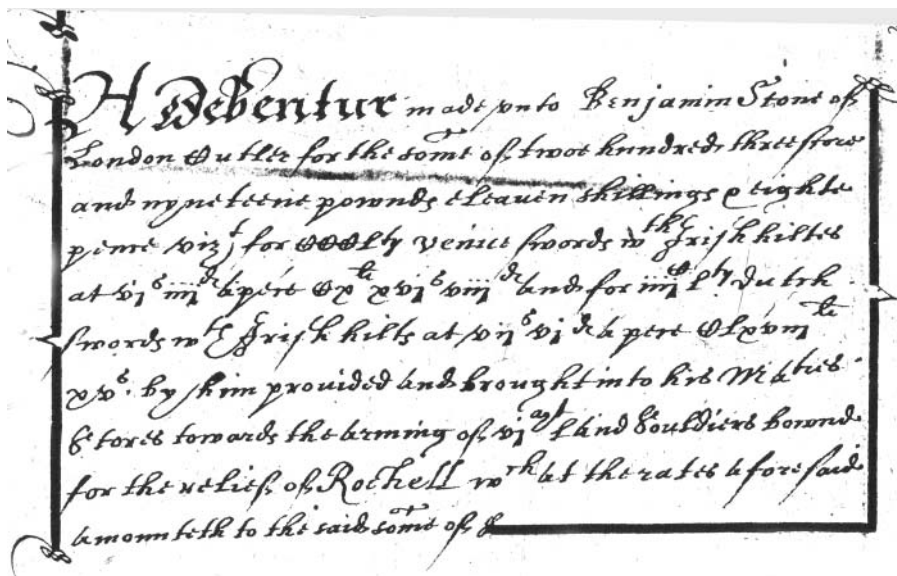


FIGURE 1 Debenture for payment to Benjamin Stone for swords delivered to the Ordnance Office in the Tower of London. National Archives WO49/ 59 f. 200.

The foundation of the Hounslow sword and blade manufactories

The date of the start of the royal project to manufacture blades and swords ‘for his Majesties service on Hounslow Heath in Middlesex in the yeare 1629’, comes from the well-known statement by two German sword blade-smiths (long resident in England), Henry Hoppie and Peter English (see below), who were the lone survivors of a small group of craftsmen invited to come to this country to start a sword and blade manufactory on Hounslow Heath, four years after Charles I came to the throne.⁶ The men’s statement (made over forty years after the event) forms part of The Calendar of State Papers Domestic of Charles II for the year 1671–2, now in the National Archives (The statement is not dated precisely but was probably made early in 1671 OS).⁷ Interestingly, all earlier writers on the Hounslow blade-making venture have drawn on the printed version of the State Papers Domestic of Charles II (1671–2), which was published by the HMSO in 1897. This is a useful account, but it is a summarized version of what Hoppie and English said. The original hand-written manuscript is a more revealing document and reads:

Henry Hoppie and Peter English Swordblade makers

Humbly sheweth unto his Matie.

That in the yeare 1629 by reason of the warre then in Germany, the Artificers being disperst, Sir William Heydon then employed in his late Maties Service in Holland designing to bring the Manufactories of Sword blade makeing from thence through much importunity persuaded severall of the workmen to come over into England and his late Matie to encourage those Artificers caused several Mills to be erected at Hounslow Heath for their use where they made Swordblades for his Maties stores and the Gentryes wearing as good and as cheape as any in the world.

That they continued in makeing of Swordblades at Hounslow untill the late unhappy Warrs in England That the said Hoppie and English with some other of those workemen went to Oxford with his late Maties and wraught there, which occasioned their Miles [sic] to be taken from them by Oliver Cromwell and converted into powder Mills.

That there is but two (the said Hoppie and English) left of that Art and calling now in England which can make and performe good worke and they are of the old stocke that came out of Germany as aforesaid, that they grow in yeares, and if they should dye the said Manufactories must of necessity be lost to England for your Matre cannot now without much difficulty get over any more workemen out of Germany by reason they sweare their Artificers before they make them free not to discover their Art to any nor to use the same in any other place wth this they should attempt and be taken it weare death to them.

That since your Maties happie restauracon the said Hoppie who is German borne hath been very much importuned to goe into his owne Country with great promises of encouragement.

That the said Hoppie thereupon informed the Right Hons Coll Legg who acquainted your Matie therewith, And your Matie was then graciously pleased to Order the said Coll Legg to see the said Hoppie and English provided for, and no doubt but he would have done the same if he had lived.

That your Maties desire of setting upp the said Manufactorie of Swordblade making againe in England may be performed by the instructions of the said Hoppie and English provided they may meete with your Maties countenance and encouragement therein.

*That the said Hoppie and English can serve your Maties stores with as good or better at a cheaper rate than is now done, And in few yeares by your Maties encouragement may be able to served other Nations out of England as formerly in his late Maties Raign.*⁸

This statement (not the published summarized version) confirms that the immigrant sword- and blade-smiths who arrived in England in 1629 and who worked at Hounslow, were not only German born and trained, but were (because of the Thirty Years' War of 1618–48) working at the time of their recruitment not in their homeland, but for the arms trade in Holland;⁹ and that it was from thence that they were recruited with pressing urgency and through much importunity by Sir John Heydon, Lieutenant of the Ordnance, then employed in 'his late majesties' (Charles I) service in Holland and not, as the men state, by his brother, Sir William Heydon, who had drowned at the Ile de Rhé in 1627 (Sir John succeeded his brother in the post following his death).¹⁰

Further confirmation that the men were natives of Germany comes also from a later petition for denization addressed to King Charles II in 1662. This denization declared that Henry Hoppe (a blade-maker and a member of a well-known Solingen family)¹¹ and two other petitioners, the hilt-makers, John Conine and John Walford (see below), were '*Aliens borne within the Dominions of the Duchy of Berg. . . and [had] not been brought up in England, in the Craft Mistery or occupation of the Cuttlers [of London] as Apprentices by the Space of Seaven Yeares*'.¹²

The original statement of 1671–2 further declares that King Charles I '*to encourage those Artificers, caused severall Mills to be erected at Hounslow Heath for their use where they made Swordblades for his Maties stores and the Gentryes wearing as good and as cheape as any in the world*'; and that the German workmen continued to make sword blades until the start of the English Civil War, when Hoppie and English, '*with some other of those workemen*', followed the King to Oxford and continued to work at the Royal Sword Ordnance in the mill at Wolvercote, an ancient parish lying two and a half miles to the north-west of the city.¹³ Afterwards, Cromwell converted their Hounslow blade-making mill into a powder mill (no doubt because it had been vacated and that gunpowder was essential to his war effort — see below). The important points here are that not one, but '*severall [Sword] Mills*' were erected and operated at Hounslow Heath, and that the German craftsmen produced, not only sword-blades for the Office of the Ordnance (His Majesty's Stores at the Tower), but also manufactured other more fashionable swords for the '*gentryes wearing*', all at a cost lower than elsewhere.

The statement further confirms that, in 1671–2, there were but two (the said Hoppie and English), who were the lone survivors of those original German-born artificers who came to England and '*that they grow in yeares*', and that if they died before the King set up a new manufactory (as had been intimated, see below), the

secrets of their trade would be lost. If that had happened, it would have been difficult to bring new recruits over from Germany to train English workers in their skills (as Charles I had done years before), as the authorities in Germany (in order to maintain their hold on the European blade trade) now made native artificers swear, on pain of death and before being given their freedom, not to go and work in any other country or to divulge the secrets of their trade to anybody else (a stricture not seemingly in force in 1629, or one not abided by in wartime, or one that could not be applied to men working abroad). Lastly, Hoppie and English indicate that they were petitioning the King on this occasion because his representative, the Hon. Colonel William Legge, Master of the Armoury and Lieutenant-General of the Ordnance (who had earlier drawn the appellants' situation to the King and had been instructed by him to provide for the two men) had died and that a further appeal was necessary.¹⁴

The Hounslow project was not the first proposal to establish a sword-blade-making centre in southern England. Several references in the early 17th century Court Minutes of the London Cutlers' Company relate to the manufacture of sword-blades. For example, in July 1608, it was agreed '*that suite be made to the Lord Maior & Councell for the provision of suche swords & other things appertayning to the Company for the servic of the Realme as from tyme to tyme hereafter shalbe provided for*', although nothing seems to have developed from this proposal.¹⁵ Some years later, in the early 1620s (before foreign smiths were invited to come to England), the Cutlers' Company records show that there was again a good deal of activity by prominent members in the company in looking at ways in which to establish blade-making in southern England. At this time, there appears to have been a direct need for such an operation, especially in the light of the many expeditions and conflicts in which England was becoming embroiled and the need to become less dependent on the importation of foreign arms during difficult times and perhaps to answer the pleas and requirements of the monarch.

For example, on '*xiiij dai of June 1621*', the Cutlers' Court Minutes record '*At this Court order was given to the Mr [Master] John Porter, that he with Mr Thomas Chessheir [another prominent past Master] and others shold see and veue a certayne Mill erected for the making of sworde blades and to give their judgements and opinions theirin at the next Courte*'.¹⁶ A month later, on 18 July 1621, a royal court favourite, Thomas Murray, '*Secretary to the Princes Highnes*', who had been granted a patent for 21 years by James I '*for the sole practise of a newe Invencon for the sole making of Sword blade Fauchions [falchions] Skeynes & Rapier blades wthin the Realmes of England & Ireland...*', offered this royal priviledge to the Cutlers, who rejected it '*by reason of the large expences...wch this worck as they thinck will require before it come to perfection...and many other difficulties depending thereupon*'.¹⁷

The Cutlers' Company view was probably the correct one at the time. Murray's '*new invencon*' (whatever form it took) would have indeed taken a good deal of time and expense to set-up, before sword-blades of some quality could be manufactured for Ordnance and civilian use.¹⁸ Most well-known sword-cutlers (including Benjamin

Stone, Robert South, William Cave, Thomas Cheshire, and many others) were merchant cutlers who primarily relied (for certain aspects of business success) on the importation of large quantities of blades and weapons acquired by their agents from well-known steel producing and arms centres on the Continent, notably Solingen in North Germany, the Low Countries, Northern Italy and Spain. (Indeed, Murray's patent above stated that '*there shall be a decay [decline] of importation. . . until the said manufacture be perfected*').¹⁹

This practice of importing blades was not, of course, new to the first half of the seventeenth century.²⁰ England, unlike those well-known centres abroad, was not known for its production of sword-blades. English sword-cutlers and, to a lesser degree, knife-makers, were dependent on good quality foreign blades, which they manufactured into swords, knives and other implements. Native smiths could hilt and scabbard fine quality pieces, but large consignments of munition swords and blades (and other weapons and armaments) required for the army or navy had to be ordered and imported in bulk, especially when demand was greatest.²¹ An example of this is found in the Cutlers' records, when the Company advanced money for the purchase of foreign blades, which were then sold to members at a fixed price some eight months later. The first purchase was of 48 dozen blades on 29 April 1624, which were then sold to sixteen members of the Company in parcels of two dozen costing £5, two of the members taking double the quantity.²² Other purchases followed over the next three years and beyond. For example, at a Court of Assistants held at Cutlers' Hall on Thursday 23 day of January 1639/40, '*it was freely consented unto that for the benefitt of this whole boddye and for the Service of his Matie there shalbe bought by Mr [Master] Thomas Bywater and William Cave such blades as can be gotten and the money for the payment of them the Mr [Master] and Wardens shall give Securitye for one hundred Pounds of the Seale of this House*'.²³

Benjamin Stone (like many other prominent names of the period involved with providing armour and arms to the royal wardrobes or to the Ordnance, such as Robert South, Thomas Cheshire or William Cave) was an ambitious entrepreneur, a businessman, a merchant sword- and blade-cutler. He was not a craftsman who assembled or hammered out the weapons at the bench; and by 1627–28, he had been selected, with several others, to deliver large consignments of swords to the Ordnance Office at the Tower. Two years later, his name became directly linked with the Hounslow project. Whether this was opportunism on Stone's part is not known, although this seems likely. The deteriorating relations between Stone and his own livery company in London, the Cutlers, may well have persuaded him to move and operate outside of what he might have considered the restrictive practices of his guild, and to gain royal favour by working directly for the monarch on a venture the King had instigated and at a site he had established.²⁴

Stone at Hounslow Heath

On 20 June 1630, in the sixth year of the reign of Charles I (a year or perhaps only months after foreign blade-smiths came to England), Benjamin Stone '*Citizen and*

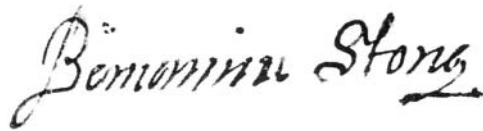


FIGURE 2 Signature of 'Benjamin Stone' on the indenture agreed with Lord Berkeley on 20 June 1630.

Cutler of London' signed a 21-year indenture at £8 per annum with the landowner, 'the right honourable George Lord Berkeley Mowbray Segrave & Bute', for the use of a 'Sword Mill lately erected on a parcel of waste ground of the sd Lord Berkeleyes called Hounslowe Heath neare unto a Bridge there called Baber Bridge over [the] newe Cutt River there wth all House & buildings & all & singular, the Appurtenants to the same belonging or appertaineinge Together wth such benefitt of the Streame of the said new Cutt River for the use of the said Mill, And also Three Acres of Land all of which situate lying & beinge upon Hounslow Heath aforesaid within the parish of East Bedfont cum Hatton in the County of Middlesex' (figure 2).²⁵

The contract was to commence officially from 'the feast of St Michaell Th'archangell wch shalbee in the Yeare of our Lord God 1632 [Michaelmas 29 September 1632]', and the agreed sum was to be paid 'by even & equall porcons' 'At the ffour most usual ffeastes or Termes in the Yeare That is to saye, At the ffeast of St Thomas the Apostle, The Anuciaton of the blessed Virgin Mary, St John Baptist and St Michaell the Archangell'. Also, Stone was to maintain the sword-mill in good order, to sustain the 'walls or banks of the newe Cutt River', and also was not 'at anie time during the said Terme [to] alter the said Sword Mill into any Cornemill or other Mill whatsoever...'

Moses Glover's *Survey of the Hundred of Isleworth*,²⁶ drawn five years after the indenture was agreed, clearly shows that the sword-mill (and Baber Bridge) were in the northern environs of the hamlet of East Bedfont, which lies on the Roman Road at the south-west corner of Hounslow Heath, the main expanse of open rolling land in the area (figure 3). Glover further showed that 'Mr Stone's House' lay just north-west of East Bedfont, before Baber Bridge, and that the 'Sword Mill' (lying due west of the house) was a long narrow structure with a pitched roof built across 'The Cut', a narrow tributary of the River Crane (later known as the 'Duke of Northumberland's River'), and was erected in such a way to take full advantage of the flowing stream.²⁷

Stone's date of occupancy on the indenture has led several commentators to suggest, probably rightly, that the Hounslow project did not begin to fully operate until he had taken up residence in the autumn of 1632, although the 'Account of George Kirk, Gentleman of the Robes to Charles I for 1630–31', includes payment of ten shillings for 'viij paper scabbards lined for viij hounslow blades'.²⁸ This reference clearly shows that Hounslow blades had begun to be manufactured the year before Stone apparently moved in and perhaps only months after foreign workers had been



FIGURE 3 Detail of Moses Glover's Map of 1635, featuring the Parish of East Bedfont and marked with Benjamin Stone's House, Baber Bridge, the Sword Mill and 'The Cutt'. Glover drew the map in reverse. The south of the area is at the top and the north at the bottom.

brought to England. The mill, said to be '*lately erected*' in the indenture of 1630, was probably ready to start operations by the time the terms were agreed.

It is not known for certain if the site of Stone's sword-mill at East Bedfont was the same as that occupied by foreign smiths after 1629 (Glover's map of 1635 only appears to show one sword-mill, although other houses and buildings are mentioned in the indenture, and industrial sites dotted around the Heath, such as buildings around a copper-mill, are less clearly defined). Hoppie and English (who do not mention Stone in their statement above) describe '*several mills*' operating at Hounslow, and perhaps (in view of Waller's later comment) one was run by Johann Kinndt or 'Kennet' and another by Stone.²⁹ It is also possible that the buildings had different functions, one perhaps to forge blades, another perhaps to mount and assemble the blades into swords, etc.

However, in view of the fact that Stone became increasingly influential in providing the King with large numbers of different types of blades, swords and '*skeins*', from the mid 1630s (and was famous enough locally to have his house and mill marked out on a colourful map of the area), it seems most probable that he was the driving force appointed (possibly by Sir John Heydon) to manage and oversee a number of operations on Hounslow Heath, especially the manufacture of munition swords for the Ordnance. (In view of the take-over of certain mills by Parliament after 1642 and the difficulties encountered by others around 1650 below, it seems almost certain that, at the height of production in the 1630s, '*several [Sword] mills*' operated on the Heath).

Other than his house and sword-mill being shown on Glover's map, only one other apparent piece of information links Stone with the Parish of East Bedfont.

The Churchwarden and Overseers of the Poor Account, dated 4 May 1634, records (perhaps typically) that the five shillings that was short and owing to the Poor Account, an amount passed to the new Overseer, Thomas Weldish, as a sum '*left unpaid by Mr Stone*'.³⁰

The Court minutes of the Cutlers' Company also reveal that Stone had become active in a new venture at Hounslow Heath.³¹ About ten weeks after he had officially taken up residence, on '*A Quarter daye Court Tewesdaye the 15 January 1632/33. . . Beniamyn Stone did request to have leave to bynd to himself soe many apprentices as his occasion in the makeing of Sword and Rapier blades doe require. The Court in answer of his request doth refer the granting thereof until Sixe of this Company appoynted by the Master hereafter named shall by their conference wth the Sayd Beniamyn Stone fynd reason for the graunting therof*'. A month later, on 14 February 1632/33, '*it was decreed that Beniamyn Stone shall have noe more apprentices than the orders of this house doth allow*'.

A master was allowed to train six apprentices at any one time and, when a candidate eventually became free, another boy could be indentured to that master. Stone clearly knew this ruling, which was the reason for his request to have more than the allowed number. However, what Stone was attempting to do was to gain his Company's permission to bind as many boys as he could, in order to train them to be master blade-smiths at Hounslow, and to provide him with more general help in his sword-mill.³²

Two years later, an incident occurred, which demonstrates Stone's sensitivity to what he considered to be interference by his livery company in his Hounslow project. At a Cutlers' Court held on 13 October 1635, '*Beniamyn Stone was committed to the Counter [prison] uppon the Lord Maiors Command for that the sayd Beniamyn Stone would not referr himself to the sencesure [censure] of this Court but stubbornely behaved himself towards the Mr [Master] Wardens and the rest of the Assistants concerning disdanefull wordes and reprochfull speeches wch he used against Mr Robert South at Hounslow the 16th daye of September last past in the Company of all the Anncient Masters and in the hearing of divers strangers*'.³³ For this offence, as with others, Stone apologized and was fined, but similar behaviour was to occur on several other occasions following 'searches' by the wardens, even as late as March 1642, five months before the English civil war broke out.

It is not known why Stone took such umbrage against the various visits by the Cutlers. He was certainly a fiery character and the Court Minutes tell of '*disdaineful wordes and reprochful speeches*' but they do not say why they were spoken. The Cutlers would certainly have been aware of foreign smiths arriving in England (see below), men invited and employed to set up a manufactory outside London under the King's protection. They would also have known that, although these mills were outside their official jurisdiction, they might affect the future livelihoods of their members and they may have tried to waylay these operations. For example, they could arrange searches to see that the required standards were being maintained, to see if apprentices were properly indentured, and that if all the legal statutes applicable to blades and swords were being observed at Hounslow.

Moreover, there is also some evidence that the Cutlers (prompted by Robert South and others) may have attempted to invest in a rival operation to Stone's, a venture which would have deeply frustrated him. For example, on Thursday 21 April 1631, at a 'Quarter Day [Cutlers] Court. . . . it is further agreed that that the sayd parties shall make an Agreement wth [a] Mr Kente a pattentee for the makeing and manufacture of Swordes and Raper [sic] blades that in such case the Companie & the Corporacon will either take it merely into their hands or Joyne for a third part uppon gayne or losse or lend One Hundred Poundes freely for one yeare uppon securitie to be truly and wholely paye agayne or as then they further agree'.³⁴ Ten months later, in January 1631/32, 'Robert South, the King's cutler and a member of this Company had £100 lent unto him for one whole yeare gratis out of the stock of this howse towards the making of Sword & Rapier blades for the good of this Companie & Kingdome'.³⁵ As there are no further reports in the Minutes on these arrangements, it can be assumed that the Cutlers' manufacturing venture with 'Mr Kente' did not materialize.

Stone appointed 'His Majesty's Blade Maker to the Office of the Ordnance' and 'His Majesty's Artificer for all manner of Sword Blades'

1636 was a turning point for Stone. Between 1632 and 1636 (although his constant struggles with the Cutlers' Company continued), the Ordnance ledgers do not appear to record Stone delivering any consignments of swords and blades to the 'King's Stores' at the Tower during these years. However, a petition from Stone to the King, in a minute, handwritten script, dated 13 May 1636 (this date has been missed by earlier writers), shows that the mills on Hounslow Heath had not been idle, but had, over a four-year period, become an active blade-making operation. The petition also shows that the promoter of the mills, Benjamin Stone, desired that this royal and national venture should be properly recognized and encouraged by the King in the proper way, that is, that Stone's newly-forged consignments of Hounslow blades should be taken into the Ordnance Office at the Tower for service use, and that the manufacturer should be promptly paid for the efforts he had made on the King's behalf. The petition reads:

*To the Kings most Excellent Matie
The humble petition of Beniamin Stone
Blademaker on Hounslow Heath
Shewing*

That whereas upon a peticon preferred to yor Matie by the peticoner shewing the greate charge your petn hath bine at in perfecting the manufacture of making Sword blades of all sorts for the honor and safety of this yor Kingdome I herein humbly intreating yor Matie to be pleased to take into yor Store from Yor patr the number of 2000 blades wch are now in readines and to cause the right honrble the Lord Treasr: to advance your petr present mony for the same thereby to incourage your pet. to continue the said

manufacture in this your Kingdome wch never heretofore was brought to such perfection therein your Matie. hath bine graciously pleased to refer the consideracon thereof to Mr Attourney and Mr Sollicitor generall to advise what fitt wayes and means might be used that the worke might not lye upon his hands and the manufacture lost for want of incouragement, Who accordingly have certified there opinions therein and have taken your pets oath that he hath 2000 blades in readines to be delivered in for your Mats Store, if he may have present money for the same whereby to inable him to undergoe the charge of soe greate a worke, wch otherwise will perish for want of encouragement as by the said peticon and reference with there report thereuppon heer unto annextd may appeare.

How soe it may please Your Matie by reason of your petr. greate expenses in the said Manufacture he is hindered therein by being indebted unto some persons in the Citty of London — severall somes of money in so much that he dareth not walke about his affayres in respect they threaten to arrest him wheresoever he goeth.

Wherefore your petr. humbly beseecheth yor Matie. to be graciously please to give order to the Lord Treasur. that your petr. may have present money upon the delivery of the said 2000 blades into your Mats Store and that your Matie. wilbe pleased to graunt unto him your Letter of protecton for his body, goods and his secuerties, for the space of one yeare that your petr. may freely walke about his affayes. . . . At the Court at St James, 13 May 1636.³⁶

Stone's petition was passed by the King to the Attorney General (John Bankes) and the Solicitor General (Edward Littleton) for their studied opinion, a view which they gave on 1 July 1636:

May it please your most excellent Matie.

According to your Mats directon we have considered of this peticon And doe find that the peticoner hath beene at greate charge in the making of Sword blades Rapier blades skeyne blades and other blades heere in this Kingdome for your Mats. Store and for the Service of your subjects wch for the most part have hitherto bine made in fforreyne parts and imported hither.

The peticoner by reason he hath noe vent [sale] of his blades is like to be undone and the worke fall to the ground.

It appears by his affdt [affidavit] that he hath 2000 blades nowe in readiness fitt for your Mats Store and provision for: 3000 more wch wil be ready by Michas [Michaelmas] next.

If your Matie. may be pleased to give order for the taking the peticoners blades into your Mats. Stores for your Mats. Service, His humble suit is that he may hand present money for the same when they are delivered, that he may be able to goe forward with the worke.

All wch we humbly submitt to your Mats greate wisdom.

Jo Bankes

1 July 1636

Edward Littleton.³⁷

Lastly, on that same day, 1 July 1636, before Robert Riche ‘*The Deponent Beniamin Stone Blademaker on Hounslow heath maketh oath that he hath now in readiness Two thousand blades fitt for his Mats Store [and] This Deponent further saith that he hath provision for Three Thousand blades more that wilbe ready by Michas. day next ensuing*’.³⁸

Nine days after Stone’s petition had been approved by the Attorney and Solicitor Generals and his oath sworn to produce the required number of blades, Stone was, on 9 July 1636, granted a royal patent: ‘*A Royall Priviledge graunted to Beniamyn Stone blademaker and his Assignes, for the terme of 14 yeares next ensuing, within England Ireland and Wales and Town of Barwicke [Somerset], to make and worke all Manner of Sword blades, ffauchions [falchions], Skeynes, Rayzer blades and blades serving for Reste for muskettes of any ffashion or Kind & whatever according to a way and invented by him by the helpe of Mill or Mills and the same to sell at moderate rates. . . . nono die July 1636*’.³⁹

Five months after the approval of his petition and his patent, the King honoured Stone further. In a warrant addressed to Sir John Heydon, Lieutenant of His Majesty’s Ordnance, sent from Hampton Court and dated ‘*12th day of December 1636*’, Stone was given a royal appointment in the Office of the Ordnance: ‘*After my very hearty Comendacons, whereas I have receaved a Comannd from his Matie [Majesty] to admitt to this Board Beniamyn Stone as Blade-Maker or Maker of Sword Blades for the Provision th’office of th’ordnance, when, and as often as thou shalbee occasion of his employment, and that for his better encouragement hee should be made a Member of the said Office, whereby hee might bee Capable of those rights and priviledges as others of the like qualities doe enjoy. Theis and therefore to pray and require you to enter the said Stone as his Mats. Artificer for all manner of Sword Blades in this Lidger Book remayning in the Office, for the doing whereupon this shalbee unto you sufficient Warrant. . . [signed Tho Newport]*’.⁴⁰

A number of commentators have been somewhat sceptical about Stone’s use on various later debentures of the title ‘*His Majesty’s Blademaker to the Ordnance*’, but, as the document above proves, the appointment was genuine. Stone constantly appealed to and petitioned the monarch because, clearly, he had begun to produce blades required for the King’s cause and was no doubt frustrated that his completed consignment (with others to follow) was not being taken into the stores at the Tower. The second point was that (as Stone himself stated) over a period of four years, he had expended a fortune of his own money in manufacturing blades for the King’s needs and had put himself into massive debt to various London creditors who, by 1636, were demanding a return on their investment and even threatening him with arrest and imprisonment.

Stone’s activities between 1637 and 1643

Following the award of his patent on 9 July 1636 and his appointment as ‘*Blade-maker to the Ordnance*’ on 12 December 1636, Stone kept up the momentum by

petitioning the Lords of the Privy Council to award him the sole right of supplying blades and swords to the Ordnance Office at the Tower and to have his ‘English’ made swords accepted into store. He claimed to have ‘*brought to full perfeccion the art and science of blade making soe that he hath and doth make as good as any that are made in the Christian world*’. In an attempt to achieve his aim of acquiring a monopoly, he denigrated the quality of the swords supplied by the London Cutlers, describing them as insufficient and unserviceable, ‘*much complayned upon*’ and ‘*for the most part ould decaed swords. . . blades made in fforaine parts. . . not fitt for his Mats. Service*’. ‘*The humble petition of Beniamin Stone Blademaker on Hounsloe Heath*’, of 1636/37 [early 1637 NS] puts these views forward forcefully:

The petitioner hath with his industry and charge of fine or £6000 pounds brought to full perfeccion the art and science of blade making soe that he hath and doth make as good as any that are made in the Christian world wch being made knowne to the King Matie and many complaints made by the Lord Deputie of Ireland and others of the insufficiency & unserviceableness of the swords brought into the office of the Ordinance by the Cutlers, his Matie was pleased to make his royall pleasure knowne, that the office of the ordinance should be allwaies furnished and supplied with blades for his Mats service made by the peticoner, and by his royall Comannd the peticoner was made a member of the said office, where he hath given caution to make 500 blades a weeke. But it is soe, May it please your Lords. that the Cutlers whoe had formerly brought in the swordes soe much complayned upon, hath order to bring in 4000 Swords wch are for the most part ould decaed swords not fitt for his Mats. service, although the peticoner hath alredy made, lying upon his hands, a greate quantity and is ready to deliver in short time any proportion his Matie. shall have occasion to use, of farr better blades and at as cheap a price.

That if the Cutlers may have this way to cross the peticoner and hinder the vending of his blades by bringing in ould decayed unserviceable swords and blades made in fforaine parts, it will not be only to the greate disservice of his Matie. but allsoe the cause to overthrow the science of blade making now brought to full perfecton within this Kingdome.

The pet.r therefore humbly beseecheth your honos. to be pleased to order that noe blades may be received into the office of the ordinance for his Mate service but such as are made within this Kingdome, where by the peticoner may be incouraged to goe on in the worke.⁴¹

Stone petitioned the Privy Council many times and they were sympathetic to his concerns, but he did not always have it his own way. The Cutlers of London (a powerful body backed by William Legge, Lieutenant of the Ordnance, of whom Stone was also most critical) were themselves intent on protecting their livelihoods and rigorously defended themselves to the Lords of the Privy Council in a very direct manner:

The humble reasons of the Cutlers of London agt. ye false allegations in Stone’s petition presented to yor. honors.

May it please yore Lops [Lordships].

Stone is not to our knowledge; [a] Sworne blademaker, nor hath a patent for ye sole makeinge of ye Swords & blades for his Mate Magazeene,⁴² nor (as we humbly conceuve) can he by Lawe, the being not ye first by 2 or 3 who brought ye worke into ye Kingdome.⁴³

That Captaine Legg or others did not only bespeake ye Swords but ye Councell of Warr did command ye Company of Cutlers, to make all that possibly they could and that with all Speede. . . . Stone had order from ye Councell of Warr to make 3000 Swords; and by his peticon to their Lords did say he had 3000 Swords ready, wch he reported should have bin delivered into the office of ordnance . . . and to be tried by Captain Leg, Stone brought but 600; and did refuse to allow of ye prooffe.

Those Swords wch he petitioneth to be removed into ye Store and pretends to be blades of his owne making, are all bromedgham [Birmingham] blades & forraine blades: And for ye bromedgham blades, they are no way serviceable or fitt for his Matie Stoare.⁴⁴

In response to these allegations and counter allegations, ‘*The Lords ordered the Lieutenant of the Tower and the Lieutenant of the Ordnance with the Officers of the Ordnance, to re-survey all the swords delivered into the Office of the Armoury by Capt. Leg [Legge]*’. However, the officers of the armoury and the delegation of Cutlers ‘*failed to meet at the times appointed*’ which did not help their case. In response, special warrants were made out to the official in the armoury and the cutlers to check the swords, and in the meantime, Stone’s swords that the ‘petitioner has on his hands may be received into the Office of Ordnance’.⁴⁵

Stone (his blades still not taken into Store) then struck back with another petition in 1638 in defence of his swords and blades, declaring that he had ‘*by comand from his Matie hath for long time wholly imployed himselfe in makeing of Swordblades in England for his Maties service and by his great paines and expences hath perfected the manufacture thereof by Englishmen, as well as others,⁴⁶ and hath now greate store of Swords upon his hands, being hindered of delivery thereof by the great number of bad blades delivered into the Tower by Captaine Legge and the company of Cutlers and others. . .*’.⁴⁷ Stone further claimed that the Cutlers and the Officers of the Armoury had hindered the proving of the Cutlers’ consignments ‘*whereas the petitioners blades have been at all times thoroughly tried*’ and that ‘*3000 blades now lying on his hands ready fitted up may be received and paid for*’.⁴⁸

As the conflict with Scotland drew closer, Stone, in some desperation, petitioned the Council of War again, claiming ‘*That your peticoner having expended all his estate to the value of £8000: in the manufacture of making blades of all sorts in this Kingdome and having brought the same to perfeccion his Matie in consideracon thereof was graciously pleased to give order to the right Honble. the Earle of Newport, Master of his Mats Ordnance, to admitt of your peticoner as cutler for the furnishing of his Mats Stores in the office of Thordnance upon all occasions. . . . that your peticoner. . . hath all waies furnished his Mats Stores with farr better Swords then ever was brought in by any, when and as often as he hath bine required, and hath allsoe*

at this present given good security to the officers of Thordnance to deliver into his Mats Stores a thousand good and serviceable Swords every Month soe long as his Matie shall have occasion'.⁴⁹

Stone not only describes the amount that he had committed to the Hounslow venture, '*all his estate*' (and constantly rising), but also complains that he was being prevented from entering the Ordnance Stores at the Tower, although he was an appointed officer. The petition concludes by requesting, once again, for Stone to be granted the monopoly of providing the Ordnance with swords for the King's service '*upon all occasions*', and also a request that the Cutlers of London desist from taking physical action against both himself and the men who worked for him. The petition concludes '*...your peticoner humbly desireth your Lops to be pleased to graunt him your warrant that he may have the sole and whole making of all such quantie [quantities] of Swords as his Matie shall have occasion to use and that your Lops would be pleased to give order the cutlers of London may not trouble, molest nor hinder your peticoner nor any of his workmen that are imployed by him in his Mats service*'.⁵⁰ And another petition (following immediately on from the one above and voicing all the same concerns) ends pointedly with the barb: '*your peticoner most humbly desireth your Lops [Lordships] to be pleased to graunt him your Lops Warranty: he may not be hindered by the Cutlers of London and that he may have power to hinder the striking of Spanish and other marks upon the blades wch are made by their workemen*'.⁵¹

On 30 November 1639, Stone claimed that he '*will always be ready to deliver 1000 swords of all fashions every month throughout the year, and will put in such security as the Office shall desire. . .*'.⁵² About six weeks later, on 10 January 1639/40 at Whitehall, a Council of War '*Ordered that the Earl of Newport, Master of the Ordnance, shall be hereby prayed to cause the 3000 swords made by Stone on Hounslow Heath to be proved, and an estimate made of the charge for so many as shall be found fit for his Majesty's service, that order may be given by the Lords for payment for the same*'.⁵³

Thus, by the end of the 1630s, Stone was required to fulfil his long-proclaimed declaration that he could produce and deliver the large consignments of swords and rapier blades for the service of the King, weapons (whose components he claimed to have perfected) and which he stated had been made by '*English men as well as others*' at his Hounslow manufactory.

The Debenture Books of the Ordnance are the most revealing source to show what and how Stone provided the King's Store at the Tower with the numerous and various essential goods for war. Also, the books appear to demonstrate that Stone's Hounslow works did not (as he had claimed) manufacture all the goods he delivered, but that he had also subcontracted a number of consignments from prominent, dependable arms merchants (including surprisingly, two of his closest rivals in the London Cutlers' Company) to deliver, in his name, weapons to make up the numbers.

Although Stone's blade-making operations at Hounslow Heath no doubt produced many swords, it is difficult to know how many of the various consignments delivered

under Stone's name were manufactured by the German smiths who had come to England years before. The Ordnance debentures do not refer to any of the known German smiths by name and (although it is assumed) the debentures also do not actually state that Stone's consignments of weapons themselves came from 'Hounslow' or were 'Hounslow made' (as it does with several other deliveries in the late 1650s sent by suppliers like John Cooke and William Walker below).

From the evidence in the debenture books, it can be assumed that Stone's operations manufactured a substantial portion of the blades and swords he delivered to the Ordnance Office, described as '*being of his owne providing*', but that he also appears to have relied on essential help and support from several other major suppliers. These were prominent arms merchants, who, no doubt, acquired their batches of swords and blades by the more traditional means of importing them from major arms centres, most notably, in this period, in the Low Countries. Stone's target portion of arms to be supplied to the Ordnance (as part of larger consignment of munitions and habiliments of war) was 5,000 swords and rapier blades, which were delivered by Stone and others as follows:

On 22 August 1638 '*Beniamyn Stone cutler desireth Allowance for the newe Hilting and Scabbarde of 1000 Swords and Rapier Blades for his Mate. Services, being of his owne providing wth at 2s 6d the peece. Amounteth to the Some of } £125-00-00*'.⁵⁴

On the same day, '*A Debenture made unto Beniamyn Stone his Mate Blade-maker for ye Office of the Ordnance, for ye some of One Hundred Twenty ffive Pounds, directed to bee paid upon ye Estimate of £12010-2s-7d ffor a proporcon of Ordnance conveyde, Powder, Shott, and other Municon & Habiliamts of Warre, appoynted to bee brought into his Mate Stoares for ye better Supply thereof vizt ffor newe hilting and Scabbarde of One Thousand Swords and Rapiere Blades (being part of the parcell of ffive Thousand Swords & Rapier Blades wch were deliverde into his Mats Store by Nicholas Brothers and others in ye Name of ye said Stone... £125-00-00*'.⁵⁵

Little is known about Nicholas Brothers, but he was clearly a major arms merchant, who made a number of deliveries to the Ordnance on behalf of Stone. A further entry in the Debenture Books, also dated 22 August 1638, records: '*Receaved into his Mats Stoares wth in the Office of Th'ordnance from Nicholas Brothers Swords and Rapier Blades. 2095 being part of 5000 Swords and Rapier Blades deliverde into his Mate Stoares in the Name of Beniamyn Stones wch at 5s a peece Amounteth to ye Some of £523-15s-00d*'.⁵⁶

Also, on that same day, 22 August 1638, another delivery was registered at the Ordnance Office on behalf of Stone. This delivery (not noticed by earlier writers and no doubt undertaken with the connivance of Nicholas Brothers) was sent by Stone's former rivals in the London Cutlers' Company, Robert South and William Cave: '*A Debenture made unto Robert South and Wm Cave of the London Cutlers for ye some of One Hundred Twenty ffive Pounds, directed to bee paid upon ye Estimate of £12010-2s-07d ffor a propercon [proportion] of Ordnance, Carryayde, Powder,*



FIGURE 4a–b An English Cavalry Officer's Sword of fine form, with distinctive proto-mortuary hilt formed as a one-piece, half-basket steel guard secured on three sides of the pommel, ivory grip, and single-edged straight blade stamped in the fuller 'HOUNSLOE'. 1630s. Royal Armouries IX.1388

*Shott, and other Municon and Habiliaments of Warre appoynted to bee brought into his Mats Stoares for ye better supply thereof vizt ffor ye neue hiling of One Thousand Swords & Rapier Blades (beeing part of the parcell of ffive Thousand Swords and Rapier Blades, beeing deliverde into his Mats Stoares by Nicholas Brothers and others in ye Name of Beniamyn Stone wch at ye Rate of ijs vjd ye peece, Amounteth to ye Said Some of cxxv£ [£125]).*⁵⁷

A further debenture was made out to Nicholas Brothers on 22 August 1638 for £23-15s-00, for a delivery on behalf of Stone, and then, six weeks later, on 2 October 1638, four large deliveries were made on behalf of Stone by a John Harvey.⁵⁸ An example reads: 'Receaved into his Mate Stoares wthin the Office of Th'ordnance from John Harvey, 2662 Sword and Rapier Blades deliverde into his Mat Stoares in the Name of Beniamyn Stone, wch at 5s a peece Amounteth to the Some of £665-10-00'.

Based on later evidence, John Harvey was probably a member of the Birmingham sword and steelmaking family, a name which became much more prominent as sword and blade manufacturers in the next century.⁵⁹ If this was the case, then there was some truth in the London Cutlers' allegation that Stone was not manufacturing all his wares at Hounslow (as he said he was), but was indeed supplying and passing off 'bromedgham' swords as his own. Clearly, as has been demonstrated, Stone had not been exactly truthful about where he had acquired his goods (they were definitely not all made at Hounslow), but, to fulfil his contract, he evidently needed to draw on all means and resources within his power (from Birmingham, from Holland, and from elsewhere) in order to acquire the large consignments of swords and blades that he had promised to supply the King.

Six months after Harvey's four consignments had been delivered, Stone is once again mentioned in the Debenture Books providing further services. On 2 March 1638/39 '*Benjamin Stone of London Cutler desireth an Allowance for the new hiltling and scabbaring of 3000 of his Mate swords and Rapiers, wch at 2s 6d a peece am[ount] to* £375-00-00';⁶⁰ on 27 April 1639 Stone delivered '*400 Horsmens Swords, beeing for the Compleating of 12000 ffoot and 400 Horse, wch at 10s a peece Amoun-teth to the some of*...£200-00-00'.⁶¹ And about ten weeks later, on 6 July 1639, '*A Debentur made unto Benjamin Stone for the some of Two Hundred Twenty six Pounds, five shillings directed to be paid upon ye Estimate of £8835 for Compleating of the Armes of 12000 foot and 400 Horse, vizt ffor there Swords hereafter menconed by him made and brought into his Mats Stoares for his Mats Speciall Services, vizt ffor ccth(200) Horsemen Swords at xs a peece=cxxvth; ffor cclxx [270] other Swords at vijs a peece=cj£ vs, Amounting in all to ye Said Some of ccxxvj £ vs [£226-05s]*'.⁶² On that same day, 6 July 1639, '*George Hayes of London Merchant*' delivered a further two hundred swords in the name of Stone.⁶³

As the relationship between Parliament and the King deteriorated, Stone's consignments of weapons sent to the Ordnance Office above have to be added to the other major consignments delivered to the Tower by several leading London cutlers in partnership, such as Robert South and William Cave, consignments undoubtedly acquired by the more traditional means of importing foreign weapons from arms centres in the Low Countries, Italy, and Germany (It is evident that one manufacturer in England could not have speedily delivered all the swords required for an army's use in time of war). As civil conflict grew closer, every means possible was used to acquire weapons and armaments by supporters of both sides, from whatever source.⁶⁴

Last references to Stone

Benjamin Stone is last recorded in the Cutlers' Court Minutes on 19 January 1640/41 '*for divers abussesses [sic] and misdemeanors by him committed as well against the persons of the master and wardens as also against the whole boddye of the manufacture of the Company as also against all Brokers and others which doe daylye abuse*

the Trade of Cutlerye'; and as 'Beniamyn Brymstone' he was fined 'att Ten shillings (to be paid the next Court day) for givinge ill language to the Wardens of the Yeomanry and for his goeing to Sturbridge fayre to sell wares without leave of the Master and Wardens'. (A later reference to 'Thomas Hunt th'apprentice of Beniamyn Stone' being sworn free on 26 October 1647, was almost certainly an apprentice of Stone's son, Benjamin Stone (II).

Stone (I) is last recorded in the debenture books of the Ordnance Office just weeks before the start of the English Civil War. On 21 May 1642, he delivered a quantity of '*partisans and halberts*' and, on 30 June 1642, he was paid for supplying '*swords made cleane*'.⁶⁵ Seven weeks later, on 22 August 1642, Charles I raised his standard at Nottingham and the Civil War began. After this date, Stone seemingly disappears from all the obvious London sources. In view of his animosity towards the London Cutlers' Company before August 1642, it appears unlikely that he would have remained in the capital at a time when the City and its livery companies were for Parliament and when his main protector, the King, had moved his headquarters to Oxford. Therefore, the references in the Oxford Ordnances of late 1642 to a '*Mr Stone Gentleman of the Ordnance*' and to a '*Mr Stone Blademaker*' who, on 19 May 1643, delivered to the Royal Ordnance, '*Swords made cleane & Scabbarded*', was almost certainly the same Benjamin Stone who had formerly lived and worked in London and at Hounslow Heath.⁶⁶

The last known reference to a Benjamin Stone, which may relate to our subject, records him as Quartermaster of the Lifeguard of Foot of Charles I and of being a prisoner-of-war at Stow-on-the-Wold, Gloucestershire, in 1646. As far as it is known, Stone, the appointed Ordnance sword- and blade supplier, never made a will, so that his disappearance in this period remains a mystery. The burial registers of the parishes and college chapels at Oxford in the 1640s and later, notably at Wolvercote (where the Royal Ordnance sword workshops were located run by William Legge) and at New College (where the King's Ordnance Office was situated) as well as other locations, have failed to reveal a burial date. Therefore, for a man who made his mark in Stuart London, there is, as yet, no precise beginning to his life and no exact end.

Views on Stone

Stone was a prominent and controversial figure in the manufacture and supply of bladed weapons in the second quarter of the 17th century. The late Dr Richard Williams described him as having been '*this country's most enterprising sword cutler and was better educated than the average London manufacturer, [and that] Stone's life was a long struggle with early debt, national prejudice and, until he became a member of it, the corrupt Ordnance Office*'.⁶⁷

Stone was certainly energetic and ambitious, an industrial opportunist and petitioner, and a man who borrowed and spent lavishly in order to manufacture and acquire the weapons to supply the King's Ordnance Office; but there is no evidence to show that he was better educated than his contemporaries or that he had a long

struggle with early debt (other than that which befell many others). Stone's behaviour was often erratic and aggressive and, even while holding the King's appointments, he made the mistake (in an age of warfare and opportunity for all) of denigrating, to the highest authorities, the products of his influential rivals in the London Cutlers' Company, men, such as Robert South, who were, not only leading guild members in the City, but who also had wide contacts and influence in trade generally.⁶⁸

Moreover, Stone also constantly attempted (from his base at Hounslow Heath outside of London) to acquire the monopoly '*to furnish all the swords and blades for the King's service in England*', to the detriment of the Cutlers and of others who supplied weapons. In turn, the Cutlers, knowing that they had the stronger hand, if not the support of the King, vigorously fought back. First, the Ordnance Stores were in the Tower of London in the City and near to where most cutlers lived and worked. Secondly, the Cutlers of London had the support (and the ear) of William Legge, the Lieutenant of the Ordnance and the Master of the Armoury, who both ran operations at the Tower and who also apparently thwarted Stone at every turn. Lastly, Stone's boasts that he had manufactured at Hounslow all the swords that he delivered into store appear to have been unfounded, as exposed by the Cutlers and revealed by the Ordnance records. However, as civil war rapidly approached, the divisive arguments as to where blades, swords and other weapons came from diminished, as the opposing sides desperately scrambled to acquire large consignments of arms and materials from whatever place they could, either in England or from abroad.

Up to 1642, Stone's energy and determination (coupled with help from dependable subcontractors) enabled him to supply numerous swords for the King's service in the years leading up to the English Civil War. However, the petitions at the end of the 1630s give the impression (to this writer at least) that Stone had made his great sacrifice for the King's cause, but was fighting a losing battle against the authorities and the Cutlers; and that his earlier vigour and determination declined markedly after the King had left London and moved the royalist headquarters to Oxford.

The decline of sword- and blade-making at Hounslow Heath

Henry Hoppie and Peter English stated that, with the start of the Civil War in England in 1642, they '*with some others of those [foreign] workmen went to Oxford with his late Majesty and wrought there*', following which their mills on Hounslow Heath were confiscated by Cromwell and converted into powder mills.⁶⁹ Therefore, it appears evident that with their patron and protector at Oxford, the original Hounslow venture with German sword-blade and weapon-makers came to a close in the early 1640s, probably in autumn 1642, when (with the repulse of the King's army at Turnham Green in November 1642) Parliament controlled the greater Hounslow area. Furthermore, as these workmen were foreigners, without denization, and not freemen of the London Cutlers' Company, their opportunity of working in or near the capital was extremely limited. However, consignments of '*Hounslow Hangers*' were still apparently being manufactured and delivered to the Ordnance Office at the

Tower until the late 1650s, such as the consignments delivered by William Walker and John Cooke in 1658 (see below). These were almost certainly being produced by craftsmen who remained at Hounslow and who supported Parliament's cause and operated other mills on the same site (perhaps using Stone's former building and artificers who may have been trained by foreign smiths). (The evidence that the German mill was converted to a gunpowder factory and that sword and blade-making continued at Hounslow, again confirms that there had been '*several mills*' in operation, perhaps erected after Glover's map was made in 1635 or not recorded by him, see below).

A number of references in the State Papers of the mid 17th century imply that the blade-making industry experienced some difficulties. On 18 May 1649, the Council of State is found to be considering a petition from unnamed manufacturers of sword blades at Hounslow Heath against the unfair levying of taxes in respect of both their residences and their workhouse. In lieu of payment, the workmen's instruments and tools were taken and broken. However, a month later, on 15 June 1649, a Council at Whitehall supported the workmen's case: '*The enclosed petition is by the workmen of sword blades at Hounslow Heath, a manufacture very necessary, and which should in the present state of affairs have all encouragement. Besides the loss to the workmen, in the breaking of their tools and instruments, the State has been prejudiced by the hindrance, and will be until they are made good: we have ordered restitution of the instruments, and left the workmen to the law for their further remedy*'.⁷⁰

Two names, known to have operated at Hounslow Heath during the Commonwealth, were Paul and Everard Ernions, described as '*sword-blade makers and lessees of the sword-blade mills*', a description showing that they were, like Stone, businessmen, involved in running a manufacturing plant (perhaps, in fact, Stone's former mills). Council of State warrants of February 1650 draw attention to the urgent delivery '*of 10 trees out of Windsor Forest to Paul and Everard Ernions, strangers, for the repair of the mills for making sword blades at Hounslow Heath*'⁷¹ and '*a petition from Paul and Everard Ernions. . . for leave to erect a corn mill, we wish to examine whether their desire may be granted without prejudice to the property of any particular person*'.⁷² Later, on 1 June 1650, a Council official was to speak with Sir Nicholas Crisp (another merchant arms importer) and Ernions, '*concerning the difference between them about erecting a corn mill upon the river running through Hounslow Heath, and endeavour to moderate such differences*'.⁷³

Another name (shown managing a sword-blade mill at Hounslow) was '*John Cooke of London gentleman*', who, in proposals referred to the Committee for Trade, was described as '*for encouragement of his manufacture of sword and rapier blades at Hounslow*'. In fact, it was Cooke who supplied the last known delivery of '*Hounslow Hangers*' to the Ordnance Office. On 6 August 1658, '*A debentur made unto John Cooke for ye Summe of one hundred thirty five pounds vizt for sixe hundred Hounslow Hangers by him provided & brought into ye Store wth in ye office of ye Ordnance for ye Supply & furnishing of ye fleets wth att ye rate of iiij s vjd p[er] peece Amountg unto ye Said Summn of £135: 00: 00*'.⁷⁴

Hounslow hangers (a short-bladed robust side-arm, costing 4/6d each) were invariably supplied to ships of the fleet, as they were an ideal weapon for use by sailors for close-fighting in a shipboard melee. However, Hounslow was not the only source for such weapons in the last years of the Commonwealth. In the same period, ‘*Dutch Hangers*’ were also sent to the Ordnance by known suppliers and other weapons, described as ‘*English Hangers*’ or simply as ‘*Hangers*’, were also included in large consignments. For example, a debenture made onto William Walker (a leading London supplier between 1658 and 1660), dated 16 June 1658, reads ‘*for ye Summe of one hundred thirty one pounds & seaventeen Shillings, vitz for ye Hangers herafter mentioned by him provided and brought into ye Stores within ye Office of ye Ordnance for ye Supply & ffurnishing of ye ffleete vitz:*

Hounsloe Hangers wth Scabberts 200 att iiij s vjd a peece=£45-00-00;
English Hangers wth scabberts, and filed hilts, varnished wth
brass Wyre handles, capps 215 at iiij s vjd a peece=£48-07-06;
Dutch Hangers wth Seercloth Scabberts Gutt Varnished hilts,
fish Skin handles wth capps and 171 at iiij s vjd a peece=£38-09-06,
*Amounting in all to ye said Summe of £131-17-00’.*⁷⁵

However, the name ‘*Hounslow*’ is seemingly not used in the Ordnance debenture records to describe particular types of swords after 1658.

It is constantly suggested (based on the year of the statement by Hoppie and English above) that the Hounslow sword-mills closed down in about 1670 or the early 1670s, just before the men made their declaration, although there is absolutely no firm source to support this convenient link in time. As Hoppie and English stated, they went with the King to Oxford, but there is no evidence at all to show that they returned, at any stage, to work at Hounslow Heath. Furthermore, the men were making their statement in order to encourage Charles II to consider re-establishing sword-making facilities in the south of England (at Hounslow or elsewhere) not particularly to keep the old mills going. Also, importantly, it is known that, following the Restoration, Hoppie had returned to London and was working as a blade-maker for Edward Younger, the King’s Cutler and successor to Robert South, in the Strand.⁷⁶ It is not known precisely when he returned, but he was officially appointed as a blade-maker to the armoury of the Royal Wardrobe on 27 April 1663, and a petition to Charles II for denization of 1662, declares that he was already being employed by Younger, both as a non-freeman of a London livery company and without denization, all to the great annoyance of the Cutlers’ Company.⁷⁷

Evidence suggests that blade-making production at Hounslow ended in two stages. The German mill on Hounslow Heath (founded in 1629) closed in about 1642 (when the immigrant craftsmen went with their patron, Charles I, to Oxford) and this mill was confiscated by Parliament and converted into a powder mill. In contrast, general blade- and sword-making production, manned by non-Royalists, and run by such as the Ernion brothers and John Cooke above, appears to have continued until very late

in the 1650s, just before Charles II was restored to the throne. Following the Restoration and a period of calm, the buildings no doubt stood in some disrepair for several years after their manufacturing function had declined.

A revival of the former manufacturing operations might have occurred if Charles II and his ministers had pushed through certain proposals more vigorously or if the London Cutlers had desired it more passionately. Like his father before him, Charles II became embroiled in various Continental expeditions and wars (such as the naval wars with Holland) and it appears that there was an interest in reviving a blade-making venture, if only in a desultory way.

For example, the Cutlers' Court Minutes record that on 19 October 1669, it was ordered that thirteen leading cutlers '*be requested to be a Comyty to consider of some Expedience for the carrying on of the affayre of the blades Trad[e] having better Experienc by reason that they Exercis the Trade of Cutler and that the Courte may have their advice in the Procede of that worke*'.⁷⁸ As William Badcock later pointed out, many leading members of the Cutlers' Company were not practising cutlers but worked in other trades, and that practising cutlers or arms merchants (in other guilds) were asked for their advice, including, as in this instance, the royal cutler, Edward Younger, who was a Citizen and Armourer of London.⁷⁹ Nearly four years later, at a Cutlers' Court '*held on Thursday ye 19th of March Anno 1673/74. The Master Acquainted the Court That Sir Thomas Cheettly Master of the Kings great Ordinance of the Tower had sent to speake with the Master and Wardens of this Company And accordingly himselfe with the Wardens and some of the Ancient Master Attended his Honor, att his house in Bloomsbury, Munday the 16th of March 1673/ 4 to know his pleasure: Which he was pleased to declare That his Matie hath Intentiond that the Manufacture of Blades for Swords should be sett up in England And that there was complaint of the great quantity of bad Blades imported into this Kingdom. And that there might be prevention by a proof Master Appointed for that purpose to Inspect those Wares. The Master reply'd that the Company was about drawing up a Petition to present to his Matie Touching several Abuses and Greivances in the Manufacture [of blades]*'.⁸⁰

Furthermore, at this same Court of 19 March 1673/74 '*Mr Peter English and Mr Henry Hoppie Sword blade makers were called in the Court [and] asked them if that they had any thoughts to offer to the Table in reference to the Blade trade but they reply'd that they had not anything to say in that. The Court acquainted them that they were about drawing up a Petition to present to his Matie. Containing severall things touching the Trade: But especially the promoting of the Blade trade here in England And further that the Company had them in the thoughts that is they had success in their busines to make use of them: And intended a very good encouragement to them in their Trade. And so att present they were dismissed*'.⁸¹

The lack of response from Hoppie and English to the Cutlers' Company's request for suggestions of ways of reviving the blade trade is somewhat odd. They might have been distrustful of an organisation that had given them a hard time earlier and

perhaps (in the light of the statement above) they themselves thought the King might turn to them to bring about a revival without the Cutlers' support, although this would have been unlikely. However, the evidence shows that the centuries' old practice of importing essential blades for munition purposes from various sources continued, and that attempts to resurrect the manufacture of blade-making in the south-east of England in the 17th century did not materialize.⁸²

Hounslow blade-makers, sword-cutlers and suppliers

Henry Hoppie and Peter English in their statement of 1671–72 above, do not refer to Benjamin Stone as being involved in their operations on Hounslow Heath. The German smiths do state, however, that '*severall*' workmen travelled from Holland to work in England in 1629 (the Cutlers' Company claimed the number was 'two or three') a term which suggests that the immigrant group of major artificers was very small (perhaps accompanied by apprentices and sons) and that many other German craftsmen chose to remain in Holland and the Low Countries, near to their war-torn homeland. From the names found on surviving sword blades and from written sources, several (or all) of the German craftsmen are known (although others may come to light in the future), but other blades (bearing English names) suggest that native workmen were associated with the Hounslow operations from the early years.

Evidence also suggests that, having arrived in England in 1629 and before moving to Hounslow, several German smiths may have resided for some months in or near London (the Ordnance workshops were in the Tower and the royal armouries were at Greenwich) where, perhaps, they awaited and oversaw the construction of the mill mentioned in Stone's indenture above.

The suggestion that the men did not go immediately to Hounslow is supported by a number of surviving blades signed '*London*' and '*Grenewich*'. Several swords are known signed 'PETER MVNSTEN, LONDON' or 'PETER MVNSTEN ME FECIT LONDON' (see below), another is signed 'IOANNES HOPPI FECIT LONDON', and a third, 'CASPER CARNIS ME FECIT LONDON' (Carnis being the Latinized version of the German word '*Fleisch*'). Those made in Greenwich include the blades inscribed 'IOANNES HOPPIE FECIT. GRENEWICH ANO 1634', or 'IOHANNES HOPPE 1634 ME FECIT GRENEWICH IN ANGLIA', and, in addition, the baptismal record of Hoppe's daughter, Elizabeth, at St Alphage's Church, Greenwich, in 1632 (see below).

For the collector, however, interest in the Hounslow venture principally relates to the signed and dated swords manufactured on the Heath or those that bear the name '*Hounslow*' in its variety of spellings, swords and blades that relate primarily to the 1630s (figures 4–8). It was probably these German-made blades that the Marquis of Newcastle (later 1st Duke, 1592–1676) was referring to in the '*Truth of the Sorde*', when he wrote in 1646, '*butt for neue blades trewlye ther was never better made then was att Hounslowe heath in Englande*'.⁸³ In contrast, the blades and weapons



FIGURE 5 *An English Cavalry Officer's mortuary-hilted Broadsword, the hilt originally black-japanned and retaining traces of its original gilt decoration. The blade, with three short fullers, is struck with three crescent moons and stamped 'HOUNSLO', c. 1640. Private Collection.*

supplied by Stone for regiments of '*foot and horse*' and for '*ships of the fleet*' would have been inexpensive, sturdy, munition pieces and would have almost certainly been unsigned. (The prime purpose of the Hounslow sword mills was to manufacture numerous blades for weapons of war for the Office of the Ordnance, although better quality swords of various designs '*for the Gentryes wearing*' were also certainly made there). In addition to Stone, the names linked (or may have been linked) to the Hounslow Heath operations between 1629 and 1658 appear as follows.

Johan or **Johannes Kinndt** or **Keindt** was the most prominent name of a Solingen family of master bladesmiths and sword-cutlers (the others in the 17th century being Hans, Clemens and Jan Kinndt), a man recruited by Sir John Heydon in Holland in 1629 to work in England, and a leading member of the original small group and perhaps the manager of the mill (The name is sometimes Anglicized as '*John Kennet*', although there is no apparent record of naturalization or denization for a Kinndt or a Kennet).



FIGURE 6 A Horseman's Broadsword, the short fuller inscribed, 'HVNSLOE', 1630s. Gunnersbury Museum, Acton, London (No. 84. 9/1)

He was the '*John Kennet*' whose work was admired by the Parliamentary commanders, Sir William Waller and Sir Arthur Hasselrig, who, on 17 April 1643, requested two hundred '*swords of Kennets making at Hounslow*'.⁸⁴ This well-known request (made eight months after Civil War broke out and which did not bear fruit) has led several writers to suggest that Kinndt did not go immediately to join the King at Oxford, but remained working at Hounslow for several months after war was declared. This view seems most unlikely as Parliament had attained control of Hounslow Heath from November 1642 (following its repulse of the King's forces at Turnham Green). A further mark of Kinndt's high reputation is the name 'IOHANNES KINNDT' inscribed on both sides of the blade of the sword being carried by Sir George Carteret in his portrait by William Dobson, c. 1643, now in the National Maritime Museum, Greenwich (Acq.No. 44-12/3).⁸⁵

Rudolf Cronau (1885) recorded that a '*Johannes Keindt*' or '*Kind*' was known to have been working at Solingen in 1620 and an early example of the master's work is the blade on a sword in the Musée de l'Armée, Paris (No. J.183) signed 'JOHANNES KEINDT ME FECIT SOLINGEN'. Following Kinndt's move to England, his name is found on several blades (more than any other Hounslow maker), blades also marked 'HOVNSLOW', and often accompanied by the dates '1634' or '1635' (markings used in the early years of manufacture). These include a rapier in the



FIGURE 7 A Hanger with lion's head pommel and pierced iron guard, the cut-down back sword blade inscribed on each side, 'HOVNSLOE', late 1630s. Gunnersbury Museum, Acton, London (No. 84. 9/3)

Royal Armouries (IX.982) inscribed 'IOHAN KINNDT HOVNSLOE 1634' (figure 9); a hanger fitted with a later 18th-century hilt signed on the cut-down, serrated, back-edged blade 'IOHAN KINNDT HOVNSLOE 1634' in the Museum of London (37.60), another hanger signed 'IOH[A]N KINNDT HOVNSLOE 1635' (36.155/1); and a rapier in the same museum signed 'IOHAN KINNDT HOVNSLOE 1635' (37.74).

Other examples include two swords in the Victoria and Albert Museum (which Clement Millward described as being unusual '*short fighting swords with very broad flat blades, 27 in. and 28¼ in. long*'), the first with an iron hilt embellished with silver ornament and with engraved panels of mother-of-pearl and stag-horn, inscribed on the blade 'IOHAN KINNDT HOVNSLOE 1634 (M.610-1927) (figure 10), the other with a gilded iron hilt signed on the blade 'IOHANNES KINNDT HOVNSLOE 1634' (M.2722-1931) (figure 11). Other pieces comprise a robust '*crab-claw*' hilted officer's riding sword in the Deutches Klingen Museum, Solingen (1955.W.196) signed 'IOHAN KINNDT HOVNSL / WILLIAM HVRST 1634' (see also below); a rapier formerly belonging to the late A R Dufty inscribed 'JOHAN KINNDT FECIT HOVNSLOE' on the blade, a rapier recorded by Albert Weyersberg inscribed 'JOHAN KINNDT HOVNSLOE / I. K. HOVNSLOE'; a light rapier with a '*pillow*' hilt of gilded brass, c. 1650, fitted with a long blade signed 'IOHANNES KEINDT',



FIGURE 8 A mortuary-hilted Backsword, the blade marked 'ME FECIT HOVNSLOW'. Late 1630s. Royal Armouries IX.2590

now in the Royal Armouries (IX.1374) (figure 12); and an English hanger of the 1630s signed on the saw-backed curved blade 'IOHANNNES / KEINNTD' sold through the London art market.⁸⁶

It is not known what happened to Kinndt after the Royalist defeat and Charles I's execution in 1649, although, interestingly, Weyersberg records a 'Johan Kindt' at Solingen in 1658 (this fact suggests the possibility that, with the Thirty Years' War over, Kinndt may have returned to his homeland after his sojourn in England).

Johannes Hoppe (or **Hoppe**, **Hoppi**) was the name of the most prominent member of a well-known Solingen family of blade- and sword-makers, the others of whom were Heinrich, Casper and Peter, and a family known to have worked at Solingen for two hundred years from 1580 to 1780. He was also a leading master of the group recruited to come to England in 1629 (and was also perhaps the father or older brother of Henry Hoppe).

A number of swords exist signed on the blade 'IOHANNES HOPPE ME FECIT', 'IOHANNNES HOPPE SOLINGEN', and 'IOHANNE HAPPE (sic) (or Hoppe) ME



FIGURE 9 *Rapier with hilt of Norman type 89 chiselled in low relief in the 'English style'. The long narrow blade inscribed in one fuller, 'IOHAN KINNDT', and, in the other, 'HOUNSLOE 1634'. Royal Armouries IX.982*

FECIT SOLINGEN' and with the maker's mark of a 'Wild Man with a Club'. These weapons were possibly made by Hoppie before he came to England (or by a forebear or another family member with the same name). The list includes a 'Pappenheim-hilted' rapier of *c.* 1630, now in the Wallace Collection (A645), an Executioner's sword in the Livrustkammaren, Stockholm (no.1867), a rapier in the Musée de l'Armée, Paris (J.354) and several others elsewhere. However, in addition to the signed Solingen swords, the name of our subject is certainly found on a number of blades made in England, several of which are dated before 1636.

As mentioned above, Hoppie appears not to have gone directly to Hounslow, being first recorded in London and later at Greenwich. Evidence for Hoppie's presence in London is the rapier of the early 1630s (formerly in the collection of the late A. R.

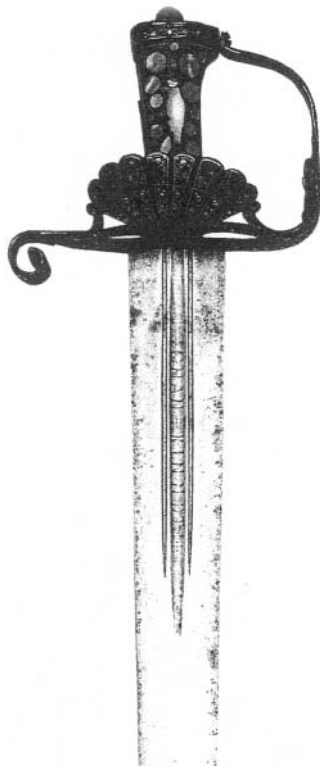


FIGURE 10 A Hanger / Sword with steel hilt and with wooden grip set with engraved panels of mother-of-pearl and stag-horn. The broad flattened blade signed 'IOHAN KINNDT / HOUNSLOW 1634'. Victoria & Albert Museum, London, M610-1927

Dufty) stamped in the fuller 'IOHANNES HOPPI / FECIT LONDON' (figure 13) and on a rapier of the same date in the Montagu family armoury signed 'IOA[HAN]ES HOPPIE / FECIT LO[N]DO[N]'.⁸⁷ His presence at Greenwich is found on the sword (now in the Museum of London) signed 'IOHANNES HOPPIE 1634 ME FECIT GRENEWICH IN ANGLIA',⁸⁸ on another 'with a chased basket hilt' inscribed 'IOANNES HOPPIE FECIT. GRENEWICH ANO 1634',⁸⁹ a third recorded by Weyersberg inscribed 'IOHANNES HOPPIE FECIT GRENEVICH'; and lastly the baptism, at the ancient Church of St Alphage, Greenwich, on 10 May 1632, of 'Elizabeth Hoppe, daughter of John Hoppe' (No other mention of Hoppie appears in the Greenwich church registers of the period, suggesting that he later went to Hounslow. Also, there is no apparent record of a naturalization or a denization of a Johannes Hoppie).

Other swords signed with variations of Johannes Hoppie's name include a rapier of the 1630s with a swept-hilt of Norman type 57 inscribed on the blade 'ION HOPPE HONSLO' and 'ME FECIT HOUNSLO' (Royal Armouries IX.910) (figure 14); a rapier of c. 1630s inscribed 'IOHANN HOPPI FECIT HOVNSLOE' (Royal



FIGURE 11 *A Sword / Hanger with iron hilt decorated with masks and retaining traces of gilding. Broad flattened blade signed 'IOHAN KINNDT / HOUNSLOW 1634'. Victoria & Albert Museum, London, M2722-1931*

Armouries IX.1389) (figure 15); and an officer's sword with a later military-hilt of c. 1680 in the Museum of London (54.50) inscribed on the double-edge blade 'MADE IN HOVNSLOE BY IOANNES HOPPIE FOR RICHARD BRIGINSHAW 1636' (see also below).

Henry Hoppie (Hoppe, Hopey) (recorded 1629–1674) was a master blade-smith (perhaps the son or brother of Johannes Hoppie), born and trained in Solingen in the Duchy of Berg, Germany, and probably a younger member of the team that came to England in 1629 (A basket-hilted broadsword signed on the blade 'HEINRICH HOPPE 1622' is recorded by Weyersberg (p. 20) as being at Glasgow. This may be an example of the master's work before he came to England, although it was probably that of an older family member).

From his later statement of 1671–2 above, Hoppie worked at Hounslow from 1629 until the start of the English Civil War, after which he joined the King at Oxford and worked at the sword-making ordnance of the Royal Headquarters at Wolvercote. Following the defeat of the Royalist forces and the King's execution in 1649, he is known to have returned to London, although the date is not certain. He worked (as a blade-maker, but without denization and guild permission) for the King's Cutler, Edward Younger, in the early 1660s. Under pressure from the Cutlers' Company, he (with Daniel Defer, John Conine, and John Walford) petitioned successfully to



FIGURE 12 An English Light Rapier of 'pillow' or 'scarf' type with brass hilt with an outside side-ring fitted with a steel plate. The long narrow blade signed 'IOHAN / KEINDT'. Blade 1630s, hilt c. 1650. Royal Armouries IX.1374

Charles II for denization in 1662 and 'Hopey' was later appointed an official '*blade-maker*' to Younger in the Armoury of the Royal Wardrobe from 27 April 1663.⁹⁰ He was still alive in 1674, when, with Peter English (I), he attended Cutlers' Hall on 19 March 1673/74, to discuss the possibility of resurrecting the trade of manufacturing blades in England (see above).

Peter English is thought to be the Anglicized name of the blade-maker, **Peter Munsten**, above, a member of a very prominent Solingen family and a name recorded on swords from the last quarter of the 16th century onwards.⁹¹ An earlier Peter Munsten was Mayor of Solingen in 1597–8 and the name is signed on the blade of a fine swept-hilted sword presented by Pope Clement VIII to Henri IV of France in 1599 on the occasion of his marriage to Marie de Medici, now in the Musée de l'Armée, Paris (No. J.379). Others are in the Livrustkammaren, Stockholm (No. 561) and in



FIGURE 13 *English Duelling Rapier signed in the fuller 'IOANNE HOPPI FECIT LONDON'. 1630s. Formerly collection of the late A R Dufty, CBE.*

the former Historisches Museum, Dresden (now the Staatliche Kunstsammlungen Dresden, Rustkammer).⁹²

In the period under discussion, there were almost certainly two men working in England, father and son. **Peter English (I)** (i.e. '**Munsten**') was a Solingen master blade-maker, who, with several others, came to England in 1629 and worked first in London and later at the sword-mill at Hounslow Heath (there is no apparent record of naturalization or denization for this man). He sided with the royalist cause during the Civil War and followed King Charles to Oxford in 1642 and worked at the Wolvercote sword-mill. Subsequently dispossessed by Cromwell, he apparently sought assistance after the Restoration. Peter English, with Henry Hoppie, later made the statement in 1671–72 in an attempt to resurrect the blade-making industry in England (see above).



FIGURE 14 *English Sword with swept-hilt of Norman type 57 signed in the fullers of the robust two-edged blade, 'ION HOPPE HONSLO / ME FECIT HONSLO'. Probably of the 1630s, although the hilt could be a little earlier. Royal Armouries IX. 910*

Several swords are signed 'PETER MVNSTEN / ME FECIT SOLINGEN' from the period before our subject came to England (often with the mark of a 'Wild Man', like Hoppie's above, but encircled with his name).⁹³ Following his arrival in England in 1629, two rapiers are known to have been made signed on the blades: 'PETER MVNSTEN ME FECIT LONDON' and 'PETER MVNSTEN ME FECIT / PETER MVNSTEN LONDON', now in the Museum of London (Nos. 36.154/1 and 36.119). Another two-edged blade on a robust cross-hilted Executioner's sword in the Livrustkammaren Stockholm (No. 5079), is inscribed in a similar manner to the one above, namely 'PETER MVNSTEN ME FECIT / PETER MVNSTEN LONDON'.

Peter English (II) (recorded 1673–1697) was an English-born sword-cutler and arms furbisher of the Parish of St Andrew, Holborn, City of London. As a practising cutler, he was one of 22 persons sworn free of the Cutlers' Company of London by redemption on 20 November 1673. On 25 March 1689, he was appointed by Frederick, Duke of Schonberg, Master General of William III's Ordnance, to the post of '*Furbisher for the Office of the Ordnance in the Tower of London*' at a wage of £25 per annum. In addition to this post, he was also required to repair and make serviceable large numbers of weapons for the Tower Ordnance, including on 30 April 1696, '*For Land Service — Basket Hilted Swords of his Maj. glazed Oyled, ye hilts Blackt wth new*



FIGURE 15 An English Duelling Rapier signed in the fullers of the long barrow blade 'IOHANNES HOPPIE / FECIT HOVNSLOE', c. 1630s. Royal Armouries IX.1389

searchcloth Scabbards and Pewter Handles — 161 at 3s 4d a peec=£26: 16s : 08d', and 'Ground Glazed Oyled new Scabbarded & ye hilts Blackt — Swords 855, Hangers 602} [totalling] 1457 at 22s a peec.=£133: 11s: 02d'.⁹⁴

Unusually, the name 'PETER ENGLISH' is signed on the blades of two swords. The first is the silver-gilt mounted 'State Sword' of the City of Worcester. The blade is also engraved with the royal arms of William III and those of Worcester. Close to the *'blade-smith's name'* is the mark of a king's head in profile to the left, which, at this date, was the mark of the Wundes family of Solingen (notably a Johannes Wundes). The second sword is the original State Sword of the Grand Chapter at Freemasons' Hall, London. The hilt is of later date than the blade, the latter of which is signed in the fuller on either side and bears the king's head mark as above, but has been shaped later along the edges with a continuous waved or flamboyant (*flamberge*) pattern from the forte to the point. It is probable that the London cutler acquired the blades from Solingen. However, an English sword-cutler's name on blades of this date is extremely rare and suggests Hounslow practices of 60 years earlier.

On 31 March 1696, English was a signatory to the Cutlers' Company List of Association and he is last recorded in the Ordnance records of 31 December 1696. He died shortly afterwards, almost certainly in the first week of February 1696/97 (following his death, Thomas Biggleston succeeded to the post of Furbisher at the Tower on 8 February 1696/97). It is not known if English ever trained or worked in the Hounslow mills as a young man (although this seems possible), but his will⁹⁵ made 30 January 1696/97 proved 10 February, records that he owned extensive property holdings (tenements, leases, etc) (perhaps inherited) at Heston in Middlesex, a hamlet situated just north of East Bedfont on Hounslow Heath, where Benjamin Stone operated and where his father probably worked.

Casper Carnis (the Latinized version of the German 'Kasper Fleisch') is found on two rapier blades datable to the 1630s in the Museum of London (Nos. 35.150 and 52.59), both of which are signed 'CASPER CARNIS ME FECIT LONDON'. (Millward claimed that Carnis (Fleisch) was a well-known Solingen name, although he is not listed in Weyersberg's directory).

Clemens Meigen J F Hayward records this name as being found on some rough broadsword blades, although a number of rapier blades exist bearing the inscription 'CLEMENS MEIGEN IN SOLINGEN', for example, on the sword in the Rustkammer at Dresden (No. 358/ 172); and on another with an English rapier hilt stamped 'CLEMENS MEIGENN' (figure 16).

'**Clemens Stof Fecit London**' is an inscription recorded on the blade of an English 'mortuary-hilted' backsword of c. 1640 sold through the London art market, an inscription which carries the name of a man whom Weyersberg records as a Solingen smith active in 1649. Little information is known about Stof. He may have come to England in 1629, worked for a period in London or Hounslow, before returning to the Continent.

Richard Hopkins was an English smith, who worked at Hounslow after probably being trained in London. His name is inscribed on the blade of a silver-encrusted hilted hanger in the Museum of London 'RECADVS HOPKINS FECIT HOVNSLOE' (36.164/ 3). He was possibly the '*Ricardus Hopkins*' son of Henry of Kingswood in County Wiltshire, a fuller, who was indentured to the London cutler, Edmund King, on 24 May 1624, but whose freedom is not recorded (this would have been about 1631). If this is the man, then he may have left London to work at the new venture at Hounslow in the early 1630s, without becoming free. (There were two other prominent London Cutlers named Richard Hopkins, father and son, who both became Masters of the Cutlers' Company. Their rise in the Company can be traced in the 17th-century Court Minutes and they were almost certainly not the same as Richard Hopkins of Hounslow).⁹⁶

Joseph Jenkes, a Hounslow smith, whose name 'IENCKES IOSEPH / ME FECIT HOVNSLO' is found on the blade of a mortuary-hilted back-sword, traditionally that of the Royalist defender of Denbigh Castle, Colonel Sir William Salusbury, now in Powysland Museum in Welshpool (see Williams undated). It has been suggested that the bladesmith was '*Joseph Jenkes, son of John Jenkes, born c. 1607, who was a*



FIGURE 16 *An English Rapier, the blade signed 'CLEMENS MEIGENN' c. 1640.* Courtesy of Robin Dale.

*freeman of the White Bakers' Company of London, but who worked as a cutler' and who later emigrated to America.*⁹⁷ (Sword and hilt-makers did not always belong to the Livery company in which trade they followed).⁹⁸ However, in view of the evidence, this suggestion has to be considered with caution. John Tofts White reported that there had been four different '*Joseph Jenkes*' proposed as being the Hounslow smith, and that his particular nomination had died in 1642. It is known however, that a '*Jone [sic] Jenkes*', wife of Joseph, died at Isleworth in February 1635, and that an '*Elizabeth Jenkes*', daughter of Joseph, was buried at All Saints Church, Isleworth, on 2 November 1638.

Although there is no apparent record of indentures or of a freedom of a Joseph Jenkes in the sometimes incomplete and damaged early Cutlers' Company archives, there was a '*free cutler*' by that name in the period under discussion as well as the man above (a craftsman who would have been properly termed a '*Citizen and Cutler of London*' and not a '*free White Baker*', like the man from the other guild). Jenkes,

the ‘free Cutler’ was primarily and notably a knife cutler, who used the mark of a ‘thistle’, a stamp found on items now in the Victoria and Albert Museum, the British Museum, and in the London Cutlers’ Company collection.⁹⁹ Moreover, the Cutlers’ Court Minutes also record a complaint between two company members and free cutlers, Joseph Jenkes (the man above) and William Rush, which again points to this man, the knife-cutler, not being the same as the apparent freeman of the ‘White Bakers’ Company’ and not the blade-smith at Hounslow. This dispute is found in the Cutlers’ Court minutes of 16 October 1638 and relates to the misuse of blade-smiths’ marks:

*‘Upon the Complaynte of Joseph Jenks Cutler and Knyffe fforger against William Rush also Cutler and knife fforger for that he the sayd William Rush Contrary to the Rules and orders of this howse and Contrary to the graunt of the Court did and doth strike upon his knife blades the mark of the Poundgrannett [pomegranate] soe neare alluding to the Marke of the Thistle is so much that divers have and doe take the same Poundgrannett for the Thistle to the great losse and hinder of the sayde Joseph Jenks wherefore this Court doth command the sayd William not to strike the same any more but to strike the marke of the Poundgrannet in the same manner and forme as the same was first graunted and enrolled upon the lead of stamps belonging to this howse’.*¹⁰⁰

William Hurst’s name is accompanied by that of Johan Kinndt on the straight double-edged blade of a ‘crab-claw’ hilted Officer’s Riding Sword, the large round shell outside the hand turned towards the pommel, now in the Deutsches Klingens Museum Solingen (1955.W.196). The short outside fuller is inscribed ‘IOHAN KINNDT, HOVNSL’ and the inside ‘WILLIAM HVRST 1634’. This may have been the William Hurst, son of Henry of Bourton-on-Water, Gloucestershire, Clerk deceased, who was bound to the London cutler, William Powlton, on 16 February 1624/25. This man, whose freedom is not known (he would have become free in about 1632), may have gone to work under Kinndt at Hounslow (The two names on the blade may suggest that the master and his assistant both had a hand in its manufacture, or that Kinndt made the sword for Hurst).

Richard Briginshaw’s name appears with that of Johannes Hoppie on the blade of an officer’s military-hilted broadsword in the Museum of London (with later hilt of c. 1680) inscribed ‘MADE IN HOVNSLOE BY IOANNES HOPPIE FOR RICHARD BRIGINSHAW, 1636’ (No. 53.50). This Richard Briginshaw was almost certainly the same as another fiery London cutler, Richard Briginshaw (a contemporary close in age to Benjamin Stone), although it is not known if he worked at Hounslow. ‘Richard Brigenshar [sic]’, son of William, of Aston Clinton of Buckinghamshire, a yeoman, was indentured to John Johnson on 19 March 1606/7, turned over to Mark Mascall, and later turned over back again to his original master, John Johnson, before becoming free on 12 April (?) 1614. In 1629, Briginshaw had an altercation with Stone regarding alleged wrongs, for which, in the course of events, Stone abused the Master and Wardens of the Cutlers’ in front of the Lord Mayor and was fined.¹⁰¹ (There is no explanation in the court minutes as to the cause of the dispute).

'Iohannes Bell Me Fecit London' is an inscription found on the blade of an English hanger with iron hilt encrusted with silver, now in the Museum of London (46.42). There was an English cutler named John Bell, 'son of Francis, Citizen and Butcher of London', who was indentured to Christopher Bowe of the London Cutlers' Company for seven years on 8 August 1620 and who was immediately turned-over for training to the prominent London cutler, William Cave. He was sworn free on 27 November 1627 and later bound two apprentices through the London Cutlers' Company (this fact alone would probably rule him out of being involved with the Hounslow blade-smiths).

A more likely candidate for the name on the blade, however, is 'John Bell, cutler' who was granted denization to live and work in England on 26 July 1632. Little is known about this man, but the fact that Bell signed the blade (a Continental practise) suggests that he may have come to England from Germany and may have worked with the Solingen smiths, Johannes Hoppie, Peter Munsten and Casper Carnis, in London and also later at Hounslow.¹⁰²

Paul and Everard Ernions. The names of these presumed brothers appear in the Commonwealth State Papers of the mid 17th century. One petition, to the Council of State, dated 14 October 1651, refers to Everard Ernions as a 'sword blade maker', while another, dated 19 February 1649/50, refers to the delivery of '10 trees out of Windsor Forest to Paul and Everard Ernions, strangers, for the repair of the mills for making sword blades at Hounslow Heath'.

These men were, like Benjamin Stone and John Cooke, below, manufacturing businessmen. References sometimes refer to them as 'sword-blade makers', while, on other occasions, describe them as founders of a 'corn mill'. For example, reference is made in a petition in the Commonwealth State Papers dated, Whitehall 'Feb. 19 1650', to a 'Council of State to John Browne and John Dainton. By a petition from the inhabitants of Bedfont, Hatton, Feltham, Heston, Hounslow, Cranford, &c County Middlesex [hamlets around the Heath] we find that the erecting of a corn mill upon that water which drives the sword blade mills upon Hounslow Heath will be much advantage to all those inhabitants. Having likewise received a petition from Paul and Everard Ernions, sword-blade makers and lessees of the Sword-blade mills, for leave to erect a corn mill, we wish you to examine whether their desire may be granted without prejudice to the property of any particular person'. It is not known what the outcome of this request was, except that there was a difference with the ex-royalist supplier and magnate, Sir Nicholas Crisp, regarding this corn-mill, no doubt because it encroached on his property and affected his land rights.

John Cooke of London, Gentleman, was a merchant supplier of Hounslow swords to the Office of the Ordnance during the Commonwealth. The State Papers Domestic of 31 January 1655–6 record 'John Cook of London gentleman, for the encouragement of his manufacture of sword and rapier blades at Hounslow, and consideration of proposals annexed'. It is probable that he managed a sword-mill at Hounslow Heath in the last years of the Commonwealth. A debenture made out to Cooke, dated 6 August 1658, records payment for a consignment of 'Hounslow Hangers'

to the Ordnance Office, the last known delivery by name of Hounslow hangers (or 'Hounslow' swords of any kind) (see above).¹⁰³ Cooke's name disappears from the Ordnance records after 1658.

William Walker was a merchant sword-cutler and supplier of consignments of swords to the Office of the Ordnance between 1658 and 1660 (in the last years of the Commonwealth) and of 'Hounslow' hangers only in 1658 (above). His name disappears from the debenture books after that date. Other than commissioning and delivering bladed weapons, it is unlikely that he had anything to do with the manufacture of swords at Hounslow Heath.

John Gale is described in the State Papers Domestic of the first year of the Restoration (1660–61) as '*sword-blade maker and millman of the armory*', for the nomination of '*the place of Postmaster at Hounslow*'. Gale had been '*imprisoned, plundered, and his family turned out of doors, for executing his office when the late King was at Oxford*'. His petition for the post was supported by a testimonial from William Legge, Master of the Armoury, who confirmed that Gale was a '*swordblade-maker*', who had worked for the King at Oxford. It would appear that Gale had requested the position of '*Postmaster*' at Hounslow, because that was where he had lived before the war and had no doubt probably returned to after Charles I's defeat or after the Restoration. Gale was almost certainly a blade-maker at Hounslow Heath, before following the King to Oxford (There is no apparent record of such a man in the Cutlers' Company archives, which suggests that he was recruited and trained locally).

John Damm of London, Cutler, was a '*Furbisher of Swords to the Office of the Ordnance*', between 1638 and 1642. He did not work at Hounslow, but in the recriminations between Stone and the Cutlers regarding the quality of their respective swords, he was employed by the Ordnance to repair swords, make them clean, provide them with scabbards and, importantly, to '*prove*' them. For example, a debenture, dated 12 May 1638, made out to John Damm reads: '*John Damm of London cutler [for] making cleane & repaying swords. More for his Attendance upon ye Officer of ye Proving of Swords receaved into the Stoare from Beniamyn Stone and others, beeing employed 6 days at 5s a diem=£1-10-00*'.¹⁰⁴

John Conine and **John Walford** (names Anglicized in the English records) were Solingen hilt-makers and associates of Henry Hoppie and may have worked at Hounslow. The first definite evidence of their presence in England is their petition (with Hoppie and the hilt-maker, Daniel Defer, above) requesting denization from Charles II in 1662, so that they would not be prosecuted by the London Cutlers' Company and would be allowed to work unmolested for the King's Cutler, Edward Younger. In that document, both Conine¹⁰⁵ and Walford (with Hoppie) declared that they were born within the dominions of the Duchy of Berg (the province in the west of Germany, where Solingen was then situated)¹⁰⁶ and trained as sword-cutlers '*in fforeign parts [Solingen] for more than Seaven Yeares, And have thereby attayned to the Art and Skill thereof [of sword-maker]*'. Both men also claimed that they '*have for divers yeares past had their abode*' in England.¹⁰⁷

The petition to the King was successful. Conine and Walford were granted denization on 14 April 1663 and, on 27 April 1663, were appointed hilt-makers on the Lord Chamberlain's staff of the King's Great Wardrobe. Walford disappears from the records at this point, but Conine was later one of 22 sword-makers made free of the Cutlers' Company by redemption on 20 November 1673. A rapier, signed on the blade 'JOHANNES CONINGS LONDONI' of c.1660–70, now in the Museum of London (A.13806), and another inscribed 'JOHANNIS CONINGS LONDINI' of about the 1660s in Newport Museum, Monmouthshire, are probably his.¹⁰⁸

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Abbreviations

BL. British Library, London
 GL. Guildhall Library, Aldermanbury, City of London
 NA. National Archives, Kew, Surrey
 SP Dom. State Papers Domestic (published versions)
 V&A. Victoria and Albert Museum, London

Notes

¹ Cutlers Company Court Minutes, Guildhall MS. 7151/ 1, f. 21. The date is very hard to read. Tofts White gives 2 February, but it is almost certainly 'xixth die of ffebruary 1604 [f. 5]'.
² British Library, Harley MS. 429, f.23. Another earlier order of 23 May 1627 (for swords for the same expedition commanded by the Duke of Buckingham) records 'A note to the Cutlers for 1835 Swordes & Rapiers to be provided and brought in with all possible Speede. The like to Mr [John] Harmer for 700 Swordes & Rapiers to be likewise provided with all possible Speede' (Ibid. f. 17). (For Harmer, see Southwick 2001: 133). (NA. WO49/59).

³ NA.WO49/59, f. 200 [p. 102] 'Irish hilts' were basket hilts.

⁴ NA.WO49/59, f. 249 [p. 124v].

⁵ On 28 July 1631, Stone was paid £1,306-16s. for delivering 4,356 swords with Irish hilts to the Ordnance Office (NA.WO 49/61, f.91 [p.48]). For the importation of weapons into England in this period (especially during the Civil Wars) see Peter Edwards (2000 and 2003). A number of other foreign designs of named swords are found in contemporary English records, such as pike-men having 'good, sharpe, and broade swords of which the Turkie and Bilboe are best' in Markham's Souldiers Accidence (1625: 705).

⁶ The year, 1629, is important, but, regrettably, it does not offer a precise day or month, when the German blade-makers arrived in England. In this period, the Gregorian Calendar (or old style

dating) was in operation in England, which means that the men may have come to England between Lady Day (25 March) 1629 and the following 24 March 1629/30, the day before the old year changed to 1630. If, for example, the craftsmen came to England between January and March 1629/30, the time period would fit more conveniently into Stone's activities at Hounslow Heath (see Main Text) and would link him more clearly with the arrival of the German artificers. However, it is unlikely that a precise arrival time will ever be known.

⁷ It will probably never be known precisely when this statement was written, except that it is found in the State Papers Domestic Charles II for the year 1671–2 (Old Style calendar). However, one clue to its date is that the men were making their statement following the death of their patron, Colonel William Legge, Master of the Armouries and Lieutenant-General of the Ordnance, an event which had occurred on 20 October 1670. Therefore, the statement was made some months after Legge's death and sometime between 25 March 1671 and 24 March 1671/2 of the next year (Old Style calendar). Thus, as the men were 'growing old in yeares', the petition was possibly made in the early part of that new year, perhaps in the spring of 1671, five or six months after Legge's death (?).

⁸ NA. SP295/49: 85

⁹ Hoppie and English's statement declaring that the German swordsmiths were recruited by Sir John Heydon while working in Holland is revealing (and one never mentioned by any previous commentator because those details had been abridged from the published account on which they relied). The summarized published version does not mention that the craftsmen were either German born or working in Holland.

¹⁰ Sir John Heydon (bap. 1588–d.1653) was a military commander and Master of the Ordnance at the Tower before the English Civil War. The second son of Sir Christopher Heydon and younger brother of Sir William, he was appointed Keeper of the Stores at Sandown Castle, Deal, Kent, in 1613. Following his brother's death by drowning at the expedition to the Ile de Rhé (1627), Heydon succeeded to the family estates and was granted a royal patent to the post 'of the Office of Lieutenant of his Mate Ordnance together with the Custody of the Store house there unto belonging, and of the Artillery Garden, wth an Annuity of a hundred Marke. . . with all other fees and office thereunto belonging, wch Sr William Heydon his brother deceased late had. 13 September 1627' (NA. C233/3, f.141). Eighteen months later, on 7 January 1628/29, he was created a Knight Bachelor. Heydon served in his post at the Ordnance until the start of the English Civil War, when he left London and

joined the King first at York and later at his headquarters at Oxford. He was in command of the Royalist artillery during the Edgehill campaign and became Lieutenant-General of the Royal Ordnance and a member of the Privy Council. Following Charles's defeat, his goods were sequestrated and he died at Heston, Middlesex, on 16 October 1653, and was buried in the Church of St Leonard, Heston, on 19 October (Interestingly, Heston is a hamlet on Hounslow Heath, near to East Bedfont, from where Benjamin Stone operated) (See also DNB 2004).

¹¹ Solingen and its environs lie today in the region of North Rhine and Westphalia, Western Germany, on the border with Holland, a location that has been for centuries the heartland of German steel and blade manufacturing. However, in the 16th and 17th centuries, Solingen was situated in the ancient Duchy of Berg, which lay on the right bank of the Rhine between the Rivers Ruhr and Sieg and between Dusseldorf (its ancient capital) and Cologne. Peter Spufford (2002:129 and 259) commented that by the end of the Middle Ages 'the best sword blades and cutlery within Europe were being made at Solingen outside Cologne where, in many museums from London to Zagreb, Solingen steel blades can be seen fitted with local hilts and handles' (Cologne itself was also noted for its swords from the 12th century onwards as was Passau). Sir James Mann (1962, II: xxvii) argued that the 'XVIth and XVIIth centuries were the era of the great swordsmiths of Toledo, but there were also fine masters of the craft at Solingen and Milan', like Antonio Picinino of Milan, the Wirsberg family of Solingen and Clemens Horn at Solingen, a man whose name is found on the blades of many richly-decorated royal swords. These include the sword of Henry, Prince of Wales, of c. 1610–12, in the Wallace Collection (A.511) and the swept-hilted sword in the Royal Collection at Windsor (No. 62), a weapon bearing the Royal arms and the date 1617. (It is quite probable that these fine blades by Horn were imported to London by the royal cutler, Robert South, there to be hilted and scabbarded for his patrons) (for other examples, see Mann 1962, II: 264).

It was not only the natural resources that gave Solingen an advantage over many blade-making sites, a town which profited from the abundance of waterpower on the small streams in the area, the easy access to suitable stone for grinding; and the mountains of Westerwald that supplied an abundant supply of natural steel of fair quality, obtained directly by smelting with charcoal. The Solingen blade-making industry was also distinctive by its high rate of production. Like Toledo, the craft of the sword-maker in Solingen had been carried on from the earliest times and implemented by a great

number of craftsmen each working independently in their own workshops, the skills of their trade being passed from father to son down to the beginning of the nineteenth century (Laking, 1, Intro: lxiii).

By 'the fifteenth century, the Solingen artificers were incorporated in three Companies of the Sword-smiths, the Temperers and Grinders, and the Finishers, which were mutually exclusive as to membership' (Lloyd, 1908: 374). Some years before our period, in 1591, 'Ordinances were passed requiring each master to be fully qualified as forger, cutler, and finisher; he was forbidden to employ more than one journeyman and one apprentice at a time; the use of blades made under mechanical hammers was forbidden; he was to strike his own mark on all his work' (ordinances which, no doubt, affected the German Hounslow makers during their years of training) (ibid).

It was the great volume of blades that Solingen produced that was impressive, blades that suited every market or taste in northern and southern Europe. And in order to satisfy the preferences of certain countries, Solingen makers began to extensively imitate quality blades from other notable areas, like Toledo, Valencia, Milan, Brescia, and Belluna (the latter exported through Venice), and then stamp them with spurious marks or names of esteemed makers from those regions, such as Juan Martinez the Elder, Sebastian Hernandez, Juanes el Viejo (the elder), Francisco Gomes and Tomas de Ayala (all of Toledo), Antonio Picinino and his son, Federico, of Milan, Alessandro Scacchi of Brescia, Andrea Ferara of Belluno, etc, thereby promoting the saleability of their own products. (For important directories of Solingen smiths, see Weyersberg (1926), Cronau (1885) and Schlesinger (1982). Also, of interest, see Lloyd (1908: 373–391).

¹² NA.SP29/48/6 and Southwick 1999

¹³ Wolvercote, like many other villages around Oxford, suffered in the Civil War, after the King made the university town his headquarters. Royalist troops, including the artillery, were billeted there in 1643 and 1644. In 1616, the Wolvercote mill comprised two corn mills and an adjoining 'fulling' mill, part of which was used by the sword-cutlers for grinding swords and blades under the command of William Legge (See J Cooper 'Wolvercote' in A. Crossley (ed) 1990; 310–11).

Officially, the start of sword-making at Wolvercote came about after a Court at Oxford on 20 November 1643 ordered the Treasurers of the Exchequer 'To pay to Wm Legg, Master of the Armoury, £100 by way of imprest upon account, to be employed in building a mill at Woolvercott near Oxford, for grinding of swords and for building forges, providing tools and other necessities for

sword-blade makers to be employed to make swords for our service. XX November 1643' (Cal. of State Papers Domestic Charles I, 1641–43, HMSO 1887, Reprinted 1967, p. 501. The same instructions are found written in Latin in National Archives E403/ 1755: 20). Three months later, on 26 February 1643/44, the Court at Oxford approved a Warrant under the Privy Seal of the Exchequer 'By our special command Legg has caused to be erected a mill for grinding Swords at Woolvercott, and forges at Gloucester Hall; you are therefore to pay upon account to Wm. Legg, Esq. Master of the Armouries, a sum not exceeding £2000 for providing swords and belts in the office of armouries, the same to be made at the usual price and according to the patterns by us appointed; also to provide tools and other necessities for sword-blade makers employed by the said Master of the Armouries'. (Cal. State Papers Domestic Charles I, 1644. HMSO 1888, reprinted 1967: 27).

The German smiths (and others from Hounslow) could have worked at either of the Oxford sites above, as required. (Other supplies of swords were sent to the magazine in New College by local swordsmiths, such as Jeremy Poole, but their numbers (in occasional batches of about 14) were very small and, while useful, could not fulfil the army's requirements) (see Edwards *op.cit.* 2000: 78). (For other aspects and orders for the Royal Ordnance at Oxford, see Ian Roy (1963–4) and (1971–3).

The King left Oxford in 1644 and the city surrendered to the Parliamentary commander, General Fairfax, on 22 June 1646.

¹⁴ Colonel William Legge (1607/8–70) was a royalist army officer, a noted servant of Charles I and of Charles II, and a man of respected integrity (whatever Stone may have thought). As a young officer, he served with the Dutch and Swedish forces during the early years of The Thirty Years' War. In November 1626, he was granted a patent 'during life' of the post of Keeper of His Majesty's Wardrobe within the Palace of Westminster (NA.C233/ 3, f.114). Ten years later, in 1636, he was appointed Master of the Armoury and Lieutenant of the Ordnance in the years leading up to the first Scottish War (1639), and was made inspector of defences of Newcastle and Hull (NA. C233/4, f.142). Following the beginning of the English Civil War in 1642, he joined the King at Nottingham, where he met Prince Rupert, under whom he was to serve with distinction as a major in his cavalry regiment. Later, he joined the King at his Headquarters at Oxford and served in the Royal Ordnance there (being in charge of the sword mill at Wolvercote) and continued to support the royalist cause until the end of the war. After

the Restoration, he was appointed to his old posts of Groom to the Bedchamber of Charles II and Master of the Armouries, and also made Lieutenant-General of the Ordnance at the Tower. He died on 13 October 1670, aged 62, at his town house in the Minories and was buried in Holy Trinity Church, Minories, on 20 October 1670 (Legg declined an earldom, but requested that his son may be so honoured. Charles II elevated William's eldest son, George Legg (c.1647–91), to 1st Baron Dartmouth in December 1682 and later, his grandson, William Legg (II) (1672–1750), was created Viscount Lewisham and Earl of Dartmouth by Queen Anne on 5 September 1711 (For full accounts, see DNB 2004).

¹⁵ Welch 1923:3

¹⁶ GL.MS.7151/1

¹⁷ See Welch (1923:2). Murray's patent, now in the National Archives (Chancery Docket Book: C233/ 2 f.103), is most interesting. It was granted two years before he offered it to the Cutlers' Company, which suggests that he had failed to earlier acquire the finance to set up the project himself. It reads: '*Januar Anno 16 et 52 Jacobi R 1618 [regnal year 16 of the reign of James I] Murray, A special priviledge graunted to Thomas Murray Esqr for 21 yeares for the sole practise of a new Invencon for the sole making of Sword blade Fauchions Skeynes & Rapier blades wth in the Realmes of England & Ireland Rendring to his Matie vliiv. [5 livres=pounds] rent yearelie until the said manufacture be pfected [perfected] as that there shalbe a decay of importacon thereof otherwise untill his Matie shall phibit [prohibit] such importacon... times the patentee is to paie to his Matie xl [£10] rent and soe... yearelie rent in lieu of Hs Customes as shalbe found... of 7 yeares to be cast up to have be'n answered for the sames teste ij January p'd [2 January 1619]*' (The intervals are as recorded). This version is the clearest, although the patent is recorded again in National Archives C.66/ 2183.

¹⁸ Sword-blades had been made in London and England since the later Middle Age, but their quality was poor and the numbers produced were not sufficient to equip weapons for large armies. Most cutlers manufactured knife-blades, known as 'short-cutlers', while those who made sword-blades were 'long-cutlers'. The latter blades were much complained about and there was a good deal of mistrust about 'monopolist bladesmiths', such as Sir Basil Brooke, even as late as the early 17th century (see Main Text). It is certain that knightly swords or their blades in the Middle Ages were also imported into England from foreign centres by 'Merchant Cutlers'. At this date, the English tradition of sword-blade-making did not compare with the great steel manufacturing centres of Europe (like Solingen, Northern Italy, and Toledo), where

natural resources, manufacturing production skills and numerous workshops far exceeded other locations (see note 11). The German Hounslow smiths knew (after years of rigorous training at a major producing site, like Solingen) how to manufacture sword-blades on a large scale. If native blade-smiths had existed in south-eastern England in the second quarter of the seventeenth century with skills comparable to those of the German workmen who came to Hounslow, there would have been no need for the King to recruit master blade-smiths from the Continent.

¹⁹ See note 51. Also, in general, most London sword-cutlers and knife-makers in the early 17th century, preferred imported blades rather than the poor quality goods provided by monopolists, such as Sir Basil Brooke. On 20 November 1617, the artificers of the Cutlers' Company petitioned the Court '*for the reformation of bad steel and for no Imbarbment of foreign steel but that they may at their pleasures to buy for their good what they may*' (see Girton 1975: 193).

²⁰ A valuable earlier insight into the importing of swords and blades into England is the rare surviving contract, dated 5 December 1578, between the brothers Zanandrea and Zandona of Ferrara ('Andrea Ferrara'), sword-smiths of Belunno, and two London merchants, Giavanni Brun (John Brown?) and Lanciloto Rolansome (Lancelot Rowlandson?) (the latter then living in Venice) in which the Italian sword-smiths agreed to supply the English merchants '*every month for ten years with two cases each containing 300 swords [amounting over the decade to 72,000] and also not to make any swords destined for England for anyone else during the terms of the contract*'. The status of the two English merchants is not known, but they may well have been either merchant cutlers themselves or representatives of leading cutlers in London. See C Blair (1984). Following this reference, Claude Blair (1998, II: 344) gave the dates of the Italian blade-smith, Andrea Ferrara, as being born in the 1530s, signing works in the 1560s, and having died in 1612.

²¹ See G Mungeam (1968–70: 209–213). An act of Parliament of 1563 ordered '*... that no persons or persons whatsoever from or after the feast of the Nativitie of S John Baptist now next ensuing [24 June], shall bryng or cause to be brought into this Realme of England, from the partes of beyonde the seas, any... Rapiers, Daggers, Knives, Hyltes, Pummelles, Lockettes, Chapes, Dagger blades, Handles, Scabberdes, and Sheathes for knyves, Saddels... being ready made or wrought in any partes of beyond the seas, to be solde, bartred or exchanged within this Realme of England or Wales, upon payne to forfayt al such wares so to be brought...'* Interestingly, the act does not mention

- sword blades, which were essential for manufacturing swords in England and, of course, were allowed entry. However, these restrictions were not strictly adhered to as many swords of all types were imported into England in the years following, regardless of the act (see Main Text). (Welch 1923:3).
- ²² Welch 1923: 3
- ²³ GL.MS.7151/1 f.321
- ²⁴ Mungeam (1968–70: 211) suggested that Stone and other London cutlers moved to Hounslow to avoid the various restrictions imposed on members by the Cutlers' Company. This, in part, may have been true, although it is not known how many men left London to go there. Stone's action appears to have been more ambitious. The move gave him the opportunity to run a major operation, to make his mark in the service of the King and, hopefully, to increase his fortune and be honoured for it.
- ²⁵ Syon House, Brentford, Middlesex: Muniment Room, Ref. Syon MS. Div.XIV, No. 2A. I am indebted to Richard Pailforth, formerly Estate Manager, Syon House, who located this document on my behalf and allowed me to consult it. (The sixth regnal year of Charles I ran from 27 March 1630 to 26 March 1631) (Twenty-six years after this event 'Mr George Berkeley', Lord Berkeley's son, sold the Manor of East Bedfont and Hatton to Algernon, Earl of Northumberland, for £1,400 on 10 May 1656. See Syon. MS.D.XV. No.1-K). For East Bedfont with Hatton see W Page (*ed.*) 1911 (reprinted 1970): 309–314.
- ²⁶ Glover's map was drawn for the Earl (later Dukes) of Northumberland, who resided at Syon House (as the present occupant still does), and whose land lies in the 'Isleworth Hundred'. Glover's map (not known to be linked in any way to Stone's indenture) was, however, ambitious and includes other parishes on the outskirts of the Heath, parishes which lie in other 'hundreds' (a sub-division of a county or shire), such as East Bedfont with Hatton, Ashford, Feltham, Hampton with Hampton Wick, etc., all of which lie in the 'Spelthorne Hundred', an area already formed at the time of the Domesday Survey (see W Page, 1911).
- ²⁷ On Glover's map, 'The Cutt' was the name of the small narrow tributary that came out from the main river and passed under the sword-mill (see figure 3). The indenture states that this tributary was 'the New Cut River', almost certainly implying that the name, 'The Cutt', derived from the fact that the tributary was newly-cut out of the land, in order to provide water power to the 'newly erected Sword Mill' (If this was the case, then this essential requirement was no doubt suggested by the German master blade-makers).
- ²⁸ V&A MS.86.GG.Z
- ²⁹ The name 'Kennet' is a misreading of the name 'Kindt' found on various Hounslow swordblades (see Main Text). It appears that in English circles, away from Hounslow, Kindt may have been referred to as 'Kennet' (as indicated by Waller's reference of 1643), but there are no apparent contemporary documents that point to him using that name. Also, before the Civil War, it is most probable that military men, interested in swords and their manufacture, may well have visited the Hounslow factory to see what the new site was producing and to purchase new designs.
- ³⁰ Parish of East Bedfont, Churchwardens Account Vol.1 1593–1684. The Parish Poor Rate Account books are kept in the Hounslow Local History Library.
- ³¹ GL.MS.7151/1
- ³² The German smiths, not being freemen of the London Cutlers' Company and without denization, could not indenture boys for training, although this was probably done unofficially.
- ³³ Guildhall Library MS. 7151/1, f.291. The 'ancient' or 'past masters' were the former Masters of the Cutlers' Company, who (after their year in office) continued to serve as members of the Court of Assistants and to play a leading part in company affairs. In this period, Robert South was a prominent figure. He was the King's Cutler, a member of the Cutlers' Court, and had served as Master in 1629–30, but he was not the serving master in 1635, as some writers have suggested (see Southwick 2006).
- ³⁴ Guildhall MS.7151/1, f. 251. It is not known who 'Mr Kent' was and an examination of the Patent Rolls and the Docquet Books at the National Archives has failed to reveal a person of that name being granted a patent for the making of sword blades. Apparently, if recipients could not afford the fee, early patents were sometimes not recorded (Speculation suggested that 'Mr Kent' might turn out to be 'Mr Kindt' or 'Mr Kennet'. This view cannot be verified, but it is a possibility).
- ³⁵ Welch 1923:3
- ³⁶ NA.SP16/328
- ³⁷ NA. SP16/328
- ³⁸ NA. SP16/328
- ³⁹ The patent is found in two sources at the National Archives: Ref: C233/4: 'Docquet Booke for the seaventh [starting regnal year] of King Charles Anno Domini [from] 1631–1638'; and the Patent Rolls, 12–13 Car.I, Vol 031/ C 66/ 2736, f. 72v. (Compare also the earlier patent of Thomas Murray, dated 11 January 1618/19, in note 12 above).
- ⁴⁰ British Library, Harley MS. 429, Ordnance Office Papers, 1626–36, f.180v.
- ⁴¹ NA.SP16/341/132: 205

- ⁴² The Cutlers' Company appear to have been unaware of the patent given to Stone on 9 July 1636.
- ⁴³ This is a rebuttal to Stone's claims that he had '*perfected the art of blademarking*' and a direct reference, by the Cutlers, to the German blade-smiths who had come to England in 1629, the real originators of blade manufacture at Hounslow Heath. If the Cutlers' reference is correct, that only '2 or 3' master blade-smiths came to England in 1629 and who later worked at Hounslow, it would indeed make the German immigrant group a very small one (the older most important masters probably being Johannes Kindt, Johannes Hoppie and Peter Munsten).
- ⁴⁴ NA.SP16/377/47: 80 [1637]
- ⁴⁵ NA.SP16/377/47: 305, no.133
- ⁴⁶ The phrase '*the manufacture [of sword-blades] thereof by Englishmen as well as others*' is a rare acknowledgement by Stone that '*others*', that is, foreigners [i.e. Germans], had a hand in the manufacture of sword-blades at Hounslow that he intended to send to the Office of the Ordnance. This may have been mentioned reluctantly by Stone at this time because the Cutlers had pointedly drawn attention to the fact earlier (see Main Text and note 43).
- ⁴⁷ NA.SP16/407/60:133 [1638]
- ⁴⁸ SP Dom. Charles I Vol 13
- ⁴⁹ NA.SO16/407/61:134 [1639]
- ⁵⁰ NA.SO16/407/61:134 [1639]
- ⁵¹ Stone was here referring to the fact that the Cutlers' swords were being stamped with spurious marks of noted Spanish makers in order to induce potential purchasers to buy their weapons. The most sought-after blades carried names of certain well-known European masters, names that denoted quality, such as Clemens Horn, Andrea Ferara, the Picinino family, Juan Martinez the Elder, Sebastian Hernandez, etc (see also note 11). The practice of stamping blades with spurious names and false marks was a known Solingen practice and one no doubt used elsewhere. (It is evident that these blades were for munition use; the finest swords had a superb hilt fitted with a quality blade).
- ⁵² SP Dom. Ch I
- ⁵³ SP Dom. Ch I
- ⁵⁴ NA.WO49/71 f.8v
- ⁵⁵ NA.WO49/71 f.9
- ⁵⁶ NA.WO49/71 f.9v
- ⁵⁷ NA.WO49/71 f.10
- ⁵⁸ NA.WO49/68 f.54
- ⁵⁹ The earliest Birmingham blade-smiths and suppliers to the Ordnance in the eighteenth century were Samuel Harvey and John Dawes, followed by Thomas Creaven and Thomas Gill.
- ⁶⁰ NA.WO49/68 f.63
- ⁶¹ NA.WO49/68 f.65
- ⁶² NA.WO/49/68 f.75
- ⁶³ NA.WO/49/68 f.75
- ⁶⁴ GL.MS 7151/1 f.328
- ⁶⁵ NA.WO49/72 and 78
- ⁶⁶ British Library Add MS.34325, f.42. See also Roy:156, 168, 174.
- ⁶⁷ See R Williams, '*Joseph Jenckes, Sword Cutler of Hounslow*'. This short paper is enclosed with other articles on Jenkes at the Hounslow Local History Library (Ref: 739.7/ VF / SW.4).
- ⁶⁸ See Southwick 2006
- ⁶⁹ The German mill was converted into a gunpowder mill in 1654. See the Bedfont Research Group, Bedfont (The Hounslow & District History Society) 1987 (available at Hounslow Local History Library).
- ⁷⁰ SPDom.1645-50:186-7
- ⁷¹ SPDom.Com.1649-50:186-7
- ⁷² SPDom.Com.1649-50:186-7
- ⁷³ Sir Nicholas Crisp, Bart. (1599?-1666) noted royalist and prominent merchant, an alderman and sheriff of the City of London, who was long and successfully engaged in the East India and African trade. In 1632, he was given the rights to trade in Guinea by Charles I and made a knight bachelor on 1 January 1639/40. When the Civil War commenced, Crisp supported the King financially and later joined him in Oxford. Following the Restoration, he received a Baronetcy (16 April 1665) and died the following year on 26 February 1665/66. He was buried in St Mildred's Church, Bread Street, City of London, but, two hundred years later, on 18 June 1898, his remains were re-interred in the churchyard of St Paul's Hammersmith (For a full account, see DNB, 2004).
- ⁷⁴ NA.WO49/90 f.274
- ⁷⁵ NA.WO49/90 f.232
- ⁷⁶ See Southwick 2001: 264-7
- ⁷⁷ Southwick 1999
- ⁷⁸ GL. MS. 7151/2
- ⁷⁹ Southwick 2001: 23, 35
- ⁸⁰ GL.MS. 7151/1
- ⁸¹ GL.MS. 7151/1
- ⁸² For later 17th-century blade manufacture, see J D Aylward (1943: 302-305). Blades continued to be imported from the Continent until the early 19th century, most notably by J J Runkel of Solingen. However, by the end of the 18th century, much blade manufacture was undertaken at the Birmingham factories of John Gill, John Harvey and Henry Osborne and his various partners, etc., all of whom supplied bladed weapons and other munitions to the Ordnance during the French Wars.
- Earlier, a Cutlers' Court held on Friday 27 March 1686, recorded '*Mr Porter of Brumejam* [*Brummagen* the city's dialect name for Birmingham] *being present declared that he is minded &*

willing to send up all ye Sword Blades which he shall make to this Hall to Lye in Stock, to be approved, marked & sold by the Compa[ny] for his account. And the money for wch ye same shall be sold to Be returned from time to time' (Guildhall Library MS. 7151/ 2 f. 344).

- ⁸³ British Library, Harley MS. 4206. John Tofts White (who had examined more Hounslow blades than most) described many of them as merely 'serviceable'. However, several 'Hounslow' blades are often found mounted on later hilts, pointing to the sturdy resilient manufacture of the original blade. For example, those fitted to the basket-hilted sword of about 1660 with blade inscribed 'ME FECIT HVNSLO' (Victoria and Albert Museum M.439-1936), another with hilt of about 1680 with blade inscribed 'ME FECIT HOVNSLOE' (Victoria and Albert Museum M.4-1956), a horse-man's sword with brass military-hilt of about 1690 inscribed on the blade 'HONSLO' (Royal Armouries IX.2052), a Mameluke-hilted sword with steel scabbard, both of 19th-century date, fitted with a curved single-edge blade inscribed '+ME FECIT+ / +HVNSLOE+' (Gunnorsbury Park Museum, 84.9/ 2), a mid-eighteenth century brass-hilted hunting hanger with reeded wooden grip fitted with a cut-down backsword blade inscribed 'M FECIT HVNSLOE' (Gunnorsbury Park Museum, 90.366), and an 18th-century silver-plated hilted cutlass (hanger) fitted with a cut-down, serrated back-edged blade inscribed 'JOHAN KINNDT HOVNSOE 1634' (Museum of London, 37. 60).

- ⁸⁴ Sir Arthur Hasselrig or Hessilrig (died 7 January 1660/61) was a Parliamentarian, who distinguished himself in the early years of the Civil War, fighting at Edgehill and as a Second-in-Command to Sir William Waller.

- ⁸⁵ Norman 1980:119

- ⁸⁶ Bonhams, Knightsbridge, London, *Antique Arms and Armour, including the Collections of the late Mrs GEP How, the late John Wilmot and the late Danny Wing*, Wednesday, 25 July 2007, lot 74 (ill).

- ⁸⁷ Norman 1980: 60

- ⁸⁸ Mann: 327

- ⁸⁹ Laking 1920: 1, Intro:ixiii

- ⁹⁰ Southwick 1999

- ⁹¹ Weyersberg: 35-9

- ⁹² Laking IV: 308 and 310

- ⁹³ Mann 1962: 327

- ⁹⁴ NA.WO51/32

- ⁹⁵ PROB 11/436, sig 29 f.228v

- ⁹⁶ The other Richard Hopkins the apprentice of Thomas Smith sworn a Free Cutler, 24 March 1645/46, took Livery (24 June 1651), became a Court Assistant (7 August 1666), Renter Warden (11 July 1667), Lower Warden (4 Sept 1668), Upper Warden (5 June 1669) and Master (17 June 1671-72). His son, Richard Hopkins, was sworn free of

his father on 24 June 1673 and became Master in 1701.

- ⁹⁷ See M Colket (1956) and SP Carlson (1985). These authors offer conflicting information on the origins of Jenkes, who, they believe, worked at Hounslow 'until c. 1639' and later in Maine, America, 'in the fall of 1641'.

It is difficult to know where these authors found their information on the early life of Jenkes. The IGI offers 'Jenkes, Joseph M/C John/Sarah Fulwater, baptised 26 August 1599 at St Anne's Church Blackfriars', although the actual church baptismal register records the birth as '1599 Joseph soonne to John Ginkes August 26'. IGI also records 'Jenkes Joseph M/C of John Jenkes / Helen, 1607 London Prescencet of Tower' (?) And a third reference which seems to apply is 'Joseph Jenkes H/M Joan or Joan Herne, 5 November 1627 at St Annes Blackfriars', although the actual church marriage register does not list this event at all! Moreover, the incomplete early records of the White Bakers' Company do not appear to record an indenture, nor a freedom, of a Joseph Jenkes!

- ⁹⁸ Southwick 2001: 23

- ⁹⁹ Hayward 1957:14 pl.VII

- ¹⁰⁰ Cutlers' Company Records, Guildhall Library MS. 7151/1. The wording, 'Joseph Jenkes Cutler and Knyffe fforger against William Rush also Cutler and knife fforger', point to both men being freemen of the London Cutlers' Company and their trade within that company being 'knife forgers'. If this Jenkes had been the same as the Hounslow blade-smith, the phrase would read 'Joseph Jenkes White Baker and Knyffe fforger'. (This extract is included in the Main Text for reference, as it appears most unlikely that a London 'knife-cutler' was one and the same as Jenkes the Hounslow sword blade-smith, a man who felt compelled to complain in person at a Cutlers' Company court in the City of London about the misuse of his mark on knife-blades in 1638, when the Hounslow sword project was at full stretch manufacturing swords and blades for the national cause).

- ¹⁰¹ GL. MS. 7151/1.

- ¹⁰² See also Schlesinger 1982: 34-5 for other 'Johannes Bells', active later at Solingen.

- ¹⁰³ NA.WO49/90 f 274.

- ¹⁰⁴ NA. WO49/69 f.35) (See also NA WO49/68 f 61 for another payment to Damm for proving swords on 19 January 1638/39)

- ¹⁰⁵ See Southwick (1999). Another 'John Conyne of St Sepulckes, London, cutler' was granted denization 'with power to hold lands', on 17 August 1655, as recorded in Patent Rolls, 1655, part 4. This man was also probably a Solingen immigrant, but not the same as the Conine, who applied for denization seven years later in 1662.

- ¹⁰⁶ Southwick 1999

¹⁰⁷ The fact that these makers had been in England for some years without applying for denization suggests that they had worked in areas where denization may not have been a prerequisite, namely at Hounslow or at the sword-making workshop of the King's Ordnance at Wolvercote, Oxford.

¹⁰⁸ The Newport rapier is recorded in the late A V B Norman's notes in the Royal Armouries. Norman also records a third 'John Connyne (of Solingen)', who was granted denization on 27 August 1607. This was an earlier immigrant than those in note 105.

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