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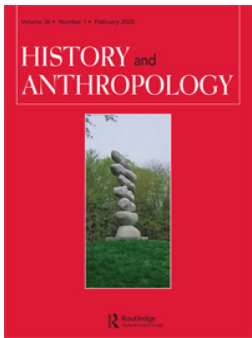
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The travelled landscape of Benjamin Harrison and the imagined eolithic world of the Kentish Weald

Angela Muthana and Roy Ellen

ABSTRACT

This paper seeks to show the relationship between the travelled landscape of the late nineteenth century Kentish Weald, the survey and collecting expeditions of Benjamin Harrison and his associates, and the imagined early Palaeolithic and 'Eolithic' life-ways that these investigators sought to uncover. We show how fieldwork shaped thinking and practice, and how walking served to organize the bodily practices of knowledge production.

KEYWORDS

History of archaeology; fieldwork and walking; Benjamin Harrison; Kentish Weald; the eolithic concept; landscape

I met a traveller from an antique land ...
Look on my Works, ye Mighty, and despair!
Nothing besides remains ...
... boundless and bare

[The lone and undulating clays stretch far away].

Adapted from Percy Bysshe Shelley, *Ozymandius*, with apologies

Introduction

Recent decades have seen the rise of landscape archaeology, as prehistorians have sought to re-create early environments and interpret traces in contemporary landscapes of their ancient progenitors. Landscapes are created from peoples engagement with and understanding of the world around them, are always in the process of re-shaping, can be seen to 'materialize time', and are always subjective, never neutral (Bender 2002). Reconstructing ancient anthropic landscapes is relatively straightforward and reliable for the period since the end of the last ice age, for which there is much evidence, but for anything older it becomes hazardous. Tilley (1994, 1), for example, discusses the development of archaeological landscapes from the Mesolithic to the Neolithic, and adopts a phenomenological perspective (11), namely the manner in which people experience and understand the world, reconstructing and evoking how ancestral tracks criss-cross a territory and come to define it. However, Palaeolithic landscapes seldom reconstruct in a way that realistically reflects social action and the impacts of individuals and groups. There are occasionally clearly defined dwelling sites, but rarely anything by way of trackways, tombs or megaliths. Moreover, the ice ages in Britain utterly transformed geomorphology, destroying features likely important to human inhabitants.

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How to make sense of Quaternary geology and the sequence of glacials and interglacials, how to distinguish and arrange ‘river drifts’ from ‘glacial drifts’, particularly in southern England, preoccupied the geologist Joseph Prestwich from the 1850s onwards (O’Connor 2007, 28). This problem was only resolved in the twentieth century and with a chronology influenced by studies of alpine glaciation (O’Connor 2007, 71). The ‘eolithic’ landscape that interested Benjamin Harrison and his contemporaries was purported to have existed earlier, at the Pliocene-Pleistocene boundary (Table 1). During the twentieth century, doubts grew about the dates for the earliest human occupation of Britain but recent work has revealed strong evidence for early Pleistocene colonization of northern Europe, including artefacts from Norfolk (Happisburgh) and Suffolk (Pakefield), providing evidence for Neanderthals and other hominids during interglacial phases, changing views regarding the pre-Anglian glacial sequence. Nevertheless, from a landscape perspective, the ice ages in Britain resulted in complete transformation, having major effects in the south where the ice never reached, contributing to sea-level rise and fall, coastline modification, upland erosion and changes in river system geography (Candy, Silva, and Lee 2011). In addition, the putative humanly made objects that have been recovered have usually travelled some distance, as evidenced by rolling and patination and by differences between the petrology and mineralogy of objects and local geological context. Thus, the best picture that most archaeologists of the Palaeolithic can supply is of an ‘overall distribution map or the presumed “site catchment territory”, where locations become simply dots in a two-dimensional space situated in relation to drainage patterns, perhaps soil types, and a choice of contour intervals’ (Tilley 1994, 3). On such maps might be plotted patterns of implement finds, producing what we might call cartographies of collection. The frequencies of so-called eoliths in particular were influenced by the large number of apparent discards found everywhere, a major problem to be explained (Ellen and Muthana 2010, 361).

This paper seeks to show the relationship between the travelled landscape of the late nineteenth and early twentieth century Kentish Weald, the survey and collecting expeditions of Benjamin Harrison and his associates, and the early Palaeolithic and Eolithic landscapes that these investigators sought to uncover. These were the earliest human environments which researchers of that time could conceive: vividly imagined spaces offering credibility to a way of life that has subsequently been shown to be false. Eolithic man (Figure 1(a)) purportedly travelled the Wealden landscape as a kind of humanoid Other, placed in another Time, so remote that it best justified the epithet ‘savagery’ (Bender 2002, S105). In seeking to understand this reconstruction, we draw inspiration from history of science writing on how ‘fieldwork’ shaped thinking and practice in the emerging earth sciences and natural history during the nineteenth century (Brintzer and Benson 2022; Burt and Thompson 2020), and from recent anthropological literature on how walking serves to organize bodily practices of knowledge production. We might start with de Certeau (1984, 27), for whom walking is simultaneously an art of thinking and of practice: the action of movement operating in a world generating ‘spatial stories’ or

Table 1. The major Pleistocene glacials and interglacials in the British Isles.

Glacial 1	Interglacial 1	Glacial 2	Interglacial 2	Glacial 3	Interglacial 3	Glacial 4
Beestonian 2 myr BP–866,000	Cromerian	Anglian 479,000–424,000	Hoxnian	Wolstonian 374,000–130,000	Ipswichian	Devensian 1,150,009–11,700

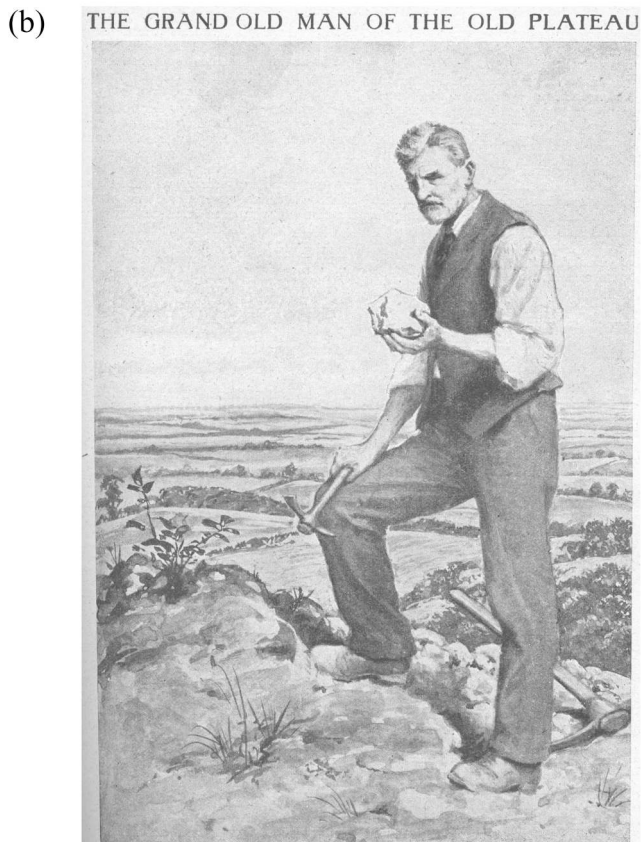
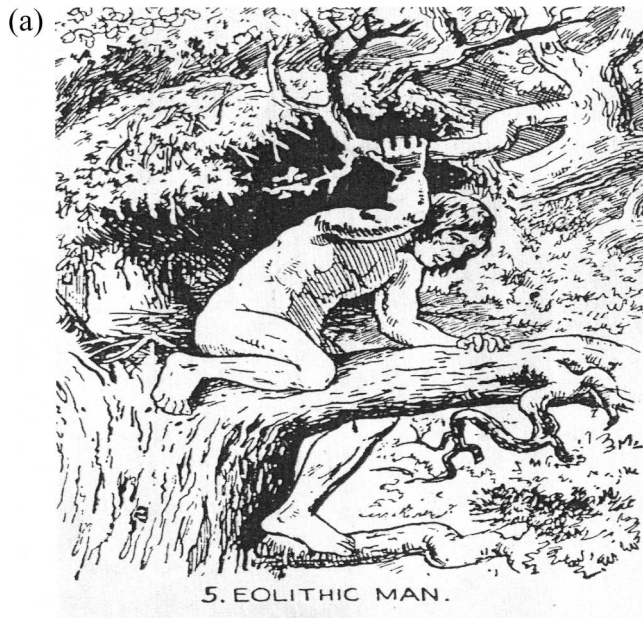


Figure 1. (a) An evocation of 'Eolithic Man'. Drawing by J.A. Kendrick, in Airne (1950, 4); (b) An heroic depiction of Benjamin Harrison as 'the grand old man of the Old Plateau' (Mee 1936, 429).

narratives, which in turn produce temporal movement. In this process landscapes act powerfully *as* memory and *on* memory, anchoring events, while daily passage through a landscape becomes a series of biographical encounters, recalling traces of past activities, previous events and the reading of signs. In other words, landscape is continually being enculturated, providing an endless order of possibilities. Recent anthropological writing has embellished these foundational observations, emphasizing how walking is not only 'an accomplishment of the whole body in motion' (Ingold and Vergunst 2008, 2–3; also Lee and Ingold 2006), but multi-sensorial. Moreover, since social anthropologists have hitherto undertaken their work on foot, walking might be considered intrinsic to ethnographic methodology and therefore something we need to be conscious of when interpreting data.

Walking as a methodology, as a way of progressively revealing spatial and thereafter historical relationships, is crucial to understanding the development of those academic disciplines involving fieldwork: in addition to geology (Jackson 2007) and archaeology (Bond 2011), geography (Driver 2000), cartography (Hewitt 2010), local history (for example, Hoskins 1954), botany and ecology (Burt and Thompson 2020; de Bont and Lachmund 2017), and of course ethnography. The early geologists acquired knowledge by conducting fieldwork in the course of its applications, as with William Smith's patterns of movement during the 1790s while working on the canal system. The very term 'geologising' like 'botanizing' evokes movement through the landscape, as does the work of those geologists initiating our understanding of rock distribution: such as Archibald and James Geikie, and Hugh Millar. The work of geologists involved survey and making maps which necessitated a very serious pedestrian engagement with the physical landscape and a particular selective representation of its elements (Rudwick 1985, 37–41). The art of geological walking since Charles Lyell (but before aerial survey and remote-sensing technology) has been to move linearly through a landscape placing each feature within a geological process, and more vaguely to acquire 'a feel for the land'. Thus, Bennett ([1907] 1917, 94–95), a professional who spent his working life with the U.K. Geological Survey, and who walked with Ben Harrison, writes as follows in his account of a walk between Ightham and Terry's Lodge in the Weald of Kent:

At the bottom of the slope we come to the Fen Pond, and to the Gault forming the flat there. Here note the large block of Oldbury stone. Some consider that these may be due to glacial transport, but they may be the hard insoluble part of the Folkestone Beds from Ightham Court Lodge ... The outcrop of the Gault extends for a mile, and just before we come to the cross-roads we lose the Gault which dips under the Chalk (though the dips are not visible). Quitting the road and closely examining the surface of the fields – here cultivated – we may see some change in the soil. But all over the surface we shall see a scattering of flints, the Chalk Scarp Drift which obscures the Gault clay [... A ...] trackway ascends to the crest of the scarp ... We may see, in the sides of this trackway, a hard ledge, in the chalk cutting, composed of angular pieces of chalk cemented into a hard breccia ... [And so on].

The basic geology of the Weald (both solid and drift) as understood today and how encountered by Harrison is shown in [Figure 2](#).

The idea of 'fieldwork' was still developing as a scientific activity in the late nineteenth century, and some in the emergent establishment sought to compare its failings unfavourably with the best practice of the well-equipped lab where measurement could be precisely controlled. It was deemed 'an imperfect form of life which aspired to

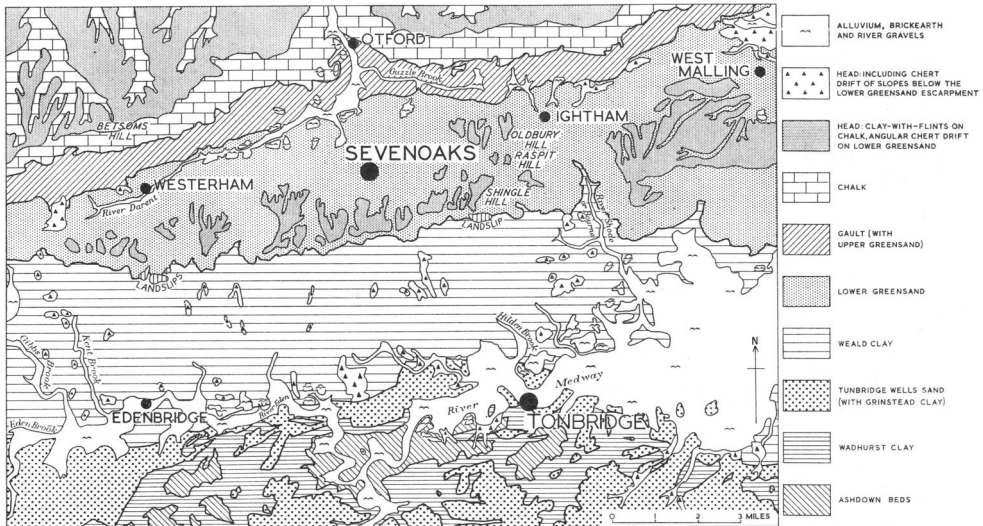


Figure 2. Surface geology of the area around Igtham as known to Harrison. Source: Dines et al. (1969, figure 1). From the North moving southwards there are east–West bands of Clay with Flints, Chalk (Upper Chalk, Middle Chalk and Lower Chalk), Gault clays (with Upper Greensand), Lower Greensand, Weald Clay (all Cretaceous). See also Ordnance Survey Geological Survey of Great Britain, sheet 287: Sevenoaks, 1971.

the status of physics’ (Schaffer 1994, 8, 11). For Schaffer (10) this is weird, as the lab is a deliberately artificial environment excluding variables and interfering phenomena. The field, by comparison, is ‘real’ containing all factors likely impacting on the expression of phenomena to be measured. For this reason, calibration between field sites, as between different labs, became an issue. But fieldworkers from lab backgrounds had routinely and systematically underestimated the problems of fieldwork, where ‘the significance of ... body techniques [is] completely inescapable’ (28). Fieldwork undeniably incorporates interference including the subjective influence of fieldworkers themselves.

Most of us are generalist walkers, but as the disciplines developed and were codified, subject-specific kinds of walking evolved that required focus on certain landscape features rather than others. Specialist walking as a geologist or archaeologist is different from that of an ordinary person. Specialists ‘see’ and experience things around them selectively, while collectors walking through landscapes can be obsessive in their field of vision. Harrison, as we shall see, had a multi-sensory and generalist experience of the landscape as part of his ‘everyday life’, which influenced his geological interpretations and collecting. The generalist/specialist distinction is therefore blurred, providing both empirical clues to where he might find objects of interest, but also generating wider insights about the landscape. That landscape was largely the Kentish Weald, to which we now turn.

The history of Wealden geology

Once William Smith had discovered the basic principles of stratigraphy and uplift, it was only a matter of time before the basic geology of the Weald would be understood (Figure 3). By 1806 John Farley had drawn a geological section of the Weald, and the

dynamic character of the formation would be made clear through the work of Charles Lyell and his rules of uniformitarianism. Lyell devotes two chapters of *Principles of Geology* ([1830] 1991) to describing the erosion involved in forming the Weald, and to demonstrating the time available for natural selection to operate. Darwin drew on Lyell's example and Ramsay's data in *On the Origin of Species* to estimate the rate of erosion of the Weald's layered dome of Lower Cretaceous rocks, suggesting that it must have taken some 300 million years. This spectacular error of calculation by Darwin (Darwin and Costa 2009, 285–286, n1) was subsequently revised, but modern dating puts the Wealden clays at 130 million (that is early Cretaceous) on top of which there were late Cretaceous deposits which had eroded at a rate of 1350 metres over 66 million years (Jones 1999). Today, the central Weald is an 'area of rolling sandstone hills older than the limestone of the Downs', an anticline or unbuckled dome from which has eroded the chalk cap that previously connected the North and South Downs, exposing underlying strata (Darwin and Costa 2009, 285, n2).

Harrison had read Lyell and from 1879 was acquainted with Joseph Prestwich who had worked out the Quaternary geology of London and Kent. They argued that the basic observation needing to be understood was that the Weald presents us with a dome in which the central part has been uplifted and subsequently eroded (Figure 4). Thus, in a section across the Weald you moved from recent Pleistocene and Holocene strata along the edges, and with increasing altitude there were older Pliocene strata. The top of the dome was exposed Eocene chalk, and in places 'clay with flints' deposited during the Pliocene-Pleistocene on eroded chalk surfaces. Harrison, therefore, searched for palaeoliths in Quaternary clays and gravels, but with Prestwich's encouragement searched for even earlier human artefacts (eoliths) in higher Pliocene deposits. The eroded top of the Wealden dome, exposing the early palaeolithic and 'eolithic' deposits,

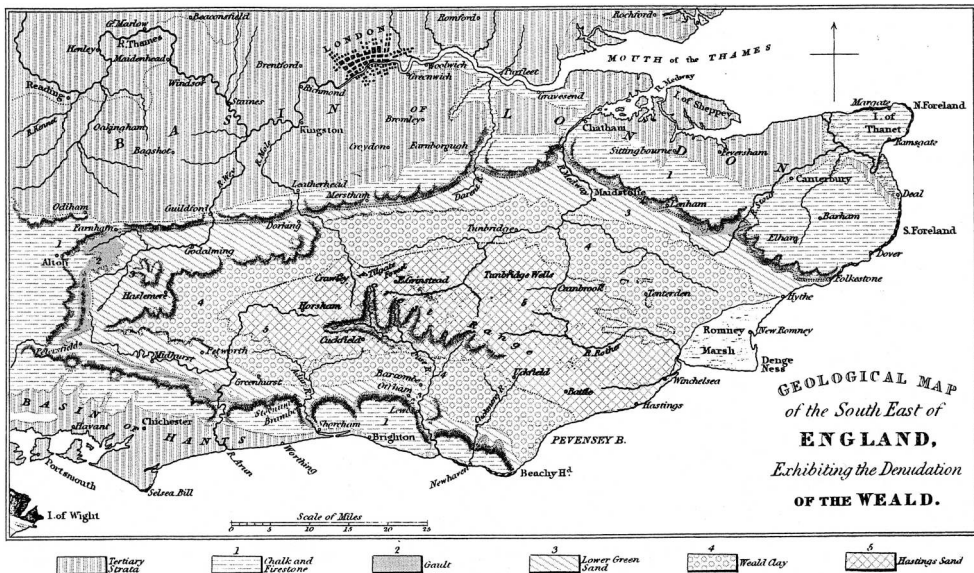


Figure 3. Map of the Weald 'exhibiting the denudation': from the facsimile edition of volume 3 of Charles Lyell's *Principles of Geology* ([1830] 1991, plate 5). The original plate was hand-painted in six colours; here they are adapted to black-and-white shading.

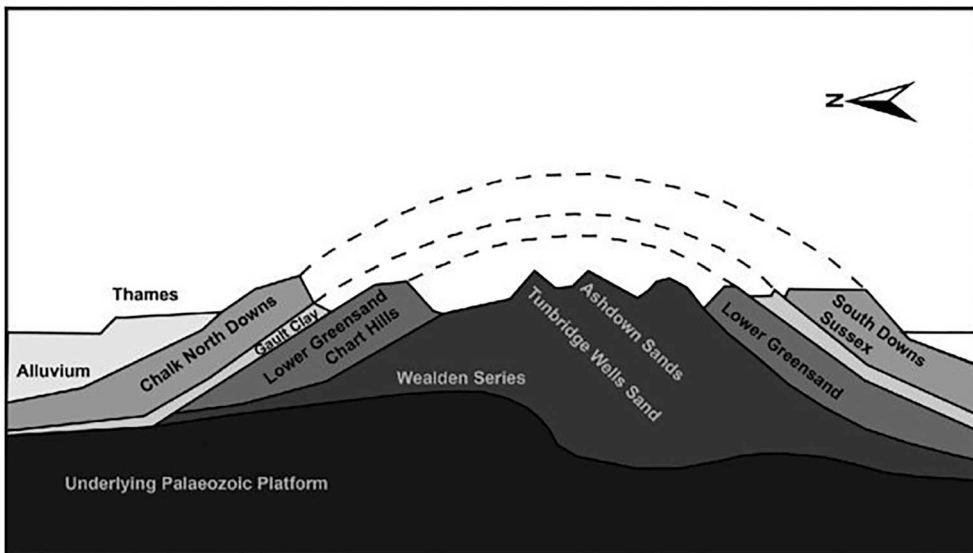


Figure 4. The basic north–south section of the Weald showing uplift and the eroded ‘dome’, simplified with vertical axis exaggerated. Reproduced from Johnson (2017, 186, figure 12.4).

became known as the ‘Plateau’ and its human or proto-human inhabitants as ‘Plateau Man’. Thus, the ‘Old Plateau’ that Harrison and others in his circle constantly mention refers to an uplifted eroded modern remnant of an eolithic world, not that world itself.

Prestwich assumed that the Weald revealed a pattern similar to the Somme and Thames terraces, where greater heights meant greater antiquity (O’Connor 2007, 136), suggesting that the Weald had been formed through glacial rather than marine or sub-aerial denudation. Prestwich believed Kent’s eolith-bearing drifts were pre-glacial or early glacial, and established a type site for the most ancient group of flints at Ash, 500 ft asl (O’Connor 2007, 139–140, Table 5.1). Harrison therefore moved his hunting territory from high level drifts to the plateau above.

The life and times of Benjamin Harrison

Benjamin Harrison was born in 1837 and grew up in and around Ightham in Kent, where for most of his life he ran the grocery store. The youngest of four children, it was his brother Thomas who sparked his interest in geology and in the ‘antiquity of Man’, inspiring him to read widely. Tom emigrated to Australia in 1852 (Harrison 1928, 37), but left behind Robert Chamber’s *Vestiges of Creation*, which Ben consumed despite his mother’s disapproval. This informed his understanding of human evolution. The habit of reading remained throughout his life, no doubt encouraged and nurtured by his reading of other books owned by Tom such as Lyell’s *Elements of Geology* and Gilbert White’s *Natural History of Selbourne*. He was also a lifelong subscriber to many popular periodicals featuring articles on human origins, for example *Cornhill Magazine*. His interests were catholic. He was a keen observer of all the natural history of his ‘world’, as attested by any reading of his twenty three notebooks, or indeed of Edward Harrison’s *Harrison of Ightham*. Most of his knowledge, and the objects which he collected, he

acquired during walks in the vicinity of Ightham, though he later interacted with many like-minded amateur prehistorians who shared his interest for the earliest evidence of human life on the Wealden plateau.

His immediate circle included illustrious figures. Prestwich, who he first met in 1879 (O'Connor 2007, 135), has been mentioned. It was Prestwich who confirmed in his mind that the older Palaeolithic stone tools were to be found at higher levels, leading him to redirect his searches. Indirectly, it was the basis for his reasoning that eoliths, largely found on higher levels of the North Downs in clay-with-flints deposits, were therefore the earliest tools produced in the area, rather than the largely natural forms we now know them to be. He later endeavoured to explain the technological changes between what he maintained was the production of eoliths and the oldest palaeoliths, often found at around the same level on the Downs, by suggesting that some of the crudest palaeoliths represented the transition between eolithic and palaeolithic technology. His twelve sketchbooks and the notebooks contain illustrations of what he considered examples of this transition. He had an infrequent but amiable relationship with John Lubbock (Lord Avebury), and a more fraught one with Sir John Evans, two leading players in the drama of early British prehistory. Evans stubbornly refused (as Harrison saw it) to accept eoliths as artefacts, while Lubbock's opinion was more emollient.

An early interest in 'curiosity shops' had familiarized Harrison with Neolithic polished axe heads, which he began to find around Ightham. This would lead to his documenting the Neolithic monuments of the Medway valley. It was, however, his reading of an article in the *Geologist* about stone tools even older than the Neolithic as described by Boucher de Perthes, that in 1863 resulted in him exploring the valley of the Shode, a small river running from the Vale of Holmsdale at the foot of the North Downs and through Ightham. He found his first lower palaeolithic handaxe in Furze Field (or Heron Shaw), which he sent to his brother Tom in Melbourne. Later that same year he found his second palaeolith in Rosewood, one of many now in Maidstone Museum. He was also to investigate Oldbury Hill, best known as an Iron Age settlement, but where he retrieved tools different from those associated with the so-called river drift, similar to those of the cave systems of Southwest France. In 1890 he began excavating the eastern slopes of Oldbury finding implements he hoped would confirm his theory of Palaeolithic human habitation (Harrison 1928, 155). A year later while following the course of the Shode towards Basted village, he discovered rich palaeontological material in several fissures of a newly opened quarry, later excavated by Lewis Abbot.

However it is for eoliths that Harrison is most remembered. He was first alerted to their existence as 'brownies' on the crest of the North Downs around Ash through a chance encounter with his future mother-in-law in 1864. In 1886, with Prestwich, he presented his findings to the Anthropological Institute. By this time eoliths were becoming his main preoccupation, to the detriment of work on other aspects of early human existence around Ightham, and adversely affecting his reputation. The rest of his life was spent further substantiating his claims. He became the hub of a network of enthusiasts, was a pioneer and important collector of lower palaeolithic artefacts generally, and an unsung contributor to understanding the geology and archaeology of the Weald. These wider contributions were arguably obscured by his obsession with eoliths, which led eventually to marginalization and mockery. The problem of eoliths had not been resolved by the time of his death in 1921.

Methodology

We describe Harrison's walks mainly using accounts in his Notebooks lodged in the Maidstone Museum. We have also during 2022 undertaken seven walks ourselves based on Harrison's routes, and thereby, through a kind of post mortem participant-observation, gained insights that might not otherwise have been possible. We are not seeking to mechanically reproduce Harrison's results by re-tracing his steps in the ways attempted by some historians of the physical sciences (Fors, Principe, and Sibum 2016), but rather repeating episodes from his walks as a qualitative exercise to better understand the landscape as Harrison saw it, the objects he found and the inferences he drew.

Our initial source of data for Harrison's walks was his son's account of his life, *Harrison of Ightham* (Harrison 1928), and Notebooks lodged in the Maidstone Museum and previously transcribed and annotated by Muthana.¹ Starting with *Harrison of Ightham*, we identified 311 walks. We then added data from the twenty-three Maidstone Notebooks. Harrison Notebooks are also lodged in other archives (for example, the BM and Croydon) though we focus here on the largest collection, in Maidstone. Ellen created a consolidated list of all dates recorded in *Harrison of Ightham* and in the Notebooks. All dates for discrete outings are numbered chronologically. There are 1391 dates. We call these 'outings' because they are not always walks. Mostly, Harrison walked, but occasionally he travelled around by horse, as did Lyell before him (Wilson 2007). Harrison recalls once falling from a horse at Fen Pond in 1868 on his way to Ash. He also travelled by fly, trap, carriage, increasingly by train, and latterly by motor car. The first mention of a car is of one which broke down on Dark Hill in 1898 and had to be towed to Durling's yard by horse (Harrison 1928, 217; entry 711 in our consolidated list). These were forms of non-pedestrian movement that could more easily take him further afield, and extend his geographic range, especially as he grew older. Harrison's stamina was remarkable. He would often get up early and take a lengthy and productive walk before returning to Ightham to open the shop. By the age of 73 long walks were becoming a thing of the past (Harrison 1928, 294, 301), and his son references a note to Lewis Abbott written in 1912 in which he draws a circle of six miles diameter from Seal to Comp, which he suggests is the range 'his old legs might cope with'. In a note from the following year Harrison gives his walking limitation as a two mile radius from home.

The 1391 outings for which we have data cannot represent the total number of walks Harrison undertook during his life pursuing amateur investigations as an archaeologist and geologist. Not only may there be notebooks elsewhere, but it is also likely that many walks, especially for the early period, went unrecorded. In 1900 he wrote retrospectively of walks from the 1860s and 1870s, and it is prudent to doubt the accuracy and completeness of these accounts. Although tempting to speculate how many walks Harrison actually undertook, he often pasted details of the same walk spread around different notebooks, and also in separate drafts he was preparing for an autobiography. Some of this cross-pasting may have been undertaken by Edward. The years 1885, 1886, 1892, 1893, 1895 and 1896 contain the highest number of duplicates and these may correspond to periods when Harrison was mostly engaged in searching for eoliths. We have removed duplicates where possible, sometimes combining information from several entries in different notebooks that relate to the same day.

Each walk has been given an identifying number (Appendix 1). On the basis of this we manipulated data to show significant patterns over time. A selection of walks were traced on to a map (Figure 6) to illustrate the core area of Harrison's walking, the extent to which he travelled and any network characteristics. In addition, during 2022, Ellen and Muthana re-traced some of the most important of Harrison's routes in an attempt to gain insights into how his walking translated into a distinctive and informed way of understanding ancient landscapes and as a strategy for locating the artefacts that he sought to recover. Another source of information was the database of eoliths collected by Harrison and his associates, earlier produced by Muthana and lodged in the Maidstone Museum (Ellen and Muthana 2022, 188). The objective here was to examine the relationship between Harrison's walking practices and the objects he found and sought to interpret.

Harrison's working and walking practices

At a time when walking has become largely a recreational and health-enhancing activity, it is difficult to appreciate its ubiquity as a commonplace mode of transport in Victorian and pre-Victorian times, especially in the countryside. Even children as young as 11 could walk from York to London and think nothing of it. In 1911 Harrison recalls speaking with an elderly lady in his shop who had walked from Portsmouth to join her son who worked in Chatham Dockyard. Harrison himself walked his entire life, and it was through his walking that he came to know not only the contemporary landscape of the Weald, but in his imagination re-constructed the ancient dome of the Weald at the Pliocene-Pleistocene boundary, and used this as a model to interpret what he found on his walks and to predict likely sites revealing evidence of eolithic activity.

Harrison's methods were what we would now call 'field walking' and 'surface archaeology', occasionally removing finds from exposed strata and digging small pits. Although full-scale excavation of early Palaeolithic sites had begun with Boucher de Perthes, this was not Harrison's preferred method. He did supervise a British Academy dig, but much later, in 1902. He took advantage of ploughing that revealed artefacts, and of the arrays of stones across newly rain-washed fields. By 1918 (entry 1390) he describes how fields ploughed for the first time in order to aid the war effort were yielding material that would not otherwise have been unearthed. There were also opportunities afforded by worked and disused flint and ragstone quarries (for example, Stangate quarry: walk 346), chalk pits (for example, Kemsing chalk pit as early as 1865: walk 16), brickyards (over ten references, but see for example, his account of 'Saxby's brick earth pit' in 1895: walk 474), trenches exposed during pipe-laying (walks 231, 238, 1036), and any 'pit' dug by almost anyone for almost any purpose (for example, 'the pit dug by Hodges' on the crest of the Downs near Drane Farm in 1894: walk 513). Some pits were deliberately commissioned by Harrison for money, which prompted labourers to undertake further digging. In October 1898 he walked to Old Soar to inspect the boring for the coal works, and notes that they were through twelve feet of yellow Atherfield Clay to the lower and older Weald Clay (entry 717). He was also much exercised by the new cuttings for the London, Chatham and Dover Railway line that opened from Sevenoaks, through Eynsford, Shoreham and Otford in 1862, and extended to Maidstone via Kemsing and Borough Green in 1874. This latter revealed both local stratification, and yielded artefacts. And in December 1914 (entry 1379; also Harrison 1928, 309) he notes

how the digging of trenches around Wrotham, presumably anticipating an invasion, and which would in that event provide protection for main roads, allowed an examination of the gravels at some depth.

Harrison would bring his haul of specimens home in pockets and a satchel and then arrange them in his 'Museum'. This would be the site for a further sorting process and objects that he rejected as non-artefactual accumulated on tips outside his house. With a full-time occupation his walks had to be fitted-in during times when not required at the shop. His walking was constrained by seasonal factors, including length of daylight. He was more active between April and September than between October and March. He would often rise early and be on the road by dawn and back in time to open the shop before 9.00 am He would walk for three or four days in a row, taking advantage of holidays, including Sundays. This is reflected in the temporal pattern of his walks. It was the situation of people like Harrison, working men engaged in significant amateur scientific activity, that encouraged Lubbock to introduce the 'bank holiday' bill to Parliament in 1871, and from which Harrison evidently benefitted.

Most of Harrison's walks were solitary, but he was a social if not a gregarious person, often calling on people he knew. He walked with a combination of local friends and family (especially his son Edward) who shared his interests in prehistory, and increasingly with visitors from near and far, including parties and excursions from geological and other learned societies. Of the individuals, those mentioned most frequently in the Notebooks include F.J. Bennett (mentioned 36 times, peaking between 1899–1909), Henry Stopes, de Barri Crawshay, Willie Tomkin (who worked closely with Augustus Pitt-Rivers), the geologists William Topley and A. Santer Kennard, Flaxman Spurrell, F.W. Shilling, J. Russel Larkby, the fern expert Charles Druery and W.J. Lewis Abbott. With these he would regularly exchange found objects as well as ideas and information. His more illustrious walking partners, who he worked with to promote and defend the eolithic cause, as we have seen, included Lubbock, Evans and Prestwich. He first walked with Lubbock and Evans in 1871, and with Prestwich in 1880, continuing intermittently until they could no longer manage Harrison's hikes, that is until 1899, 1909 and 1897 respectively. There were other celebrity visitors including Clement Reid, the zoologist E.R. Lankester, the anthropologist E.B. Tylor, the geologist Thomas Bonney, the labour politician Keir Hardie and Alfred Russel Wallace. Especially latterly, there were visitors from overseas, including the German physiologist Max Verworn, the US zoologist A.S. Packard, and the US anthropologist George Grant MacCurdy. But these walking companions were all, it must be said, male.

The geography of Harrison's walks over time

A network of walks

Appendix 1 provides a selection of entries for Harrison's walks from a transcription made by Muthana of the Notebooks. Appendix 2 lists a sample of Harrison's walks shown as links between significant places visited for two years, 1892 and 1893, the two years immediately following the presentation of the paper by Prestwich and Harrison at the Anthropological Institute (Muthana and Ellen 2020, 2), and drawn from a period when Harrison was beginning to fully engage with the eolithic problem. In all cases, Ightham is the locus from which walks radiate, and in Appendix 2 we have estimated distances

travelled from Ightham that were manageable on foot in a single day. In interpreting the walks we need to take into account subsequent land use change. Comparison of maps available in Harrison's life time with the modern Ordnance Survey indicates that woodland around Ightham has expanded to encompass areas that Harrison would have known as open fields, though many of the boundaries remain un-altered despite the pressures of modern agriculture and road-building. Harrison was able to make good use of early Ordnance Survey maps, at least one of which in the Maidstone archive was annotated by him (Figure 5(a)), while maps produced by his son for *Harrison of Ightham* but unpublished (Figure 5(b)), show the key places and features visited.

The most visited places are within a radius of 4 miles of Ightham. The most frequently mentioned is Oldbury (116 mentions), then Ash (108), followed by Borough Green (56), Sevenoaks (52), Fane Hill (49), Shoreham (48) and Kemsing (33). Apart from Oldbury (mainly of interest because of its Iron Age fort and Middle Palaeolithic rock shelters), Fane Hill is a salient location in Harrison's lower palaeolithic investigations, first walked with Evans in 1881 and last mentioned in 1918. This is only slightly less important than the Basted fissure at 50 mentions, which he first reports in 1891 and last mentions in 1908. The dated entries record where he went, who he went with and who he met, where he supped, and report features that he regarded as significant (such as swallow holes: entry 599) as well as exceptional finds. There is less detail on the archaeology than one might expect. He was increasingly interested in 'The Plateau', the high areas of the Downs where 'spreads' were to be found yielding eoliths, and in 'ochreous patches'. On 23 June 1899, for example, Harrison reports spending time with E.B. Tylor searching the Plateau for eoliths (walk 755).

In Figure 6 we have transcribed the walks for (a) 1892 and (b) 1893 onto a map of the local area. This produces a network, web or bundle of interwoven lines, such as classically developed in geography by Haggett (1967) highlighting the most frequently visited pathways, with obvious nodes or knots at much-frequented places (Terry's Lodge, Ash, Parsonage Farm, Fane Hill), and showing other places as peripheral outliers. The frequency with which certain places were visited and the relationships between them inevitably influenced the pattern of objects collected and Harrison's interpretation of the evidence for 'eolithic man'.

The geography of eoliths

In 2007 Muthana created a FilemakerPro database of all objects described as 'eoliths' in five collections in southeast England, most of which were sourced to Harrison himself (Ellen and Muthana 2022), many a consequence of walks described above. The locations where the eoliths were found are usually written on the objects themselves, on museum labels or inferred from discussion within his Notebooks. Some locations are expressed as quite specific toponyms (for example, Sparks Farm) with no further information. Further research, using Ordnance Survey maps and in particular sketch maps drawn by Edward Harrison (Figure 5(b)) has allowed us to provenance most of these.

Appendix 3 shows places of origin of eoliths recorded for Kent in the museum collections studied. Some are provenanced only to 'Kent general' (333), 'Kent Plateau' (86), 'North Downs' (1), 'Plateau East' (130), or 'Plateau West' (97), but most can be allocated to more specific localities. These are listed in Appendix 3 in terms of pre-1870 parish boundaries that would have been familiar to Harrison. All objects were collected by him or one of his close associates and are those described in museum labels as 'eoliths'. In interpreting

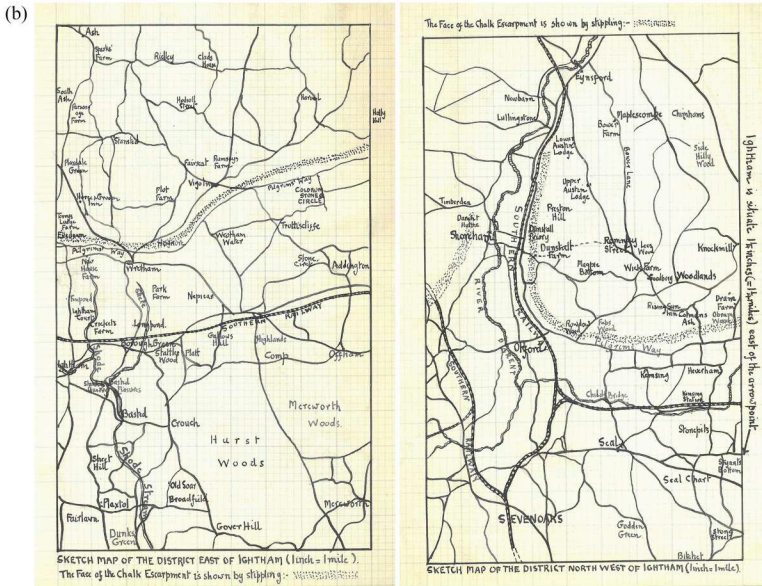
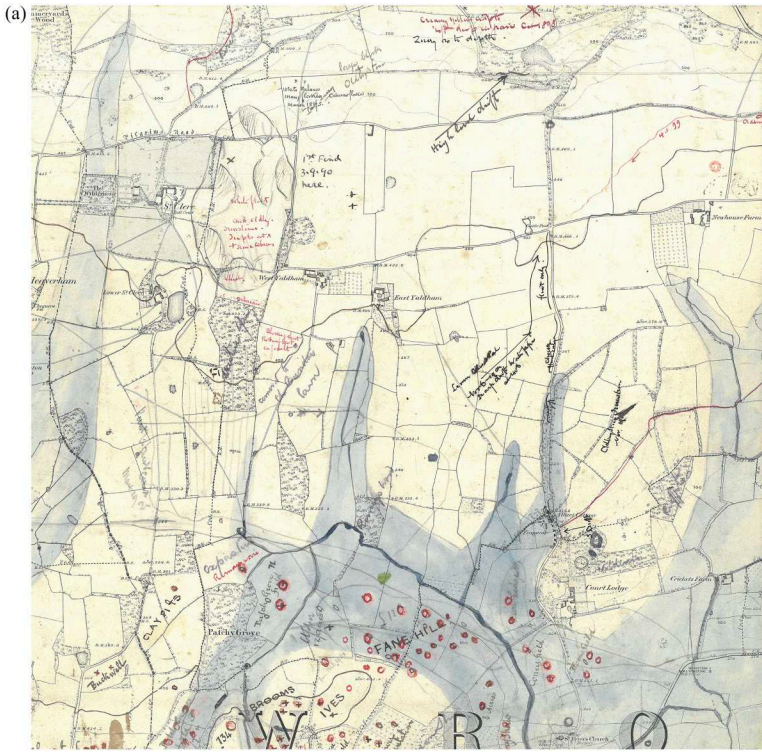


Figure 5. (a) 1880 Ordnance Survey map for the area immediately north of Ightham, owned and annotated in red and black ink by Harrison (Maidstone Museum Harrison Folder 29.30.31). It shows points of archaeological and geological significance relating to his walks, including positioning of lithic finds; (b) Original sketch maps on squared paper by E. Harrison of Ightham area showing toponyms featured in his father's walks (Maidstone Museum Adlib NO_ID46559). These were printed in his working copy of *Harrison of Ightham*, but not included in any published version. The face of the chalk escarpment appears as stippling, a zone particularly rich in eoliths.

these data we need to make a few cautionary observations. Firstly, the spelling of names in museum records sometimes differs from what is currently recognized, especially if we take into account the idiosyncratic character of Harrison's spelling. Thus, 'Barnshatch' is the same as Brands Hatch, 'Drain Farm' is Drane Farm, Hodsoil Street is Hodsoll Street, Kemsley is Kemsing, Kingsdown is West Kingsdown, and Aldham is Yaldham. When in doubt we have used the spelling found on the most recent edition of Ordnance Survey maps. Secondly, locating places given as provenances is not always easy and we have not been able to trace all locations mentioned in the catalogues and archives (for example, Dorland). Thirdly, because so many sites are listed, many of which could easily be subsumed within more inclusive local designations, we have ordered the data in Appendix 3 basically by parish. For example, the parish of Ash includes Ash, North Ash, South Ash, Fawkham Green and Ridley. Two parishes listed in the database (Tatsfield and Titsey) are in Surrey, and together with Clapham (London) we have simply left these out for convenience. However, other specific sites within parishes are so significant in the eolith literature (such as West Yoke and Terry's Lodge) that we have listed these separately in Appendix 3, while indicating that they are a subpart of a parish that also includes other sites not separately listed. Where locations are only given at a sub-parish level to hamlets, farms or other landscape features, we have where we can identify them, included these objects under the name of the nearest parish, village or urban centre. For example, 'Parsonage Farm' alone is subsumed under Ash.

Most eoliths are recorded for Ash, by a significant margin, and then Ightham and Stansted, followed by Eynsford, Shoreham, Wrotham, Halling and West Kingsdown (Appendix 1). These parishes correspond well to the areas in which Harrison was walking. It is not a random distribution but reflected his knowledge of characteristic features of an imagined eolithic landscape, corresponding to parts of the High Weald where Harrison predicted the presence of eoliths given the exposure of the Pleistocene/Pliocene deposits. In other words, his steps were determined by an understanding of the geology. [Figure 7](#) shows the density of eolith finds by parish, displayed geographically, and matching well the pattern of walks shown in [Figure 6](#). Finds outside the areas of greatest concentration are less convincingly correlated with expected geology.

Discussion and conclusion

How did Harrison's walks influence our understanding of the geology and archaeology of the Weald, as well as the portrayal of an imagined eolithic landscape?

Through acknowledgment of his peers and the most influential geologists and prehistorians of his day, from our reading of the Notebooks and from a close inspection of museum collections, there is little doubt that Harrison contributed hugely to museum collections and to our understanding of the Quaternary geology and Palaeolithic archaeology of the Weald, especially the difficult interface between Pliocene and Pleistocene deposits. Unfortunately, his modesty, probably his deafness, and his diffidence in presenting and writing-up findings meant that knowledge of his critical role was lost to his immediate successors. A great deal of what, for example, the later Prestwich and others were to publish owed more to Harrison's discoveries and insights than even they recognized, for example the rich palaeontology of the Basted Fissure (for which Lewis Abbot was later to take credit), the morphology and variation of lower palaeolithic hand axes,

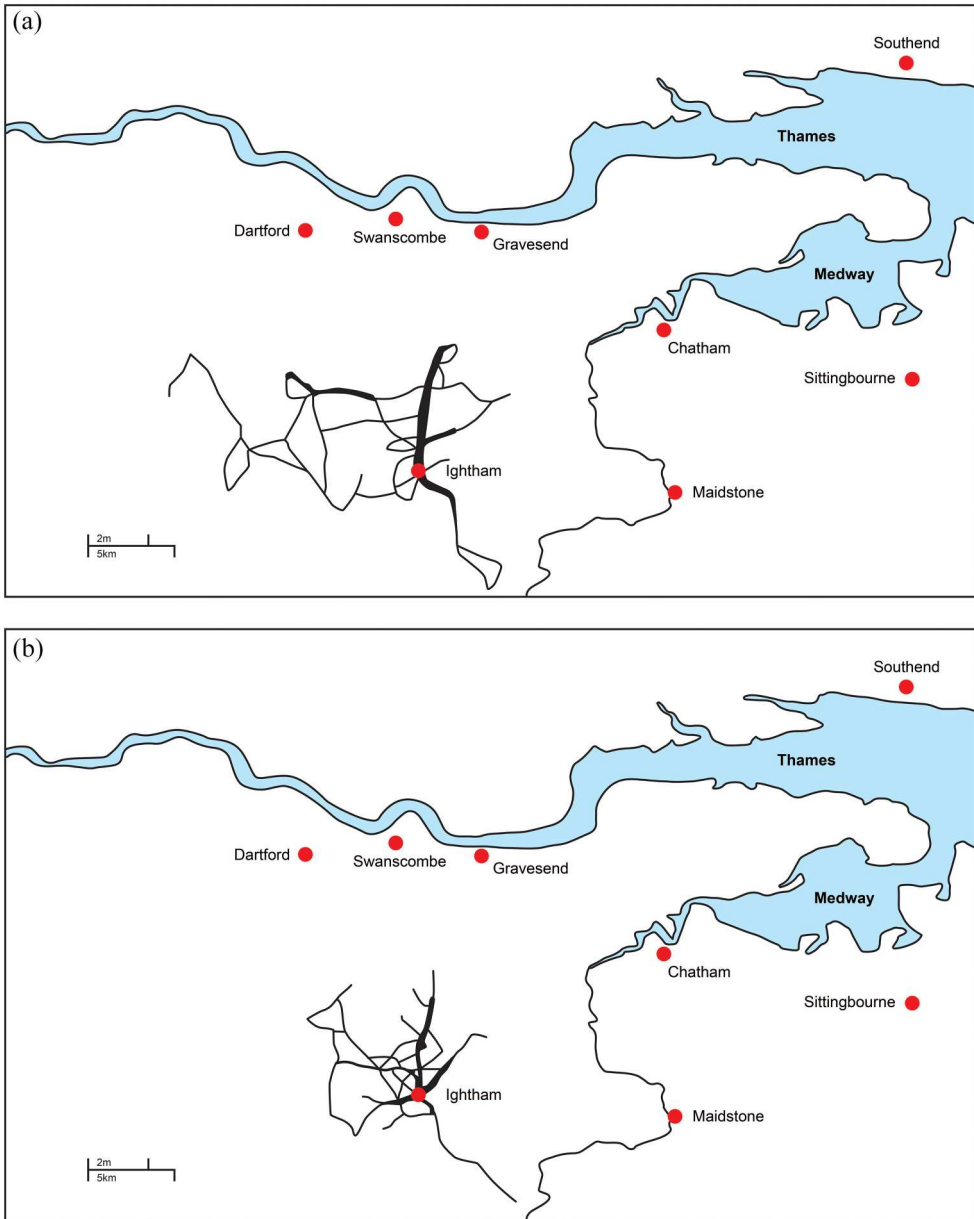


Figure 6. Network of walks undertaken by Harrison in search of eoliths and palaeoliths during (a) 1892 and (b) 1893. Thickness of line indicates density of walks recorded for these years.

and the compositional character of the high level ‘Plateau’ deposits (see for example, Wenban-Smith et al. 2019). However, his association with the eolithic idea and its subsequent trashing tarnished his reputation for more than a century, despite the fact that this episode in the history of archaeology was itself crucial for our later understanding of the earliest phases of prehistory (Ellen and Muthana 2010). The same walks that gestated the eolithic problem were those that fostered all Harrison’s contributions to geology and palaeolithic archaeology.

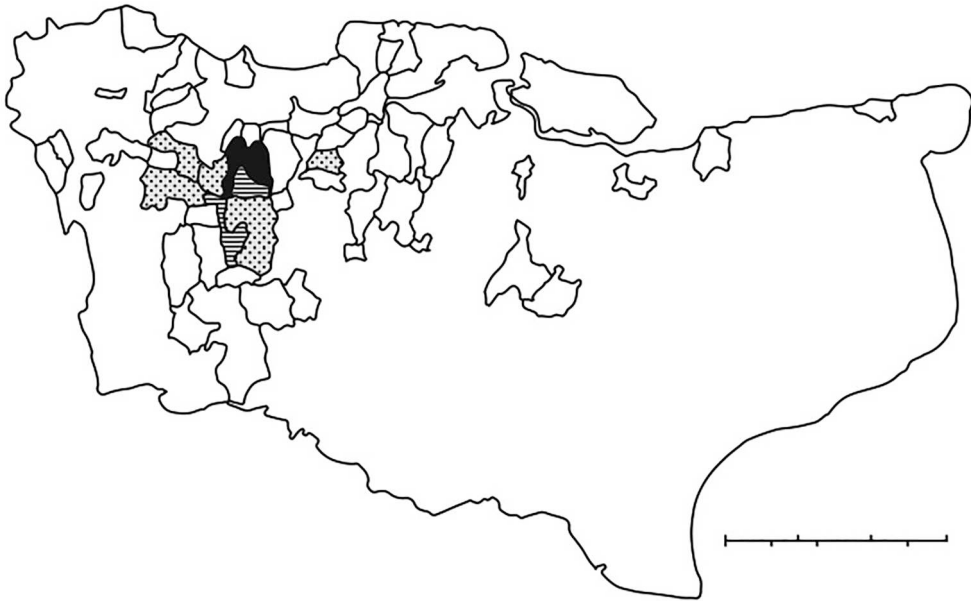


Figure 7. Geographic distribution of Harrison's eolith finds based on Appendix 2 and the pre-1870 parish boundaries (Lawson and Killingray 2004). Parishes shaded black (Ash) yielded over 1000 finds; parishes hatched (Ightham and Stansted) between 100 and 999; parishes stippled (Cuxton, Fawkham, Halling, Meopham, Shoreham, West Kingsdown and Wrotham) between 10 and 99; while unshaded but marked parishes yielded less than 10.

The local geography of eolith distribution was largely created through the walks of Harrison and his associates between 1870 and the 1920s, and is neatly inscribed over a geological landscape constituted through the eroded and uplifted dome of the Wealden landscape in which eoliths were found at the highest levels: the so-called 'Kentish plateau'. Harrison himself emphasizes (Anon. 1902, 1) that eoliths were to be found both on the surface and in situ in the gravels. No palaeoliths were ever found in any pits that he dug in these places, suggesting to Harrison and his supporters human activity older than the palaeolithic. He also found gravels older than those that could be linked to Palaeolithic rivers, and for Harrison some eoliths were undoubtedly carried in these gravels from Wealden heights long eroded. It was Harrison who 'revolutionised existing ideas on the age and character of the drift deposits that cap the chalk downs in western Kent' (Anon. 1897, 640). An objection to Prestwich's interpretation had been that most eoliths had been found on the surface and therefore might be newer than the gravels (147), but Harrison, Topley and Prestwich were satisfied that implements turned up by plough belonged to the gravels.

By the end of his life Harrison had undertaken well in excess of 1391 outings, most of which were walks or part-walks. Given that there are diaries elsewhere, and likely walks that were never documented, the number must have been higher. Harrison's walking, though informed by his autodidactic reading and by interaction with other enthusiasts and luminaries, was embedded in practices that had developed over many years. The walks were motivated by a range of interests in history and natural history, and followed routes often influenced by patterns of social interaction, hospitality and the necessity to

pursue life as a local resident and village shopkeeper as much as by his definition as a geologist or archaeologist, factors we now know to be relevant to understanding processes of data gathering elsewhere in the historical record (see for example, Isayev and Mueller-Wille 2022; Young 2022). In other words, the walks were embedded in everyday life rather than in a professional rule-based methodology. This approach inevitably influenced his ‘generalist’ appreciation of landscape, embodied through habits of a lifetime. Richard Long in his experimental artwork ‘A ten mile walk England 1968’ (Alfrey 2012) follows a direct line across a landscape on the initial premiss that it is a tabula rasa. This would have been counter-intuitive for Harrison, for whom walking routes had to bend with the anthropic morphology of place. Long and his interpreters subsequently discovered that however arbitrary a route it nevertheless confronted physical and anthropic obstacles at every stage. In Harrison’s world, paths are dictated by serial attempts to navigate a route in the physically most appropriate way, mindful of cultural and social impediments: field boundaries and their artefacts, crop types, ownership patterns and so on.

Walking through a landscape is a linear action, but in the process – by overlaps and criss-crossing – we can acquire a sense of stereoscopic space via something resembling a ‘meshwork’ of lines following Ingold’s (for example, 2015) imagery, rather than a network of points. Successive walks along the same trajectory involve overlap, but every new walk brings new experiences and opportunities such that the walks themselves become like frames in a motion picture film, each slightly different from the previous one, but seen together present a continuous and synoptic narrative. The walks are chapters, situated in a story of movement over time, yet aggregated they contribute towards a sense of place and provide a framework that can eventually dispense with the trappings of personal journey and become mimetic knowledge, a transformation from one-dimensional linear forward movement rooted in episodic memory to a two-dimensional map, three-dimensional sections and a four-dimensional understanding of change.

Note

1. The Maidstone Notebooks comprise the following: NB4 (1887–1889), NB5 (1884–1887), NB6 (c1879), NB8 (c1890), NB9 (1904 or later), NB10 (c1890), NB12 (c1892), NB13 (1893–1896), NB14 (1896–1897), NB15 (1890 or after), NB17 (1874–1898), NB20 (1870–1900), NB21 (1903–1904), NB21a (1901–1902), NB22 (1905), NB23 (1907 or after), NB23a (1902–1903), NB24 (1907–1908), NB25 (1907–1908), NB26 (1908–1909), NB27 (1909), NB29 (1911–1912), NB30 (1899–1900). A catalogue with annotated transcriptions of the Notebooks by Muthana is available at: https://www.kent.ac.uk/sac/research/projects/rfe_cognitive.html.

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Appendices

Appendix 1. A selection of entries for Harrison's walks from a transcriptions made by Muthana from the notebooks. Hol = Harrison of Ightham

-
201. 19.11.85 Out again to the factory. Walked to Fawkham. Found a quartzite pebble on the summit by Terry's Lodge, 770 feet OD and an orange-coloured implement at the latter. Called in on Rebecca. Found a deeply stained palaeolith north of Ash Church. Left at The Black Lion Inn and noted the large spread of pebbles and green-coated flints on the shoulder of the hill, Tertiaries resting on chalk. Hol 110–111. This was the year in which Ben found his first 'high level' or Plateau palaeolith, whilst pursuing his search for the mysterious 'Swanscombe Stone'.
277. 23.10.88 Walked by Ash via Fairseat and Ridley at Hodsoll Street. Across the valley to White Ash Wood and on to Ash Hop Garden. Met Joseph Prestwich and Mrs P there and walked via churchyard to Ash Plain and on to South Ash Farm. They searched for implements. Drove back to Shoreham. Walked the drift at

- one point where they noted the drift which was shortly to be outdone by the drift at West Yoke. BH notes the connection between the two drifts connected by an extinct prehistoric river; Hol 136.
430. 27.08.93 At 07.30 to Fane Hill where he found an implement on the lower slopes. Later that day he walked to Wrotham Hill patch from where he went on to Platt Farm and Fairseat. Home via Wrotham Hill Park.
622. 13.11.96 Drive to Porto Bello with specimens then walked to pit no 3. Planned to meet Sir John Lubbock at Kingsdown but he cancelled so BH went alone to the pit section at Parsonage Farm. On to Chimhams where he found a 'transitional'. Walked on to Swanley via the pebble bed in Farningham Wood Heights; Hol 209.
900. 26.01.02 Walked from Kemsing (got there by train) to Birches and on through an ochreous patch to Terry's Lodge and the reservoir. To the high level section where they found quartz grains which BH thought may have been decomposed grains from the Folkestone beds; Hol 247.
1080. 08.10.05 A fine but dark day. BH out at 09.30 to a brickyard to examine the flints there. On to Wrotham and The Bull where he was 'refreshed'. On via Stanley's land to observe the ochreous drift where he found no eoliths but did locate a *Chara* fossil in the Gault.

Appendix 2. A sample of Harrison's routes for 1892 and 1893

1892

358. 01.05.92 Shoreham - Sevenoaks - Meenfield Hill - Polhill Road (20 km).
360. 16.06.92 Dunstall - Shoreham - Darent Hulme - Romney Street (19 km).
362. 28.06.92 Basted. (4 km)
363. 06.07.92 Sevenoaks - Thong Lane Quarry - Borough Green (14 km).
364. 05.07.92 Otford - The Mount - Cotman's Ash - Birches - Terry's Lodge (10 km). Basted (2 km). Seal Chart (6 km).
365. 07.08.92 Basted. (4 km)
366. 10.08.92 Peckham Wood Corner - Hawkin's Corner - Stansted Heights - Fairseat - Vigo (13 km).
368. 14.08.92 Stanley's Hop garden - Wrotham Place - Telegraph House (6 km).
369. 16.08.92 Downe - Green-Street-Green - Fox's Brewery - Snags Lane - High Elms Park - Well Hill - Knockholt - Cudham - Brasted - Polhill Arms - Shepherds - Meenfield Woods - Darent Hulme - Shoreham - St Clere - Yaldham (33 km).
375. 15.09.92 Knockholt - Sevenoaks - Dunton Green - Polhill Arms - Three Horseshoes - Military Road - Great Peckham Wood - South Beeches Wood - Shoreham - Tubbs Hill - Sevenoaks (19 km).
376. 17.09.92 Basted Fissure - Mill Pond. (6 km)
377. 18.09.92 Furze Field - Fane Hill - Isles - Oldbury ramparts (6 km).
378. 25.09.92 Basted Fissure. (4 km)
379. 02.10.92 Dunks Green - Hadlow - Goose Green (12 km).
381. 06.10.92 Exedown - Terry's Lodge (6 km).
382. 09.10.92 Tubbs Hill - Knole - White Hart Hill - Fawke Common - Bitchett - Seal (14 m).
383. 13.10.92 Shoreham - Darent Hulme - Stone House - Sepham - Heath Lane - Morant's Court Hill - Shoreham (16 km).
384. 16.10.92 Terry's Lodge - Horse and Groom - New House Farm (8 km).
385. 17.10.92 Terry's Lodge. (6 km)
386. 00.00.92 Ash - South Ash - Ash Place. (12 km)
387. 18.10.92 Exedown - Terry's Lodge. (6 km)
388. 00.10.92 Ash. (10 km)
389. 00.10.92 Ash. (10 km)
390. 19.10.92 Ash - Ash Place - South Ash. (12 km)
391. 21.10.92 Dunks Green - Goose Green. (12 km)
392. 23.10.92 Ash - Plaxdale Green (12 km).
393. 30.10.92 Oldbury - Fish Ponds. (6 km)
394. 04.11.92 Sevenoaks - Marle Wood - Sevenoaks or Shoreham (10 km).
395. 06.11.92 High Cross - Dalison's Wood.
396. 13.11.92 Rock Shelters - Middle Wood - Fishponds - Merrimans - Rosewood (6 km).
398. 11.12.92 Basted Lane Plantation - Basted Fissure - Manor House (5 km).
399. 18.12.92 St Clere - Drane Farm - Birches - Yaldham (4 km).

1893

400. 28.01.93 Wrotham - Exedown. (5 km)
402. 05.02.93 Ash. (10 km)
405. 05.03.93 Exedown - Rising Sun - Crowdleham - Heaverham - Stonepits - Oldbury (8 km).
407. 13.03.93 Heaverham - Shore Hill - Bower Lane - Eynesford - Lullingstone Park - Eynesford Castle - Darent Hulme (17 km).

(Continued)

Continued.

408. 17.03.93	Bay Shaw (4 km). Otford (9 km).
410. 28.03.93	Fane Hill - St Clere - Four Wents - Bitchet Wood (11 km).
413. 16.04.93	Shoreham - Dunstall (12 km).
415. 05.05.93	Sevenoaks - Shoreham - Cotman's Ash (16 km).
417. 14.05.93	Crickett's Hill - Wrotham Park (6 km).
418. 21.05.93	Wrotham (5 km). Oldbury (4 km).
419. 28.05.93	Fen Pond (2 km). Otford - Cotman's Ash - Yaldham (9 km). Oldbury - Darent Hulme (16 km).
420. 00.06.93	Oldbury rock shelters - Oldbury ramparts - Heron Shaw (2 km).
421. 04.06.93	Bayshaw. Basted Fissure - Bayshaw Court - Oldbury (5 km).
423. 25.4.93	Oldbury rock Shelters (2 km).
425. 23.07.93	Oldbury hill fort (2 km)
427. 13.08.93	Mist's Hop Garden - Fane Hill. (4 km)
428. 14.08.93	Fen Pond. (2 km)
429. 20.08.93	Ash - West Yoke - Crooked Billet - Plaxdale Farm (16 km).
430. 27.08.93	Fane Hill. Wrotham Hill - Platt Farm - Fairseat - Wrotham Hill Park (8 km).
431. 03.09.93	Fane Hill - Crickett's Farm - Dickey May's (4 km).
432. 10.09.93	Patch Grove - Crowdleham - Kemsing - Cotman's Ash - Birches - Old Terry's Lodge (9 km).
433. 24.09.93	Basted Fissure - Longlands - Grove Wood - Johnson's Field (4 km).
435. 01.10.93	Old Gate House - Terry's Lodge - Kingsdown - Crowhurst Farm - Broomfield Wood - Crooked Billet (9 km).
436. 00.10.93	Kingsdown - Fawkham - West Yoke - Old Gate House - Porto Bello - Kingsdown Church - Crowhurst Farm - West Broomfield Wood - Knockmills - West Yoke - Wyse Land - Plaxdale (16 km).
438. 15.10.93	Basted Fissure (4 km). Oldbury rock shelters - Middle Wood rock shelters (2 km).
439. 24.10.93	Wrotham Hill - Platt Farm - Stansted - Fairseat (11 km).
441. 29.10.93	Four Wents. Wrotham chalk pit - Vigo - Fairseat - Stansted (12 km).
442. 02.11.93	Coney Field - Churchfield - Bay Shaw - Furze Field - Fane Hill - Kiln Field - Oldbury (5 km).
443. 05.11.93	Wrotham - Butt Field - Vigo - Fairseat - Wrotham Hill (11 km).
444. 12.11.93	Ramsey's Chalk Pit - Wrotham - Trosley Towers - Platt Farm - Wrotham Hill (7 km).
445. 14.11.93	Exedown Gravel Pit - Peckham Wood (7 km).
446. 22.11.93	Exedown pit. (4 km)
447. 26.11.93	Borough Green - Telegraph Hill - Rock Shelters (6 km).
449. 10.12.93	N.W. Ightham - Fawkham - South Ash - Swan Field - The Billet - Mills Field - Ash (14 km).
450. 17.12.93	Seal - Bitchet - Shingle Hill - Wilmot Hill (10 km).
452. 25.12.93	Sevenoaks - Knole Park - Godden Green. (12 km)
453. 26.12.93	Terry's Lodge. (6 km)
454. 29.12.93	Basted Fissure. (4 km)
455. 31.12.93	Turner's Oak Wood - West Yoke Farm. (12 km)

Notes: Itineraries are shown as place names linked by hyphens in the order in which they were reached. Discrete walks on the same day are terminated with a full stop and no hyphen. Conservative estimates of distance travelled (in kilometres) are in parentheses and include round trip.

Appendix 3. Geographical origins of Kentish eoliths in museum collections studied

Place	PRM	BM	NHM	M	C	D	T	R	Total
Kent general	35	109	6	72	33	27	18	33	333
Kent Plateau		83	3						86
Plateau East				129				1	130
Plateau West				97			1		98
North Downs		1							1
Medway Valley							1		1
Ash	139	169	34	276	30	8	20	17	1026
Aylesford				1				1	2
Barming				1					1
Bean Hill, Dartford				1					1
Bearsted				4					4
Borough Green				5		1			6
Brands Hatch	1	4	3	8			1	2	19

(Continued)

Continued.

Place	PRM	BM	NHM	M	C	D	T	R	Total
Birches, Shoreham		2	1	5				1	9
Birchington						3			3
Bouts Hole Field, Ash				3					3
Bower Lane, West Kingsdown		3							3
Bowman's Lodge, Dartford								1	1
Boxley				2		5			7
Bredhurst								4	4
Charing				1					1
Chimhams, West Kingsdown		1							1
Chatham				3					3
Clinch Street Farm								1	1
Cockerhurst			1	6					7
Crowsland				3		3			6
Cuxton							6		6
Dorland								1	1
Downe				1					1
Drane Farm, West Kingsdown		1		1					2
Erith								3	3
Eynesford				1					1
Fairseat				15		14	2	2	33
Fane Hill, Ightham		1							1
Faversham				1					1
Fawkham		1						2	3
Foots Cray							2		2
Gillingham				1		1			2
Hartley				4					4
Hayes				1					1
Haysden							7		7
Highcliffe								1	1
Hook								1	1
Halling Ferry							1		1
Hodsoll Street				26					26
Idleigh	2	2							4
Ightham	101	5		12		1	1	1	121
Kemsing				2					2
Kingsdown		3		5					8
Knockmill								1	1
Knole				1					1
Laytham's Farm				3					3
Leigh Place								5	5
Lenham				1					1
Little Mollom's Wood, Pratt's Bottom				1					1
Malthouse				1					1
Maplescombe				49				3	52
Meopham							2		2
Millfield							1		1
Milton Street				1					1
Mote Valley, Shipbourne				1					1
Nunstead				2					2
Oldbury, Ightham		1							1
Orpington								3	3
Parkham				1					1
Parsonage Farm, Ash		2		2				2	6
Patch Grove				1					1
Peckham Wood	1	4		1					6
Platt Farm, Fairseat				1					1
Plaxdale Farm, Stanstead		4		10					14
Plaxdale Green								1	1
Plaxtol					1				1
Rainham				3					3
Ranscombe							9		9

(Continued)

Continued.

Place	PRM	BM	NHM	M	C	D	T	R	Total
Romney's Wood, Shoreham		1							1
Shipbourne				1					1
Shode, Plaxtol				1					1
Sittingbourne				2					2
Snodland							1		1
Speedgate				15				1	16
Stanstead		25		3				2	30
Strood							1		1
Sutton-at-Hone				1					1
Swalecliffe				1					1
Swanscombe				1					1
Terry's Lodge					14				14
Tonbridge		1							1
Trottiscliffe	2								2
Turner's Oak				1				2	3
Upnor				1					1
Upper Halling							21		21
Vigo								1	1
Westfield							1	4	5
West Yoke	6	37		43	9	3	4	2	104
Whitstable				4					4
Wickam				1		2			3
Wrotham		1		7		1			9
Yaldham		1							1

Notes: PRM = Pitt-Rivers Museum Oxford; BM = British Museum, London; NHM = Natural History Museum, London; MM = Maidstone Museum; C = Canterbury Museum; D = Dartford Museum; T = Tunbridge Wells Museum; R = Rochester Museum.