

Volume 4

(1st of series of 23)

November 13th 1887 to May 29th 1889

Benjamin Harrison, who during his life was known affectionately as 'Ben' by many friends and acquaintances, is referred to here throughout as 'BH'. His son, Edward Harrison, who adds comments and corrects dates in this and the remaining 22 volumes, is referred to as 'EH'. Sir Joseph Prestwich, who had a prodigious correspondence with BH, is referred to as 'JP'.

The first, unnumbered, page relates to the 'recent conference at Oxford Dec 2 1887' and is signed, Sir W. Houldsworth [in BH's hand]. This little aphorism is one in which a Doctor, unable to diagnose a condition, prescribes medicine, which he acknowledges will have a dramatically negative effect on the patient (fits). This action is compared to the political actions of the Conservative government on the country, with similar negative consequences.

A letter from Darwin to Herbert. 'By the way you rank any Natural History labours far too high. I am unworthy more than a lion's powder. I don't feel at all sure they will not growl and finally destroy me'. This quote comes from p. 24 Volume 1 of Darwin's *Life*. [This and subsequent references are to F. Darwin, *The Life and Letters of Charles Darwin, including an Autobiographical Chapter*, published by Murray as 3 volumes in 1887.]

Page unnumbered. 'Book 4' is written in pencil in right hand corner. 'J. Evans, Athenaeum Club Hemel Hempstead'. Notes to insert'. 'Find above Ailden's' [this is probably the house or farm belonging to said person]. 'White specimen, Oldbury 500'. 'Hickmott's [a person] Malling finds-brickearth side-scraper and point, Child's Bridge section'. 'White flint spread. Cop Hill, Buley Warren, depression 400, bottom of plantation, Vyses field, Sheet Hill' [Vyse is a person]. 'Above Basted and Crouch above Bourne [the Bourne is the river fed by The Shode, in the gravels of which many stone tools were found by BH], Old Sore [also spelt Soar] and Breadfield and capping hill Cul...? at 500 or about near spring vents'.

An entry entitled 'Clay with Flints' relates to Darwin's *Life* p. 391 Vol 1

(in 1854) in which a section relates to this feature of the North Downs. 'There was a meeting lately at the Geological Society, at which JP (judging from what R. Jones told me) brought forward your exact theory that the whole red clay and flints over the chalk plateau hereabouts is the residue from the slow dissolution of the chalk.' Below this is written: 'Letter to Lyell'.

Page unnumbered. 'Earth's Sculptures; or the Gutter Theory... as I venture to call it Duke of Argyle in nature'. October 27th 1887. The poetry used here imitates Shakespeare, improved by Dr Green! [It is about the two opposing geological theories of the earth's formation, volcanism and plutonism]. The final two lines are penned vertically at the bottom of the next page with another date of November 8th 1887 written below *Pall Mall* [a popular Victorian journal]

Page unnumbered. Headed 'Geological Notes to Oct 11 1887'. In red ink 'Snow in October 87. October 11-12'. There follows a description of this phenomenon.

Sunday October 30th 1887. 'A terrific gale... tree blown down in Busty Lane and fell across telegraph wires and snapped them'. Account of a walk with Mr Druery [A well-known 19th century fern expert] and his wife and return home with 'the sun setting in splendour... and the moon rising in the east at the same time'. During the long walk they spoke with Mr Body.

November 6th. 1887. Account of a walk to Maplescombe with H. Beadle via St Clere. Describes a heavily berried Spindle tree.

P.3. Continued from previous page. Finds many white flakes at the 400 OD [Ordnance Datum] line. Meets a gamekeeper, to whom the object of their search is explained, he in return recounts the unearthing of a stone axe close to the so-called 'Druidical Circle' [possibly the Coldrum]. Rain followed their return home.

Another copied letter, this time: 'Darwin to Henslow'. Dated March 1834' it goes: 'I am quite charmed with geology, but like the animal between two bundles of hay I do not know which I like best...' and so on in this vein. The presence of fossils in soft rocks as opposed to crystalline rocks is noted.

'Dr Evans on Unwasted land surfaces' A quote from a [?] lecture given by J. Evans at the Royal Society of Antiquaries 1860.

P.4. Undated entry entitled 'On the weathering of flints', by JP. The section pertaining to staining and colouring of flints is underlined 'Thus in siliceous and chalky sand... in ochreous sand, especially if argillaceous, they stain yellow whilst in ferruginous sands and clays they assume a brown colour'. [The two pages of narrative are quite clearly written, which may suggest the importance of the content for BH].

P.5. Sunday November 13th 1887. 'Home all day'. November 20 1887 'heavy rain...found Mr Bevington astir long chat...'

'27 1887'. A visit, by train to Mr Crawshay. 'Crawshay's at 9.30 stayed till 12.30. Very pleasant time in examining his collection of fossils and antiquities and then, later on to see the orchids, 3 houses full... . Very pleasant visit'.

Sunday December 4th 1887. An entry detailing a long walk with Agnes [one of his two daughters] and Ted [his eldest surviving son] via Oldbury and on to 'the Bucks Head'. Met Mr John Knight for a chat and was home by 1.15.

An undated account of information gained, whilst out on a walk with John Hale, regarding a Mr Hudson and his manorial purchase. Clearly a man gently mocked for his social pretensions.

Wednesday December 7th. 1887. Record of a train journey via Sevenoaks to Westerham on a frosty winter's day. Managed a quick fieldwalk near the Hollies. Despite the hailstorm, Mr Bell [I assume this must be Montgomery Bell] accompanied BH to the station. Somehow meets and chats with Mr Bevington and arrives home by 5.30.

P.6. Sunday December 11th. 1887. 'Dull day. To Oldbury farm & Styants. Only Neos found'. December 18th 1887 an account of storms in Rye and the channel. BH walked via Kingsdown and other places in locally fine weather. Started out with Horace but met Charles and Elcombe, chiming in the belfry. At Ash, searched field N of Church. 'Horace found a very nice implement No 393 and some spalls and Neolithic flakes and one rough Celt... . Home at 2.15'. BH, Mrs H Agnes and Lizzie [his second daughter] walked to Hadlow where they met Mr Shrivell and his brother. By 6.30 snow had begun falling and BH and family returned home in the fly. [A small horse-drawn carriage]. In a separately dated entry for the 18th December however, BH states he was at home all day except for a walk on Oldbury Hill. He again mentions snowstorms. [This may be the

recording of another day's activity that he has simply misdated. His visits to Oldbury, or walks via this route, were so frequent that he could easily have mistaken the date]

Sunday 25th December. Walk with Fred Headland and Sid to Sevenoaks. Called in on Crawshay and arranged another walk on the following day. Chats with Bevington then on to Mr Knight who was absent having gone to Mr Frank Knight's whose daughter had typhoid 'died on Monday'.

Boxing Day December 26th 1887. Trip to Swanley with Crawshay and Vignolles. Snow at Ightham but none N of Shoreham Went to Swanley and walked to the Eynesford high-level beds, mostly in seed so only a bare portion explored where some Neolithic flints with no secondary working and a Hammerstone, were found. Notes the presence of chert, ironstone rag and 'one nice piece of Oldbury grit, very coarse grains'. Continues overleaf.

Page Unnumbered. On Stud Hill a block of quartzite is noted. On to Well Hill where rag and chert were found. Continues the walk on the ridge. On the main road to Shoreham finds 'a heap of flints recently gathered from the field' notes the large percentage of 'ochreous flints' resembling the Ash spread but not as water-worn. Resolves to look for this later at another site. They had a lunch of bread and cheese, rum and milk at Polhill. Taking the Riverhead route BH arrived home by 6.30, Not in the least tired'.

January 1st 1888. Hard frost. BH Walked towards Hadlow with Mrs H, Ted, Agnes and Horace Found possibly Roman pottery in Peckham Hurst in which Mr Shrivell expressed an interest.

January 8th. 1888. Woke 2.50 am and, as his brain was 'lively' got up and worked on a list of implements. He worked till he reached number 610 in the list after which he went back to bed, resuming the activity at 9 till 12 when he says; 'the slavery is now finished the other [a walk to Oldbury] will be pleasant and health giving'.

'Above 500 22; above 400-199. Total 405'. This entry summarises the numbers of implements on the list occurring at the OD levels here recorded.

P.7. A letter from JP to BH over two pages, in a distinctive hand [Not BH's]. Dated January 4 1888 and sent from 21 Park Crescent, Portland Place. 'Sir, I have now finished the second Vol of *Geology* which will, I

hope be out about the end of the month. I shall now therefore be ready to engage in some other work if you are still of the same mind. I will take in hand and describe your “finds” of Palaeolithic flint implements around Ightham to see whether any further conclusions can be drawn from them...’. There follows an outline of the plan of action with some instructions to BH as to what is expected of him, which includes drawing a map with contour lines on which he is asked to place mark all his finds between the Darenth in the west, just beyond Malling in the east, Ash in the north and Hadlow in the south. In addition, JP asks for a table with the height, position, and colour of the specimens. He says he will insert the position of the drift beds himself after BH has done as he initially requests.

P.8. April 16th 1888. Professor Bonney, Mr John Hale and BH set out across Seven Acres to Furze field examining blocks of ‘greensand’. They cross Fane Hill to the ‘rocks’ [probably the Rock Shelter on Oldbury Hill] and from there across Oldbury Hill to Styants Bottom, past the Fish Ponds to Beacon Mount [Otherwise known as Raspit Hill].

Copied letter from Professor Bonney, dated April 19th [1888?] and sent from The Atheneum, thanking BH for help with regard to a supply of ‘Lenham stone’ which he wishes to describe for an article soon to be included in the *Geological Magazine*. He reassures BH that he will send the promised specimens of crystalline schists when he has gathered some specimens together.

P.9. April 1888. On a miserable, cold day, BH and Shrivell take the train for a day’s field trip to Barming and ‘Bensted’s Quarry’ [the remains of which is in Queens Road, Maidstone and is where a fossilized Iguanodon was found by Bensted and later identified and named by Gideon Mantell]. Some old, gravel-filled pipes are noted here. There is a sketch of how the ragstone fragments disappear to become sub-aerial strata. Outline of the myth of how an old woman was supposed to have carried the Kits Coty stones. Called on Morris for any news of finds, of which there were none of note. After looking at the lenticular sand they carry on to the Countess Stones and, in a blizzard, on up to Kits Coty. From Kit’s Coty, across the field to the ‘Lower Bell’ the flint walls of which buildings are observed and found wanting! Down towards Maidstone, past the Boxley stream and the Running Horse [an ancient hostelry and now part of a chain of food outlets], to Maidstone East Station where they met Ashdown the watchmaker with whom they travelled to Barming. Sketch of two layers of hassock between which there was a stratum of ragstone.

Two blank pages.

P.11. Quote from Evans on 'Hutton's ochreous LD Implement' Dated April 11th 1888. 'In form it is not so distinctly Palaeolithic as some that we have seen, but in colour and character it has all the appearance of belonging to same old gravel'.

Copy of Sir Frederick Pollock's reminiscence's. Dated September 4th 1861. This relates the meeting of Sir Fredericks meeting on the train with JP, who was returning from Abbeville where he had been examining stone tools (a basket full of which he had under the his seat). Sir Frederick goes on to say how the sheer numbers of stones left him perplexed. He notes that none of these putative implements, to his knowledge, had been found alongside the remains of early humans. He is clearly amazed at the implications and slightly sceptical.

P.12. Conclusion to Sir Frederick's memories. Mention of the Rev Brookfield, Inspector of Schools. Comets, and childrens' understanding of them. A question mark, below which is an entry [? whose handwriting] '1858 Donatis'.

In Red ink 'Romney Street' May 24th 1888. A map, showing (A) the Fox and Hounds and (B) a farmouse. The geology of this area briefly detailed.

P.13. Sunday June 3 1888. 'A very hot day'. Latin quote in margin from the tombstone of Col. Prevost at St Laurence Church. BH met Payne, Shrivell and his brother at Sevenoaks and they made their way through Knole Park to Winlet Hill, surveying the land as per usual. The old road leading from Fawke Common to Bitchett Common is where they met a foreman who gave information re: his finds. John Hale joined them from there to Stone Street where they lunched, making their way to Hales's house to inspect some pottery. Returned via Raspit Hill, Rose Wood and Oldbury in a temperature of 85 in the shade. After tea they rode to Hadlow. BH had 'A very enjoyable day'.

Tuesday June 12th 1888. Mr Allen Brown visited BH and they went to Highfield and Basted railway section and Fane as well as the Oldbury-Rock Shelters. Mr Brown stayed the night and the next day to they went to Oldbury, Crown Point and the Seal drift bed. Crawshay was part of this little adventure despite the very hot weather.

Sunday June 17th. 1888 walk postponed owing to rain. Walked in the evening to St. Lawrence Church with others.

Monday June 18th 1888. After Two hours careful observation of a hop garden adjoining a wheat field at Ash, they found three Implements as well as four ochreous flakes a quartzite pebble and a block of Oldbury stone. Deemed 'Very successful'.

Extract from letter of G[eorge] Payne, dated 19.6.1888 re: Roman finds from the Beech Tree Field on Wilmot Hill. Payne disappointed to have missed BH, the more so because of the useful work they undertook. Payne compares the enclosures at Hayes Common to those at Rose Wood, suggesting that they are another example of 'settlement outside the Oppidum'.

P.14. Sunday July 29th. 1888. Evening walk with Shrivell and Ted to Rigg's Hill, Wrotham. Patch of tertiary pebbles noted.

Tuesday July 31st 1888. To Telegraph Hill where a patch of pebbles is noted.

Sunday August 12th. 1888. Walk via Birches Wood, where, yet again, Tertiary pebbles are noted on SE side. The coombe is, once more described as running up to Drain Farm. Flint spreads seen extending far into the Pilgrims Road and on into the adjoining field. JP taken there a few days later and described it as '...very remarkable and worth recording'.

Tuesday August 14th. 1888. 'Took Prestwich to Wrotham...' Where 'a spread,' which JP suggests is glacial, is noted. No chert observed. Visited Platt, Basset's farm, returning via New House spring, which was said to be barely flowing compared to Wrotham waters.

A letter from [Flaxman] Spurrell to BH in which he acknowledges the receipt of some seeds [sent by BH?]. Notes that they are from 'water-loving plants' and for which he thanks BH. A marginal note dates this entry [or the letter] as November 20th 1888. There is an allusion to the [then] present day North Kent and the Thames Valley, which Spurrell notes is 'tame' by comparison to the forested area it once was.

P.15 In pencil 'My continuous holiday in my world'. Sunday August 19th 1888. Shrivell, Horace and BH go by the 10.53 train to Cobham, arriving at 12.15. They note pebble beds and Thanet sand west of church as well as ochreous flint with similar staining to those from Ash. Observes Lily of the Valley and 'Thallus Impatiens' which BH says is a 'memorable

find'. 'Descended dene hole on Birling Lees...' where Hound's Tongue is noted. Through the woods past 'Little Commodity' [whatever that may be] where he notes more pebble beds. They took tea at the Vigo [Inn].

August 21st 1888. To Drain Farm and Cotman's Ash, 'Monks-in- the-Hole' [?], Otford Mount pausing at the Bull Inn, to tea and chat to the Landlady. After this interlude BH continued on to the low-level gravel beds west of the village before heading for Dunton Green. Notes how striking the 'Seal [Culler?] is from that point. Sam Griffiths drove BH and Mr Crawshay at a 'furious pace' to Crawshay's home. Called on Bevington for a chat. [According to a note by EH, Crawshay did not make this visit].

P.15. Wednesday 22nd August 1888. A visit to Ash, via Vyse's Farm and Hawthorn Green. Ric Rogers [probably a relative of BH's first wife, Elizabeth Rogers] says that the gully [Coombe] south of Drain Farm, does not bear comparison with another found on the road to the Fox and Hounds, which a surveyor is reported as saying measured more than thirteen feet deep.

P.16 Thursday 23rd August 1888. BH met with JP, Dr Evans and Topley. They visit several places, Crow Hill, Crouch, Old Sore [Soar], Dunks Green, Starvecrow, Dene Park, Buley & High Fields, in which Topley was particularly interested. He remarks that he will send one of his staff to map the area, marking out the gravel spreads.

Saturday August 25th. 1888. Visited the local Rector, Rev Polehampton, for his parting chat re: matters '... parochial, personal and archaeological'.

Monday August 27th. 1888 Lasham arrived from Canterbury and stayed till the following day when he and BH walked.

Wednesday 29th August 1888. Visit with JP and Mrs Prestwich to Four Vents [Wents] and Wrotham Hundred. Went in the Landau to Comp where they found implements. Onto Malling, past abbey, then Larkfield Heath where they examined a flint drift, much decomposed which resembled that on Forge field and Fawke Common. Then on to New Hythe where they note sand beds capped with gravel, deeply stained flint boulders and some Wealden pebbles. They continue on to Leybourne Castle and up to the hilltop (153 feet OD). Back home to Wrotham by 5.30.

P.17. Sunday September 2nd 1888. BH walked to Fawke Common with its single beech and from there to Rooks Hill where, on the crest, he found one piece of ochreous flint' He spent time that evening examining the gravel to the west of Court Lodge and noted that there was a Gault capping on top of flints and tertiary pebbles.

Monday September 3rd 1888. Buley Hill cut walk and from there to the Mote. Found a 'very pretty little implement and a few flakes in Parson's Broom Hop Garden'.

Tuesday September 4th Letter from Crawshay informing BH that Prestwich had lost a beloved friend and had put work aside to mourn.

Sunday September 9th 1888. Took the train to Sevenoaks to meet Shrivell who failed to arrive. BH goes on alone to explore and examine the geology of Hale Wood and Fawkham Common. Onto Shipbourne where he finds chert scattered over weald clay. Then to Little Park where he examined Tertiary pebbles and continued onto North Frith where he met Mr Hale. They walked over Hale's land together after which he made his way home at about 5.30. He comments; 'Very fine day, a perfect day for walking'.

P.18. An extract from Dixon's *Geology of Sussex*, P.95 in which Colonel Lane Fox discusses Roman features. Two more extracts from same, pp. 108 and 129

P.19. 'Palaeolithic Implements, Coombe rock'. Notes on the Coombe rock pit at Portslade 3 miles west of Brighton' Workmen engaged here encouraged to preserve any bone they find or flints 'of unusual form'. Finds include 'elephant teeth, rhino molar (not recorded before in this deposit) and a very good implement of Palaeolithic form and age' Description of stratigraphy and similarity to Somme implements. This is clearly an extract of a paper or book, probably that noted on previous page. It was copied on October 7th 1888. A pencil note, not in BH's hand, refers to the second edition of Sir John Evans book, [title not given but it must be] in which, on p. 622, Ernest Willetts find came from the so-called 'Elephant Bed'.

Sunday October 7th. 1888. BH at home owing to a bad cold. He occupied his time copying the forgoing extracts. 'Worthington Smith on Implements': 'I think the final answer would be "all slightly abraded and ochreous". The examples you gave me were all very small, some being wrecks'.

Also in red ink: 'Evans on implement sent found on Fane Hill. "It has a venerable appearance about it which I much respect. The gloss upon it is like that which appears on some parts of the Currie Wood impt"...'

P.20. Sunday October 14th. 1888. To Hale Wood. Spoke to Mr Bevington and paid his respects to the remains of Mrs Didman.

Wednesday October 17th 1888. Met JP and Mrs Prestwich at Broad Oak. Inspected Crown Point Brickearth bed examined, Loess noted. After lunch at Mists [The George and Dragon] on to Cop Hall, Ivy Hatch, Buley Field and Lane and Sheet Hill. Back past Crowhurst and Boro' Green, then accompanied the Prestwich's to Yaldham, returning through the fields. An earthwork noted east of a house in Coldhourbour Farm. On to Stansted and Ash where scratched, ochreous flakes in a gravel bed are noted on the return journey. Met the trap with Lizzie and Elsie and Mrs Shrivell in Crowslands. Then on, down St. Clere Hill. Lewis and BH alighted at [Y]Aldham and walked home looking for blocks of Oldbury stone in the field.

Tuesday October 23rd 1888. BH walked to Fairseat and Ridley among other places on what was a 'frosty day'.

P.21. Entry from the previous page continued. Found black pebbles before reaching White Ash and Hop Garden where he '...soon found two flakes, ochreous, both striated'. Met JP and Mrs Prestwich and found an implement and a large flake in situ in a bank near the pond. They lunched at 2 before starting home via Crowsland and Monks in the Hole. 'A beautiful day, perfect'.

October 25th 1888. In the company of Loveland, Hudson and Tomkin [BH's nephew], BH set off for Hadlow via the Old Soar and Oxenhoath. BH notes that they met at Mr W.W. Rogers house, he having just died at Barming Asylum. BH and Willie Tomkin parted company from Loveland and, having dined, arranged the implements. 'Glorious day'.

October 28th 1888. 'Buley before breakfast'. Later BH, Mrs H, Agnes and Fred Headland went to Single Beech returning via Shingle Hill. Met Mr Hale. Plant species observed in the latter's garden.

Conversation about 'Will o' the wisp' with Bridger the local Butcher.

P.22. Continued from previous page. Will o' the wisp on way back from

cricket match. Long account of phenomenon, continues onto P 23. BH sent the account of this phenomenon to Mr Spurrell who thinks it is in the same category as 'Globular Lightning'. He notes that fire flies have been caught in England. Dated October 30th. 1888. [concludes on p.23].

P.23. October 30th 1888. In red ink in margin: 'Evans on Glacial Striae' there follows letter from Sir John Evans [from his country home, Nash Mills, Hemel Hempsted] regarding two returned specimens, which he regards as unworked, though the smaller of the two is somewhat equivocal. He regards the scratches as resulting from movements in the gravels rather than of glacial causation.

[In Red ink] 'Bower Farm Romney Street. November 4th 1888'. EH's note above runs thus: 'Discovered in Bower Lane on February 18th 1886... No: 469...'.

'Sunday...train to Eynsford'. Geological expedition. Finds stained 'ochreous' flints in a field near Swallow hole pond. Underlined is the observation that they appear to have been worked. The age estimated in relation to the degree of denudation. Continued on to Romney Street where he notes there were large aggregations of flints, just as there had been in the south.

P.24. 'Ash November 6th 1888'. Met Crawshay at Kemsing and walked to Drain. The day was cold. To the south of the house (presumably Drain Farmhouse) they view a section, which shows clay, not the usual clay-with-flints, these nodules were large, white and very sharp. Then onto Crowslands, Kingsdown, Crowhurst where they see the more usual ochreous [worn] flints. At Ash, in the Hop Garden noted 'ochreous flakes' and one deeply stained implement. They ate lunch at The Swan where BH had '...capital sirloin of beef'. Mr Crawshay and BH parted company at 12 acres.

A copy of a letter from JP dated October 29th 1888. He confirms receipt of the Ash specimens but is unable to add to previous analyses of them. He answers queries that BH must have put to him about various places and fossils. Asks BH to look for evidence of more swallow holes around Drain Farm, the evidence for which would be streams that might appear after rain. Asks specifically about conditions following the torrential rain of July 31st that year.

In red ink: 'Remark on Bower Farm find. Dated November 6th. 1888. From 'JP' [It is more likely that this 'JP' is the previous Rector of

Ightham, the Rev J. Polehampton, rather than Prestwich] who notes the fact he has found nothing but 'Neolithic Flints' on Bower Farm.

P.25. 'Bell on Ash finds. November 4th. 1888. Short note in which Bell says he was much impressed with the ash finds.

[NB. There is an interesting marginal note, in pencil and dated 1890, which confirms that the notebooks were written up some considerable time after the events they detail. BH kept other methods of recording his daily activities, returning to them to produce the 'official version' of events that the notebooks constitute.]

'Prestwich'. ? 'Referring to find at Boro' Green' (1881 in pencil under this heading in EH's hand). This is interesting as it is a confirmation that BH has found Palaeolithic stone tools in the high gravels of the area around Ightham where JP had searched unsuccessfully. JP draws an analogy between the finds at Boro' Green and those in high level gravels around Salisbury, and possibly Reculver. He asks BH to continue to look as new cuttings are made.

A copy of a short note from Topley, dated February 28 1882. Congratulates BH on success in finding implements and expresses the hope that this success will extend to the higher level gravels.

Copy of a letter from Dr James Geikie to WG Smith, dated 2nd May 1881 re: letter on Palaeolithic implements and their occurrence in the Ware and Hertford gravels. He says: 'I hope other observers will take a hint from you and search for pal implements in places which have hitherto been looked upon as barren of such relics'.

P.26. Copy of a letter from the Rev Osman Fisher on 'Trail' and sent from Harlton Cambridge. Dated 12th January 1882. Recounts his thoughts on a visit made with BH and JP to Oldbury. Suggests that Palaeolithic man and his implements are likely to found 'under the trail'. He explains that information about his phenomenon may be found in papers published in the Journal of the Geological Society for November 1866 and in a supplementary paper in the same journal of that date. He proposes that the same deposit has been dragged, not washed over the surface and one would expect to find Palaeolithic implements to be found UNDER such a surface since humans were contemporary with extinct megafauna older than the trail.

Copy of a letter from G.B Wollaston, of Bishop's Well, Chislehurst and dated 13th January 1883, to Mr Druery re: 'Orchis Hircini'. It appears that he has been to Ightham and searched for this plant unsuccessfully. He asks if BH would visit him and stay overnight so that he could be shown the whereabouts of the rare specimens in private grounds in Wollaston's area.

P.27. 'Alfred R. Wallace on Pliocene man... . January 20th 1881'. A copy of a letter from Wallace, from Frith Hall, Godalming re: the antiquity of man in America. This letter to BH indicates that Wallace, like BH, has concluded that the antiquity of man predates the Palaeolithic and uses the 'Calaveras skull' as an example that proves this. His nemesis in opposing this is one, Bret Harte, though he notes that many American Geologists accept his thesis. He suggests that BH should read his article on American Museums in the *Fortnightly Review* of September or November. He is unable to recall the exact edition.

Sunday November 11th. 1888. BH spent most of the day indoors, on what he says was very inclement weather, writing letters and copying letters into his notebook. Out to walk on Tylers Knoll in the afternoon found no flint, only decomposing chert. He says the chert he found in Fawkham Common and Larkfield Heath almost resembles pumice stone. Speculates that the Furze Field [Furze Field, otherwise known as Heron Shaw, is to the north of Ightham Church and the site of his first Palaeolithic find in 1863, sadly lost as he sent it to his brother Tom in Australia] gravel spread may be derivative of the break up of similar deposits from a higher level.

A note in the margin informs the reader that this was the day on which, at his wife's suggestion, BH began his autobiography after a thorough search through his notebooks.

November 13th. 1888. BH took a train to Shoreham where he called on Loveland and then made his way to JPs library where they had a long talk about his early finds in the Lenham beds. They took lunch after which they went to Preston's Hill where they noted much ironstone. They passed Austen Lodge Farm to higher levels where an ochreous bed was identified and some flakes were observed. To East Hill, Woodlands and Cotmans Ash. They escaped the storms that threatened.

P.28. November 15th 1888. A short, copied note from Crawshay to BH asking him to come over on Sunday and view what he found at level 520 in Eynesford and also at Halstead, level 470.

14th February 1882. A letter from James Geikie sent from his home in Burnham, Perthshire. He thanks BH for his most interesting letter and says how glad he is that his thoughts may have been helpful. Reminds BH that, in his recently published book on Prehistoric Europe there is a description of coarse gravels in which are found Palaeolithic implements. Suggests many gravels accumulated under cold conditions whilst others were laid down under 'more genial climactic conditions'. Suggests BH's 'limited area of observation' will allow detailed study, and that it is by such careful observation that science is advanced. Cites a letter from Darwin in his recent book with comments about snow-bound Kentish valleys during glacial times and this association with the formation of coarse gravels.

P.29. Copy of another, long letter, which continues to page 31 from Professor James Geikie to BH. Dated February 28th 1882, and sent from Perth, Scotland. He thanks BH for his two instructive letters and excuses the delay in replying, which, he says was owing to his having been on a long excursion. Discusses the presence of high-level Palaeoliths. Suggests that, as Darwin maintained, high-level gravels were probably laid down when the valleys of Kent were choked with snow in Pleistocene times. He cites present-day Alaska as a possible explanation of what might have been the case in Kent, and other parts of Britain in glacial times. He discusses coastal presentation of ice and alluvial strata, laid down in Pleistocene times and expressed in cliff sections. He further proposes that great floods occurred in the valleys covered with snow every summer and spread out over plateau that they could not have reached had there not been snow in the valleys' during winter. He ponders on the presence of Arctic and other, southern species as a result of the endurance of such snow-filled valleys' into relatively temperate times. He suggests that erosion, often massive during times of great melt, means that generally the gravels deposited then should be assigned to early Pleistocene times. He does not underestimate the difficulty of identifying such phenomena in the geology of today.

P.31. Copy of letter from James Geikie continues. He concludes saying that he would expect Palaeolithic implements to be found at all levels and recognises that this possibility is likely to cause the hairs of some archaeologists to 'stand on end like quills...'.

Copy of a letter from Professor Rupert Jones entitled 'Professor Rupert Jones Investigates', dated November 4th 1884 and sent from 10 Uverdale Road, King's Road, Chelsea. This is clearly in response to a letter from

BH but he is unable to answer BH's questions. He promises to send an out-of-print book recording a lecture on human antiquity, given by him and published in 1877. He also refers BH to the 1865 paper by Topley on 'The Valley of the Medway'.

Thomas Hooker September 3rd. 1882 Solicitors letter re: deeds dated 1647 granting land to one Thomas Hooker of Ightham.

P.32. A copy of Topley's first letter to BH, as an official of the Geological Survey 28 Jermyn St. December 13th. 1880. This is in response to a request from Mr Mackeson who forwarded a letter from BH to him. He encloses a pamphlet about the gravels around Ightham and expresses the view that finding Palaeolithic implements at the levels described by BH constitute 'a most interesting discovery'.

A copy of Flaxman Spurrell's first letter to BH. Dated November 9th 1880, from Lesnes Heath, Kent. Enclosed with it are flake specimens from Crayford. Proposes theories related to chronologies based on the study of gravels and he suggests that successive stone ages followed one another closely with no 'dead blank' period separating them, at the time a widely the accepted theory. He suggests that the area around Oldbury could demonstrate this. Hopes that BH if he would do the work required of data collection from eastern England. Cordial letter. Asks about the 'hut pits' [these supposed constructions were identified in Rosewood, in Ightham].

P.33. An extract, presumably from a letter from Sir John Evans to BH in which he says: 'you are making out a most interesting case and the discovery of so many implements at such high levels and so far from any important stream opens up a wide field for speculation. When the days are longer I should much like to run down to Ightham again and looking again at the configuration of the county'.

A letter to BH from Sir John Lubbock re: implements, dated 1878. 'Dear Mr Harrison, you must have been surprised at not having heard from me, but my butler only yesterday brought me (with many apologies) your box and letter. I think some of the implements are certainly Palaeolithic etc, etc, etc Yours very truly John Lubbock'. [Sir John Lubbock was Maidstone MP from 1871 to 1878 and was known personally to BH].

Drain Farm swallow hole November 20th 1888. An account of this visit. BH Obtained information from a local shepherd, originally from Dorset, re: the manner in which the swallow hole disgorged its water and the way

in which rain affected this activity. Notes how fluvial activity moves the surface flints. [The reader will recall JP's earlier request that BH should attempt to provide this information.]

P.34. The entry from the previous page concludes with BH noting the importance of this phenomenon and describing his return route home. Copy of part of a letter from Bell, dated November 18th 1888, in which he describes a 'find' made by one of his 'pupils' at the base of the brickearth. Though this find is from a common, the exact site is not specified. It is unlikely that he refers to Ightham and possible that he means Limpsfield.

A copy of a letter from JP dated 26th November 1888. The topic is Drain Farm. He suggests that the road from the farm to the Pilgrims Way is an ancient water-course. Asks BH if he could find any [flints?] between that spot and Wrotham. Wonders what drew BH's attention to his find of the first large implement in 1863 [in Furze Field/Heron Shaw] and what directed his attention to the search. He asks which name BH ascribes to the Ightham stream, since he provided JP with three, and he wishes to know which is currently used in the neighbourhood. Also asks if there is a name for the stream that runs past Malling and Leybourne.

P.35. December 2nd 1888. BH spends a day exploring Terry's Lodge crest and Wrotham. This walk takes in several sites, the most notable of which is Terry's Lodge where BH thinks he can discern the remains of ancient watercourses, currently mostly obscured by the fairly new roads which have latterly formed drainage conduits in several directions. Notes the presence of Oldbury stone in Terry's Lodge House. Looking west he observes more spreads of ochreous flint.

P.36. Three pencil sketches: on a loose leaf, an anterior and lateral drawing of a palaeolith found on the chalk plateau November 19th 1885, a lateral drawing of a palaeolith found at Currie Wood [this is probably the frequently referred to 'Currie Wood' specimen], between Knockholt and Shoreham 1869 and another lateral sketch [which I think is of the Currie Wood specimen].

P.37. In red ink above the copy of part of a letter from JP and dated December 7th 1888, the title 'Professor Prestwich on Watercourses on crest and flints with glacial striae and pitted'. He says that the Drain Farm watercourse runs into the Darent [the river that passes through Shoreham, the site of JP's country home] and suggests BH should look for similar features relating to the drainage of the Ightham basin. Also asks BH to look at Park Farm brick pit and examine any white flints that

may be found there for glacial marks and pitting. Queries the possibility of such features occurring in the Gallows Hill gravels.

1888. Writing in red ink in margin, records a stoat attacking a rabbit.

Sunday December 9th. BH walked around Gallows Hill, Park Farm brickfields and Crowhill [collectively known as the 'Highlands']. A few pieces of pitted flint from the highlands, no chert. On the lower slopes near the railway a large spread of small flint fragments, as might be found in a 'wash'. 5 Tertiary pebbles and some pitted flint. On Gallows Hill BH found cracked and irregularly broken flint, some of which was also pitted and very decomposed. He notes that the spread, as seen in August, had all but dissipated and later observers would have doubted its existence. Only flint was seen in this site. The brickyard site, at the junction of the Gault and Folkestone sand was well exposed with brickearth overlying the flint wash and a parting in the section of between 10-11 feet. Any flints in the Gault section were obscured by clay. Crowhill yielded some yellow flint and no ragstone or chert.

P.38. December 10th [1888?]. A copy of a letter from Rector of Trottisciffe telling BH that he is unable to give the authentic name of the Addington Brook. He recalls a previous Rector telling him it was known as the Eden'. BH must have written asking on behalf of JP who wished to know what it was known as.

There follows a discussion of the words for rivers in Europe, often noted to be derivatives of Celtic words for river. Gives examples. Mentions the 'Danaides', the waters of the inundation.

P.39. December 11th 1888. JP asks BH about location of Oldbury stone found at Terry's Lodge, the thickness and component parts of the gravesl at Gallows Hill, Malling and Oldbury Place as well as the location, on a map he has provided, of find spots. Sends BH part one of his papers [does not specify]. Wants the map redone to include find spots on. Urges BH to take his time in doing this.

P.40. December 15th 1888. A copy of a letter from JP in which he includes a plate of sections he intends to draw. He asks BH to confirm that the flint find spots have been inserted correctly. He adds a post -script saying that he thinks the drift beds [in the plates?] are too thick, especially on Dunk's Farm, which he thinks should be divided by four. He also notes that the plates are not all in line, Bay Shaw among these.

BH has drawn two sections; the first across the headwaters of the Darent, the Shode and the Leybourne stream. The second: Section from Oldbury Hill to Highlands.

P.41. Two more sections drawn, the first from Ightham Common to Comp Wood and the second from Shipbourne to Hamptons. Dated December 16th 1888. The first showing Lower Greensand geology, and the second the Wealden.

December 20th 1888. A copy of a letter from JP in which he thanks BH for sight of specimens and map and returning some flints sent him. Remarks that the 'split flint' must wait for an opinion. Says BH should show Topley the stone from Crowborough, which he thinks it is common in the Weald. The flakes he regards as Neolithic. BH disagrees [in red ink!] Asks for list of finds from Ash and for BH to trace some of the specimens.

P.42. Conclusion of the letter from the previous page. JP says he had hoped to find distinct characteristics between the river drift specimens and the high level stone tools. He is unable to establish anything much other than that the latter are smaller.

A list of tracings of specimens all numbered [these numbers will almost certainly correspond with the numbers on the individual specimens].

P.43. On Sunday December 16th 1888 BH made a trip to the highlands around Gallows hill, during which several specimens were found. The plain, south of Stones Plantation, yielded one Palaeolithic flake, which BH notes is similar to those from Oldbury East. [Many of the stone tools from here are Middle Palaeolithic]. Notes the presence of pieces of flaked chert though he does not ascribe artefactual status to them. [Some of the Middle Palaeolithic stone tools from Oldbury East were made from chert which occurs in abundance there. At least one Mousterian stone tool from Oldbury East is held in the BH collection in Maidstone Museum]. Comments on the large spread of ochreous flint in the plantation south east of Highlands. One block of Oldbury stone noted. Moved on to Offham where he found more ochreous flint and three white flakes which he says are 'pals'.

On Sunday December 23rd 1888 BH went to Oldbury via Oldbury Place where he noted the gravel on the path consisting of a few pieces of yellow chert and flint and a sole Tertiary pebble. In the afternoon BH and Ted went to Four Wents... across the dividing ridge above The Pilgrim's Road.

Found a quartz pebble and much ochreous flint. Then on up the coombe to Terry's Lodge.

List of localities of lithic finds with the height (Ordnance Datum, in feet) and the find number.

P.44. List from previous page continued.

An entry about all BH's listed specimens. [This is possibly part of a letter, which I think this should have preceded the list to which it refers]. The entry goes on to suggest that the heights should be judged in relation not to the sea but that of the adjacent valleys. The adjusted heights are then noted.

P.45. Entry from the previous page continues with heights of some of BH's finds spots adjusted. The totals of tools found between heights given. When tools are arranged thus groups are noted as emerging and BH lists the places according to the river basin in which they were found. They are: the Shode, Darent, Leybourne and the Thames basins.

On Christmas Day 1888, despite being a holiday, BH went to Ash searching for stone tools as usual. He found flakes and a 'fine green coated Palaeo side scraper'. It rained on Boxing Day so he stayed in making lists.

27th December. 1888. A letter from JP sent from his London with Instructions re: the map which he intends displaying at the meeting at which he will present his paper to the Geological Society in Burlington House in Jan or Feb 1889 and asks if BH will attend the meeting.

December 29th 1888. Another letter from JP thanking BH for specimens and photograph as well as discussing contours and the colours that distinguish one contour from another.

P.47. Letter from previous page continues. Expresses his interest in the large, green-coated flake from Ash and other tools of interest. Concludes with best wishes for the New Year.

Sunday 30th December 1888. BH, Ted and Horace out to Gallows Hill. BH notices a small part of a stone tool near the level crossing. By Addington Church knoll recent graves have disgorged some discoloured drift. On via East Street where the sandy ridge is examined and a large spread of pitted, ochreous flint is seen. North of Ryarsh the gravel is

identified as being of that typical of the Vale of Holmsdale. BH spent the evening sketching and writing letters.

December 31st 1888. As Mrs Harrison was in London Horace and BH played cards then went to the church to hear the New Year rung-in. A letter from Mr Druery received informing BH of his planned visit to Ightham.

P.48. Copy of a letter from JP dated January 1st 1889. Apologises to BH who has marked all the sketches he sent, as they are not what he wants. Underlined in red is the sentence 'The great interest of the Ightham specimens is the conditions under which they occur'. He gives BH more instructions and notes that the spreads at Addington and Ryarsh are peculiar. Mentions Aylesford and Barming as sites already known. More best wishes for the New Year.

P.49. Copy of a letter from Mr W H White on Dunks Green Implements dated 2nd January 1888. He has obviously sent BH some stone tools found in the Ightham district, which feature on the map BH is preparing for JP. He promises to send six more implements and says he would like them back when BH has finished with them.

October 13th 1882. Section made in marking cesspools at Ightham. Sketch and notes on exposed sections in the construction of the cesspools. The dating in the margin notes is February 1889 and relates to a tank at Ightham Place in which 4 feet of humus and 5 feet of flint gravel is noted. Red Clay forms the base of this section.

P.50. Mr Crawshay's list of implements numbering 29. [Note: De Barri Crawshay was an avid eolithophile and amassed a large collection of these items, however, it is probable that this list, of only twenty-nine items, is of artefacts, not eoliths].

P.50. January 6th 1889. BH records that there have been 14 days of frost. Out walking to Crowslands, Kingsfield, Sheet Hill Farm where he feeds the ducks with bread. Notices blocks of Oldbury stone all along the route as well as patches of finds worn flint and Tertiary pebbles. He spotted one block of flint from which 7-8 flakes had been struck. Mrs H and Agnes go to Hadlow and Willie Mist [the owner of the George and Dragon, which for a time was known as 'Mists', came to tea.

Tuesday January 8th 1889. To West Peckham and Hadlow with Horace via

Peckham Hurst, from where they descended to the east of Adam's Well coombe. Pitted flint and Tertiary pebbles found. Inspected West Peckham Church. Heads towards Goose Green and notes fields covered with chert. Says there has been recent quarrying in Goose Green pit. Sadly all the gravels excavated had been taken away and no finds of note were discovered. Supper with Shrivell.

P.51. Letter from previous page concludes. Another letter from JP, dated 9th January 1889, in which he thanks BH for the drawings. Says he has asked Crawshay for a sketch of his Seal Chart specimen, the only one he will use in his planned paper. Asks BH about two Ash specimens, which he thinks may be among the drawings. Informs BH that the paper will be out on 6th February.

P.52. 10th January 1889. A letter from JP in which he approves the sketches, asks some questions and requests that BH should send 'one or two rude nodules you think worked unless I have seen them already...'. Expresses concern that EH has done the sketches of De Barri Crawshay's specimens and commends him on this.

18th January 1889. Yet another letter From JP Confirming suitability of some of BH's work and asking for some minor amendments, especially with the colour of the contour lines. Concludes on p. 53.

P.53. 21st January 1889. Another letter from JP re: paper to be read to the Geological Society. Remarks that a specimen from the Highlands, sent to him by BH, is an example of one of the hard concretionary silicious sandstones often found in Berkshire and Wiltshire and from the Lower Tertiary beds. Asks BH to send the large map directly to the Geological Society at Burlington House. A copy of yet another letter from JP, this one dated 12th January [predates last one]. More requests re: sketches and tracings. Small, tear-drop shaped sketch at the conclusion of this letter on p.54.

P.54. 23rd January 1889. Another copy of one of JP's letters re: the paper and specimens sent by BH. Wants a selection of flints from the river drift, the hill drift and the Ash/Bower Lane area. In another copied letter, JP offers BH an early copy of Lyell's *Principles of Geology* and possibly also *The Antiquity of Man*.

P.55. Sunday January 27th 1889. A day out with Ernest searching Cotmans Ash, Romney Street sandpit and Bower Lane. They were rewarded with the find of an implement and several flakes. They then went on to

Maplescombe Church where BH notes the presence of a large Sarsen stone. On to Kingsdown before heading home.

Copy of part of a letter from JP, dated January 25th 1889, in which he asks BH to send no more specimens without instructions. Says all he wanted was a simple outline. Small sketch to illustrate a stone fitted into a vacant space [on the illustrations for the paper]. Includes his card for BH and Mr White to enable them to enter the geological Society. Yet more last-minute requests, perhaps hinting at some anxiety on the part of JP.

P.56. First two lines of this entry are on the previous page. January 29th. 1889. This is a copy of part of a letter from JP. Reference to the old chapel, Maplescombe and Sarsen stones, previously missed. Mentions that some missing specimens had been found. Tells BH that Mrs Lyell, Editor of Lyell's *Life* and his sister-in-law, is the person offering Lyell's works.

31st January [1889]. BH told to mention JP's name at the meeting of the Geological Society. More requests re: various specimens and the list for publication, which should be done within a month.

February 1st 1889. Mrs Lyell is said to have sent *Principles of Geology* and a copy of his *Elements* but not *Antiquity*. BH told to acknowledge receipt of them and is given the Lyell's address: 9 Cornwall Gardens London SW.

P.57. Copied letter from previous page concludes. BH informed that there are notes in the volumes in Lyell's hand, said to be 'very interesting'.

February 2nd 1889. BH again urged to 'make a short note' to Mrs Lyell. A line about the 100 specimens sent which are acceptable to JP.

February 7th. 1889. Letter from Bell [A. Montgomery] from Limpsfield, in which he congratulates BH on JP's presentation of the previous evening to the Geological Society. Refers to both Valley specimens as well as those from Ash, which must be '...the most ancient of the known works of man'. Described as '...truly a great and definite result...'. Notes that Prestwich recognises the different stages that each type of stone tool represents. He suggests that this introduces clarity in the understanding of human development. BH, as the producer of this evidence should feel satisfaction.

February 6th 1889. BH describes his journey to Burlington House for

Prestwich's lecture. [His writing is large and bold here, a feature noted by the transcriber to often coincide with momentous occasions on which he might be expected to feel anxious, or elated].

P.58. Entry from previous page continues. After the main protagonists have spoken, BH is called upon to say a few words which he did [one suspects this was an overwhelming experience], the more so because he was unable to hear the presentation very clearly and, by his own admission, felt very nervous. Was introduced to Professors/Drs, Judd, Woodward, Whittaker Bonney, Walker, Hicks and Topley. He left with Mr Allen Brown and got home at 11.30. He probably stayed in London that night because the following day, February 7th, he visited the British Museum and met with Mr Franks who gave him some specimens from the La Moustier caves, recently acquired by means of the Christy bequest. [This is of importance to note since, if these specimens have been incorporated into BH's lithic collections and are unrecognised as from le Moustier and not Oldbury East, a skewed impression of the latter site might result]. Also looked at the Wrotham and Worcester Ware [pottery]. He Sketches some of the former.

P.59. The entry from the previous page continues with an account of Franks speaking to BH about the possible period over which Wrotham Ware was produced. Went to hear some music with Dr Parker, to whom BH does not warm [BH rarely commits critical comments to the pages of his notebooks so when he does the reader can be sure that they are heartfelt]. After that he went to Jermyn Street [to meet with Rupert Jones?] and inspect *The Geological Survey of Kent*.

Limpsfield February 10th 1889. Letter from Montgomerie Bell telling BH that Evans doubted that the Ash specimens were pre-glacial. Hicks disagreed and told Evans so in a manner that BH found 'unpleasing' [though I am sure he was delighted at the backing Hicks gave to his theories about eoliths]. Others also disagreed and said so, some, like Topley hedged their bets and dwelled upon geological timescales. [possibly an indirect way of backing the idea of eoliths as markers of pre-Chellean stone tool-makers in Britain].

P.60. Entry from the previous page Continues and is described above. It concludes that JP was judged confident in his views and fair in his answers to the objectors.

Limpsfield January 26th 1886. Letter from Bell in which he says how pleased he was that his presence at the meeting of the 6th was supportive

of BH. Asks to see two of BH's Neolithic finds and suggests that together, time permitting, they could write an interesting account of their area in such times. Mentions the 'Fortress', [by which he means Oldbury Hill] and asks BH to consider the proposal and to mention the idea to Mr Bevington.

P.61. Letter from previous page continued. Bell Says he found a Neolithic 'Celt' from the Thames. He plans to visit BH the following Saturday.

Letter from H. Walker, from 36 Leamington Road Villas, Westbourne Park congratulating BH on his 'red letter day' (the 6th February) and noting that he [BH] was given the most public of acclamations of his life's work at the meeting that day.

12th February 1889. A copy of a letter from the Rev Polehampton, in which he acknowledges Bell's letter sent to him by BH and read with interest. Says BH is receiving acknowledgement from the leading lights in this field of research.

S. Laing. 3rd February 1889. A copy of a letter from S. Laing of 3 Adelaide Mansions, Brighton in which he thanks BH for his letter. Says he will be unable to attend meeting on the 6th February at the Geological Society.

P.62 Letter from previous page continued. Asks about the state of the finds from the high elevations of the area around Ightham. Confirms his belief in the great of many human remains. Disagrees with JP's view of the short duration of human antiquity and the glacial period. Does not doubt the authenticity of human remains attributed to the Pliocene and possibly the Miocene period. Notes the inclination to approximate biblical dates with humanity's, age and how this attitude adversely affected the discoveries of Boucher de Perthes. Says too that the French Congress of Geologists voted in favour of human origins in the Pliocene of some of those discovered in France. Regards the evidence from California as convincing.

11th February 1889 Letter from Laing expressing interest in the Ash specimens and queries their typology. Refers to relative chronology between sites of eolith finds and Kent's Cavern and other ancient sites in Britain.

P.63. The letter from the previous page continues with Laing mentioning

the Pliocene drifts of St. Prest and Puy. He observes that each discovery pushes back the age of the time when humans emerged.

11th February 1889. Copy of a letter from Rev Polehampton which continues to p.64. BH has clearly sent a copy of a letter from JP to him, for which he says thank you. He copies part of a poem that expresses his hopes for BH in the fullness of time. He compares the present time to BH's own 'Advent'. He considers that evolution in no way contradicts the statement in Genesis of God's creation of man. Goes on to consider other biblical accounts of creation. He invites BH's thought on these ideas.

P.64. A letter from H. Lewis dated February 12th 1889. The letter is in response to a letter from BH and expresses pleasure at receipt of same. He regrets that he was not at the meeting. Discusses eoliths, their striae and glacial processes. He seeks BH's opinion as to the forces that may have produced them. Makes associations with stones similar to BH's 'small implement' and which he has seen in Finchley. Intends coming to Ightham especially to look at the Ash district when convenient. Has sketched some of the most impressive of his finds, which he encloses.

P.65. The forgoing letter from H. Lewis concludes here. A copy of a letter from JP, sent from his London home and dated February 20th 1889 asks after BH's health, for which the letter conveys a genuine concern.

P.66. Has jumped from 65 to 67

P.67. London 21st February 1889. A letter from JP expressing pleasure, and perhaps relief, at having received BH's letter that morning since he was concerned that he might be ill. Checking on return of specimens and asking BH for to examine the gravels on Swanscombe Hill. JP intends returning to Shoreham soon.

March 1889. A Letter from the Rev Polehampton [JP] informing BH that the sent the abstract of the paper to the Sevenoaks Chronicle. Regrets that the bad weather curtailed their fieldwalking. Thinks that Professor Hughes, of Cambridge sat opposite them at the meeting. BH's specimens are to remain in London till a firm decision about the plates is made.

P.68. In red ink in margin, quote from a letter from Sir John Evans congratulating BH on the discovery of two '...rudely made' palaeoliths. No's 720/843 in the catalogue. [The fact that this is recorded in red ink suggests that it constituted a victory, coming as it did from Sir John Evans, whose failure to accept the authenticity of eoliths, was a source of

great pain to BH]

Sunday March 10th. 1889. Train to Shoreham on to Swanscombe Hill, Telegraph Hill (285) and then Bower Lane. Found two implements and some flakes. Notes that by the telegraph pole on Swanscombe Hill there were white quartz pebbles. The height OD is 520, according to EH's amendment.

March 17th. 1889. Lewis, Horace and BH make a trip to Drain Farm, and Bower Lane, Shoreham, Lullingstone, Eynesford, Brands Hatch, Crooked Billet and Ash. Found several flakes.

March 24th 1889. Out again despite the drizzle and fog. Found 'a rude implement' (No.483) at 950 feet OD in Wrotham Park Hill. It bore similarities to the Currie Wood paleolith. [So we can be fairly sure this was an artefact and not an eolith, which stones are often referred to as 'rudes']. He also noted the presence of Tertiary pebbles on this site

Tuesday March 26th. BH walked to Wrotham Hill Park in the afternoon but it was curtailed by a sudden, and violent snowstorm during which he sought shelter under a dwarf yew tree where he stayed for half an hour. Despite this he made some observations about the ochreous nature of the flint in a field close to the edge of the escarpment.

March 27th 1889. Walked in the afternoon to Plaxdale farm where he met Mr Cooper, the owner. From here he went on to [Mr] Pink's, meeting with the Bailiff, Burnett. He searched the southern slopes (of the North Downs but does not specify the exact location. Tabular flints are found at this site and he remarks that flint here is white with many very ancient pebbles identified among the spread. From here he moved on to stained bed, in which he found a Palaeolith number 485. This site is identified by EH as that at Parsonage Farm where he notes the presence of tabular flint with 'apparently worked edges'. [It is most likely that these items are eoliths]. He also notes the presence of two blocks of ironstone which, when broken revealed bivalve fossils. These he takes to be from the Lenham beds. He returned home via Kingsdown and Crowslands. There is an enigmatic note from Edward Harrison 'see X p.71'.

P.69. March 29th 1889. ? Letter from EH to his step-mother. Says he has a little news that he thinks will interest his father. He went recently to a lecture on 'Prehistoric Man in Britain', at the Town Hall, in the company of his friends. Dr Whittaker, the lecturer, mentioned many things that BH had spoken of to Edward. The flints exhibited at this lecture had been

loaned to Whittaker by Dr Hicks and Mr Allen Brown. EH was familiar with many of the names mentioned, that is Dr Evans, Professor Prestwich and Mr Spurrell. Whittaker mentioned that JP had recently changed his mind about human antiquity. EH asks if that referred to his father's influence and the pre-glacial finds from Ash? Whittaker gave his own view about Palaeolithic implements, which was that they were all pre-glacial. EH expressed his surprise at this as BH thought only the old Ash stone tools pre-dated the last glaciation. Mr Thornhill clarified what Whittaker referred to and was told that it was the Palaeolithic implements. EH then refers to 'Neos' as opposed to 'Pals'. [So we can be fairly sure that eoliths are not being considered here.]

A copy of p. 397 of Woodward's *Geology*, in which he considers the origins of chalk. He suggests that the 'granitic peaks of Dartmoor (then a much loftier range than now) supplied the chalk with the quartz grains in Devonshire'. This continues on to p.70.

P.70. An explanation of Paramoudras. This may also be taken from Woodward's *Geology*, though it does not specify this and there is no page number given as previously. BH notes the presence of these in Darent Hulme garden [JP's home]. He mentions their presence in the river Bure, in Norfolk.

April 9th 1899. A copy of a letter from Topley, sent from 28 Jermyn Street, London. He informs BH that the Geologists Association is planning to visit Ightham and Sevenoaks on June 1st and asks if they may visit to see his lithic collection. He tells BH of his plan to visit Ightham the following Monday to mark the gravels on his maps and asks if he [BH] would be able to accompany him as it would save him time. Encloses a flake specimen sent by BH some time before. Asks about the possibility of a donation of some implements for the museum. This letter concludes on p.71. [By this time BH was being asked frequently for specimens, both by individuals and institutions, in this country and abroad. He most often responded positively, but not always for free.]

P.71. Sunday April 7th. 1889. Letter from Topley concludes. Out to Mr Pink's land where BH examined a very ochreous spread of gravel where he found quartzite pebbles and one implement as well as ironstone in which were fossils. EH's note 'see Read's letter P 74 & see 68'.

Good Friday 1889. BH out with Ted and Horace on what he describes as 'A glorious day'. They go to Exedown and along the crest of the North Downs to Wrotham Hill Park, passing Park Farm.

Section drawings of the Valley of the Darent.

P.74. Pages 72 and 73 missed out. An original letter from Clement Reid dated 6th May 1889 and sent from 28 Jermyn Street. Thanks BH for ironstone specimens and comments on type of fossil shells in the Ironstone. (EH says 'this refers to finds on pp. 68-71').

April 21st 1889. Easter Sunday. EH and BH go to Terry's Lodge where he notes 'A good percentage of ochreous drift'. They find a plover's nest with 4 eggs in it.

April 22nd 1889. Meets Topley at Basted and from there onto Sevenoaks, Robsacks, Bayshaw, Furze Field, Fane Hill, over the railway cutting to Usherwood's Field. They walk along the 'line' and Topley just manages to catch the train with no time to spare. He notes the stag hounds at Porto Bells [?]. They appear to have caught a stag here and certainly caught another at the top of the Downs, east of Exedown.

P.72. [This number is an error as the following page resumes the correct sequence of 76]. April 23rd 1889. BH Out with Topley. They meet at Seal Hill walking to Waterden and the chert beds at Mr Saxby's, with whom they meet and talk about the brickearth spread. Then on to Styant's sand pit. Topley expresses an interest in the fossil sponge spiricules and the echinites in this pit. The next site for investigation is Middle Woods rocks where they 'crushed, shattered and analyzed' after which they made their way to the sand pit and Mount Pleasant Rocks. Further on in Kilnfield they observe the gravel and rocks. The next stop is at Brooms where they rest for a while under the beech trees after which they follow the stream-bed, noting the big blocks of Oldbury stone. At Crown Point Inn they take tea but even here BH cannot help but detail the geology.

April 24th. 1889. To Sevenoaks with EH and Topley taking the tram to Wrotham. Many places visited. They returned via Basted.

April 28th. 1889. Out with Topley yet again. To Oldbury and Raspit Hill this time. It was wet so the fieldwork was curtailed.

13th May 1889. A letter from Flaxman Spurrell from his home in Belvedere, Kent. Very complimentary of BH's efforts to record the history of his neighbourhood and asks if he may say something at a public meeting of what has been made known as a result of BH's work. Confesses that he urges many people whom he meets to contact BH, the

implication being that he is worthy of note.

P.75. Letter from Mr Spurrell concludes here.

Letter from Topley, dated May 27th 1889, sent from Jermyn Street. Tells BH he has not yet had time to look at the fossils he found on his visit to Ightham. Mr Reid looked at the ironstone and believes it to be Eocene not Pliocene. Confirms acceptance of Mr Johnstone's lunch invitation and says he will firm the arrangements and thanks BH once more, this time for offering to arrange tea for the group visit. Asks if it is possible for a room that the ladies in the group might use. Asks for a trap to meet them at Kemsing. Sends a copy of Whittaker's pamphlet. Hopes that Fullerton sent copies of the circular publicising the outing.

P.76. Copy of a letter from Worthington Smith dated June 1st 1889. '... Professor Prestwich has sent me a copy of his paper on the Ightham implements. Will you please give me his address so that I may thank him. I am very glad to get such a lot of data, as you may suppose. I have lately found three implements near here on the hills in red clay on chalk- one in the gravel (so called) at 795 feet above OD and 345 feet above the nearest brick ¼ miles off (nothing to do with brick) and no water near for miles. 3 Implements are cinnamon colour, very slightly abraded, tongue-shaped, rather small...'

3rd June 1889. A copy of a letter from Spurrell to BH offering his thanks for the Geological Association group tour around Ightham, which BH led. Spurrell maintains that most people came simply to see him and his work (the lithic collection). Regrets that BH's wife and other family members were not present.

Half the following page, which is number 17 from the back of the book, contains two letters, the first from JP on Bower Lane and dated 4th June 1889 in which he thanks BH for sending him 'a beautiful specimen from Bower Lane' and asks him about a possible excavation here. Also asks if the Vigo Inn still exists.

The second letter, written a day later by Grace Prestwich, thanks BH for his letter and for sending JP a specimen from Bower Lane, after receiving which he felt 'quite young again'. They are just off to London for a few days to hear about the work in Norfolk.

NB: From this point BH's habit of copying sections of papers makes it necessary to start from the back of the volume.

First two pages on card are a pastiche. The volume number is clearly to be seen on right hand page corner. The page is not numbered. There are numerous quotes, Goethe, on truth, among them. 'When truth we seek no need for words to speak'. Dated June 10th [year ?]. Paper clipping Re: flying ants and their habits. A letter dated February 2nd 1889, the signature of which is not very clear, sent from 61 Great Russell Street, Bloomsbury. The sender asks BH for any sight of 17th century tradesmen's tokens. He is a friend of Canon Greenwell. Quote from Wendell Phillips about self-contradiction. Section drawing in pencil. A copy of part of a letter from Horace Beale. Above this another citation, which is not identified.

P.1. Copies of Letters 5 and 7 from Gilbert White's *Natural History of Selbourne*. Verse from Exodus XI V.15.

'The Antiquity of Man in North America' by Alfred R Wallace and taken from the journal *Nineteenth Century* November 1887. This continues to p. 2.

P.2. At the bottom of the page is a single line entry referring to *The Annual of the Geology of India*.

P.3-16. Continuation of Wallace's article 'The Antiquity of Man in North America' from the journal *Nineteenth Century*. [This continues onto p.16]. BH dates this copy as November 15th 1888.

P.16. Notes that Professor Boulgier called in the summer of 1888. He asked BH if a friend of his had called to see his collection, to which the answer was 'No'. The Professor had been asked by this friend about some stone tools he had found. The response was to provide him with an address in order that he might compare his finds with BH's very ancient stones [most likely eoliths].

An example of BH's attempts at secret communication! He transposes letters, for example C with B so that the name of a place or person is not obvious. In this case it is J Allen Brown. The letter is dated June 15th 1888 in which he notes that the stone tools [eoliths] shown to a group, were out of reach of any of the ancient rivers since they were all at such high OD levels. He suggests that these were geological relics of ancient plains resulting from denudation and possibly of Pliocene age. He does not believe this plain was submerged.

P.17. Once again BH uses the transposition of letters to disguise a name,

this time Mrs Prestwich ('oqdrsubg'). Dated 24th June 1888 she informs BH of the localities that JP wishes to be examined for the presence of Tertiary pebble beds or clay. They are Crowslands and Terry's Lodge and the road between St. Clere and the Maidstone High Road.

June 18th 1888. BH out to Ash where he searched the hop garden, finding three implements and many flakes.

July 1st 1888. BH out to Exedown, then on to Crowslands, Woodlands, Cotmans Ash and Heaverham. Horace, Agnes, ...? and Ernest. BH notes the presence of strawberries on the northern hillside.

July 8th 1888. Started early with Arthur to South Ash examining the worn gravel spread. Again searches the hop garden and a small patch to the west of the cornfield where he found a few pieces of broken palaeoliths, a fabricator and deeply ochreous flakes. Examined the limits of the pebble beds, which he notes, extend nearly to White Ash Wood. Home via Kingsdown, Knockmill, Crowslands and Drain Farm. BH records that he saw no ochreous flint on the journey home from Ash. The line of the Tertiary bed reminded him of Oldbury.

Page 76 overleaf.

[Transcribed and annotated by Angela Muthana on behalf of Maidstone Museum, 3 November 2013.]