

ENUMERATION OF BLOCKS OR PIGS OF LEAD AND TIN, RELICS  
OF ROMAN METALLURGY, DISCOVERED IN GREAT BRITAIN.

It has appeared desirable to give, as a supplement to the foregoing memoir, a detailed inventory of certain relics of Roman metallurgical operations in Britain, the *massæ plumbi*, ἑλασμοὶ μολυβδοῖνοι of Dion, in mediæval times termed *tabulæ*, now commonly known as pigs of lead, with notices also of a few similar objects of tin. I have, therefore, readily complied with the request of Professor Phillips that I should arrange the notes, which for some years past I have collected, and that they should form an accompaniment to his valuable dissertation.<sup>1</sup>

The earliest notices of any *massæ plumbi* found in this country occur in Camden's *Britannia*, describing the pig of lead found in the reign of Henry VIII. near "Ochie hole," Wokey on the Mendip Hills, and the large deposit of twenty pigs bearing the names of Vespasian and Domitian, reported to Camden as having been discovered on the coast of Cheshire.<sup>2</sup> The attention of antiquaries, however, was not called to the subject until the discovery, in 1734, of two pigs of lead on Hayshaw Moor, Yorkshire, which was communicated to the Royal Society, and called forth the elaborate dissertation by Professor Ward which may be found in the *Philosophical Transactions*.<sup>3</sup> The learned writer came to the conclusion that these pigs were part of the tax paid out of the mines of Britain, and he adverts at considerable length to the condition of the country as a Roman province governed by a Legate, under whom was the oppressive *Procurator* who had charge of the revenues. These were derived, as is well known, from *tributa*—capitation tax, tax upon lands, &c., and *vectigalia*, consisting

<sup>1</sup> An interesting notice of pigs of lead and description of those preserved in the British Museum, has been given by Sir H. Ellis, in the *Library of Entertaining*

*Knowledge*, Townley Gallery, vol. ii. p. 285.

- Camden's *Britannia*, edit. 1607, pp. 163, 463.

<sup>3</sup> Vol. xlix. p. 686.

of part of the produce of grain, payments for grazing cattle, customs and revenues, including those from *salinæ* and mines. These last were usually farmed by *publicani*, or, when the undertaking was large, by companies, termed by Cicero "*societates vectigalium*," and usually resident at Rome.<sup>4</sup> The reader may be referred to the memoir in question for a more ample statement of the speculations of antiquaries in the last century on the subject. To Professor Ward's concluding observations regarding these leaden pigs we may heartily assent:—"As they are very remarkable, and perhaps the singular remains of that kind relating to the Roman government, either here in Britain, or any other part of their dominions, they may deserve the further consideration of the curious in their investigations into these subjects."<sup>5</sup>

The question may still be open to discussion, whether the numerous pigs of lead found in this country, and bearing the names of certain Emperors, as hereafter described, should properly be regarded as the produce of mines farmed by *publicani*, or worked for the direct account of the State. In some instances, however, the mines of conquered countries were left in the possession of individuals or towns, on condition of a certain rent being paid. I will now endeavour to record the discoveries of these remarkable vestiges of Roman enterprise in Britain; and to enumerate the relics in question as far as practicable in chronological order. The form, it may be observed, is the same in all cases, and it is shown by the woodcut on the next page. Of other examples, here described, the upper or inscribed surface only is shown.

#### ROMAN PIGS OF LEAD FOUND IN GREAT BRITAIN.

BRITANNICUS. Date about A.D. 44—48.

Tiberius Claudius Britannicus, son of Claudius and Messalina: born A.D. 42; he shared with his father the title of Britannicus conferred about A.D. 44, for pretended victories in Britain; was regarded as heir apparent until the death of his mother, A.D. 48, and was removed from the succession on the adoption of Nero in his stead, A.D. 50. The precise date of this inscription is not determined; as, however, the young prince was out of power, through the intrigues of his stepmother Agrippina, A.D. 48, and the leaden pig next to be described bears the date A.D. 49, it is probable that Britannicus had been deprived before that period of any

<sup>4</sup> See this subject more fully treated in Dr. Smith's Dictionary of Antiquities, v. *Vectigalia*.

<sup>5</sup> Philos. Trans., vol. xlix. p. 700.

revenues he might have enjoyed as heir-apparent. The date would thus be brought to A.D. 44—48; and in that case this must be regarded as the earliest example hitherto discovered in England. It was found about August, 1853, near Blagdon, on the Blackdown range, Somerset, the northern flank of the Mendip Hills. The countryman by whom it was found brought it to the patent shot-works of Messrs. Williams at Bristol; and on being informed of the historical value of the object, Mr. Williams presented it with most praiseworthy liberality to the British Museum.<sup>6</sup> No other inscription, it is believed, bearing the name of Britannicus, has been found in England. The inscription, as Mr. Franks informs me, may be read BRITANNIC :::: AVG F:: (Augusti filius). The letters twice impressed upon the side of the pig probably denote its weight; they appear to read thus:—V · EIP · C or FTP C · (?). Mr. Roach Smith, *Collectanea Ant.*, vol. iii., p. 258, proposes to read V · ETP · C. It weighs 163 lbs; it measures 24 inches by 6½; width of the inscribed surface, 3 inches.



Fig of Lead found near Blagdon, Somerset. British Museum.

#### CLAUDIUS. Date, A.D. 49.

In Leland's "*Assertio Incomparabilis Arturii*," printed in his *Collectanea*, vol. v., fo. 23, a, mention is made of lead as suitable from its durability for sepulchral inscriptions, and also of the rich lead-mines in the Mendip Hills, Somerset. Leland then observes, "*Non puduit Romanos, rerum Dominos, trophæum ex oblonga plumbi tabula in ipsis pene eorundem montium radicibus, ad fontes Ochidis fluvioli fabulosis ditionis episcopi Fontani, Claudio Cæsari sic inscriptum erigere: TI. CLAVD · CÆSAR · AVG · P · M · TR · P · VIII · IMP · XVI · DE · BRITAN. Hoc trophæum annis ab hinc paucis aratro erutum, et ad ædes Thomæ Houerti, Icenorum Ducis, Londinum translatum.*" Camden (*Britannia*, edit. 1607, p. 168) records this discovery as having occurred near "Ochiehole," now called Wokey Hole, in the reign of Henry VIII., and gives the inscription as above; and Dr. Holland thus translates the passage, with the addition that the leaden relic had been at Lambeth. "Not far hence [Ochie-hole] in the raigne of K. Henrie the Eighth, was turned up with the plough, a table of lead somewhat long, which lay long at Lambith in the Duke of Norfolkes house, erected sometime for a trophee in token of victorie, with this inscription" (as above given), Camden's *Brit.* by P. Holland, 1637, p. 230. Compare Gough's edition, 1806, vol. i., pp. 82, 104. Lambarde mentions this discovery in his *Topographical Dictionary*, under Onky (obviously an error of the

<sup>6</sup> It was presented by James Williams, Esq. See a further notice in this Journal, vol. xi. p. 278.

press for Ouky, or Wokey). The learned Dr. Musgrave has given a Dissertation in his *Antiquitates Britanno Belgicæ*, p. 181, cap. xvi., entitled "De Claudii Tropæo propter Ogonem eruto," showing that it was the most ancient Roman inscription extant in Britain. Horsley (*Brit. Rom.*, p. 328) cites the inscription on Camden's authority, and concludes that the original was lost. See also Collinson's *Somerset*, vol. iii. p. 420; *Monum. Hist. Brit. Inscriptions*, No. 133; Pennant's *Tour in Wales*, vol. i. p. 57.

CLAUDIUS. A.D. 41—54.

A pig found at Matlock, Derbyshire, in April, 1787, according to the account sent to Pegge by the Rev. J. Mason, of Elton. See Pegge's *Memoir* on this pig of lead, *Archæologia*, vol. ix. p. 45. It is described as the heaviest of the pigs found in Derbyshire, weighing 173 lbs., and consisting of about thirty layers, as if smelted at so many different times. The inscription is,

TI · CL · TR · LVT · BR · EX · ARG.

Pegge originally proposed to read, *in extenso*,—"Tiberius Claudius Tribunitia Potestate Britannicus, ex argento,"—the seventh letter having been read I, and LVT. was supposed to be a blunder for POT. On more careful examination, the pig having been purchased by Mr. Molesworth, F.S.A., the questionable letter was pronounced to be L, and the Rev. T. Crane proposed to read LVT. "Tiberii Claudii Tributum, lutum Britannico ex Argento," tribute paid out of British money.<sup>7</sup> The occurrence, however, of the letters LVTVD. upon other pigs found in Derbyshire appears to confirm the explanation that *Lutudarum* is intended, being the name of a Roman station given by Ravennas next to Derventio, and the site of which there is reason to suppose is now occupied by Chesterfield. Dr. Gifford proposed the reading "Tiberii Claudiani Triumviri Lutudari Britannorum ex argentaria;" but Sir Henry Ellis suggests "Lutudari Brigantum ex argentariis." Pegge concludes that the date of this pig is A.D. 44; and in explanation of the letters EX · ARG., he cites the remarks of Pennant regarding the extraction of silver from lead by the Romans. (*Gent. Mag.* 1783, p. 937; Pennant, *Tour in Wales*, vol. i. p. 58.) This pig measured  $17\frac{1}{2}$  inches in length on the inscribed side, 20 inches on the other.

See Lysons' *Derbyshire*, p. ccvi.; Sir H. Ellis, in the *Library of Entertaining Knowledge*, Townley Gallery, vol. ii. p. 290, seems to have confounded this with the next, which he has not noticed; *Monum. Hist. Brit. Inscriptions*, No. 142; *Journal of Brit. Arch. Assoc.*, vol. v. p. 227; and Bateman's *Antiquities of Derbyshire*, p. 135.<sup>8</sup>

<sup>7</sup> *Archæologia*, vol. ix. p. 43; vol. xiii. p. 405.

<sup>8</sup> Mr. Bateman observes that he had

been unable to ascertain where the pig formerly in Mr. Molesworth's possession (as above stated) now is.

## CLAUDIUS. A.D. 41—54.

Four pigs found January 31, 1824, on the estates of the Earl of Egremont at Broomer's Hill, in the parish of Pulborough, Sussex, a short distance to the east of the "Stone Street," or ancient Roman way from Chichester (*Regnum*) towards London. The inscription, it is stated, was the same on each of them. One is now preserved in the Hall at Parham Park, the seat of the Hon. Robert Curzou, near Pulborough. Another, the inscription on which is here figured, was presented, July 1, 1824, by the Earl of Egremont to the British Museum. It weighs 184 lbs., length 23 inches, width  $6\frac{1}{2}$  inches, height  $4\frac{3}{4}$  inches.



Pig of Lead found at Pulborough, Sussex. British Museum.

According to recent information from Mr. H. G. Brydone, Col. Wyndham's steward, it is believed that the other two pigs, being defaced and the inscriptions illegible, were sent to the plumbers at Petworth.

In *Gent. Mag.* March, 1824, vol. xciv. part i. p. 194, the following notice occurs:—"Sussexiensis states that about ten days ago some labourers discovered at Pulborough, in Sussex, four Roman pigs of lead. They were 22 inches in length, and 6 inches across the top, and 4 inches at the bottom. On each was impressed the following inscription . . . ICITR·PVT·BR·EXARG." In the same volume, p. 320, appeared a letter dated Greys, and signed J. I. (the initials of the late Dr. Ingram, President of Trinity College, Oxford), relating to the above-mentioned communication, and proposing the following reading, supplying an initial T, and altering one letter, TI·CL·TR·PVT·B·REX·ARG. "Tiberius Claudius Tribunitiæ potestatis Britannici (or Britanniarum), Rex Augustus." The learned writer justified his conjecture by the occasional occurrence of v for o, as in *Aquæ Sulis*, for *Solis*; and stated that the title of *Rex* is given to Constantine, on certain coins.

See Horsfield's *Hist. of Sussex*, vol. ii. p. 164; *Monum. Hist. Brit. Inscriptions*, No. 143. It is not noticed in the account of pigs in the *British Museum, Townley Gallery*, vol. ii. p. 285.

## NERO. Fourth Consulate. A.D. 60—68.

Pig of lead found August 11, 1783, on the verge of Broughton Brook, near Stockbridge, Hants, on the Houghton side of the stream. It was in the possession of Mr. Thomas South of Bossington. The first notice of the discovery was communicated to the *Gentleman's Magazine*, in that year, vol. xliii. part 2, p. 936, where the pig is figured. See also, vol. xlv. part 1, p. 85. It was conjectured that it had been deposited or lost whilst on the way to *Clausentum* for exportation. A Roman line of road passes very near the spot. It subsequently came into the possession of the late J. M. Elwes, Esq., of Bossington, by whom it was exhibited in the

Museum formed at the meeting of the Institute at Winchester, September, 1845. (Catalogue, p. xl.) In the Journal of the British Archæological Association, vol. v. p. 227,<sup>9</sup> it is figured, and the following description is given by Mr. C. Roach Smith. "It is inscribed on the top, in letters an inch in length, NERONIS · AVG · EX · KIAN · III · COS · BRIT'; on one side HVLPMCOS; on the other EX · ARGENT' and CAPASCAS, with the numerals xxx. This inscription is peculiarly interesting, as referring to the Cangi at an earlier date [than on the pigs of the time of Vespasian and Domitian] the name being spelt as pronounced, *Kiangi*, and just previous to the reverses of the Romans in Britain from the courage and skill of the heroic Boadicea. Nero was fourth time consul the year before; and this pig of lead would seem to have been on its way from the country of the Cangi towards the south, for exportation, composing probably part of the tribute, the harsh exaction of which was one of the causes of the insurrection." Mr. Roach Smith observes further, that BRIT' must be considered as referring to the metal or the province, and not intended for *Britannicus*, as on the pig with the name of Claudius, that title not having been assumed by Nero. The lateral marks are not to be satisfactorily explained, except EX · ARGENT' which may refer to the separation of the silver from the ore.

The weight is nearly 156 lbs. The upper or larger surface measures 24 inches by 5; the inscribed surface 21 inches by 3½; thickness 5 inches. There is a hole on one side for the insertion, as supposed, of some contrivance by which it might be lifted.

See Monum. Hist. Brit. Inscriptions, No. 134; Archæological Journal, vol. xi. p. 279; Wright's Celt, Roman, and Saxon, p. 237, where it is figured. It is stated that this pig has been recently removed from Bossington to Cheltenham.

VESPASIAN. Third Consulate. A.D. 74.

Pig of lead found September 29, 1838, in forming the Railway from Chester to Crewe, near Tarvin Bridge, in the township of Great Boughton, about a mile from Chester. It lay at a depth of seven feet from the surface, in a field across which there was a foot-path to Hoole, and about 150 yards from the north side of the road from Chester to London. The place is described as very near the Roman road from Chester to Manchester by Kilsall and Holme Street, and a short distance north of the garden where a Roman altar, dedicated by the twentieth legion to the Nymphs and Fountains, was discovered in 1821. The inscription is as follows:—

IMP · VESP · V :: T · IMP · III · COS.

On the side is inscribed DE · CEANGI. It measures 24 inches by 6 inches: the thickness being 4½ inches. The weight is 179 lbs. It was presented to the late Marquis of Westminster by Mr. A. Gardner, of Chester, to

<sup>9</sup> It is noticed also, *ibid.* vol. i. p. 326.



whose kindness I am indebted for the foregoing particulars. It is now preserved in the library at Eaton Hall. See Monum. Hist. Brit. Inscriptions, No. 135.

VESPASIAN. Fifth Consulate. A.D. 76.

A pig found on the Common at Hints, Staffordshire, near the Watling Street, about four miles from the spot where that Roman Way is traversed by the Rycknield Street, at Wall (*Etocetum*). In the Catalogue of the Rarities in the Lichfield Museum, collected by Richard Greene, taken September, 1782, the following account is given, p. 42: "A Pig of Lead, weight near one hundred and fifty pounds, on which, in raised letters, appear the names of Vespasian and of Titus Vespasian, Emperors of Rome. It was discovered in the year 1772, in digging for gravel on Hints Common, about four miles from Lichfield, and three quarters of a mile from the Watling Street Road, at the depth of four feet beneath the surface of the earth. Presented to the Museum by Ralph Floyer, Esq." On the dispersion of Mr. Greene's museum it came into the possession of the late Master of Clare Hall, Cambridge, the Rev. Dr. Webb, and on his decease in 1855, it was purchased by the Trustees of the British Museum. It measures  $22\frac{1}{2}$  inches, by  $5\frac{1}{2}$  inches; thickness, 4 inches; the weight is 152lbs. The inscription is shown by the woodcut; on the side is inscribed DE · CEANG. The territories of the *Ceangi*, or *Cangi*, and the Brigantes, as



Mr. C. Roach Smith has observed (Journal of the British Archæological Association, vol. v. p. 226), included Cheshire and Yorkshire, and in these counties, as well as in Derbyshire, the pigs stamped DE · CEANG. and BRIG. have been found.

See the notices of this pig in Gent. Mag., vol. xlii. p. 558; vol. xliii. p. 61; liii. p. 935; Shaw's Hist. of Staffordshire, Gen. Hist., vol. i. p. 35, and p. 331; Camden's Britannia, edit. Gough, 1806, vol. ii. p. 503; Pennant's Tour in Wales, vol. i. p. 55; Erdeswick's Survey, edit. Harwood, 1820, p. 320, where the discovery is said to have occurred in 1771; Monum. Hist. Brit. Inscriptions, No. 136.

VESPASIAN. Fifth Consulate. A.D. 76.

Camden, in his notices of Runcorn and Halton Castle (Britannia, edit. 1607, p. 463), records the discovery of twenty pigs on the coast of Cheshire, inscribed with the names of Vespasian and Domitian. On the latter occur the words DE · CEANG., and Camden, discussing the question of

<sup>1</sup> Mr. Greene, in his letter Oct. 17, 1772, Gent. Mag., vol. xlii. p. 558, where the pig above described is figured, speaks

of it as "found last winter in digging gravel." It was then in possession of Ralph Floyer, Esq. Weight, 150 lbs.

the locality occupied by the Cangi, inclined to place them in Cheshire, observing, "*Dum enim hæc recognovi, a fide dignis accepi viginti massas plumbeas hic in ipso littore erutas fuisse, forma oblongiori sed quadrata, in quarum superiori parte, in concavo hæc legitur inscriptio, IMP · DOMIT · AVG · GER · DE · CEANG. In aliis vero IMP · VESP · VII · T · IMP · V · COSS. Quod monumentum videatur erectum fuisse ob victoriam in Cangos.*" (Compare Gough's edit. 1806, vol. iii. pp. 45, 61.) Horsley, p. 316, cites these inscriptions, and concludes that the pigs in question were formerly at Halton Castle; but this does not clearly appear from Camden's statement. Pennant alludes to this discovery (*Tour in Wales*, vol. i. p. 57), and observes that the ore which produced this lead was dug and smelted, either in that part of Flintshire anciently called Tegangle, or the summer's residence of the Cangi, "or from the residence of the same people in Derbyshire or some neighbouring county."

DOMITIAN. A.D. 81—96.

Several pigs of lead found on the coast of Cheshire, according to the report given to Camden, as stated above. Of twenty pigs thus discovered, probably near Runcorn at the mouth of the Mersey, some, according to his account, were thus inscribed—

IMP · DOMIT · AVG · GER · DE  
CEANG.

Camd. Brit. edit. 1607, p. 463; Pennant's *Tour in Wales*, vol. i. p. 57.

DOMITIAN. Seventh Consulate. A.D. 81.

A pig of lead, one of two found in 1734, on the estate of Sir John Ingleby, Bart., on Hayshaw Moor, in the manor of Dacre, and about eight miles N.W. of Ripley, in the West Riding of Yorkshire. They are described as having been found standing upright, near each other, at a depth of about 18 inches. The place where the discovery occurred has sometimes been described as Hayshaw Bank, near Dacre Pasture.

On June 26, 1735, Dr. Knight communicated to the Society of Antiquaries a letter from Mr. Cooper, one of their members, giving an account of this discovery upon a barren moor near Ripley by a labourer, about Christmas in the previous year. He stated that the weight of one piece was 16 stone; that of the other, a little less. They remained in possession of Mr. Ingleby, son of Sir John Ingleby, of Ripley. On Nov. 20, 1735, Vertue brought a drawing of the inscriptions, which were copied into the Book of Minutes.

Another communication on the subject, written by the Rev. S. Kirkshaw



to Mr. W. Sloane, and dated from Ripley, December 15, 1735, has been printed in the *Philos. Trans.*, vol. xli. p. 560. It is there related that the pigs were found "in January last," by a countryman, whose horse's foot slipping into a hole covered with ling, he dismounted, and thrusting his stick into the hole, he found the two pieces of metal, described as standing upright near each other, about 2 feet deep. One of these pigs is figured, *ibid.* tab. 11. Mr. Kirkshaw relates also the story which he heard from a countryman regarding a cavity on a rock about half a mile distant, which might have served for casting such pigs. On January 31, 1754, Mr. Henry Smart Stevens communicated to the Royal Society a drawing of the two pigs, with a note of the discovery, which, according to that account, occurred in February, 1734; the weight of each piece was 156 lbs.<sup>2</sup>

In 1756, a memoir was read by Professor Ward, and printed with an engraving in the *Philosophical Transactions*, vol. xlix, p. 694. It is entitled "Considerations on a draught of two large pieces of lead, with Roman inscriptions upon them, found several years since in Yorkshire," in which he gives some remarks on the method of smelting, and other matters relating to Roman metallurgy.

One of these pigs was bequeathed to the British Museum by Sir John Ingleby, Bart., in 1772. Length,  $23\frac{1}{4}$  in.; width,  $5\frac{3}{4}$  in.; weight, 156 lbs. It is inscribed—IMP · CAES · DOMITIANO · AVG · COS · VII.



Pig of Lead found at Hayshaw Moor. British Museum.

See *Archæologia*, vol. v. p. 370; *Townley Gallery*, vol. ii. p. 287, where this pig is figured.<sup>3</sup>

#### DOMITIAN. Seventh Consulate. A.D. 81.

The second pig found with that last described, is now in the possession of the Rev. H. J. Ingleby, at Ripley Castle. Pennant, in the observations on Roman metallurgy, in his *Tour in Wales*, written about 1773, states that he saw it at Ripley, and he gives a representation of that pig, vol. i., pl. ix. p. 57. The inscription upon the upper surface is the same as that given above; on one side appear the letters BRIG., signifying, as Pennant suggested, that it came from the country of the Brigantes.

The great Roman road from Aldborough into Lancashire passes, as Gough remarks in his additions to Camden's *Britannia*, within a short distance of the spot where these pigs were found. "There had been no

<sup>2</sup> According to Gough one weighed 11 stone 2 lb. = 156 lb.; the other a pound less.

<sup>3</sup> A cast from the pig in the British Museum was exhibited by Mr. C. Newton in the Museum during the meeting of

the Institute at York in 1846.—Catalogue, *Transactions of the York Meeting*, p. 9. The cast was presented by the Institute to the Museum of the Yorkshire Philosophical Society.

lead mines within some miles of it, but there is said to be on the top of a large rock about half a mile distance, an impression or cavity of the size of these pigs, large enough to admit a melting-pan. Lead is now got at Green, two miles from the spot." Camden, edit. Gough, 1806, vol. iii. p. 293.

Professor Phillips notices these pigs in his "Rivers, Mountains, and Sea-coast of Yorkshire," p. 72, and considers them to have been produced from the mines of Greenhow Hill, in the township of Dacre and parish of Ripon, worked by the Romans, and probably by the British tribes before the Romans. He describes a most interesting cave opened in the course of lead-mining at Greenhow Hill, and which he reached, in 1825, by a miner's climbing shaft.

DOMITIAN (?). A.D. 81—96.

A pig of lead found, about 1849, with Roman remains near Common Hall Street, Chester. It was imbedded in a wall at the depth of about 4 feet. The upper surface is unfortunately so much damaged by oxidation that it is impracticable to ascertain what the inscription had been. It is stated by Mr. C. Roach Smith, in the *Journal of the British Arch. Assoc.* vol. v. p. 226, where it is figured, that "it was most probably inscribed to Domitian." It was presented to the Chester Archæological Society by Mr. Baylis, City Surveyor, and by the Mayor of Chester, simultaneously, in the belief that it was public and not private property. It was exhibited by that Society in the museum formed at the meeting of the Institute in Chester, July, 1857. The following letters of the inscription may be deciphered; CAESARI :: :: :: VADON.

Weight about 168lb. The inscribed surface measures 20½ inches by 4 inches.

HADRIAN. A.D. 117—138.

A pig of lead found in April, 1777, on Cromford Nether Moor, in the parish of Wirksworth, near Matlock, Derbyshire, and first described by Pegge in a communication to the Society of Antiquaries, 1778, printed in the *Archæologia*, vol. v. p. 369. It was then in the possession of Peter Nightingale, Esq., of Lea, by whom it was presented to the British Museum in April, 1797. Pegge read the concluding letters MEI · LVI · supposing the three first to be for MEM, and he explained the whole inscription thus, *Imperatoris Caesaris Hadriani Memoriae Legio Sexta*. According to another interpretation MEI was intended for MET, and the letters following were numerals, denoting the number of the pig. The inscription is, however, undoubtedly IMP · CAES · HADRIANI · AVG · MET · LVT · (See woodcut). Weight, 127 lb.; length, 22 in.; width, 5 inches and two-tenths.



Pig of Lead found on Cromford Moor. British Museum.

This pig has been figured in Lysons' *Derbyshire*, p. ccvi., where it

is observed that various erroneous conjectures had been formed regarding this and other inscriptions, especially the letters LVT • which, according to Lysons, is unquestionably a contraction of *Lutudarum*, the Roman station mentioned by Ravennas next to *Derventio*, and supposed to have been at Chesterfield. The inscription may therefore be read, *Imperatoris Cæsaris Hadriani Augusti metallum Lutudarense*. Sir Henry Ellis (Townley Gallery, vol. ii., p. 290), adopts this reading; whilst Mr. Thomas Wright is of opinion that MET • LVT • undoubtedly signifies *metallum lutum*, or washed, in reference to the process through which the metal had passed (Celt, Roman, and Saxon, p. 238).

See also Camden's *Britannia*, edit. Gough, 1806, vol. ii. p. 433; Monum. Hist. Brit. Inscriptions, No. 140; Bateman's *Antiquities of Derbyshire*, p. 134.

#### HADRIAN. A.D. 117—138.

A pig of lead found about 1796 on a farm called Snailbeach, in the parish of Westbury, Shropshire, about ten miles from Shrewsbury, and on the confines of Montgomeryshire. It was deposited in the British Museum by John Lloyd, Esq., in March, 1798. The following memorandum is preserved in the Department of Antiquities. "This pig of lead was in the year 1796 or 1797 found on a farm called Snailbeach, in the chapelry of Minsterley, in the parish of Westbury, 10 miles SW. of Salop, belonging to the Marquis of Bath, now in lease to the Snailbeach Company. This mine has been worked time immemorial, and produced great quantities of lead, the present company having expended above £60,000 on the said works; and presented this pig to Mr. Lloyd, who is one of the partners; and which he requests the Trustees of the British Museum to accept. January 25, 1798." The inscription is simply IMP • HADRIANI • AVG.



Pig of Lead found at Westbury, Salop. British Museum.

Weight, 193 lbs.; length, 22 in.; width, 7 in.; upper surface, 19 in. by  $3\frac{1}{2}$  in.

See Townley Gallery, vol. ii. p. 291, where this pig is figured with a transverse section; <sup>4</sup> Monum. Hist. Brit. Inscriptions, No. 139; Bagshaw's *Hist. of Shropshire*, under Minsterley.

#### HADRIAN. A.D. 117—138.

A pig of lead found, about 1767, in the supposed Roman workings on the western face of Shelve Hill, in the parish of that name, under the Stiperstones, about seven miles N. of Bishops Castle, Salop; these ancient lead-works are known as the White Grit Mine. The excavations towards

<sup>4</sup> The weight is there stated to be 191 lbs. For the precise weights of all the pigs of lead in the British Museum, as

recently taken, I am indebted to Mr. A. W. Franks.

the top of the hill have formed vast caverns, now choked up with *debris*, among which Roman relics have been found at various times. In these excavations, above the modern Gravel Mine, the pig is believed to have been found. It is now at Linley Hall, Bishops Castle, the seat of the Rev. T. F. More, by whom it was exhibited in the Temporary Museum at the Meeting of the Institute at Shrewsbury, in 1856, with two spades of oak, stated to have been found in the Roman workings. The inscription is simply IMP · HADRIANI · AVG. Weight 190 lbs. 6 oz. Length,  $22\frac{1}{4}$  inches, width,  $7\frac{1}{4}$  inches; length of the inscribed surface  $19\frac{1}{2}$  inches. On the margin round the inscription are twice impressed the letters WINP, which have been supposed to signify *Quinquevirorum jussu notatum plumbum*.

See also Monum. Hist. Brit. Inscriptions, No. 139; Gent. Mag. vol. lvi. part 2, p. 924, where the pig is figured; Sir R. Murchison's Silurian System, p. 279.<sup>5</sup>

#### HADRIAN. A.D. 117—138.

A pig of lead found about 1775 (?), near Aston Farm-house, on the ancient line of road from Shrewsbury to Montgomery by Westbury. It was formerly in the possession of the late Mr. Probert, at Copthorn, about two miles from Shrewsbury on that road. I am indebted to the kindness of the Rev. T. F. More, of Linley Hall, for the communication of a letter from Mr. Isaac Frowd to R. B. More, Esq., dated Bishops Castle, October 9, 1827, informing him that the sale of the late Mr. Probert's Museum at Copthorn was fixed for October 15, and that there was in the collection a pig of lead, marked with the name of Hadrian, and probably from Mr. More's lead mines, or some other workings near them. Mr. Frowd gave the following particulars:—"The history of this antique piece of lead you have perhaps often heard from your late much respected father; if so, I hope you will excuse my present repetition of it. Before I came to Bishops Castle fifty years ago, this pig of lead was bought of Mr. Richard Williams, glazier, of this town, and sold by him to the Rev. Mr. Gifford, who then resided in Derbyshire, and who, having an estate at Mainstone, came here and luckily saw it in R. W.'s shop. Mr. Probert, having a very profitable share in your valuable lead mine, obtained it from Mr. Gifford, and now you will apply for it, I hope, and obtain it. Being found in your neighbourhood you ought to possess it, and add it to the tools of the Romans, which you showed me last autumn. It was found near Aston Farm-house, on the Roman road leading from Elland's turnpike-house, which stands on it, to the Gaer, near the Severn. That farm, fifty years ago, belonged to Mr. Thomas, of the Welch Street, Bishops Castle, from whose son it went to his widow, now married to Col. Witney, of Herefordshire. At Pentre-Cwm, near the Pentre, was a smelting-place of the Romans, where perhaps this pig was smelted." I have been unable to trace where this pig is now to be found; it was reported to me by Mr. Bowers, of Shrewsbury, that it was purchased, as he believed, by the late Bishop Butler, at Mr. Probert's sale: and he described it as rather smaller than Mr. More's pig, and bearing the legionary stamp, LEG. XX. I have not found evidence to verify this account.

<sup>5</sup> See also Mr. T. Wright's account of ancient mines in the neighbourhood.—Linley, its Roman remains, and of the Illustrated London News, Oct. 4, 1856.

## HADRIAN. A.D. 117—138.

A pig of lead found in May, 1851, about 3 feet deep in draining a field in the parish of Snead, Shropshire, below a large entrenchment called The Roveries, about a mile west of Linley Hall,  $2\frac{1}{2}$  miles south of Church Stoke, and  $4\frac{1}{2}$  south-east of Montgomery. It was found, as communicated by Mr. J. Cove Jones to the Society of Antiquaries, on January 29, 1852 (see *Proceedings*, vol. ii. p. 205), on the estate of Philip Morris, Esq., of the Hurst near Clun, in whose possession it remained until 1856, when it was obtained by Mr. Thomas Wright for the Museum of Mr. Joseph Mayer, F.S.A., at Liverpool, and it is now there preserved. It is precisely similar to that above described, found at Shelve and in possession of the Rev. T. F. More, of Linley Hall, near Bishops Castle, and may have been cast, very probably, in the same mould. The inscription is identical, IMP · HADRIANI · AVG. This pig is noticed by Mr. Wright, in his account of the Roman lead mines in Shropshire, *Illustrated London News*, Oct. 5, 1856. Weight, 190 lbs. Length, a little more than 2 feet.

## HADRIAN. A.D. 117—138.

A pig of lead found about 1822 at Bath, near Sydney Buildings, on the S.W. side of Sydney Gardens, in the course of works under the direction of Mr. Goodridge, Architect, of Bath, by whom it was deposited in the Bath Literary and Scientific Institution. The inscription is the same as on the pigs before-described, IMP · HADRIANI · AVG. The Rev. H. M. Scarth, in a *Memoir on Roman Remains in Bath*, published in the *Proceedings of the Somerset Archæological Society*, 1852, p. 108, remarks that this pig may very probably have been smelted at the mines on the Mendip Hills. An ancient key, now in the Museum of the Bath Institution, was found with the pig. Mr. Hunter, in a letter to Mr. Markland, Director of the Society of Antiquaries, in 1827, regarding Roman inscriptions found at Bath, observes that in the collection of the Bath Institution such a pig existed, "which was found near the site of Sydney Place, in 1809." (*Archæologia*, vol. xxii. p. 421.) The discrepancy in date is doubtless only a typographical error.

Weight, 1 cwt. 83lbs. The Rev. W. Phelps notices it in his *History of Somerset*, vol. i p. 161, as found in 1822 near Sydney Buildings, but he inadvertently gives the weight as 83lbs. only. See also *Journal Brit. Arch. Assoc.*, vol. v. p. 228.

## ANTONINUS AND VERUS. A.D. 163—169.

A pig of lead found early in the last century at Bruton, Somerset. Stukeley, in his *Itinerarium Curiosum*, p. 151, Iter vi., dated 1723, gives the following account of the discovery. "At Long-Leat, in my Lord Weymouth's library, is a piece of lead weighing fifty pound, one foot nine inches long, two inches thick, three and a half broad, found in the Lord Fitzharding's grounds near Bruton in Somersetshire, and was discovered by digging a hole to set a gate-post in: upon it this memorable inscription, which I suppose was some trophy; communicated by Lord Winchelsea."



IMP DVOR AVG ANTONINI  
ET VERI ARMENIACORVM.

See also Stukeley's *Carausius*, i. p. 167. Horsley, in 1732, engraves it among his *Inscriptions in Somerset*, No. 10, p. 328, adding nothing to Stukeley's account. Professor Ward, in 1756, states, that upon enquiry he could not find that it was at Longleat at that time; but in a note he observes that he had received Lord Winchelsea's account from Stukeley. *Philos. Trans.* xlix. p. 699. In Gough's edition of Camden's *Britannia*, vol. i. p. 104, edit. 1806, it is stated that this pig came into the possession of Heneage, Earl of Winchelsea, who gave it to Mr. Creyke, of whose sister Mr. Duane bought it. Collinson, in his *History of Somerset*, vol. i. p. 216, mentions the discovery as having occurred about the beginning of the last century, and cites Stukeley's account; as does also the Rev. W. Phelps, in his *History*, vol. i. p. 178, with the statement, which I believe to be a mere error by an unwary copyist, that the pig is preserved in the library of the Marquis of Bath at Longleat.

*Monumenta Hist. Brit. Inscriptions*, No. 141.

A pig of lead bearing no Imperial name; it is inscribed with the name of *Lucius Aruconius Verecundus*, either a governor of a province, as it has been supposed, a procurator, or some person appointed to superintend mines in Britain.

It was found upon Matlock Moor, Derbyshire, shortly before Oct. 1783, in "ridding" a piece of ground near Matlock Bank, in the course of an inclosure of common lands there. The pig lay at a depth of a few inches only, covered by a large stone. Close to the spot there was a "bole," or place marked by heaps of rubbish and a hearth of flat stones, where, in ancient times, before smelting mills were constructed, lead ores were smelted. It was thought probable that the pig had been run or cast there, and it appeared to have been run at different times in nine or ten layers. Pennant notices such ancient slag hearths as frequent in Flintshire, and regards them as traces of the process used by the Britons. *Tour in Wales*, vol. i. p. 58. On the surface of the pig there appeared numerous small particles of brass mixed with the lead, which have not been noticed in other instances. It was sold by the finders to a clock-maker at Matlock, from whom it was purchased by Mr. Adam Wolley of that town, and by him presented to the British Museum in April, 1797. The inscription has been read (*in extenso*) as follows, *Lucii Aruconii Verecundi metallum Lutudarense*. The last word has occasioned considerable discussion. Pegge, by whom this pig was first described (*Archæologia*, vol. vii. p. 170), decyphered the concluding letters LVND, and proposed the reading *Metallici* or *Metallarii Londinensis*, i.e., lead merchant of London, the farmer, possibly, or undertaker, of the lead-works at Matlock. Pegge closes his memoir with a postscript, "It were ardently to be wished that the Roman pigs of lead were all lodged together in the British Museum."





Pig of Lead found on Matlock Moor. British Museum.

Lysons has engraved this pig, and also the inscription on a larger scale, in his *History of Derbyshire*, p. ccvi., and has pointed out that *LVTVD* is unquestionably, according to his opinion, a contraction of *Lutudarum*, supposed to be the Roman station, mentioned in *Ravennas*, as already stated in the notice of one of the pigs of the time of Hadrian.

Weight 83lbs.<sup>6</sup> Length  $20\frac{1}{2}$  inches; width  $4\frac{1}{4}$  inches; inscribed surface  $17\frac{1}{2}$  inches by  $3\frac{3}{8}$  inches. This is the lightest Roman pig hitherto found.

See also Camden's *Britannia*, edit. Gough, 1806, vol. ii., p. 423; *Monum. Hist. Brit. Inscriptions*, No. 144; Sir H. Ellis's account in *Townley Gallery*, vol. ii. p. 228; Glover's *Derbyshire*, vol. i. pp. 71, 72; Bateman's *Antiquities of Derbyshire*, p. 134.

A pig of lead bearing no imperial name, but inscribed *C · IVL · PROTI ·* was found in 1848, in Hexgrave Park, about six miles from Mansfield, Nottinghamshire, in or near an ancient encampment. It is now in the possession of Richard Milward, Esq., of Thurgarton Priory, Notts. Mr. Roach Smith has noticed it, *Journal Brit. Arch. Assoc.* vol. v. p. 228.<sup>7</sup> He is disposed to adopt the explanation that the letters *LVT*· signify, as before mentioned, *lutum* or *luitum*, washed or purified metal, a reading confirmed by a passage in Pliny's *Nat. Hist.* lib. xxxiv. c. 16, where the word *elutia* is stated to be applied to tin found in the gold mines of Spain and Portugal, as designating its being washed from the vein by water. The inscription reads as follows:—*C · IVL · PROTI · BRIT · LVT · EX · ARG*· Between the words are introduced heart-shaped stops, possibly intended to represent leaves. Weight, 184lbs. Length of the inscribed surface  $19\frac{3}{4}$  inches; width  $3\frac{5}{8}$  inches. The letters measure an inch in length. A cast from this pig may be seen in the Museum of Practical Geology.

A pig of lead was found, as it is stated, at Castleton, Derbyshire, upon which the letters *IMP*· only could be decyphered. Mr. Mawe, according to information cited by Professor Phillips (*Proceedings of the Yorkshire Philosophical Society*, for March, 1848), described it as having been preserved in the Museum of Mr. Greene, at Lichfield. No mention, however, is found of this relic in the Catalogue of that Collection printed by him; it is not noticed by Lysons, nor in Bateman's *Antiquities of Derbyshire*.

A pig of lead was found in 1774, in or near a Roman entrenchment, on the North bank of the river Almond, Perthshire, near its confluence with the Tay. There appears to have existed there, as noticed by Maitland (*Hist. of Scot.* i. 198, written about 1750), a Roman station or camp on a rising ground, subsequently washed away by encroachments of the river. Many Roman vestiges and interments were thus brought to light, especially a large urn, described as lined with bronze; notice having thus been called

<sup>6</sup> Pegge states the weight to be 84 lbs.

*Brit. Arch. Assoc.*, vol. viii. p. 55;

<sup>7</sup> This pig is noticed also, *Journal*

Wright's *Celt, Roman, and Saxon*, p. 238.

to the site, certain semicircular pillars, as they were described, were observed in the perishing bank, extending from its summit down to the bed of the river. The mould forming these pillars, eight in number, was black, contrasting with the reddish colour of the bank. They were about 18 ft. in height, and 10 ft. apart; at the bottom of each one or more urns were found, which led to the supposition that the so-called pillars were of sepulchral character. These had, however, evidently been shafts, resembling in their character the remarkable rubbish-pits, or *favissæ*, of which examples have repeatedly occurred near sites of Roman occupation, as noticed in the *Archæologia*, vol. xxxii. p. 451, and in this *Journal*, vol. viii. p. 95, vol. xii. p. 111. After the winter floods in 1774, some gentlemen from Perth whilst exploring these singular remains found a large amphora, or urn, resting on a flanged tile, and near it lay decayed portions of a helmet and spear nearly consumed by rust. Beneath was found an "oblong bar of lead," 73lbs. in weight, on one side of which were these marks— $\text{X} \text{ J. } \text{xxxx}$ , probably indicating its weight. This pig does not appear to have been preserved. See "the Muses Threnodie," edited by Cant, pp. 21, 25, Perth, 1774, cited by Stuart in the *Caledonia Romana*, p. 206; Wilson's *Prehist. Annals*, p. 392. Stuart considers it probable that this station may have been the *Orrea* of Richard of Cirencester.

Another pig of lead was found at Kirkintulloch, Dumbartonshire, on the line of the Barrier of Antoninus, between the Forth and the Clyde. Stuart, *Caledonia Romana*, pp. 207, 323, relates that whilst Mr. Stewart of Peel, Kirkintulloch, a station on the Barrier of Antoninus Pius, was engaged some years ago in levelling part of the Station, of which he was the proprietor, he found considerable remains of buildings, and among them "a bar of lead, marked with some Roman characters, not sufficiently legible (says Stuart) to enable us to present the reader with a copy; but probably, like those which appeared on the block discovered at the mouth of the Almond, intended to indicate the weight of the metal, or bearing reference to some imperial tax." I am indebted to Mr. John Buchanan of Glasgow, a careful investigator of Roman vestiges in North Britain, for the information that the mark seen by him in 1826, was CCLXX., on the centre of the bar. The pig measured about 24 in. by 6 in., and had been sawn asunder by Mr. Stewart in expectation of finding a core of gold.

Three pigs of lead were found at Saham, Norfolk: no record is preserved of any inscription. Mr. Woodward, in his *Descriptive Outline of Roman remains in Norfolk*, communicated to the Society of Antiquaries in 1830, states that in the parish of Saham, near the supposed line of Roman road leading westwards from Norwich, "in removing Saham wood, some years ago, three pigs of Roman lead were discovered, and sold to the village plumber." *Archæologia*, vol. xxiii. p. 369. I am indebted to the Rev. W. H. Parker, Rector of Saham, for recent information confirming this statement. The pigs, as he states, were found about forty years ago; they were purchased by a plumber named Pitts, now deceased.

Mr. Bateman, in his *Vestiges of the Antiquities of Derbyshire*, p. 135, after noticing the examples found near Matlock, observes that "besides these inscribed pigs of lead, others of a similar form, without the important accompaniment of a legend, have been discovered in the neighbourhood of Wirksworth. From the similarity of shape, the presumption is strongly in favour of their Roman origin." Again, p. 159, Mr. Bateman enumerates Roman coins and relics, found upon Oker Hill, near Darley-in-the-Dale,

adding that "in 1846, a pig of lead of the Roman shape was dug up near some ancient mineral works on the Hill."

A pig of lead was found, July 31, 1849, outside the walls of Flint Castle, supposed to be coeval with the building, and brought for fastening iron clamps in the foundation stones. It appears to have been cast in a clay mould, the impression of the moulder's finger-marks being visible on the lower part. It is a very rude casting as compared with the Roman pigs. *Journal Brit. Arch. Assoc.*, vol. v. p. 297.

Mr. Franks has informed me of the recent discovery of a Cake of lead, of irregularly oval form, 7 inches by 4, apparently cast in a roughly dished cavity on a piece of stone. It was found, as it is believed, in the Thames, near Battersea Bridge.<sup>8</sup> The weight is nearly 44 oz. On the upper surface are impressions of two stamps; one of them, twice impressed, appears to read SYAGR, the R being reversed; the other is remarkable, being the monogram of the name of Our Lord, composed of the Greek letters Chi (reversed) and Rho, surrounded by letters, of which the following are legible.—SPES. The sixth letter was probably an s, but it is now very indistinct. These impressions (here figured) were formed with stamps in intaglio, like seals: the letters on the lead are in relief. The occurrence of the Christian monogram is a feature of considerable interest: it has hitherto been noticed twice only, in connection with remains assigned to the Roman period in Britain, one of these being a silver cup found at Corbridge, Northumberland, and hitherto unpublished; the other the fine mosaic floor excavated by Lysons, at Frampton, Dorset, in which the Greek monogram of the Saviour's name is



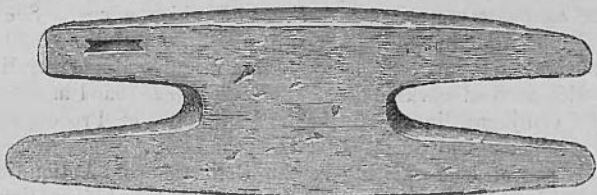
found strangely combined with the head of Neptune and subjects of Pagan mythology. It must be admitted that the Roman character of the *massa plumbi* found in the Thames cannot be considered as established.

In connection with the foregoing notices of the relics of early metallurgy in Britain, it may not be irrelevant to record the few facts which have fallen under our observation regarding any block or pig of tin found in the British Islands. In the neighbourhood of Penzance, there appears to have existed formerly a mould for such objects, as it is described by a writer "On the Study of Antiquities" in 1791, whose letter appears in the *Gent. Mag.*, vol. lxi. part i. p. 34. He there states that he had recently

<sup>8</sup> Mr. Bateman, in his collection of Antiquities of Derbyshire, has specimens of circular or oval cakes of lead apparently smelted by wood fires, and cast in a simple depression in the earth. They precisely resemble in form that above described, being flat on one side and convex on the other. One was found

at Cromford, May, 1848; another, weighing 25 lbs., on Eyam Moor, in 1849. In the Museum of Practical Geology in Jermyn Street, may be seen an oval cake of tin similar in form and dimensions to the leaden cake above described, found in the Thames.

visited a gentleman in that locality, who possessed "among other things a mould by which the blocks of tin used to be cast, in the times when the Phœnicians traded to Britain for tin." Unfortunately, no account is given of the form or dimensions of the mould, the writer's attention having apparently been diverted by finding in Mr. Price's cabinet a gold crescent found near Penzance, and supposed to have been worn by the Druids when cutting mistletoe. The most remarkable specimen of ancient tin discovered in Britain is the double pig, here figured; it was dredged up in Falmouth Harbour about 1810 (?), and it is now preserved in the Truro Museum.



The dimensions are, length 2 ft. 11 in.; width 11 in.; width of the solid portion between the two forked openings  $10\frac{3}{4}$  inches. A piece has been cut off at one end, and near that part there is an impressed bifurcate mark, 3 inches long,  $\frac{3}{4}$  wide, and  $\frac{1}{4}$  deep, which has been regarded by some persons as a miniature representation or symbol of the double pig itself. The weight of the block, which is very ponderous, has not been ascertained. It was found in dredging for sand, between Pendinas and St. Mawes. A notice of this remarkable relic is given by Sir Gardner Wilkinson in his notes on Rawlinson's translation of Herodotus recently published, vol. ii. Another remarkable relic of ancient metallurgy is to be seen in the Truro Museum, a portion apparently of a pig or block of tin; it was found at Carnanton in the parish of Mawgan-in-Pyder, Cornwall, near the ruins of a "Jews' House," as certain ancient smelting works are termed in that county. It measures 20 inches in length; width, 9 inches; thickness, 3 inches: one side being convex, taking the form of the mould, the other is flat. (See woodcut.) The type of an ingot, thus pointed at its extremities, is not without precedent;



it is probable that the obtusely pointed fragment of bronze found about 1849 in the old workings at the Ormes Head, Llandudno, with stone mauls, and presented by the Hon. W. O. Stanley to the British Museum, was a portion of such an ingot. There is a perfect ingot of bronze, from the Bahr Collection, in the British Museum, it was found in Livonia, and terminates in this pointed fashion: it measures about 15 inches in length. In the Exhibition in Hyde Park, 1851, a block of tin was produced, thus described:—"A rude smelted block of tin, supplied by Mr. G. N. Simmons, found in Ladock, near Truro, and supposed to have been smelted when the Phœnicians traded to Cornwall for tin." Mineral Products, No. 468. A Florentine writer of the fourteenth century writes of the export of tin in ong square slabs. Geol. Trans. Cornw., vol. iii. p. 129.

Several Roman pigs of lead have been discovered on the Continent. Mr. James Yates has kindly informed me of the existence of one at Châlons-sur-Saône, inscribed with the name of Septimus Severus; this "*saumon*," as objects of this kind are termed in France, has been figured in the Memoirs of the Historical Society of Châlons, tome iii. pl. xi. Another, found at Lillebonne, is preserved in the Museum at Rouen, and a third at Vieil-Evreux. They are described by the Abbé Cochet in a memoir in the Revue Archeologique, Dec. 1856, p. 548, entitled,—"*Note sur le commerce et l'Industrie du Plomb dans la Gaule et la Grande Bretagne, à l'Epoque Romaine*," in which the learned author expresses the opinion that these *saumons* may be from the Shropshire mines. See also De Caumont, Bulletin Monumental, vol. xxii. p. 409. A full account of these relics of ancient metallurgy will be found in a valuable Memoir by Mr. James Yates, on Roman lead-workings, and the pigs of lead found in Great Britain and on the continent, in the forthcoming volume of Proceedings of the Somerset Archæological Society, for the year 1858.

The only pig of lead existing in the Collection of Antiquities at the Bibliothèque Imperiale at Paris, according to the information of M. Lenormand, communicated to me by Mr. Charles Newton, is one found in Spain, and thus inscribed—M · P · ROSCIEIS · M · F · MAIC. This inscription is identical with that on a pig of lead found at Carthagera, and presented to the British Museum by Lord Palmerston, about 1849. The weight of this last is 52lbs; the form of these specimens is peculiar, being semi-cylindrical; the ends are cut off at right angles, the letters of the inscription are in relief, in a deep hollow on the curved surface. Mr. Newton suggests the following reading *in extenso*.—*Marcus Publius Roscius Marci filius Mæcia [tribu]*. A similar pig is to be seen in the Museum of Practical Geology in London, and two others are preserved in the Museum at Carthagera.

The inscribed relics of other metals of the Roman period, found in the British Islands, may in conclusion be briefly enumerated. The rude cake of copper found at Caer hen, the ancient *Conarium*, four miles from Conway, and inscribed SOCIO ROMÆ, stamped also NATSOL. in small letters, obliquely across that inscription, is still at Mostyn. (Pennant's Tour in Wales, vol. i. p. 63, pl. ix.) It weighs 42 pounds, and measures 11 inches in diameter. The ingot of silver found in 1777 in the Tower of London with coins of Arcadius and Honorius (A.D. 383—423), and inscribed EX OFFE HONORINI,<sup>9</sup> is preserved in the British Museum, where may also be seen the most remarkable relics of their class, the silver ingots found near Coleraine with a large hoard of silver Roman coins. One of these ingots bears the inscriptions CVR MISSI and EX OF. PATRICII. The discovery has been fully noticed in this Journal, vol. xi. p. 283, and in the Ulster Journal of Archæology, vol. ii. p. 182, and it deserves especial notice, not less on account of the very rare occurrence of any Roman relic in Ireland, than in regard to the variety and amount of the bullion and coins discovered; the coins numbering not less than 1506, from Constantius II. to Constantius III., including fourteen emperors. The entire deposit weighed upwards of 200 oz. of silver, and was unaccompanied by any object of less precious metal.

ALBERT WAY.

<sup>9</sup> Archæologia, vol. v. p. 292, pl. 25; Archæol. Journ., vol. xi. p. 409; Monum. Hist. Brit. Inscriptions, No. 144 a.