An Assessment of the Extent and Character of Hobbyist Metal Detecting in Scotland

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Commissioned by: HES and TTU





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Definitions of Acronyms:

ALGAO Scotland - Association of Local Government Archaeological Officers CBAUG - Centre for Battlefield Archaeology University of Glasgow **CPD** - Continual Professional Development CIfA - Chartered Institute for Archaeologists DS - Detecting Scotland FCS - Forestry Commission Scotland FLO - Finds Liaison Officer HES - Historic Environment Scotland (HS- Historic Scotland (up to 1st October 2015)) HMD - Hobbyist Metal Detectorist **HP** - Heritage Practitioners NCMD - National Council for Metal Detecting NTS - National Trust for Scotland NMS - National Museum of Scotland PAS - Portable Antiquity Scheme SARG - Scottish Artefact Recovery Group SM - Scheduled Monument TTU - Treasure Trove Unit (TT- Treasure Trove)



Executive Summary

1.1 This assessment was conducted by GUARD Archaeology Limited, having been commissioned by Historic Environment Scotland (HES) and the Treasure Trove Unit (TTU). The assessment set out to establish the extent and character of hobbyist metal detecting in Scotland by engaging in discussion with representatives from both the heritage profession and the metal detecting community. The assessment took the form of a set of research questions agreed by a Reference Group appointed for this assessment; this group consisted of representatives from the heritage profession and the metal detecting community. The individuals who provided data and information for the assessment included: TTU, members of The Association of Local Government Archaeological Officers (ALGAO Scotland), other Planning Authority Archaeological Advisors, Museum representatives, the Forestry Commission Scotland, the National Trust for Scotland, National Council for Metal Detecting and several metal detecting clubs and individuals representing Scotland and northern England. The data gathering took place from December 2015 to March 2016. A total of 198 responses (32 main research responses, 166 online responses) were received through a combination of face to face discussion, telephone discussion, email, metal detecting Dig visits and through an online version of the research questions.

Introduction

- 2.1 This Project was put out to tender by HES (then Historic Scotland) and TTU to professional archaeological companies. GUARD Archaeology Limited, with advice from the Centre for Battlefield Archaeology (University of Glasgow), were the successful tenderer in this process and were commissioned to undertake the work. This project builds upon previous research conducted across the U.K., with Ferguson (2013a) and Thomas (2012) including Scotland in their research. No definitive study to date has been carried out on the extent and character of metal detecting in Scotland. There is much speculation about the subject which is based upon *anecdotal* accounts and long-held preconceptions on the part of both HPs and HMDs. This research therefore aims to provide current data and information that can be used to better understand and quantify hobbyist metal detecting in Scotland and how it interacts with the historic environment and HPs.
- 2.2 The Reference Group appointed for this assessment consisted of representatives from the heritage profession and the metal detecting community. The individuals on this group were (in alphabetical order): Derek Alexander (NTS), Christopher Bowles (Archaeology Officer for the Scottish Borders), Alistair Hacket (NCMD), Grant Maxwell (Detecting Scotland- DS), and Dr. Suzie Thomas (University of Helsinki). Dr. Natasha Ferguson (TTU) and Kevin Munro (HES) were joint project managers for this research project.
- 2.3 The author, Warren Bailie, has experience in metal detecting surveys and working with metal detecting groups and individuals in Scotland since 2011 while working with GUARD Archaeology Limited and the Centre for Battlefield Archaeology, University of Glasgow on collaborative battlefield investigations. These investigations have included planning related metal detecting on the Pinkie and Sheriffmuir battlefields, and working with metal detecting clubs and individuals on Bannockburn and Killiecrankie battlefields. In addition the author assisted with a CIFA CPD event, which also involved SARG members and the TTU, for the training of early career archaeologists in methodologies for metal detecting surveys.
- 2.4 From the outset it is worth pointing out the distinction between Digs and Rallies in the hobby of metal detecting. Metal detecting Digs, sometimes referred to as Outings, are events which take place on one day only. These are the most common events involving metal detecting in Scotland and usually involve 20 to 40 HMDs, but can have more depending on the popularity of the site and organizing club. Rallies are larger events which last for two or more days, usually over a weekend, and can involve many more individuals. Charity rallies are an exception and tend to run over one day.

2.5 Current Research in a European Context

2.5.1 This project sits within a wider European context of projects and discussions which aim to



establish the character of hobbyist metal detecting and the nature of the archaeological data they produce. Of particular interest is current research in Sweden, Denmark and Finland which provides comparable data for the Scottish research and a background for the development of hobbyist metal detecting. Metal detecting is not allowed in Sweden, is regarded as liberal in Denmark and a similar legal system to that in Scotland operates in Finland. This recent research includes a recent overview of metal detecting activity in Finland (Maaranen 2016; Thomas et al forthcoming), with the cultural impact, both positive and negative, explored in Norway (Rasmussen, 2014), Denmark (Dobat 2013) and the Netherlands (van der Schriek and van der Schriek 2014). Approaches to the potential of artefact data in cultural heritage management is also being discussed in Denmark (Dobat pers. comm), and actively engaged with as part of the MEDEA project in Flanders (Belgium) (Deckers 2016). This project will make an important contribution to this conversation and in turn will draw upon the collective experience of our European neighbours.

Project Scope

- 3.1 The main aim of the project was to improve our understanding of the scale, nature, location and practice of the legal activity of metal detecting in Scotland, in order to inform a future programme of training, guidance and other proactive outreach with the metal detecting community. The methodology was therefore designed to address research questions related to the recreational activity of hobbyist metal detecting in Scotland.
- 3.2 The project sought to discover the extent and examples of both responsible and irresponsible metal detecting practice. It examined how hobbyist metal detectorists interact with the Treasure Trove law in Scotland, the Ancient Monuments and Archaeological Areas Act 1979 (scheduled monuments) and with other designated areas, notably sites in the Inventory of Historic Battlefields.
- 3.3 This project sought evidence for the extent of non-reporting of archaeological objects and activity near or on scheduled monuments both of which would normally be recognised as irresponsible or illegal metal detecting practice. However, the intention was not to identify individual instances of potentially irresponsible or illegal activity. Instead, the project aimed to capture how aware hobbyist metal detectorists are of the range of heritage and environmental laws, and how they navigate and respond to these laws.
- 3.4 The project examined how professionals within the heritage sector engage and interact with the metal detecting community, and how they respond to potentially damaging or what may be identified as 'irresponsible' activity i.e. activity that may have an adverse impact upon the historic environment and archaeological record. The project also looked at the experiences of HMDs when interacting with the heritage sector and the quality of existing information and communication networks.
- 3.5 The geographical scope of this project was all of Scotland and, where relevant and necessary, the border area of northern England (relevant for cross-border historic battlefields). Examples of metal detecting practice and the experience of the heritage sectors in Europe and North America were also useful to provide context or comparisons.
- 3.6 The project did not seek to assess and characterise the extent of illegal metal detecting activity, for example, the deliberate targeting of scheduled sites or access to land without landowner permission with the sole purpose of recovering archaeological objects with a metal detector. Such illegal activities cannot be conflated with metal detecting as a hobby: a recreational activity enjoyed by many people with no malicious intent. However, the project did consider the concept of 'nighthawking' and whether this is relevant in Scotland since the legal parameters differ from those in England and Wales.
- 3.7 The scope of the project includes reflections on the current process and experience of reporting objects through the Treasure Trove system. However, it does not include consideration of any changes in the process or the adoption of alternative approaches or schemes that would lie out with the parameters of Scots law.

Project Aim and Key Outputs

4.1 **Project Aim**

4.1.1 The purpose of the project was to gather quantifiable data on the extent and character of hobbyist metal detecting activity in Scotland. The results will be used to inform future guidance, community engagement and heritage management strategies connected to metal detecting. This was a partnership project between HES and the TTU. The project was advised by a Reference Group of key stakeholders from both the heritage profession and the metal detecting community.

4.2 Key outputs

- 4.2.1 The key outputs of the project were:
 - A full report detailing the results of the research
 - Recommendations for revisions and additions to the current Code of Practice for metal detecting within Scotland, or if appropriate, the creation of a new Code of Practice which reflects current research.
 - Recommendations for new or revised guidance on metal detecting for a range of audiences (e.g. HMDs, landowners, the heritage sector).
 - Recommendations on themes for dedicated training and conferences around metal detecting.
 - Recommendations for any future research topics which the project has revealed.

Methodology

5.1 Literature Review

- 5.1.1 In the first instance the author conducted a brief literature and web review on the subject of hobbyist metal detecting. This involved subscribing to various metal detecting forums, reading publications on the subject of metal detecting from both academic and mainstream sources, as well as reviewing the current policies and guidelines available to the metal detecting community from within that community and from HES, TTU and other land management organizations such as the Forestry Commission (Ritchie 2014) and NTS. The relevant literature and research findings from similar studies were taken into account in the results, discussion, conclusions and recommendations in this report. The author also provides recent examples of archaeological projects, where the author has managed or directed metal detecting surveys, and where possible, where this involved engagement with HMDs in Scotland.
- 5.1.2 Data was provided by TTU for the past 104 years, 1912-2016. This data is a record of the submissions to Treasure Trove over that period and includes submissions by all means, including metal detecting which is identifiable from 1981 onwards (Appendix A). Annual Treasure Trove reports (2007 to 2014) were accessed via the TTU website. Using the data accessed and provided, the number of cases sourced from metal detecting in each Local Authority area were charted and this information was used to illustrate change in overall submissions to TTU as well as increases/decreases in activity over the time across Scotland.

5.2 Main questions agreed in consultation with Reference Group

5.2.1 Following the literature and acknowledging, although not necessarily following, the approach taken in similar research, two sets of draft questions were created. The two sets of questions (Appendices B and C) were aimed at recovering data and information from both the metal detecting community and the heritage profession, with the aim of establishing the extent



and nature of hobbyist metal detecting activity in Scotland. Although there were two sets of questions, wherever possible the questions were identical, allowing comparative analysis but with the recognition that they both set out to recover information on the same topics from the different perspectives of HPs and HMDs. The research questions were put before the Reference Group for consideration. Following consultation with the Reference Group the research questions were revised prior to requesting responses from a set of key representatives within the metal detecting community and the heritage profession across Scotland, with one HMD respondent from England.

5.3 Method of contact/discussion

5.3.1 The key Metal Detecting representatives were mainly club and organization leaders with some individuals contacted via the TTU. The key representatives from the heritage profession included Local Authority Archaeological/Heritage Advisors, Museum representatives, Forestry Commission Scotland and the NTS. The various representatives of the metal detecting community and the heritage profession were initially contacted by email to request participation in the research. This was then followed up by phone, email and face to face meetings where practical. Face to face discussions and phone call discussions were seen as a means of discussing the responses with the opportunity to follow up on answers with more information or examples. This was seen as an enhancement of the process of respondents simply filling out a survey document such as the online survey which accompanies the main research. Face to face meetings were conducted with individuals in north-east Scotland, central Scotland and western Scotland, along with discussions with HMDs involved in a metal detecting planning related survey supervised by GUARD Archaeology at Killiecrankie and a visit to a metal detecting club dig on the outskirts of Stirling. The research recovered data and information from key representatives for the Greater Glasgow area, North Lanarkshire, South Lanarkshire, Loch Lomond and the Trossachs National Park, Ayrshire, Renfrewshire, Stirling, Edinburgh, East Lothian, Falkirk, Fife, Dumfries & Galloway, Moray, Angus, Aberdeenshire, Inverness (Highlands), Orkney, the Scottish Borders, Peebles, Hawick, Galashiels and England.

5.4 Shortened Questionnaire – Online format

5.4.1 A shortened version of the research questions (Appendix D) were created for an online survey via Survey Monkey. The research questions were condensed and reworded with the aim of engaging with the wider metal detecting community, rather than only representative members, and to provide an opportunity for individuals to have their opinion on the topic. The online survey was disseminated via the Treasure Trove website, through social media by the author and TTU, through metal detecting forums, through NCMD members and through club representatives. The author made follow-up contact with various metal detecting clubs to encourage members to participate, reiterating that the survey was anonymous, and relatively quick to complete.

5.5 Anonymity

5.5.1 Official heritage bodies, such as the TTU and HES, adhere to the Data Protection Act. It was made clear to all respondents who participated that their responses would be treated as anonymous and that the author would be the only individual who would have access to any information that could identify them. For this reason, in the main research question responses, each HMD response has been allocated an identifier as follows: HMD1, HMD2 and so on. The same applies to the responses from the HPs where each response has been allocated an identifier as follows: HP1, HP2 and so on. The online questionnaire was also anonymous given that no respondent was asked for any information that might identify them. The full tabulated results of the research will be available on request but will be redacted to remove all potentially identifying information, and any offensive or potentially incriminating remarks.

Historical Background of Metal Detecting

6.1 A Metal Detector was first invented for medical purposes by a Parisian Inventor, Gustave Trouvé in 1874 with further advances in the technology in the 1920s and later in the 1940s



by Lieutenant Josef Stanislaw Kosacki, a Polish officer stationed in St. Andrews, who refined the design for detecting German mines (Ferguson 2013a). Metal detecting as a hobby has its origins, like many technological break-throughs, in the military. The hobby is noted as early as the 1950s in the USA (Thomas 2009) and was taken up in the UK in the 1960s. The popularity of the hobby grew in the 1970s and 1980s, and legislation reflected this with the introduction of the Section 42 consent as a requirement to metal detect in a scheduled area (Section 42 also covers magnetometry/gradiometry and ground penetrating radar geophysics which can also highlight metal objects). This requirement is to restrict even the detection of objects, let alone their recovery. The technology involved in high end metal detecting machines has continued to advance with the double coil system, first introduced in the 1970s, but developed further in recent years. The simpler single coil system creates an inverted search cone which tapers towards the limit of detection increasing the possibility of missing an artefact the deeper it lies within the topsoil. A currently available double coil or Double D system (http://www. metaldetectingworld.com) creates an elliptical blade of detection which can not only reach to greater depth but also provides a greater surface area of detection at its limit below ground, reducing the possibility of missing an artefact. The double coil system also enables the HMD to discriminate between different metal types. The competitive nature of the hobby and the willingness of HMDs to invest heavily in this pastime, creating a commercial demand for better machines, support further ongoing development and advances in the technology.

Treasure Trove

7.1 Treasure Trove Unit

- 7.1.1 The role of Treasure Trove is to ensure that archaeological objects of cultural significance are protected for the benefit of the nation and preserved in museums across Scotland. Treasure Trove in Scotland is based on the legal premise of 'bona vacantia' - objects that no longer have a traceable owner. Archaeological objects discovered by chance through activities such as gardening, agriculture, or hobbies such as metal detecting, or professionally in the course of an archaeological excavation, are the property of the Crown. The Crown, or more accurately the Crown's property representative in Scotland, the Queen's and Lord Treasurer's Remembrancer (QLTR), acts on behalf of the nation by 'claiming' objects considered to be of archaeological significance. These objects are then made available for allocation to museums across Scotland where they are accessible for research and public display rather than languishing unseen in private collections. As there is no restriction on the age or composition of the material there is great flexibility in what can be considered 'archeologically significant' and therefore 'claimable' as Treasure Trove. Treasure Trove in Scotland is distinctive from the Treasure Act 1996 operating in England and Wales, which is supported by the Portable Antiquities Scheme for the voluntarily recording of non-treasure objects. PAS also handle most Treasure Trove cases in England and Wales.
- 7.1.2 The TTU operates on behalf of the QLTR providing the frontline archaeological expertise when assessing material through the Treasure Trove system. The Unit liaises with members of the public reporting finds of archaeological objects, 95% of which are from HMDs, as well as archaeologists, museum curators, and other heritage professionals. As specialists in material culture it is the responsibility of the TTU to assess and research material passing through the Treasure Trove system, ultimately identifying which objects or assemblages are appropriate for 'claiming'. While Treasure Trove may be hinged upon a legal framework the TTU is there to help members of the public, archaeologists and museums navigate the law, rather than to enforce it. Therefore engaging with the public and promoting awareness of Treasure Trove through outreach programmes, such as the regular series of finds workshops and talks, are essential in encouraging people to report their discoveries and to ensure the system is both approachable and accessible. TTU is also research active with academic contributions to journals and conferences on the subjects of metal detecting, material culture and cultural heritage management.

7.2 Treasure Trove Data

7.2.1 The first submission to the TTU in Scotland, of a find recovered through metal detecting, was



in 1981, a William I of Scotland double cross penny from Aberdour, Fife (TTU Data 1912-2010). This is not to say that this was the first find recovered using this method, but simply the first to be declared to TTU. The number of TT cases reported by metal detectorists has increased since that initial item but the level of TT cases reported by HMDs probably falls short of the number of finds actually recovered. This is likely to be a result of research interests focussing on prehistory rather than Medieval or post-Medieval material culture. It should be noted that each case of reporting, or submission, by metal detectorists to TT can vary in quantity from singular artefacts to large hoards of up to, or in excess of 1000 objects. The TT data for cases reported by metal detectorists has been collated (Appendix A) and separated by year and Local Authority area, with the first year shown being the first year where a metal detecting find was submitted to the TTU (1981). It was not possible to obtain an accurate record of the full number of TT reported cases, from all sources, for 1912 to 1994 as many entries were not dated. However, during this period there were a total of 531 submissions from all sources with Metal Detecting submissions being 95 during the same period, although only beginning in 1981. For the period of 1995 to 2010 the figures for all submissions from all sources were available, and for the period from 2011 to present the total number of submissions, minus excavation assemblages, was available. Figure 1 shows the change in the number of TT cases reported by metal detectorists over the period of 1981 to 2015, these figures include all cases, claimed and disclaimed.



Figure 1: Graph showing the number of TT cases reported by metal detectorists in Scotland from 1981 to 2015.

7.2.2 The last year shown is for the latest full annual dataset, 2015. Changes in areas across Scotland are considered on a relative year on year basis. The increase in submissions to TTU in one area may appear low when compared to areas where the hobby is generally more prolific, this is in terms of the number of cases and not necessarily the number of objects. The number of metal detecting submissions (hereafter unless otherwise specified, submissions only refer to metal detecting finds) remained relatively low with the total number of submissions across Scotland remaining in single figures for the first ten years (up to 1991) with no submissions in 1983. However, even with this apparent low level of activity it is evident that the activity was spreading across Scotland, as material was coming from three to four areas each year, but up to eight areas are represented by 1991. During this first decade two areas stand out, Dumfries & Galloway and Perth & Kinross, where in six and seven years respectively out of ten at least one submission to TT was made. There are a number of factors that could play a role in the increase in the early nineties, including the advent of publicly available internet access, perhaps leading to a more fluid medium of communication and exchange of information. From 1992 to 1996 the numbers fluctuate between 11 and 25, but by 1997 the number of submissions across Scotland has risen to 70, across 19 different areas. At this point the figures suggest that the greatest activity is present in Fife and the Scottish Borders, with 11 and 12 submissions respectively. There is also a three-fold increase on the previous year in submissions from the Highland area in 1997. The numbers for all of Scotland dip slightly the following year only to rise further in 1999, at this point the areas that display the most marked increase are Fife (28) and Moray (13), although the figures also show the Highland remaining at similar levels (7) and Perth & Kinross is showing its highest level (8) up to this point. In 2000 the number of submissions drops by around 75% across Scotland, it is not certain why this decrease is so sharp but it may be that this dip in activity is directly related to the occurrence of Foot and Mouth Disease and the resulting infection control measures implemented across the U.K; the epidemic ended in 2002. Another three years pass before numbers were up to similar levels as 1999. Numbers recede again the following year and submissions fluctuate around 50 submissions per year for the next four years, before dropping to 2001 levels for the next two years. Up to this point, despite peaks in 1997 to 1999 and again in 2003, Scotland had not witnessed a sustained and perpetual increase in activity, however this was about to change, that is after the harsh winters of 2009 and 2010 which may account in some way for the slight dip in apparent metal detecting at this time.

- 7.2.3 In 2010/11 the number of submissions from across Scotland rose to its highest level since the first metal detected submission in 1981. Incidentally DS was formed in 2010, closely followed by Toddy's Digs in 2011. There were three peaks of activity in terms of Local Authority areas were Perth & Kinross, (16), Fife (12) and the Scottish Borders (10). The Highlands (9) Moray (8) and Dumfries & Galloway (8) formed the next highest tier of activity. The number of overall submissions rose again in 2011, by 39% to 139, with the most marked relative increases being in Angus (1 to 10) and East Lothian (5 to 16). The most active areas in 2011 were Dumfries & Galloway, The Scottish Borders, Perth & Kinross and Fife. The overall submission number increased by 55% in 2012 to 306. Dumfries & Galloway is showing the highest level of activity again with 52 submissions, closely followed by Perth & Kinross (47) and then the Highlands (38) and then Fife (27) and Moray (23). In the following three years the area that shows the starkest increase in activity is Perth & Kinross; only in 2015 does the level of activity, at present there is activity in new areas where it was very limited for the previous 30 years. Examples where this is apparent are West Lothian, North Lanarkshire and North Ayrshire.
- 7.2.4 As has been shown, submissions to TT have increased considerably in some areas in recent years; this is likely to be, in no small part, down to the outreach work of the TTU in providing opportunities for engagement with, and education of, HMDs. When looking at the data for the past five years (2010 to 2015) (Figures 2 and 3) there are areas where particularly marked increases in detecting have been observed in certain areas of Scotland, the question is if this is as a result of TTU outreach, a standalone increase in activity, or (most likely) a combination of the two. This data represents the TT cases of reporting by metal detectorists including claimed and disclaimed and this will reflect reporting to Treasure Trove by HMDs. Although the full local authority area will be colour-coded in Figures 2 and 3, this is not reflective of area-wide metal detecting but of the number of cases of metal detecting submissions which may be isolated to a small group of sites within that area, or indeed singular events such as metal detecting rallies e.g. Kingsbarns, Fife (2015) or Minto, Scottish Borders (2015). The main areas that have seen a notable, but relative, increase within the last five years are as follows, in ascending order of total submissions (shown in [brackets]) from 2010 to 2015: Aberdeenshire [40], Stirling [56], East Lothian [82], Angus [87], Moray [92], Highland [154], Dumfries & Galloway [166], Scottish Borders [173], Fife [229] and Perth & Kinross [282] (See Appendix A). Similarly the TT annual reports from 2007 to 2014, although showing a 62% decrease in named individuals submitting between 2007/8 (31) and 2008/9 (12), the numbers remain similar in the following year (13) before increasing again in 2010/11 to 25. In 2011/12 (20) there is a 20% drop in numbers submitting but this rises sharply by 46% in 2012/13 before falling again by 27% to 27 in 2013/14. The Scottish Borders, Perth & Kinross, Highland, Moray and Dumfries & Galloway all show sharp rises in 2012 which coincides with the rise in numbers of named submissions observed in the annual reports. Of all areas, Perth & Kinross has the highest number of submissions in recent years, rising steadily from single figures in 2010 and peaking at 95 in 2014. The next highest number of submissions in Scotland in the same period is Dumfries & Galloway with 42 in 2014. There was also a rise in submissions from the Stirling area in 2014, which doubled the figures for the previous two years and the following year. This rise could be linked to the fact that the Battle of Bannockburn 700th Anniversary occurred this year. The large scale archaeological project (Bannockburn 700) which engaged with over 1000 volunteers including HMDs in the two years leading up to the anniversary, may have had an influence in this case (see Case Study 2, Section 10).











Results

8.1 Policies, Guidance and Codes of Practice

- 8.1.1 HES have guidance on metal detecting (Metal Detecting, Yes or No? Metal Detecting Scheduled Monuments and the Law). TTU have a Code of Practice for TT law outlining the Treasure Trove system and processes within the Treasure Trove Unit, with relevance to archaeological units, museums and members of the public as 'chance finders'. TTU also has a number of mediums for outreach, through the TT website, through workshops, finds days, attending metal detecting digs and rallies, and through the distribution of their guidance leaflets and other documents. The NCMD have a Code of Conduct and most metal detecting clubs have a Code of Conduct which specifies the process of ethical metal detecting. Governmental and other national bodies such as The Forestry Commission, NTS, National Parks, Ministry of Defence, Crown Estates, with the exception of the foreshore which requires a self-certificating permit, and RSPB do not permit metal detecting on land they own and manage (Ferguson 2013a), with the exception that the practice is part of an agreed research agenda. The strict policies do not necessarily stop metal detecting as a recent discovery of Bronze Age weapons on the Island of Coll on RSPB land has shown. In this case an individual "...had sought and innocently been given permission..." (Cowie 2016) to metal detect. As it happened the individual on making the initial discovery sought professional advice. TTU assisted in the excavation of the material and it is currently undergoing conservation.
- 8.1.2 Some metal detector retailers (e.g. Regton, JoanAllen and Detecnicks) provide a code of conduct on their website, or links to them. The code of conduct and links to the Treasure Act etc. is in some way contradicted by selling night-vision goggles alongside metal detectors on some websites. Assuming supply reflects demand, this does suggest the intent of some individuals to metal detect in low lighting conditions or at night.
- 8.1.3 Interestingly CIFA, the leading professional body representing archaeologists working in the U.K and overseas, currently do not have guidelines for archaeologists working with either metal detecting apparatus or hobbyist metal detectors in the U.K. or overseas. This subject has been raised with the CIFA Scottish Group Committee and the issue is to be revisited following the dissemination of this report and recommendations.

8.2 Summaries of Hobbyist Metal Detector Online responses (166 responses)

8.2.1 Numbers and Gender of Hobbyist Metal Detectors in Scotland (incorporating main responses)

In analysing the Online Survey data, Hobbyist Metal Detecting is dominated by males with around 11 % women respondents compared to 87 % men respondents, three individuals did not provide a response. Based on the figures provided by the clubs which responded and NCMD (Scottish Region and U.K wide), this low woman representation appears typical within the hobby across the U.K. with some variance between areas and clubs. The figures for the numbers of HMDs represented by each group that responded are tabulated below (Table 1). The mean average of Scottish club percentages of women members is 13.74 %. The small percentage of women represented may be as a result of a relatively recent inclusion in the hobby, incidentally Detecting Scotland have indicated that their women member numbers have risen by almost 1% in the last 3 years. The rise in women participation could be down to a number of factors including active encouragement from clubs and a slight rise in interest in the hobby.

The overall number of HMDs in Scotland is difficult to ascertain from online members as some of these members could be showing an interest but not actively detecting, the online member numbers therefore provide a, probably inflated, upper ceiling for the number of individuals showing an interest in hobbyist metal detecting in Scotland of 1800 individuals. It should also be noted that some HMDs may not be active online. The NCMD membership, which covers any insurance requirements for the hobby, is perhaps a reflection of the number of HMDs who are more actively detecting, 313. The NCMD figures are also likely to be duplicated in multiple clubs. Having said that not all HMDs will be NCMD members and there is an unknown quantity of individuals who metal detect independently from clubs. For this reason the actual



number of HMDs in Scotland will be in excess of the lower figure but some way short of the upper membership levels indicated by online subscribers. When considering Thomas's research (2012) on the topic of metal detector numbers across the U.K., the estimate for Scotland was 340, which is close to the current figure for NCMD members in Scotland (313). However what was also highlighted in this research was that 39.8% of respondents were not part of a club or society. Applying this percentage to the NCMD figure gives an estimated number of 520 HMDs in Scotland including individuals.

Club/ Organization	No. of Members
NCMD UK	15000
NCMD Scottish Region	313
Toddy's Digs	1425 (online)
Detecting Scotland	1800 (online)
SARG	53
Ayrshire Detecting Club	24
Highland Historical Search Society	30
Moray Detecting Club	15
Moray Individuals	20-30
Doric Diggers	15-20
Scottish Detecting Club	84

Table 1: Scottish metal detecting club member numbers.

8.2.2 Age Group Representation

The largest percentage of online respondents was from the 45-55 age group, with 35.8 %, closely followed by 27.3 % in the 55-65 group. The hobby is therefore dominated by men approaching middle age and retirement; if we combine the 45-55, 56-65 and 65+ age groups a total of 75.2 % of respondents is represented. There are 13.3 %, 10.3 % and 2 % represented by the 36-45, 26-35 and 16-25 age groups respectively (Figure 4)

8.2.3 What inspired you to start metal detecting?

The total number of HMDs indicating an interest or love of history as their inspiration was 84, or 51.2 % of the 166 HMD responses. This is similar to the findings of Thomas (2012, 60) where the most popular response was, 'an interest in the past'. Five HMDs suggested archaeology as an inspiration. A total of four HMDs indicated treasure as an inspiration, with another four HMDs indicating programmes and documentaries like Time Team, a further two HMDs noted their inspiration was HMD magazines. A total of five HMDs were introduced to the hobby by a friend and there were eight HMDs indicating an interest in recovering coins.



Figure 4: Pie Chart showing representation within the hobby of various age groups.



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From the online responses the length of time HMDs have been detecting ranges from 0 (just started) to 45 years. The mean average for the respondents was 9.13 years. The highest mode of HMD respondents occurs at two years in the hobby with 26 respondents. There were 20 respondents at four years, 16 respondents at one year and 14 respondents each at three and five years. A total of 63 % of respondents have been metal detecting for 5 years or less with 26.5 % of respondents detecting for over ten years. When looking at the woman HMDs alone the range of years in the hobby ranges from less than a year to 25 years, the mean average length of time of the woman respondents in the hobby is 5.32 years. This reaffirms that women are comparatively recent entrants to the hobby when considering the figures for men. For comparison, when men only numbers are taken into account the average length of time in the hobby is 9.62 years.

8.2.5 How frequently do you metal detect?

The most common frequency of detecting is once per week with 57 responses (34.3%). The next most common frequency is twice weekly with 24 responses (14.5%). The third most common frequency was twice monthly, or every two weeks, with 20 responses (12%). The range varies quite widely, with seven respondents indicating that they detect on a daily basis while others detect as little as once or twice a year.

8.2.6 Which specific area(s) and or site(s) do you prefer to detect?

When asked in the online survey if there is a preference for particular sites or site types 41 respondents in the online survey indicated a rather general, fields/farmland. There were eight respondents indicating Roman and Medieval sites, with seven indicating battlefield sites. Other responses included castle sites, coastal areas and old dump sites.

Do you engage in metal detecting tourism, i.e. travel to another country for the purpose of metal detecting? If so where do you prefer to go?

In response to Question 7 in the online survey in relation to metal detecting tourism, the majority, 133 respondents indicated that they do not engage in this. A total of 28 respondents indicated that they engage or have engaged in metal detecting tourism. Among those who had engaged in or have not but intend on engaging in Metal Detecting Tourism the destinations were England (15 responses), Germany (4) Spain (3), Poland (2), within U.K (2), Abroad (1), Belgium (1), France (1), Luxemburg (1) and Scotland (1). Despite one known metal detecting tourism business operating in Scotland which encourages overseas tourists to travel to Scotland for 'expert' guided metal detecting tours, no online responses mentioned this. On the webpage advertising the metal detecting tours the owner states, "Scotland is unlike England where most places have been emptied... it's perfect for treasure hunters."

8.2.7 How far would be prepared to travel to conduct your detecting?

From the online survey, most metal detect locally while also being prepared to travel in excess of 100 miles for metal detecting activity with 68 online respondents indicating this, 51 respondents chose the 0-50 miles option preferring to detect more locally. There were 35 respondents who indicated the 50-100 miles option with six of the respondents indicating all three options.

8.2.8 Do you prefer to metal detect on your own, or as part of a group?

A total of 79 HMDs (47.6%) have no preference and enjoy both individual and group detecting. A total of 51 HMDs (30.7%) indicated that they prefer to detect as part of a group, 33 HMDs (19.9%) indicated that they preferred to detect alone and three HMDs did not respond.

8.2.9 Do you record the position of artefacts you discover? Using Map plotting? GPS? Other? If not, why?

The online survey asked if GPS was used to locate finds and if not what other methods were



employed, such as maps. One respondent from 166 indicated that they GPS their entire surveys. There were 82 of the 166 respondents that said they used GPS to locate finds; an additional 10 respondents indicated that they used their Smartphone GPS system through an app, 12 respondents said they do not GPS finds. It is not clear whether the 82 who indicated they use GPS are using an appropriate device, over and above a Smartphone, and therefore the appropriate degree of accuracy in recording finds. Only three other individuals specified any device, one a GPS Metal Detector, one a GPS camera and the other a handheld GPS. There were 11 respondents who stated that they use a combination of GPS and maps. Some give reasons for not recording find positions including that they have never found anything significant (19 responses), or that they 'visually locate' or that the 'map is in head' or that they have a 'good memory of the finds locations'. The accuracy of Smartphone GPS systems varies widely dependent on connectivity with the cellular network, connection to a Wi-Fi source, and also how advanced the system is on the phone. The range can at worst be 600 m and at best 6-8 m (http://communityhealthmaps. nlm.nih.gov/2014/07/07/how-accurate-is-the-gps-on-my-smart-phone-part-2). In comparison with standalone GPS equipment, a worst case scenario for the accuracy of a hand-held GPS is 7.8 m with high quality devices offering better than 3.2 m accuracy (http://www.gps.gov/systems/ gps/performance/accuracy). Recent work has suggested that despite some GPS devices being marketed as being accurate to within 4 m to 5 m, they have been shown to be as much as 40 m out (pers. comm. Kevin Munro).

- 8.2.10 Do you keep a record of the finds you discover? If so what attributes do you record?
- 8.2.11 From 166 respondents 25 HMDs skipped this question. The most common note of recording was for the object type (82.5%) with the least common answers being depth (24.6%) and context (27%). The location/co-ordinates response was almost as high as object type at 78.6%. The metal type was noted by 58.7%, the age of the object was noted by 54.8% and the relevant landowner was noted by 42.9%.
- 8.2.12 Do you think heritage practitioner/local authority archaeological advisers/Museum representatives should be given notification of digs/outings/rallies? If so how much notice would be appropriate?

In the online survey HMDs were asked if HPs should be given notification of digs/ outings/ rallies, the responses were as follows: 94 responses (56.6%) answered yes with notice periods varying between one week and several months. A total of 42 responses indicated that the HPs should not be given notification, 12 respondents were unsure. There were three responses suggesting that this is not required while one response suggested that the HP join the Metal Detecting club meaning they will always be on the digs. One response also indicated an element of distrust that the HP would abuse this tool to try and stop a dig, one other stated that the detectorists in a group are responsible enough to report finds, others indicated that the HP should only be notified if anything significant or worthwhile is found.



Figure 5: Graph representing the attributes recorded for finds discovered by HMDs.

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8.2.13 If a heritage practitioner provides advice on avoidance of particular areas as they are potentially archaeologically sensitive, how would you consider/react to this advice?

If a HP provided advice on the avoidance of a particular area due to it being potentially archaeologically sensitive 146 of 166 HMD respondents (88 %) stated that they would heed that advice and avoid the area. Two responses stated that they would still detect there, one said they would discuss it with the landowner with one other suggesting that they would like to see evidence of the claim. One other response suggested mistrust again in stating, '...such advice may be used aggressively/ unnecessarily by those who don't agree with metal detecting'.

- 8.2.14 Do you actively engage with heritage practitioners (Local Authority Archaeologists, Museum reps and other heritage practitioners, CIFA Members) and archaeological projects? If not, why?
- 8.2.15 On the question of engagement with HPs and Archaeological Projects in the online survey, a total of 91 responses (54.8%) indicated that they actively engage with HPs and Archaeological Projects with 26 responses saying they do not. There were six responses indicating that TTU was their main contact with one additional respondent indicating that they did not engage with HPs and that they found TTU unpleasant to deal with. A total of six individuals indicated that they had not found anything significant and therefore had no reason to engage with HPs, these responses perhaps overlooked the root of the question which was aiming to find evidence of HP to HMD engagement irrespective of any personal need to engage.
- 8.2.16 Who do you usually engage with in the first instance after recovering potentially significant artefacts? (Treasure Trove Unit, museum representatives, heritage practitioners, local authority archaeological advisors, metal detecting forums, others?)

In the online survey the responses showed that 62 (37.3%) would specifically contact TTU in the first instance. The next highest response was 19 (11.4%) who said they would initially engage with a metal detecting forum and, usually later, then contact TTU. A further seven responses indicated that they would contact their Museum and TTU: four responses stated that the club members would be notified first and TTU thereafter. Taking the total number of responses that mention TTU as the main contact or joint contact, the percentage contacting TTU following the recovery of a potentially significant artefact is 55.4% (92 responses). There were 18 respondents that indicated they would engage with the club members, forum or dig organizer in the first instance. A total of 17 (10.2%) stated that they had not yet been in the situation where they had found anything potentially significant.

8.2.17 Are you aware of the relevant legislation, such as Treasure Trove and the Ancient Monuments and Archaeological areas Act? If yes, where do you get this information from? (Word of mouth, online, metal detecting clubs, forums, leaflets, other)

From 166 HMDs questioned in the online survey 165 answered yes, that they were aware of the relevant legislation, one individual did not provide a response. The largest medium for acquiring the information on legislation was using online sources, 89 responses (53.6%), in the majority it was not specified where this information was sourced; two respondents mentioned Historic Scotland as a source. A total of 51 (30.7%) responses stated the metal detecting club as their main source of information regarding legislation, closely followed by forums where 37 responses (22.3%) indicated this source, 13 responses (7.8%) indicated NCMD as their source of information on legislation. There were 26 (15.7%) responses indicating their information on legislation came from a TTU online source/ website. Other sources included Leaflets (20), Word of Mouth (16), Museum (6), Books (4) and Magazines (3). It is clear from the responses that HMDs are aware of the relevant legislation but adherence however is not always the case. One Moray HMD provides advice on a Metal Detecting Tourism webpage to a father who intends on finding a suitable site to take his children: "...need a permit for beach combing, but to be honest-don't think anyone bothers, or is bothered."

8.2.18 How would you respond to members/other hobbyist metal detectors who do not follow guidance and/or the law?

A total of 161 responded from the 166 participants, the most common response was to report

someone who was not following guidance and legislation, 58 responses (34.9%). The second most common response was to provide advice and guidance to the individual, 42 responses (25.3%). The third highest response was one of anger and annoyance that someone's actions can have a negative impact on all in the hobby, 15 responses (9%); three respondents thought they should be banned from detecting, three thought they should be fined, one respondent suggested a jail term.

8.2.19 How would you rate your experiences of working with heritage practitioners on a scale of 1 (poor) to 10 (excellent)?

The average from 139 who responded to this question was 6.83 out of 10; the number of responses for each rating is displayed in Figure 6 below.



Figure 6: HMD rating of experiences of working with HPs.





The average from 139 who responded to this question was 5.59 out of 10; the number of responses for each rating is displayed in Figure 7 below.

Figure 7: HMD rating of experiences of working with HPs.

8.2.22 What is positive about that (HP/HMD) relationship?

The response to this question in the online survey were varied with 38 different answers. The most common response was N/A or no response with a count of 33. A total of 28 responses suggested that the most positive aspect of the HP/HMD relationship was the opportunity to share and exchange knowledge and experiences. A further 14 responses said that it was positive that HP advice was there if needed. A total of 14 responses indicated that they had positive experiences with TTU, a further 13 indicated that working together on projects was good for both HPs and HMDs. Similar research conducted by Thomas (2012, 61) on England and Wales has shown that where HMDs had collaborated with HPs, the experience was more likely to be described as positive. One HMD with 30 years' experience in the hobby said in response to this question that the, "...Attitude towards HMD (has) changed hugely since 30 years ago ... HMDs were saw as parasites." Although there still remains friction between the two groups, this shows that the quality of the relationship is markedly improved on the tumultuous 1980s.

8.2.23 What is negative about that (HP/HMD) relationship?

The total number of responses that indicated no negatives in the relationship was 19 (11.4%) with 42 responding n/a (25.3%). There were 26 (15.7%) indicating that the time delay in TTU responding, processing and returning submitted finds was too long. One other suggests that the ex-gratia payments are not always fair. Other specific comments include note of a lack of trust from HMDs of HPs, too much red tape, response times from museums, HMDs are looked down on, poor/no communication, HPs don't understand metal detecting as a hobby, suspicion of metal detecting over HPs, attitude of HPs that we are "raping land" and lack of respect for HMDs.

8.2.24 Does Hobbyist Metal detecting contribute positively or negatively to the safeguarding of Scotland's heritage?

A total of 134 (80.7%) suggest that hobbyist metal detecting contributes positively to the safeguarding of Scotland's heritage. There were seven n/a (non-applicable) responses and no respondents stated an absolute negative contribution. Twelve respondents acknowledged the potential for both positive and negative contributions. One response suggested that there was not a straightforward answer to the question and that it depended on the motive. One respondent suggested probably both as those who are members of clubs and NCMD are less likely to have a negative impact, but from HMD forums it appears there are individuals that choose to disregard guidance. One respondent said that most HMDs are law abiding but that they have seen a few (HMDs) who have lied about permission. One respondent suggests that both positive and negative contributions can be made. It is positive when isolated artefacts are found and preserved in museums for generations to come, but it can be negative when unfamiliarity with the law leads to irresponsible activity. One respondent would like to think that the contribution is positive but only last week they lost permission due to a night hawker damaging the landowner's lawn. One respondent stated that it depends on the individual, "... honesty and trust are key factors in any working relationship, however you will always find individuals who are out to profit from any find". One respondent states, "paradox or doubleedged sword?. ...leave it in the ground and ban detecting and ploughing and safeguard it for who? Detect and dig and everyone can see what heritage is all about." One respondent states both positive and negative contributions can come from detecting, misreporting can throw archaeology out. One response states that the Scottish Government should have more control over metal detecting in Scotland. They suggest that a similar system to that expected for an archaeological dig should be in place before a HMD rally can take place. The positives are that new finds and sites are discovered providing research opportunities. One response thinks that things could be a lot better and that HPs at HMD digs should be more available and that there is a need for advice and guidance. One responder thinks that there are excellent finds but, ...if 50 HMDs on a site each found a musket ball and information was not properly logged or recorded, information for Scottish heritage would be lost forever.'



8.3 Summary of Online Hobbyist Metal Detector Responses

8.3.1 In combining the available data there is an estimated 520 HMDs across Scotland with 75.2 % of these being aged 45 or over. A total of 63 % of respondents have been metal detecting for 5 years of less with 26.5 % of respondents detecting for over 10 years. Some 51.2% of the 166 HMD responses indicated an interest in history as their motivation to participate in the hobby. A total of 34.3% of HMDs detect on average once per week, although the range varies quite widely from daily to once or twice annually. Approximately 80% of HMDs say they do not engage in metal detecting tourism with 16% indicating numerous locations in Europe including Germany (4), Spain (3), Poland (2), Belgium (1), France (1) and Luxemburg (1). Approximately 41% of HMD said they detected locally while also being prepared to travel in excess of 100 miles. Almost half (47.6%) of HMDs had no preference for detecting in groups or as individuals, 30.7% indicated that they prefer to detect as part of a group and 19.9% prefer to detect alone. A total of 49.4% indicated that they use GPS to record finds, although only one HMD from 166 stated that they used GPS for their entire survey. Only three HMDs from 166 specify a GPS device, rather than a Smartphone app. The information recorded for finds revealed that the least common answers were depth (24.6%) and context (27%). Reassuringly though, the percentage for location/coordinates was 78.6%. The question of whether an HP should be notified in advance of metal detecting digs/events revealed that more than half (56.6%) of HMDs questioned answered yes, with notice periods varying between one week and several months; 25% of responses indicated that the HPs should not be given prior notification. A total of 88% of HMDs questioned said if an HP indicated areas of archaeological sensitivity to be avoided they would heed that advice. 54.8% of respondents indicated that they actively engage with HPs and Archaeological Projects with 15.7% of the respondents saying they do not. HMDs rated their experience in working with HPs as 6.83 out of 10, with the current relationship between HPs and HMDs rated as 5.59 out of 10. A positive outcome of the HP/HMD relationship was the opportunities that it offered for the exchange of knowledge and experiences. Negatives included lack of trust between the two groups, red tape, poor communication and response times. A total of 80.7% of responses indicated that HMDs contribute positively to the safeguarding of Scotland's heritage with others having a more balanced view, appreciating that there can be both negative and positive contributions from the hobby.

8.4 Summaries of Hobbyist Metal Detector Main Research Question Responses

8.4.1 What is your perception of hobbyist metal detecting and its current position within the heritage sector in Scotland?

Only one response (HMD1) indicates that the hobby is exploding due to hoards being found, and the negative result is that some are not declaring and pursuing SMs, using metal detecting to steal. The situation is portrayed more positively by HMD2, HMD3 and HMD4. They think the hobby is starting to gain better acceptance and that it is a valuable asset, an integral, very important, part of the Heritage Sector. Others are not so positive with HMD 9 stating that they have never had any dealing with anyone in the Heritage Sector. HMD 4 and HMD 5 think that the HMD activity finds items that would not be found by archaeologists, saving them from the plough and farm chemicals. HMD10 states that hobbyist metal detecting is important in producing new areas of interest. The NCMD are noted by HMD7 as commenting that there is a lot less opportunity to metal detect in Scotland.

8.4.2 Do you see this position changing in the future? If so, in what ways?

A total of six respondents see the hobby changing but only if laws are changed or if others plan for it to change. HMD1 thinks a negative change would be for HMD to be banned, and a positive change would be working with HPs. HMD2 states that there are opportunities for HPs to utilise the skills of HMDs for surveys and community projects. HMD 6 thinks that regulation is needed; there is a Code of Conduct in place but some do not heed this. HMD6 also suggests that the introduction of a FLO system would be a good idea.

8.4.3 Do you/your members actively engage with heritage practitioners (Local Authority Archaeologists, Museum reps and other heritage practitioners, CIFA Members) and archaeological projects? If not, why?



All but one respondent indicated that they or their members engage with HPs. In north-east Scotland, HMD1 engages with several HPs as well as a local historical society. HMD5 gave up on engaging with HPs due to snobbery in the Heritage Sector. HMD6 has worked with both the TTU and NMS in their area. HMD11 engages with local museum to hand in finds but does not get offered advice or help from HPs. HMD11 notes a negative experience with TTU waiting two years to hear back from them; positive experiences are however noted with one local Archaeologist. HMD11 notes that, "... many HPs detest HMDs and have no time for them."

8.4.4 How would you describe your experiences of working with heritage professionals and archaeological projects?

Most responses state a positive experience of working with HPs. HMD1 notes their experience as excellent and felt welcomed and valued. HMD2 feels that the Heritage Sector lets itself down by not engaging with HMDs on how best to do the job using HMD skills and knowledge. HMD4 notes that TTU is easy to deal with, HMD5 has had positive experiences with one HP but does not enjoy engagement with other HPs. An English example from HMD7 recalls a request in 1987 for an HMD on site by the County Archaeologist and yet the site director refused. HMD9 has never worked with HPs and HMD11 describes a mixed experience and notes that archaeologists are not so friendly.

8.4.5 Is there a common method and clear instruction when on archaeological projects? How does this differ from methods used on digs (1 day)/outings/rallies (1+ days)?

The general consensus is that archaeological projects involve clear instructions and methods in comparison to HMD digs and rallies where participants are free to wander across the area. HMD11 does note that there is no clear plan or instructions on archaeological projects, just scanning spoil heaps. HMD11 also notes that they found items on such digs but never received feedback or gratitude and felt they had wasted their time. HMD 8 states that there is a common method on archaeological projects but that there is not much difference between this and the methods on digs and rallies.

8.4.6 Do you contact heritage professionals/local authority archaeological advisers/Museum representatives ahead of digs/outings/rallies? If so how much notice do you provide and what kind of information?

A total of five respondents stated that they do not provide prior notice of digs. Exceptions to this include sensitive sites, areas of importance and larger digs/rallies when notification is given. Canmore is consulted and this is seen as adequate by HMD2. HMD11 states that they do not contact HPs ahead of digs as there is no one of use. An example from England by HMD7 explains that an Agri-environmental Agreement is in place for 70% of farmland, in these cases 12 days' notice is required ahead of a rally and most follow this rule.

8.4.7 If a heritage professional provides advice on avoidance of particular areas, how would you consider/react to this advice?

All respondents stated that they would acknowledge and respect such advice but some would ask for a more detailed explanation. HMD11 stated they provided a local archaeologist with maps of detecting areas but they were not interested in helping or telling them about potential sites of interest. For rallies in England, HMD7 states that you have got to do this, and *anecdotally* mentions that two HMDs were caught on a SM last year and were up in court.

8.4.8 When engaging with an HP what information do you expect?

HMDs expect HPs to identify finds and expect HPs to ask to be informed of finds and to want to look at the finds. HMDs expect as much information as the HP is prepared to provide including information on areas to avoid and a note of finds already made in the area. HMD10 expects the HP to have an understanding of what the HMD is doing and would expect a concise plan of work ahead. HMD11 states that no HP is available at the local museum as only a part-time volunteer with no knowledge at all is present. Three HMDs did not provide an answer.



8.4.9 How many members do you have? Men/Women/Age range?

This question is answered using both the main research responses and the data from the 166 online responses in paragraph 8.2.1 above.

8.4.10 On average how long have your members been detecting? Have any of your members observed any changes in the hobby?

The range of periods HMDs have been participating in the hobby ranges from beginner to over 40 years. The average stated by HMD2 and HMD3 was around ten years. HMD1, HMD6 and HMD8 all indicate a particular increase in recent years. Five of the respondents indicate new or members with one year or less being in their group/club reflecting those recently joining the hobby. Recent increases in the Metal Detecting submissions to TT (TTU data, 2010-2015) in some areas in the last five years substantiates this account of relatively recent growth.

8.4.11 How far do your members travel to conduct their detecting? Local, regional or national?

Most respondents indicated that they and/or their members would be prepared to travel nationally and/or up to 150 miles. Only HMD2 indicated that they travel locally and regionally, others such as HMD4 states that they would travel from the north of Scotland to the south of England. HMD3 have members from across Scotland. HMD6 travels 150 miles annually and also travels to England and Germany to detect. HMD1 thinks that most would not travel specifically to their area but *anecdotally* notes that there is evidence for HMDs from outside the area detecting at a Scheduled Monument in their area.

8.4.12 Where would your chosen or preferred area be?

The responses to this question vary from the more general, Scotland and Central Scotland, to specific areas such as Moray and The Black Isle. Others state that have no preference or special areas and go where the research takes them. The areas for detecting are dependent on permissions so in some cases this may dictate the location. HMD8 notes that sites with history attached would be detected. HMD1 notes that sites are sought and after a preliminary wander a more methodical survey is undertaken.

8.4.13 Are there specific areas and or sites that you/your members prefer to detect? What factors inform the selection of a site and what resources, if any, are used during this process.

Battlefield sites are noted by HMD1 while also noting that field walking and research is done on the archaeology and history of the site. HMD1 uses maps, word of mouth and experience to target sites. Dump sites, areas around castles, churches and beaches are noted by HMD4. HMD4 also researches parish records and old maps of the area. HMD6 notes that prehistoric Bronze Age sites are preferred, and more generally areas that have been busy over the centuries giving a higher chance of finds. HMD7 notes that the club has a bank of land with limited access to certain areas within that. Old market towns and old working farms are noted by HMD10. They go on to state that talking to landowners can give an idea of how old relics/coins might be in the area along with information from the internet. HMD11 conducts research and prefers to detect around old churches and castles. HMD11 uses the available HER records but notes that the resource is only accessible 10% of the time due to no budget for it. HMD2 and HMD5 note that selection is based on availability. HMD3, HMD8 and HMD9 did not provide a response.

8.4.14 Do you prefer to metal detect on your own, or as part of a group?

A total of seven respondents have no preference but HMD4 and HMD7 think groups provide a social, competitive, idea exchange and safety aspect to detecting. HMD1 prefers to detect alone to ensure it is done properly. HMD2 prefers to detect as part of a group and while HMD6 prefers groups they feel they find more when alone.

8.4.15 If you attend metal detecting rallies/digs what do you like and dislike about them?

The social aspect of both digs and rallies is noted as positive although HMD6 notes that



sometimes there can be too many people at rallies. This is echoed by one HMD7 in their note of under recording and difficulty in engaging with a FLO at rallies in England as they are too busy. HMD4 notes the advantage of attending rallies in England being that you get different finds that you wouldn't usually get in Scotland. HMD4 also notes the negative side of rallies *anecdotally* where there is a degree of dishonesty with finds brought to the event under the pretence that they have been found that day, also finds are planted for the event. On attendance at a club dig as part of this research, accounts from senior members of the club stated that novice HMDs do on occasion produce artefacts that, in the opinion of the more experienced members, have not been found on the site. This conclusion is based on the relative condition of the find in comparison to other artefacts of similar metal type and taphonomy found on the site. Although *anecdotal*, these comments do suggest that this practice may be occurring within the hobby. NCMD do not support rallies but notes that the advantages of club digs are the social aspect with the sharing of experiences and knowledge.

There are thought to be up to five rallies per year in Scotland. One weekend rally event was organised in 2015 by DS at Kingsbarns, Fife; this rally involved approximately 120 to 150 HMDs and raised several thousand pounds for charity. On the same weekend Toddy's Dig's organized a rally in the Scottish Borders, this attracted approximately 25 HMDs on both days. Both rallies were attended by a representative of the TTU which assisted with finds identification and reporting. DS usually have one day rally events, so 2015 was the first weekend rally organised by the club. DS have a two day dig planned for mid-May 2016 which is a Minelab sponsored event and will be held in Fife near Lochgelly. This rally will raise funds for the 'soldiers off the streets' charity. DS also have a summer rally planned for 23rd September 2016 in Cairndow, Argyll. DS have requested archaeological/TTU attendance at the rally to assist with identification and recording. Toddy's Digs has held a weekend rally each year since 2012 with three in the Scottish Borders and one in Linlithgow. Rallies are not as common in Scotland, with probably less than five annually, and they are perceived to be considerably more frequent, and with much higher numbers of attendants in England and Wales.

8.4.16 How frequently do you metal detect?

The range of responses varies widely from 6 to 8 hours daily to once per month, it was acknowledged by the respondents that it was difficult to estimate the frequency for all club members. A more quantifiable analysis of the frequency which utilises the 166 online responses can be found in paragraph 8.2.5 above.

8.4.17 What inspired you to start metal detecting?

The inspiration to start metal detecting ranges from an interest in history / archaeology to having an opportunity to try metal detecting at some point before taking up the hobby. Some HMDs acknowledged that it was difficult to speak for a large number of their members on this question. This question is analysed in more detail using the 166 online responses in paragraph 8.2.3 above.

8.4.18 Are the metal detectorists in your club aware of the relevant legislation, such as Treasure Trove and the Ancient Monuments and Archaeological areas Act?

All respondents answered yes to this question. Members are provided with information from clubs and, if applicable, NCMD. Clubs also encourage members to stay within current guidelines and HMD4 in particular suggests that scans of finds should be sent to TTU even if the significance of the find is not apparent. As most of the HMDs questioned were speaking on behalf of clubs etc. the responses did not highlight any potential variance in awareness and adherence to the legislation. This question is looked at in more detail using the 166 online responses in paragraph 8.2.16 above.

8.4.19 Is additional information and guidance made available to metal detectorists in your club? If so, what do you provide?

With the exception of HMD1, yes, additional information is provided. On joining NCMD a set of hand-outs are sent out including NCMD code, HS (now HES) guidelines, and article by Alison



Sheridan in 'The Searcher' (1995), TTU leaflets and a magazine three times per year. HMD2 provide updates on their forum with links to the TTU website. HMD4 makes all members aware of TTU law and any areas that they are not allowed to detect upon, members are also encouraged to join NCMD or FID. HMD5 states that there is plenty of relevant information on the club forum. HMD10 notes that before rallies all information is relayed to attendees on exclusion zones, protected sites and who to report to. HMD11 notes that although all members are provided with TTU hand-outs, this resource could be more detailed, HMD11 did not suggest ways in which the detail could be enhanced.

8.4.20 What format would you want this guidance to be in? How do you wish to access it?

Where responses were provided most indicated an electronic version of the guidance is most suitable as this can be reproduced and shared on forums and websites. HMD3 noted that outreach programmes were useful and three other respondents preferred hard copies of leaflets and posters.

8.4.21 How do you respond to members/other hobbyist metal detectors who do not follow guidance and/or the law?

The responses show a consensus that this would not be tolerated. HMD1 specifically mentions that they would provide guidance on hoards, advising that digging is done with assistance (from archaeologists). All clubs maintain that members should follow guidance (from relevant HPs) and that they would eject the relevant member. HMD4 notes that HMDs who break the law do not usually belong to any club. HMD7 and HMD11 both state that they would call the police if night hawkers were seen illegally detecting. HMD10 provides an *anecdotal* example where they reported an incident to Historic Scotland but were disappointed that no action was taken.

8.4.22 Who do your members usually engage with in the first instance after recovering potentially significant artefacts? (Treasure Trove Unit, museum representatives, heritage practitioners, local authority archaeological advisors, metal detecting forums, others?)

No consistent response was given for this question. HMD1 would at first contact the Local Authority Advisor, HMD2 would consult the club forum followed by TTU. HMD3 would contact TTU first followed by the local museum. HMD4 would contact TTU or the club secretary then TTU. HMD5 would advise all members to email TTU that night after a dig. HMD6 would go to a particular named individual known to the group/club for identification, get a GPS spot and inform TTU or go to the museum. HMD7 states that everything has to be reported to TTU in Scotland but the finder should also speak to the landowner. HMD7 provides an English perspective whereby if something significant treasure is found the Coroner is called and the FLO. If the item is non-treasure then only the FLO is called, with significant finds the FLO must be called upon quickly. HMD8 states that the forum would be consulted in the first instance followed by TTU. HMD9 is unsure. HMD10 suggests contacting the dig co-ordinator who would then decide whether to stop the dig. If a single find is encountered then it is reiterated to the finder the importance of recording the find with TTU. HMD11 suggests that TTU on occasion do not want to see a find if the photo submitted is poor; in reality the scenario is much more likely to be that a better quality photo would be requested by TTU in order to make a reasoned decision on the object. This is a scenario that has been observed on metal detecting forums where HMDs have indicated that a better quality image has been requested by TTU.

8.4.23 From your experience, what constitutes a significant find to your members? Type, rarity, value, material, age, state of preservation, associated place?

From the responses, significance is subjective and can depend on the past experience of the HMD. HMDs note significant finds as: finds that stand out from previous finds, easily recognisable objects, any item that can add to local or national history, personal items such as rings, items with a story behind them, militaria, state of preservation and hoards.

8.4.24 What is the current relationship between heritage practitioners and hobbyist metal detectors?

The current relationship varies from those such as HMD11 who believes there is no relationship,



to HMD1 who sees the relationship as excellent. Interestingly these two HMDs detect in the same area of north-east Scotland and yet they perceive the relationship at opposite extremes. HMD2 acknowledges that not every HMD wishes to work with HPs but maintains that the club has had and continues to have very close relationships with HPs. HMD3 sees 'genuine co-operation' between HMDs and HPs. HMD4 has observed improvements in the relationship from a contemptuous one in the past. HMD7 observes in England that the relationship varies between areas with some holding on to old archaeology politics of the 80s and 90s. HMD8 feels that there is room for improvement and HMD10 sees the relationship as broken.

8.4.25 What is positive about that relationship?

The main positives about the relationship are that it provides a means to share knowledge and experiences to benefit both parties. HMDs 1 to 4, 7 and 10, who engage with HPs and experience a positive relationship, stand to benefit from further involvement in archaeological projects, fulfilling a role within the management of the heritage in their area. Other HMDs don't see the benefits of the relationship due to either inadequate or non-engagement with HPs. HMD1 and HMD11 again have contrasting experiences and therefore views of the relationship between HMDs and HPs in their area in north-east Scotland.

8.4.26 What is negative about that relationship?

It is noted by four respondents (HMD 6, 8, 10 and 11) that, what is perceived as, the long TTU response time and time taken to return items is a negative aspect of the relationship. HMD11 also notes that the time delay may lead to HMDs selling items on auction sites, which of course is illegal. HMD1 notes the lack of honesty on the part of some HPs in relation to sites with apparent significance. HMD2 believes that more engagement by HPs with HMD would provide opportunities for skills and knowledge exchange. HMD3 points out that the sensitivity of some sites to detecting is a negative aspect of the relationship. HMD7 perceives the relationship as positive and sympathises with the workload of FLOs in England.

8.4.27 Do you engage in metal detecting tourism?

From the 11 respondents, seven indicated that they do not engage in metal detecting tourism. HMD1 states that the practice should be made illegal. A metal detecting tourism business in north-east Scotland is mentioned *anecdotally* by HMD7; this company arranges bus transport for Americans to attend detecting events where allegedly finds are seeded. HMD7 has noted that some continental people have expressed an interest in attending rallies in England. HMD7 has detected in Majorca once. HMD9 has travelled to Wales and Yorkshire for detecting. HMD6 has attended digs in England and Germany. HMD10 engages in metal detecting tourism occasionally. Surprisingly, despite two of the respondents being based in north-east Scotland, where the only current metal detecting tourism venture (to the knowledge of the author) exists in Scotland, neither mention this in this question response.

8.4.28 How common is this on digs/rallies you attend?

HMD tourists from Holland, Belgium, France, America, Canada, Scandinavia and Poland are noted by HMDs 1, 7 and 10. HMD7 notes that Dutch tourists that had been encountered on a dig did things correctly, HMD7 goes on to state that if tourists are brought to digs we need to ensure that the items are recorded. HMDs 1, 2, 6 and 11 all state they have not come across this tourism in their areas. HMD5 and HMD9 appear to have misunderstood the question and have answered weekly, perhaps referring to the frequency of digs, not the commonality of metal detecting tourism.

8.4.29 What is your experience in liaising with landowners for hobbyist metal detecting activity?

The experience in liaising with landowners is generally positive. The landowners can assist with advice of best fields for detecting, they also may know the older parts of the farm. Some landowners are interested in the history of the farm while others just want the holes backfilled and gates closed. In some cases a selection of finds can be gifted to the farmer. In England some



are targeted by archaeology pressure groups to stop detecting, other farmers charge for access onto their land. Gaining permission to detect relies on building up trust, HMD2 also offer a free recovery service for landowners and the general public which helps farming communities.

8.4.30 How do they assist you in your hobby?

According to HMD7, in the context of England, the landowners provide information on fields. Countryside Commission applies to some land in England and this grant is subject to restricted metal detecting. Some landowners are happy to share history of the farm with HMDs and show an interest in the findings. The landowners may point out areas to avoid as well as areas that may be worth targeting. Some landowners do not want archaeologists on their land, working relationship and trust is therefore important. Some landowners simply grant permission and provide no other assistance.

8.5 Summary of Hobbyist Metal Detector Main Research Responses

- 8.5.1 Of the HMDs questioned, the length of time that they have been detecting ranges from 1 to 40 years, with a recent growth in new members noted. The general consensus is that archaeological projects involve clear instructions and methods in comparison to HMD digs and rallies where participants are free to wander across the area. The perceived potential changes for the hobby are that it could be banned, if laws were changed. A more positive change envisaged is a move towards greater engagement with HPs. Most HMDs that do engage with HPs describe it as a positive experience. Less than a third of the HMDs questioned think that the hobby is starting to gain better acceptance and that it is a valuable asset, an integral, very important, part of the Heritage Sector which finds new sites. HMDs think that the hobby finds items that would not ordinarily be found by archaeologists, and that may otherwise be damaged by the plough and farm chemicals.
- 8.5.2 A total of five respondents stated that they do not provide prior notice of digs. Exceptions to this include prior notification for sensitive sites, areas of importance and larger digs/rallies. HMDs expect an HP to provide information on sites to avoid as well as providing finds identification and note of previous finds in the area. There is a varying degree of information and expertise available across different areas of Scotland.
- 8.5.3 Most HMDs said that they would be willing to travel up to 150 miles to detect while also enjoying detecting locally. In terms of site selection, some are detected plainly based on availability, other club representatives note a bank of land that they have permission to access parts of. Research is also noted by most as a deciding factor in where to detect; resources used in research include HER records, literature, maps, landowner information and word of mouth. On the subject of rallies and digs it was noted that the main advantage of rallies was that they enabled exchange of knowledge and experience in a social setting. The main disadvantages noted were that there can tend to be a lot of people attending which does not appeal to some. The high numbers can also lead to underreporting in one HMD's opinion.
- 8.5.4 All respondents said that they and, where representing a club/organisation, their members were aware of the relevant legislation. Guidance is provided for new club members, this includes the club/organisation code of conduct and information on TT law as well as other articles in some cases. It was noted that outreach programmes, leaflets and posters from TTU were useful. While most suggested a digital version of information was favoured, three specifically noted a preference for hard copies of leaflets etc. The consensus from HMD responses was that those HMDs not following guidelines would not be tolerated among peers. When asked about the first point of contact made on discovery of a potentially significant artefact, responses varied widely. Most indicated an informal approach whereby the find would be discussed with a third party before contacting Treasure Trove.
- 8.5.5 A wide range of attributes are noted by HMDs for the significance of a find, this can very much depend on the past experience of the HMD. Some do note militaria, well preserved finds, those with local significance, those with a story behind them, and hoards as significant. The perception of the current relationship between HPs and HMDs varies widely from those having

an excellent relationship to those who see the relationship as non-existent. Over half of the HMD respondents stated that the most positive side of the HP/HMD relationship was that it provides a means to share knowledge and experiences to benefit both parties. There were four respondents from 11 that indicated response time from TTU as a negative side of the HP/HMD relationship with one stating that this could lead to individuals selling items online.

8.5.6 A total of seven respondents from 11 stated that they do not engage in metal detecting tourism, those that do mention that tourists from Holland, Belgium, France, America, Canada, Scandinavia and Poland have been known to attend digs in Scotland. Landowners have a key role in HMD activity in that they provide or withhold permission to detect on their land. HMDs aim to build up trust with landowners to facilitate more detecting, in some cases the finds are gifted to the landowner or token rewards are given, such as whisky, in appreciation for their permission. This is a practice that has also been employed on archaeological community projects directed by the author where permission has been required prior to work which may lead to some inconvenience to the landowner. Landowners can also provide information which may or may not suggest the likelihood of artefacts surviving on the land. Landowners also have the responsibility of informing HMDs of any areas or in particular SMs that should be avoided.

8.6 Summaries of Heritage Practitioner Main Research Question Responses

8.6.1 What is your perception of hobbyist metal detecting and its current position within the heritage sector in Scotland?

The responses to this research question could be placed into three broad groups, those who believe that HMD do not, and should not, have a role in the heritage sector; those who accept that HMD are part of the system and should therefore be carefully managed; and those who perceive the HMD as being "...vilified." (HP1) and, "...derided as an unimportant, potentially harmful, fringe group that is largely treated with disdain and hostility" (HP13). Despite this stance HP13 also states that HMDs do not have a role in the heritage sector. HP4 goes a step further and states that HMD should not have a role in the heritage sector. In the opinion of HP20 the majority of HMD do abide by the law but there remains the issue of HMDs, some ignorant of TT law, coming across the border from England to metal detect in Scotland. In the opinion of one HP there is a disparity, in south-east Scotland, in the number of finds recovered and the number recorded and then declared to the TTU.

8.6.2 What potential position do you think, if any, that hobbyist metal detecting should have within the heritage sector in Scotland?

Most HPs provide positive responses in relation to a potential position for HMD in the heritage sector, one HP however has expressed concerns that a HMD in Northeast Scotland is running a tourist metal detecting business aimed at American tourists. (This has been verified by the author and is discussed further in paragraph 8.4.27.) The only exceptions were HP4 who would seriously consider banning the HMD in Scotland, and HP13 who analyses the question itself but, despite highlighting previously how HMD are derided as unimportant, no potential position for HMD is suggested in response to the question. HP1 suggests a more central role, HP2 indicates that HMDs are just as good as other volunteers, HP9 sees their role as providing a vast amount of information for HER recording while HP19 suggests that HMD are encouraged to work in partnership with HPs on projects, and be discouraged from working alone. There are also suggestions by HP15 for a larger, PAS-style TTU with the ability to undertake/ commission excavation, conservation and reporting.

8.6.3 What is your experience with hobbyist metal detecting?

HP1 notes HMDs as some of the most dedicated volunteers on community projects with HP7 also noting a good working relationship with some HMDs in parts of their area, although some do not engage and no HMDs from other parts of their area currently engage. HP4 states that their experience of HMD is fairly good and that HMDs are always friendly, and that they show an interest in history not money. HP6 indicates a mixed experience with a small number willing to provide information, some groups are operating but no notification of finds and /or their

locations is forthcoming. HP10 has had good experiences with HMDs but also believes that HMDs are unaware of the museum/HP point of view. HP12 is less positive stating that the bad experiences outweigh the good. HP8 sees the HMD community as represented by three groups: criminals; genuine interested/amateur HMDs and more professional HMDs (making a living through property of the crown). HP16 suggests a largely positive experience when engaging with HMDs, often leading to new finds and exchange of knowledge. However HP16 also said that known sites continue to be looted and there is a general mistrust between HPs and HMDs. HP19, one of two HPs who provided a view on one of the urban areas in central Scotland, noted the invaluable contribution HMDs made to the recent battlefield survey projects. HP20 goes on to say that on surveys and excavations HMDs can be a huge asset and add to our existing knowledge. HP20 also *anecdotally* notes that they are aware of night hawking and underreporting because of the perceived issues with time delays in processing artefacts with TTU and NMS.

8.6.4 What are the negative impacts/positive contributions of metal detectorists and events, in your experience?

The main negative impacts noted are: underreporting; damage to known and unknown archaeology sites.; damage to battlefields.; detecting SMs, lack of standard methodology; lack of full mapping of all finds; lack of control on large rallies; night hawking; landowners can be put off engaging with the heritage profession if experience bad with HMD.

The positive contributions that are, or could be, made are: contribution to our understanding of the past; new information on battlefields; exciting finds helping museums; new sites discovered; individuals are hard-working and enthusiastic; exchange of knowledge and skills.

8.6.5 Are you aware of the methods, if any, used in the recording of finds by metal detectorists?(And what methods should be used?)

Most HPs are unsure of the methods used for the recording of finds. Some are noted as using GPS, either Smartphone or handheld. Some use Google Earth or other mapping system with some evidence of false provenance. In the opinion of most HMDs, no systematic detecting is done in a club setting, it usually just involves wandering. In one example, an HP described Danish tourists detecting and GPS tagging the find spots, photographing the finds and providing itemised reports on two surveys to local authority archaeologists. HP11 noted that in a presentation by HMDs they had attended, it was clear that finds were not being mapped. HP13 remarks that, "... very little attempt is ever made to accurately record find spots and no attempt is ever made to produce distribution plots. Memory is the only recording tool that is routinely used. But how many professional archaeologists report all of their work, finds and observations?"

Suggestions for methods that should be used include grading of HER sites for metal detecting, e.g. no metal detecting on Roman sites but possibly around the sites to better define their limit. HP9 suggests that a survey area is covered by 10 m transects and hotspots are covered 100% with perpendicular transects. HP16 suggests that ideally an 8 or 10 figure grid reference would be useful with an accompanying photo and written description including the depth of recovery.

8.6.6 Do you actively monitor MD activity within your geographical area or as part of your role? If yes, how? If no, why not?

HPs do not actively monitor metal detecting activity, this is mainly down to the lack of resource but is also influenced by the fact that HPs are not usually informed of activity until well after the event and it is not a priority as stated by HP13.One exception is HP14 who does monitor activity but finds out indirectly when detectorists submit material to TTU without including museum representatives or the local authority archaeologist. Two incidents of bad practice are *anecdotally* noted by HP18 in the past 17 years, both in relation to SM sites. Some HPs in more rural locations in north-east and south-west Scotland, have an informal shortlist of those who detect in their area. HP9 noted that the reception from the HMD can be quite cold towards HPs, they do not want interference. HP11 stated that they would only monitor as part of a specific planning specification.

8.6.7 Have you observed any changes in this activity over time?

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The response is quite varied dependant on the individual and the area, although one also needs to consider the responses in light of the previous question responses where most stated that they did not monitor HMD activity. HP11, HP13, HP15 and HP19 all stated that there was no change, HP20 suggests that there are fluctuations in activity and communication over time. A total of eight HPs suggest a substantial increase in recent years with HP1 suggesting a 10 or 20-fold increase. The areas where these increases were noted are Stirling, Clackmannanshire, Moray, Angus, Aberdeenshire, Aberdeen City, East Lothian, Argyll, Dumfries and Galloway and Falkirk.

8.6.8 What in your opinion is the extent of metal detecting in your region/area?

Only three of the 21 respondents could provide a figure for the extent of HMD activity in their area, HP5 (20 to 30), HP9 (30 that engage, from 3 to 4 groups) and HP16 (345 in one group, estimated 500 in area). HP10, one of four providing a response relevant to Argyll and Bute in this research, stated that an estimated 40% of the Kilmartin valley floor has been detected. In addition multiple SMs were allegedly targeted by HMD at Kilmartin seven years ago (2008).

8.6.9 Are there specific areas and or site types that particularly attract metal detecting activity? Do you have any concerns about these areas/sites, or has the information they recovered been generally beneficial?

In the central Scotland specific sites targeted include the area around a scheduled abbey site, the Scheduled area around a castle, and two inventory battlefields. More generally: Bronze Age, Roman, late Iron Age/Viking/early Medieval, Medieval, castle sites, Scheduled Monuments, river crossings, fayre sites and old travel roads/pilgrimage networks are all noted as foci for metal detecting. It is thought that the wider area of some iconic battlefields is at risk. "Beaches are always popular simply because there is often a perception that permission to detect on beaches is not required." (HP13). The discovery of Hoards can encourage interest in an area that ordinarily would not draw attention. Aviation Archaeology (or amateur WWII aircraft recovery) is noted as being of interest [**see note below*]. Awareness of the FES guidance may not also be very high amongst front line staff. For the north-east of Scotland there seems to be a concentration around the urban centres for detecting. The Brough of Deerness incident in Orkney, was detected over a decade ago. According to HP 18 no prosecution followed one incident of metal detecting on a Scheduled Monument despite witnesses and video evidence:

".. the metal detectorists were digging on a SAM. They were filmed by (omitted) archaeologists (and) car number plates were recorded. Filmed saying, '...look what we found...' – i.e. a coin. And then all the holes were documented by... (two HPs) ...next day to record damage.

*[Note: This is in conflict with the Protection of Military Remains Act (PMRA 1986). All military crash sites in the U.K. and in coastal waters are classified as "controlled sites" under this Act. This applies regardless of any loss of life associated with the crash site. The Act made it an offence to tamper with, damage, move, remove or unearth any items at such sites, unless the Ministry of Defence issues a licence authorising such activity].

8.6.10 Do MD individuals/ clubs engage with you ahead of metal detecting events?

HP1 indicated that they do not have engagement from HMD ahead of metal detecting events, except on one occasion. HP2 stated that not many events occur in their urban area but that on occasion discussions are had in relation to parks. HP5 has occasional conversations with a local HMD about metal detecting survey. HP3, HP4 and HP5 indicate that they do not have prior engagement with HMD before events. HP17 stated that they did not expect prior engagement. HP7 does hear in advance occasionally but never hears from a particular group, while detectorist engagement in part of their area has improved, reflecting good practise. HP6 noted that they do not get information on finds discovered usually. Only one HMD has ever come to HP10 to provide advance notice. HP12 has been notified twice in five years whereas HP13 has been given prior notice of digs frequently.



8.6.11 Do they provide adequate detail and notice?

The general consensus is that adequate notice is not provided, 14 HPs indicated no, n/a or did not provide an answer. Two respondents indicated yes that adequate notice was given, the remainder noted occasions when notice as given rarely or on some occasions, although notice is not usually adequate.

8.6.12 If not how do you find out and how do you address the issue?

HP6 indicated that a FLO or equivalent Local Authority level or local HP contact to maintain local relations with HMDs would be beneficial. This would lead to better communication and information transfer. The HP usually finds out after the event through TTU or indirectly through other means such as a member of the public or later through a media release.

8.6.13 What level of information do you feel is necessary? What would you do with this information?

Most HPs suggest a set of requirements but HP8, HP3 and HP16 cover the main requirements that could assist HPs in maintaining the HER record. HP8 stated that if HMDs were obliged to contact an HP with information such as: the extent of the survey area; reassurance of a suitable recording system; reporting system; -methodology to protect sub-topsoil levels; Code of Conduct; post event notification of findings. HP3 indicated a similar set of requirements: where?; how many people?; recording?; SMs/Avoiding SMs?; rallies – set out procedures for hazards. HP16 also notes the provision of evidence that the finds have been submitted to TTU on completion of the survey/ metal detecting event would be useful in updating the HER records for the area.

8.6.14 What type of advice do you provide? HER information? Areas to avoid? Advice relating to landowners?

HPs suggest advice on Scheduled Monuments and their avoidance with one HP indicating that no metal detecting should encroach within 20 m of the SM boundary. Advice would also be provided on other archaeological sites to avoid. Information, including leaflets and online resources for Treasure Trove as well as HES guidelines would also be provided. Assistance with finds is also offered should it be required. The HMD would be advised to create a map of their finds and survey area and to report the finds through the TTU system. Metal detecting may be discouraged should the situation dictate this as the most ethical course of action to minimise the potential for negative impacts on the historic environment. HP1 indicates that they would not engage with HMDs beyond providing information on the avoidance of SMs.

8.6.15 Do you think the HMDs in your area/region are aware of the relevant legislation?

There were two responses indicating no and two who did not provide an answer. The remainder agreed that most are aware and that those who were part of a club were more likely to be aware and to adhere to the legislation. Some newcomers may not be aware but there are numerous sources of information from local authorities, TTU, HES and when asking landowner permission information will also be available at this point. HP20 raises the issue of English HMDs coming over the border into Scotland to detect and wrongly assuming the PAS system applies. As HP7 points out, despite being aware of the legislation, some still detect on SMs. HP14 provides an *anecdotal* example of an apparently genuine case of naivety when a HMD recovered four Roman coins from a SM, he had been given permission to detect on the land but was not aware of the Scheduled Area.

8.6.16 How aware are the metal detectorists operating in your area of sites recorded on Canmore, the Historic Environment Records, and the Inventory of Historic Battlefields etc. Are these sites actively chosen for Metal Detecting?

A total of 12 respondents indicated that they thought HMDs were well aware of Canmore, HER etc. and use it to target sites, not unlike archaeologists who use these resources to avoid sites or to mitigate for potential impacts from development. Other HPs are not so sure that these

resources are used so readily by HMDs. From the author's experience in discussions with many detectorists from various clubs over the years, a number of different resources are used, ranging from literature, online sources (such as PASTMAP etc.), maps, past experience and landowner information.

8.6.17 How aware are the metal detectorists operating in your area of scheduled and/or undesignated sites? Is there any evidence of these sites being detected upon? What advice do you provide?

The majority of HP responses suggest that HMD are aware of the SMs and/or undesignated sites. There is some anecdotal evidence of detecting on multiple SMs in the north-east of Scotland. There is no factual evidence or research to back up these claims. HP14 believes that HMDs are aware and some don't care. HP3 believes that most know about SMs. The boundary of SMs is not always clear and awareness is not there, especially in relation to Roman sites being detected. HP13 states, "I always advise HMDs of the legal situation. I cannot remember a case in (my area) in the past 15 years where HMDs deliberately set out to detect on a known site, knowing that their activities might be illegal or contrary to the best interests of the site". HP14 does not know of anyone targeting SMs but there are definitely HMD targeting around SM perimeters. HP13 thinks that, "...the recovery and reporting of unstratified finds in the plough zone almost exclusively only makes a positive contribution to the archaeological record and to our understanding of the past."

8.6.18 Do you think that metal detectorists are aware of the impact that detecting could have on the Archaeological Record?

HP5 notes that HMD do not see the full picture, some see their hobby as treasure hunting, and some want to be part of the process of recovering Scotland's history. HP7 sees things similarly in that HMDs don't appreciate the impact or importance of the HER and preservation of the archaeological resource. In archaeological investigation the HP first preference is always preservation in situ, and if, as is most often the case, it is not possible to modify a proposed development, the archaeologist will then destroy it through excavation. In doing so the aim is to recover as much information from the archaeology as possible, preserving it by record. In contrast, the first preference of the HMD is not to leave a signal in the ground, preserving it in situ, but to retrieve the artefact, blind, from the topsoil/ subsoil interface. This is done with no consideration for the context from which the object came. Archaeological contexts can and do survive quite high in topsoil layers, everything is not sealed by a homogenous, uniform layer of loam.

Beyond the physical damage that recovery without adequate care can have, HP14 provides an *anecdotal* example of evidence for manipulating the legislation for financial gain and the lack of appreciation for context:

"One Roman coin hoard from (a) while back, declared as found in ... (south-west Scotland). Numismatic analysis and dating suggest an assemblage more in keeping with East Anglia. Very sceptical if this hoard was legitimate,... (the HMD) may have pretended it was found here to avoid 50/50 split with a landowner in England, so seeding is problem but not sure how widespread this might be".

8.6.19 From your experience, what constitutes a significant find to metal detectorists? Type, rarity, value, material, age, state of preservation, associated place?

Some HPs think that HMDs are only interested in the star 'bling' items such as Bronze Age axes, coins, brooches, gold, jewellery, Roman artefacts etc. Others see the interest in militaria and items that can potentially be tied to a regiment or even individuals. The range of items that appeals to HMDs is wide and varied and is probably influenced by a number of factors. This question was devised to establish what was important to HMDs in terms of artefact. To an archaeologist the context is key, an artefact no matter how 'bling' has little value without the physical association with the archaeology. In a similar way the HMD takes value from the ability to tie an object to an historical figure and or event, having no physical stratigraphic context to attribute the artefact to. HP13 diverts from the materialistic viewpoint and states, "It's the



journey of discovery that drives them and the desire to engage with, please and be recognised by fellow HMDs and by professionals working in the heritage industry that supplies the buzz."

8.6.20 What is the current relationship between heritage professionals and hobbyist metal detectors in your experience? What would you change?

The HP respondents accept that the relationship is not as good as it could be with better and more regular communication and real and lasting mutual respect. A catalyst for an improved relationship between HP and HMD may be a sustainable program of outreach by the TTU; the TTU is already active in this sense. TTU in many cases may be the main, and regular, contact that a HMD has within the Heritage Sector so it is important that this interaction is as accommodating, professional and informative as it can be. Both HP and HMD have expressed negative comments on, first and foremost, the time delays, but have also complained of the lack of transparency and periodic feedback when using the TTU system. Suggestions for change by HPs include the creation of opportunities for discussion between heritage bodies and companies, and HMD clubs and individuals. Metal detecting is already contributing to the Heritage Sector through the recovery of artefacts on an individual and club level, through participation in community and battlefield events and projects and through general interaction with HPs that have reached out to involve and include HMD in archaeological projects. Some HPs, it is apparent, have worked hard at nurturing and maintaining positive relationships with HMD in some areas in south-west, south-east and central Scotland. There are suggestions for more control with the introduction of proforma methodologies, not unlike those used in archaeological projects. There is also a suggestion for more accuracy in recording with specifications of GPS equipment queried.

8.7 Summary of Heritage Practitioner Main Research Question Responses

- 8.7.1 The HPs consulted provided a wide range of viewpoints and experiences. The opinions on the role of HMDs falls into three main categories: those who believe that HMD do not, and should not, have a role in the heritage sector; those who accept that HMD are part of the system and should therefore be carefully managed; and those who perceive the HMD as being treated with hostility from HPs. Some have nurtured positive relationships with at least parts of the metal detecting community in their respective areas in the north-east, south-west, south-east and central Scotland, which has led to more transparency in the metal detecting activity. However, it must be said that not all experiences in these areas have been positive. In other areas of Scotland and the islands, despite engagement and assistance being offered by the HP, there is some *anecdotal* evidence of illicit metal detecting practices occurring. Some representing the Museum sector have experienced positive engagement with HMDs in north-east and western Scotland and yet there still remains a degree of disengagement from some HMDs or HMD groups. In central and western Scotland there appears to be little HMD activity, although the HPs in these areas do not generally engage with HMDs or vice versa.
- 8.7.2 Suggestions for improvements in the methodologies used by HMDs include the provision of at least 8 figure grid references, the use of transects and targeted survey, and the grading of HER sites for Metal Detecting whereby sites can be better defined through peripheral detecting. Negative impacts of HMDs are noted as: underreporting; damage to known/unknown archaeology sites; loss of information and damage to battlefields and SMs; lack of a standard methodology; lack of full recording; lack of control on large rallies and night hawking. Positive contributions include: contribution to our understanding of the past; new information on battlefields; exciting finds for museums; new site discovery; potential for exchange of knowledge and skills.
- 8.7.3 All but two of the HPs said that, on the rare occasion when they do receive prior notice, it is adequate. The remaining HPs say that they do not receive prior notification and usually find out about events and what was found through the media some time afterwards, or through TTU when the finds have been through the system.
- 8.7.4 The site types noted by the HPs questioned cover all periods where metal could be part of the material culture surviving, i.e. Bronze Age onwards. Any site where permission is available and where there is the potential for recovering artefacts of interest it may be detected.



Discussion

- 9.1 It is important to acknowledge here that in researching this subject it was clear that most HPs do not actively monitor or collate HMD data, and yet these same respondents could provide a response for extent and problem areas. Estimates and opinions can therefore not have always been based on direct information and knowledge. It may be the case that some statements on the extent of the practice of hobbyist metal detecting in some areas is based, at least partly, on *anecdotal* evidence.
- 9.2 It should also be acknowledged that the HMDs, and in some cases HPs, who were forthcoming in participating in this research do not necessarily represent the hobby, and likewise the archaeology profession, as a whole. The respondents probably represent those who are more willing to participate, it is likely then that few of those against engagement between HPs and HMDs have participated. Non-participation in this research may also be down to other factors such as time, a reluctance to provide an opinion on the matter, and scepticism around the anonymity may also have been a factor despite assurances. From 118 requests for responses to the main research questions only 32 (27%) responded. In all cases more than one request was put out and where applicable follow up requests were made by phone. The online version of the research questions was inherently more detached and less confrontational while also being easily accessible online, as opposed to discussing the research with the author. The response here was impressive in terms of number (166) but not necessarily in terms of proportion (31.9% of the estimated population of HMDs at 520 in Scotland) which is only marginally more than the response success for the main research questions.
- 9.3 The estimate for the number of HMDs currently operating in Scotland can be based upon the upper figure of online membership of 1800 and the lower figure of 313 NCMD members. The online figures are most likely inflated by those with an interest but not necessarily having any intention of becoming an active member, for instance the author is a member of several metal detecting forums. One Aberdeen HP suggest a figure of 500 HMDs for NE Scotland alone, but this figure is outdated given that Doric Diggers, formerly the largest club in that area, no longer exists and this figure represents online numbers, not active members. The figure for Doric Diggers is more likely to be 20-30 members. Using the NCMD figure as a baseline, and taking into consideration the figure for HMDs who are potentially not members of any club or society (39.8%) (Thomas 2012), an estimate of 520 HMDs in Scotland is the result. The average number of members per club figure of 50 used by Thomas (2012), in relation to England and Wales has not been used in this case to calculate numbers in Scotland given that many club memberships here fall well below this average.
- 9.4 There is the suggestion from HPs that the extent of hobbyist metal detecting is increasing, at least in some areas of Scotland, while others suggest little or no change. There are also small increases in the number of women joining the hobby in the last decade. One HP, who has around 20 years' experience with HMDs in their area, suggests that there is no real increase in the activity. Analysis of the TTU data suggests otherwise, the data for the same area shows a more than 14-fold increase in TTU submissions in the last five years. This cannot merely be down to increased reporting, and must be linked to a particularly marked increase in metal detecting in that area. It is noted that, despite some HPs having active engagement with the hobby for up to 20 years, the perception of the level of activity is not necessarily accurate. This could be down to a section of the HMD community not engaging with the HP or merely down to perception given that no HP in any area is tasked with actively monitoring the activity.
- 9.5 The TT data provided for this research (Appendix A) shows that while the hobby has become more widespread geographically over the past 35 years, there remain four key foci of activity, Perth & Kinross, Dumfries & Galloway, Fife and The Scottish Borders. It can be no coincidence that these areas encapsulate some of the best arable farmland in Scotland. These areas are highlighted as the highest quality farmland (Class 1-3) in the distribution of land capability classes for agriculture in Scotland (Davidson and Carter 1997, 51). This class is described as being best suited to arable cropping. Given that 25% of HMDs stated farmland as their preferred sites and that there is usually a preference for low vegetation level, freshly harvested or ploughed ground

(from the author's experience), this type of land is prime territory for detecting. Although this may seem an obvious point, these areas would have offered similar productivity to occupiers throughout prehistory, especially with the onset of agriculture in the Neolithic, as well as through into the historic period, making these areas lucrative for settlement. The availability and quality of the land for metal detecting, and its richness in terms of archaeological/historical activity, is likely to directly influence the proliferation of the hobby in these areas. It should be noted here that around two thirds of Scotland is upland or mountainous, so although some regions may appear on plan (Figures 2 and 3) to have a high concentration of metal detecting, the activity will be isolated to the more accessible lowland areas within that region.

- 9.6 It has been noted previously that HMDs are motivated by similar interests in the past as archaeologists (Thomas 2011, 44) where the CBA (Council for British Archaeology) and MA (Museum Archaeologists) noted in an unpublished position statement (CBA and MA, 1978), "...(it is) becoming increasingly apparent that many metal-detector users are motivated by the same interest in the past as archaeologists." Though there remains the belief on the part of some HPs that 'bling' and objects of value are what is sought, rather than an understanding of the past. Ferguson (2013b) notes metal detecting as a recreational activity interacting in a non-professional way with the archaeological record. To improve the relationship between HPs and HMDs more and better communication are required along with the creation of mechanisms for improving levels of trust between the two groups. The burying of heads in the sand and abstaining from involvement or engagement with HMDs, was an approach taken by the CBA in 1970 (Thomas 2013, 113) when they rejected the opportunity to collaborate on a code of conduct for metal detectorists. This cannot have been expected to lead to any positive resolution. The CBA took this stance as it did not want a role in what it saw as facilitating the practice. This stance possibly set the tone for later developments such as the STOP (Stop Taking Our Past) campaign by many in the archaeological profession in 1980.
- 9.7 In terms of motivation for the hobby, and while acknowledging the most common response of a love for, or interest in history, the author can also see strong similarities with angling. The hobby of angling, with which the author has around 30 years' experience, has striking similarities with metal detecting. In angling there are both clubs and individuals, and members of clubs also fish as individuals or small groups. There are also those who drift in and out of the hobby, the author being one of them. The vast majority would take part in the hobby responsibly but there are an element that has little regard for the environment or rules and regulations. Clubs are limited to bodies of water or stretches of water that can accommodate their numbers, while fishing as an individual provides more open opportunities and fewer restrictions. Landowner permission is often required when accessing a spot to fish. When an individual, small group or club, locate a particularly lucrative spot the location and how plentiful the catches may be from that spot tend to be guarded within the group. It would be counter-productive to your enjoyment of the hobby to tell other individuals or groups that a location you had found was particularly good, although you would tell enough to gain pride from your efforts. Also not unlike metal detecting, serious hobbyist anglers invest a lot of money on equipment as well as spending time on research, and will travel considerable distances for that elusive catch, even in some cases going abroad specifically for fishing. In conversation, metal detecting was explained to me by HMDs using the analogy of angling on more than one occasion. The waiting for the metal detector to give a signal is like waiting for a bite from a fish. This seeking out and the anticipation of the unknown is at the root of the hobby of metal detecting, and angling, and although the comparison may not be so clear-cut, probably hunting in general. Some HMDs have noted in conversation an interest in angling/hunting and that they switch between hobbies dependant on seasons.
- 9.8 While there is some note of negative experiences in dealing with Treasure Trove these comments do not take into account or acknowledge the TTU Code of Practice review in 2014 (TTU 2014) or the numerous outreach events that TTU arrange to engage with, among others, HMDs across Scotland. TTU also periodically provide ALGAO and other Local Authority Archaeologists with TTU data and make data available on Canmore via the SURE (Specialist User Recording Environment) Project.
- 9.9 The areas where the relationship between HMDs and HPs is not a positive as it could be are located in some of the more geographically remote areas of Scotland. In north-east Scotland in



particular, where HP3 notes a positive relationship another, HP5, notes evidence for detecting on SMs. This illustrates how some HPs may see the positive benefit of activity on specific sites where another HP, who has more regular engagement and opportunity, sees what is going outside that positive engagement. There are a number of Scheduled Monuments that are allegedly being targeted in north-east Scotland. No evidence of this activity or any individual undertaking it has been recorded on the sites but the *anecdotal* account of one HP suggests physical evidence in the form of neat investigative holes, characteristic of metal detecting, have been observed on the aforementioned Scheduled Monuments. One of the HPs questioned about the Moray area has indicated that while local HMDs have engaged, and continue to engage, some HMDs no longer engage and those HMDs that travel from outside the area do not engage. Another HMD who has moved into the area from outside Scotland also does not engage with local HPs. Northeast Scotland is also the only area where metal detecting tourism is occurring as a business venture, whereby overseas tourists are encouraged to come and 'treasure hunt' in Scotland with 'expert guidance'.

- 9.10 There are historic occurrences of less than responsible metal detecting practice, such as those mentioned, albeit anecdotally on one of the islands off the north of Scotland. Here it was noted that despite the reporting of SM detecting nothing came of the matter. An HMD also noted that they had reported an incident and found that neither HS (now HES) nor the police were interested. There is little value in setting out guidance for the engagement of HMDs with the historic environment if there is no penalty for ignoring that guidance. The vast majority of HMDs are responsible but the small number who is not need to know that there may be consequences for illegal actions.
- 9.11 There are a large number of unknowns in most areas of Scotland. It appears that most of the areas noted, albeit anecdotally, for definitive damage to SMs are in the less populated regions, such as north-east Scotland and the islands off the north of Scotland. This is not to say that that other areas have not been noted as possibly being damaged, and two specific inventory battlefields in central Scotland are also noted as being detected. The HPs from some of the more urbanised areas in central Scotland, have very little engagement with HMDs and as a result have little tangible data or information on activity there. There is no doubt activity going on in these areas but the true extent of this is unknown. In these central areas the metal detecting is one very small part of a complex system of high volume planning applications and development, in comparison to the less populated regions such as those previously mentioned. This may account in some way for the lack of engagement and the resulting disparity in information.
- 9.12 "The current position of HMDs within the heritage sector is as an interest group who remain separate from the profession apart from where they take part as volunteers in surveys or excavations," according to HP20. This possibly sums up the actual position of the hobby, although occasionally HMD individuals and groups can play a crucial role in evaluations of battlefield landscapes ahead of proposed development. This is generally in exceptional circumstances, two projects (Braehead Community Garden and Killiecrankie) which the author has managed, have involved HMDs in their evaluation. In this role HMDs are providing a temporary fix for a gap in the skill set of HPs, and more specifically archaeologists in Scotland. This gap needs to be addressed with appropriate CPD training and guidance potentially provided by CIfA. This could be achieved in discussion with HMD representatives, for use by those involved in the commercial heritage sector as well as the wider community, including HMDs that engage and interact with the historic environment. Any guidance would need to be universal and consistently delivered across the heritage sector in a unified form.

Case Studies

10.1 It has been shown that positive engagement between HPs and HMDs in some areas has led to maintenance of communication and to some extent a mutual respect. Not unlike volunteers on community archaeology investigation, HMDs should be actively encouraged to participate. This participation should not be from the side-lines but should be meaningful and inclusive, taking into consideration any relevant insight and skills, and the benefits this could have for the project. Two examples of projects where the author managed and directed metal detecting



surveys in Scotland over the past four years are provided here along with an example of a Desk Based Assessment for Flodden and an example highlighted by Ferguson (2013b), Prestonpans. While the following case studies are battlefield related, they are chosen because they illustrate the interaction between HPs and HMDs and highlight the value of responsible metal detecting and the potential detriment of less responsible detecting, even in undesignated areas.

10.2 Case Study 1: Killiecrankie Battlefield

10.2.1 In the case of where GUARD Archaeology Limited (Bailie and Kilpatrick 2015, unpublished report), in collaboration with the Centre for Battlefield Archaeology, Glasgow University (CBAUG). were commissioned to undertake a large metal detecting survey on a 1.5km section of the battlefield ahead of a proposed road design. Part of the specification included the requirement to engage with and include metal detectorists from the local and wider community. The author contacted two main clubs, SARG and DS, and invited them to assist us in the survey with their most experienced HMDs. The HMDs who attended were amenable, professional, and efficient and all followed the instructions and procedures on the survey in every manner. One of the statements in our methodology was that any item found to be below topsoil level would have its position recorded but would not be recovered, in order to preserve any context present. The survey utilised approximately 10 HMDs per day over a five day survey with 3 accompanying archaeologists, and this was only to cover a series of 5m and 10m transects. The survey produced good results in that artefacts attributable to the period of the battle were recovered. Given the level of experience and the quality of the detecting apparatus in use, no archaeological unit could expect to achieve this degree of coverage in this time over this area without the assistance and expertise of HMD. Reeves (2015, 265) also notes the advantages of working and engaging with HMDs at James Madison's Montpelier in Virginia, USA, saying that Metal Detecting Surveys can, "locate historic sites quickly and efficiently", while also noting that, "...effective use of Metal Detectors necessitates extensive experience with high-end machines."

10.3 Case Study 2: Bannockburn 700 Projects

- 10.3.1 The Bannockburn 700 Projects were conducted from 2011-2014 and involved over 1000 volunteer days in the investigation of the Bannockburn Battlefield. The project involved the CBAUG, NTS, TTU, BBC, the University of Stirling, Stirling Council and GUARD Archaeology as well as a number of Post-graduate students from the University of Glasgow. The project used a multi-proxy approach which included Documentary Research, Map regression, Aerial Imagery, LiDAR, Topographic Survey, Geophysical Survey, Test-pitting and Metal Detecting. Each and every proxy had something to contribute to the project and the sum of the parts would be less had we discounted any of the above. The test-pits recovered numerous miscellaneous artefacts which included medieval pottery, the other proxies provided targets for investigation, but it was the Metal Detecting that recovered the three main artefacts which could be attributed to the period of the battle. Approximately 50 HMDs were involved throughout the project with many turning up for every event. The HMDs we encountered were from the local and wider community, and clubs (such as SARG and DS) as well as HMD individuals engaged with the project. What we found was that the HMDs came from all walks of life, not as HP13 assumes, "...working class males..." Thomas (2012, 58) notes that the socio-economic backgrounds of HMDs both in the present in the past may hint at political and economic factors in increasing popularity of the hobby. The HMDs who engaged with the Bannockburn Project included a local councillor, retired engineers, farmers and civil servants; one HMD respondent to this current research is a semi-retired geologist. One negative incident occurred in relation to HMDs over the three year project with a relative newcomer, and apparent novice. This novice HMD brought two finds to the site and tried to deceive the archaeology team and others in maintaining they were genuine. It is worth noting that this HMD was unknown to the other regular participants and was not part of any club or society, needless to say the other participating HMDs were not at all happy with the individuals actions. Looking at this incident in context, it was one negative volunteer day in 1000, which is a positive statistic.
- 10.3.2 While the Bannockburn project provides an almost wholly positive outcome from HP and MHM engagement in surveys, it does also highlight the potential scale of underreporting in Scotland. The Bannockburn projects recovered over 4000 artefacts over 12 surveys each covering between



approximately 5 and 10 hectares. From these 4000 artefacts, fewer than 5% (200) would be considered significant and/or battlefield related. If we equate these figures to HMD digs, this suggests an estimated figure of around 333 artefacts may be recovered per dig/survey with fewer than 17 of these being considered as significant, in the context of a medieval battlefield such as Bannockburn.

10.3.3 Both case studies 1 and 2 illustrate how positive engagement between HPs and HMDs can lead to achievements that neither group could realistically achieve independently. These examples of positive contribution that HMDs and responsible metal detecting can make when engaging with archaeologists are not isolated as previous works by Ferguson (2013a, 2) and Reeves (2015) show. What is key though is that in these positive cases the archaeologists have led in terms of methodology and recording, assisted by the knowledge, experience and expertise of the HMDs. Where Metal Detecting Surveys can be led, or at least monitored by archaeologists the issue of underreporting could be addressed.

10.4 Case Study 3: Prestonpans, East Lothian (Ferguson 2013b, 13)

10.4.1 At Prestonpans in 2009, a rally (although it is not specified if this extended over more than one day) involving 37 HMDs took place in an area that was, at the time, under investigation by the CBAUG. Despite recommendations from the Local Authority Archaeologist, the TTU, Historic Scotland and the CBAUG the event took place. This battlefield is on the Historic Scotland (now HES) Inventory of Historic Battlefields and was noted as having "high archaeological potential" (Ferguson 2013b, 13). In discussions between the TTU, CBAUG and the two metal detecting clubs an agreed methodology of bagging all items and recording an approximate grid reference and a more accurate GPS reading for musket balls. The metal detecting clubs, although recovering the artefacts as requested did overlook some of the artefacts as important in the understanding of the battlefield and the grid references for these items from the survey only provided a 500 m² location area. Ferguson (2013b) highlights that metal detecting surveys conducted in this was way highlights a "risk that important signature artefacts will be disregarded or misidentified."

10.5 Case Study 4: Flodden, Scottish Borders (Bailie 2012)

- 10.5.1 In April 2012, Flodden 1513 Ecomuseum Limited, commissioned GUARD Archaeology Limited to undertake a desk-based assessment of Ellemford, The Scottish Borders (centred at NGR: NS 701 685). The main area assessed was centred around a former ford and site of stepping stones which are shown on the OS first edition map (1862), with 'Elemford' also noted on Roy's map of lowland Scotland (1752-55). James IV's entire military force and artillery is said to have mustered at Ellem Kirk on 21st August 1513 having left Edinburgh on 17th August (Barr 2001). The ultimate destination was Lady Kirk and the target Norham Castle which lay either side of the Scottish border and the Tweed River. James IV was to take Norham Castle before going on to take further Castles and plunder several villages on his advance to begin the Battle at Flodden on 9th September 1513. In conducting this research it became clear that when attempting to define a battlefield, or key locations that play a part in the lead up to the battle, a vast landscape must be considered. The army in its movement south towards Norham Castle may have left evidence of their presence at muster points and other crossings leading towards its destination. The point being made here is that despite a battlefield being defined by a boundary on an inventory, there is a much wider landscape area which must be considered in the context of a battlefield or battlefields. As a result, metal detecting should be undertaken responsibly, and where possible, under guidance of professional archaeologists in all locations with archaeological potential, with especial caution exercised in relation to known archaeological sites, defined battlefields and wider battlefield landscapes.
- 10.5.2 As the case of Flodden aims to illustrate, a boundary for a site or event does not necessarily define the limits of the archaeology. The same could be said of Scheduled Ancient Monuments. The boundary of such areas is clearly marked in red on the accompanying plan and legal document for each SAM, the edge of the SAM however does not necessarily mark the extent of the significant, nationally significant archaeology that may survive there. There is the potential for significant archaeology to survive in even the most unexpected of locations, and for this reason any investigation in any area, undertaken by archaeologists or metal detectorists, should



be conducted with due care and responsibility and with appropriate guidance and support from experts in their field.

Conclusions

- 11.1 In some areas of Scotland the relationship between HMDs and HPs is generally positive. This has been achieved through sustained effort and the building of trust on both the HMDs and HPs parts, in some cases over quite a number of years. TTU in particular actively engages in outreach events across Scotland to raise awareness of the system and process while also providing opportunities for face to face discussion and advice to HMDs as well as other HPs. This does not lead to a utopian relationship where every HP and HMD interact with mutual respect but it does mean that a higher proportion of, sometimes important, discoveries will be reported through the Treasure Trove system. The majority of those in the Metal Detecting Community, in the author's experience from previous engagement as well in undertaking this research, are responsible and respectable individuals and the club leaders and organizations such as NCMD promote good practice, and are keen to be seen to do so.
- 11.2 The Metal Detecting Community regard themselves as 'heritage heroes', saving our heritage from the plough and providing our museums with an endless supply of new discoveries. HMDs feel that they make an overwhelmingly positive contribution, although with an object focussed approach, not archaeological. HMDs are no more heritage heroes than archaeologists are, both groups are damaging, and in effect destroying archaeology when interacting with the historic environment. One group is doing this in a controlled, measured, professional and responsible way and the other is taking part in recreational activity (Ferguson 2013b) and therefore operating on a less controlled, object focussed, non-professional and less responsible way.
- 11.3 As soon as an item, which is prone to corrosion through oxidisation, is removed from the soil it will immediately begin to deteriorate. In 'An Archaeologist's Manual for Conservation', Rodgers (2004, 269) states that, "...once iron objects are removed from moist loamy soils they can rapidly decay, but if left in the ground these objects are relatively stable." When such an item is recovered during an archaeological excavation a conservator would be involved at the earliest possible opportunity. The question of archaeological context is also overlooked in the recovery of an artefact through hobbyist metal detecting. In recovering one artefact from a context of unknown extent and complexity two negative effects have been inflicted: 1. an object has been removed from its context, 2. the context from which it has been recovered is disturbed and if ephemeral, destroyed. Metal detecting is recovering and analysing material culture from past human activity, the very definition of archaeology itself. It is certainly the case that metal detecting, through its inherent selective prospection, recovers many metal artefacts, highlighting sites in some cases that would otherwise not be found. And yet there is no requirement for the professional accreditation, transparency, prior notice, methodologies, reporting and archiving etc. that HPs are bound to supply in undertaking similar work.

Recommendations

12.1 Heritage Practitioners should actively engage with HMD in their area and where possible provide appropriate information and advice ahead of any metal detecting activity or event. The scale of metal detecting in Scotland is a fraction of that observed in England and Wales and as a result a PAS-style TTU suggested by some HPs is unlikely to be a viable way forward. Given that local authorities and other HP employers have ever decreasing budgets and resources with which to provide additional services it is suggested that one clear set of guidelines are created. These guidelines, and / or Code of Practice should be prepared in consultation with relevant stakeholders such as CIFA, ALGAO Scotland, HES, TTU and the detecting community, this can then be linked to all relevant websites. This would ensure that the information is consistent throughout Scotland avoiding any possibility of variance or misinformation in the guidance, and therefore creating a unified approach in the interaction with the hobby of metal detecting. This approach should consider metal detecting surveys, conducted by HMDs led by HPs, as another layer of data, not unlike how other disciplines or techniques are considered and used in archaeological research and investigation. If a site or area is at risk of disturbance as a result



of development, or some other intrusive factor, metal detecting (using HMDs led by HPs) could be considered as one of many means to investigate, evaluate and understand that site. The author can recall two recent examples of planning related metal detecting surveys where HMDs led by HPs was the proposed methodology; Killiecrankie and Braehead Community Garden. It should be noted that the use of HMDs or other volunteers in planning related projects would be the exception rather than the rule. If following appropriate and responsible methodologies in recording and reporting, metal detecting surveys conducted by HMDs and led by HPs can provide invaluable data for the enhancement of our understanding of the archaeological resource. Equally so the inclusion of metal detecting as another technique in archaeological evaluation and investigation by archaeologists, on all sites irrespective of age, could provide another layer of information which is otherwise absent from the archaeological record, with the exception of battlefield sites.

- 12.2 Archaeology as a profession, since the mid-twentieth century, has incorporated elements of STEM (Science, Technology, Engineering and Mathematics) disciplines into its working practices. Archaeology embraces these disciplines to draw as much available information from the records and material recovered from that site. The preferred option for all archaeology is preservation in situ, if the option is realistic and sustainable. Behind this preference is that in the future techniques will have advanced beyond our capabilities in the present and that these techniques will therefore be better equipped to draw ever more information from the archaeology, should it need to be removed. The root of our unanimous preferred option of preservation in situ for archaeology is that in the future technology and techniques will have advanced beyond our capabilities in the present. Archaeology is always open to new techniques that can provide more data and information, from even the smallest artefact or ecofact that can then lead to greater understanding and more thorough interpretation. Despite the wide disciplinary net that archaeology casts, metal detecting as a technique and technology appears to have slipped through it. There has been no active uptake of the use of metal detecting as a skill and technology in the archaeology profession in the U.K. However in Europe there are some universities actively incorporating metal detecting and/ or engagement with HMDs into their archaeological fieldwork (pers. comm. Suzie Thomas). One example is the University of Helsinki which has detectors which the students have opportunities to use in fieldwork scenarios, has also worked with local detectorists on archaeological projects. The Universities of Turku and Oulu, also in Finland have metal detectors and pin pointer detectors in their inventories and use them in archaeology teaching. Another example is Vrije Universiteit, Brussels where the students, although not using metal detectors themselves, do involve local detectorists in their fieldwork whenever possible. In the U.K the reluctance to adopt such an approach could be down to the stigma that is attached to the hobby, created in many ways by archaeologists who have expressed distain for the hobby. It is recommended then that metal detecting is actively promoted by relevant bodies such as CIFA as a valuable skill for the professional archaeologist with CPD events to assist with training in the skill. This will lead to an increased understanding of the capabilities of the technology available, enabling its use on a professional level while also creating opportunities for engagement and collaboration with HMDs to create and refine methodologies for collaborating with non-professional HMDs in metal detecting surveys.
- 12.3 Metal detecting could do more to engage with the Heritage Profession, and in particular local authority archaeologists so that the HER record can be maintained and updated, ensuring that any decisions made in respect of planning are made with all the available information. It is one of the responsibilities of the Local Authority Archaeologists and Advisors to maintain and update the HER records for their area. It should be seen as the responsibility of those who interact with the archaeological record (archaeology/history societies, archaeologists (academic, commercial or voluntary), hobbyist metal detectorists, chance finders) to report finds through TTU and to provide information on finds, including accurate locations, for HER records. It may be of benefit to the heritage sector in general, and more particularly TTU, to pursue means by which the process of reporting of finds is made easier through the use of mobile devices, apps and similarly accessible mediums.
- 12.4 One suggestion for responsible, non-professional metal detecting, may be the provision of proforma methodology and reporting forms for the historic environment records, or perhaps a digital version of this. These forms could be sent as supplementary information when HMDs



are submitting finds and could also be used to update HER records. In these proformas the HMD or HMD club would state: the location; the responsible person/club for contact before during and after the activity; the provision of assurances that all finds would be reported through the Treasure Trove System and the provision of a report and plan of the finds following the activity. It is also suggested that it would be seen as responsible for HMDs or HMD clubs, where significant artefacts and/or potentially significant distributions are found, that a Discovery and Excavation Scotland (DES) Entry should be submitted. Given that metal detecting digs are not usually commercial projects the DES Entry would incur no charge and this would represent a simple form of record for hobbyist metal detecting digs. Some metal detecting finds already feature in DES but these are generally written by museum representatives who have had direct contact with the finder, not the finder themselves. The TTU issue posters and leaflets as part of their outreach programme which, along with their website (http://www.treasuretrovescotland. co.uk/Information_for/detectorists.html), provide clear guidance on what categories of objects do not require reporting, such as Victorian coinage and modern agricultural debris.

- 12.5 Although it is impossible to come to a figure for the extent of underreporting of metal detecting finds, given the apparent disparity between finds discovered and recorded, a more robust set of guidelines may be required. From the research responses, despite the majority of HMDs stating that they are aware of the current legislation and the Treasure Trove system, there remains an informal process of identification via online forums, local authority archaeologists, museums, other HPs as well as other contacts. It is important to note here that as Scotland has a relatively low level of metal detecting activity, in comparison to England and Wales (Thomas, 2012), a FLO system therefore would not be seen as a viable option making best use of available resources. A network of HPs, who are amenable to assisting in the process of submitting finds from HMDs to TTU, would seem to be one possible solution to the current situation. Such HPs could be sourced from the museum sector, commercial archaeology sector, and voluntary sector or where resources permit from the Local Authority. A system whereby this network of HPs was a known facilitator in the TTU process would ensure two positive outcomes. The first of these would be the more timely updating of the HER records with information on findings being recorded by a person who is familiar with the archaeology of the area. The second positive outcome would be that the HMDs in that area would have a single point of contact, or network they could engage with on a regular basis in the process of submitting their finds to TTU. Such a system, which could potentially be managed by TTU, would provide a face to face service and may remedy the current informal and indirect pathways some take in reporting their finds. This may in turn bring some consistency in approach in engaging with HMDs; currently the engagement with HMDs varies widely in Scotland from active and positive engagement to negative engagement and in some cases no engagement.
- 12.6 It is recommended that HES and TTU arrange a workshop aimed at encouraging meaningful engagement between HMDs and HPs to provide opportunities for presentations, discussions and questions. The workshop should take a form that does not alienate nor discourage either group to attend. The workshop should take place in an accessible and non-archaeological venue and should not take the form of an archaeological conference. The topics for discussion should be decided following consultation with key representatives from Metal Detecting groups, clubs and organisations as well as from the Heritage Profession. This consultation with HMDs and HPs could take the form of individual workshops for each respective group prior to a joint workshop. The workshops will aim to dispel *anecdotal* preconceptions within both groups to improve relations between HMDs and HPs which can be built upon. As Thomas (2014, 35) puts it, "...the importance of keeping a dialogue with the metal detecting community cannot be over-stated."
- 12.7 The hands on participatory programs which took place at Montpelier (Reeves 2015, 263-274) are a good example of where HPs and HMDs stand to benefit from such engagement, while also enhancing our understanding of archaeological sites. One HMD with 30 years in the hobby had held the view that he was protecting artefacts from deterioration in the ground, whereas on completion of the program at Montpelier he realised the importance of preserving site information, not simply the artefact (Reeves 2015, 270). The archaeologists involved in the programs also came to realise that the Metal Detecting Surveys could lead to the discovery and preservation of sites that would otherwise be invisible to the archaeologist (Reeves 2015, 271).

12.8 Research recommendations

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- 12.8.1 It is acknowledged from this project that there are a number of areas that would benefit from further research on the subject of hobbyist metal detecting. This research, and in particular the interviews and response gathering was quite condensed into two to three months and in hindsight the project may have benefited from a longer retrieval period of perhaps six months. A longer retrieval period may permit a wider participation from each geographical area from both the HPs and HMDs, should similar research take place in the future.
- 12.8.2 One suggestion which would enable a more detailed insight into the hobby of metal detecting in Scotland would be for an HP or HPs to join a metal detecting club for a year and participate in the weekly/monthly digs that the club members attend. This would provide direct experience of the hobby rather than a viewpoint from the outside looking in, which is the approach of this and previous similar research.
- 12.8.3 Although attempts were made to contact the main detector manufacturers during this research, no data or information was forthcoming. The manufacturers of the metal detectors may have a record of the geographical and temporal distribution of their equipment across Scotland and the rest of the U.K. which would provide a layer of data for comparison with the results from this current research.
- 12.8.4 Given that there are particular areas of Scotland highlighted for greater metal detecting activity this current research could be built upon by more detailed local authority-wide studies of particular areas. This would aim to gather the views of a greater number of individuals from the HP and HMD groups in that area to provide a more detailed view of the character and extent of hobbyist metal detecting.
- 12.8.5 This current research should be considered in a much wider context, beyond the U.K. and even beyond Europe. The hobby of metal detecting is global and the ever increasing interconnectivity of the world's populations ensures that advances in technology are quickly adopted. From this research we know there is at least one known, recently established, metal detecting tourism venture in north Scotland. An understanding of the global appeal of the hobby and an understanding of what the perceived incentives would be for individuals to come to Scotland to metal detect is imperative in managing any impact that such ventures might have on the historic environment.

12.9 Summary of recommendations

12.9.1 Should guidance, proforma methodologies, and revisions to the Code of Conduct for metal detecting be produced, in part, from the results and recommendations in this report, these documents and their use should be promoted as best and responsible practice for hobbyist metal detecting in Scotland. This can be achieved through workshop and training events arranged, in discussion with HMD individuals and group representatives, and provided by the heritage profession. Both HPs and HMDs stand to benefit from this exercise, through meaningful engagement aimed at instilling mutual respect and understanding. The greatest potential benefit from all of this will be the setting of new standards of responsibility in hobbyist metal detecting, which will lead to a greater understanding of the archaeological record and reassertion of the need for its stewardship by all for all.

12.9.2 Recommendation bullet points

- Provision of CPD events to provide opportunities for HPs to attain skills in metal detecting surveys and in active engagement with HMDs;
- Encourage more active engagement by HPs with HMDs and vice versa;
- Promote the use of proforma methodologies for survey and recording as the most responsible practice for metal detecting digs;

- Promote the production of DES entries by HMDs for significant finds;
- Promote official reporting to TTU, or a network of TTU approved HPs, on discovery of reportable finds;
- Promote responsible detecting on any and all sites of archaeological potential;
- Arrange for hands-on participatory workshops for HPs and HMDs at neutral venues/ sites.

Acknowledgements

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An Assessment of the Extent and Character of Hobbyist Metal Detecting in Scotland

Section 2: Appendices



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Appendices

Appendix A: Collated TTU 1981-2015

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Appendix B: Main research questions- HPs

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Assessment of the Extent and Character of Hobbyist Metal Detecting Activity in Scotland-

Questions for: Local Authority Archaeologists, Museum Reps and Other Heritage Practitioners, ClfA Members

- 1. What is your perception of hobbyist metal detecting and its current position within the heritage sector in Scotland?
- 2. What potential position do you think, if any, that hobbyist metal detecting should have within the heritage sector in Scotland?
- 3. What is your experience with hobbyist metal detecting?
- 4. What are the negative impacts/positive contributions of metal detectorists and events, in your experience?
- 5. Are you aware of the methods, if any, used in the recording of finds by metal detectorists? (And what methods should be used?)
- 6. Do you actively monitor MD activity within your geographical area or as part of your role? If yes, how? If no, why not?
- 7. Have you observed any changes in this activity over time?
- 8. What in your opinion is the extent of metal detecting in your region/area?
- 9. Are there specific areas and or site types that particularly attract metal detecting activity? Do you have any concerns about these areas/sites, or has the information they recovered been generally beneficial?
- 10. Do MD individuals/ clubs engage with you ahead of metal detecting events?
- 11. Do they provide adequate detail and notice?
- 12. If not how do you find out and how do you address the issue?
- 13. What level of information do you feel is necessary? What would you do with this information?
- 14. What type of advice do you provide? HER information? Areas to avoid? Advice relating to landowners?
- 15. Do you think the MDs in your area/region are aware of the relevant legislation?
- 16. How aware are the metal detectorists operating in your area of sites recorded on Canmore, the Historic Environment Records, the Inventory of Historic Battlefields etc. Are these sites actively chosen for metal detecting?

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- 17. How aware are the metal detectorists operating in your area of scheduled and/or undesignated sites? Is there any evidence of these sites being detected upon? What advice do you provide?
- 18. Do you think that metal detectorists are aware of the impact that detecting could have on the archaeological record?
- 19. From your experience, what constitutes a significant find to metal detectorists? Type, rarity, value, material, age, state of preservation, associated place?
- 20. What is the current relationship between heritage professionals and hobbyist metal detectors in your experience? What would you change?

Appendix C: Main research questions-HMDs





Assessment of the Extent and Character of Hobbyist Metal Detecting Activity in Scotland

Questions for: Hobbyist Metal Detecting Groups and Individuals

- 1. What is your perception of hobbyist metal detecting and its current position within the heritage sector in Scotland?
- 2. Do you see this position changing in the future? If so, in what ways?
- 3. Do you/your members actively engage with heritage practitioners (Local Authority Archaeologists, Museum reps and other heritage practitioners, ClfA Members) and archaeological projects? If not, why?
- 4. How would you describe your experiences of working with heritage professionals and archaeological projects?
- 5. Is there a common method and clear instruction when on archaeological projects? How does this differ from methods used on digs (1 day)/outings/rallys (1+ days)?
- 6. Do you contact heritage professionals/local authority archaeological advisers/Museum representatives ahead of digs/outings/rallys? If so how much notice do you provide and what kind of information?
- 7. If a heritage professional provides advice on avoidance of particular areas, how would you consider/react to this advice?
- 8. When engaging with an HP what information do you expect?
- 9. How many members do you have? Male/Female/Age range?
- 10. On average how long have your members been detecting? Have any of your members observed any changes in the hobby?
- 11. How far do your members travel to conduct their detecting? Local, regional or national?
- 12. Where would your chosen or preferred area be?
- 13. Are there specific areas and or sites that you/your members prefer to detect? What factors inform the selection of a site and what resources, if any, are used during this process.
- 14. Do you prefer to metal detect on your own, or as part of a group?
- 15. If you attend metal detecting rallys/digs what do you like and dislike about them?
- 16. How frequently do you metal detect?
- 17. What inspired you to start metal detecting?

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- 18. Are the metal detectorists in your club aware of the relevant legislation, such as Treasure Trove and the Ancient Monuments and Archaeological areas Act?
- 19. Is additional information and guidance made available to metal detectorists in your club? If so, what do you provide?
- 20. What format would you want this guidance to be in? How do you wish to access it?
- 21. How do you respond to members/other hobbyist metal detectors who do not follow guidance and/or the law?
- Who do your members usually engage with in the first instance after recovering potentially significant artefacts?(Treasure Trove Unit, museum representatives, heritage practitioners, local authority archaeological advisors, metal detecting forums, others?)
- 23. From your experience, what constitutes a significant find to your members? Type, rarity, value, material, age, state of preservation, associated place?
- 24. What is the current relationship between heritage practitioners and hobbyist metal detectors?
- 25. What is positive about that relationship?
- 26. What is negative about that relationship?
- 27. Do you visit museums and/or other heritage sites as a recreational activity?
- 28. Do you engage in metal detecting tourism ?
- 29. How common is this on digs/rallys you attend?
- 30. What is your experience in liaising with landowners for hobbyist metal detecting activity?
- 31. How do they assist you in your hobby?



Appendix D: Online HMD Questionnaire GUARD ARCHAEOLOGY



Appendix

Online Questionnaire

Assessment of the Extent and Character of Hobbyist Metal Detecting Activity in Scotland

Questions for: Hobbyist Metal Detecting Individuals

- 1. Gender ?
- 2. Age (Tick as appropriate) 16-25____26-35____36-45___46-55____56-65____65+___
- 3. What inspired you to start metal detecting?
- 4. How long have you been detecting?
- 5. How frequently do you metal detect?
- 6. Which specific area(s) and or site(s) do you prefer to detect?
- Do you engage in metal detecting tourism, i.e. travel to another country for the purpose of metal detecting ?
 If so where do you prefer to go ?
- 8. How far would be prepared to travel to conduct your detecting? 0-50 miles, 50-100 miles, 100 + miles?
- 9. Do you prefer to metal detect on your own, or as part of a group?
- Do you record the position of artefacts you discover? Using Map plotting? GPS ? Other? If not, why?
- Do you keep a record of the finds you discover?
 If so what attributes do you record? (*tick where applicable*)
 metal type _____ object type ____ age ___ context ___ depth ___ Landowner ____ location/co-ordinates _____
- 12. Do you think heritage practitioner/local authority archaeological advisers/Museum representatives should be given notification of digs/outings/rallys? If so how much notice would be appropriate?
- 13. If a heritage practitioner provides advice on avoidance of particular areas as they are potentially archaeologically sensitive, how would you consider/react to this advice?
- 14. Do you actively engage with heritage practitioners (Local Authority Archaeologists, Museum reps and other heritage practitioners, ClfA Members) and archaeological projects? If not, why?
- 15. Who do you usually engage with in the first instance after recovering potentially significant artefacts? (Treasure Trove Unit, museum representatives, heritage practitioners, local authority archaeological advisors, metal detecting forums, others?)
- Are you aware of the relevant legislation, such as Treasure Trove and the Ancient Monuments and Archaeological areas Act?
 If yes, where do you get this information from? (word of mouth, online, metal detecting clubs, forums, leaflets, other)







- 17. How would you respond to members/other hobbyist metal detectors who do not follow guidance and/or the law?
- 18. How would you rate your experiences of working with heritage practitioners on a scale of 1 (*poor*) to 10 (*excellent*)?
- 19. How would you rate the current relationship between heritage practitioners and hobbyist metal detectors across Scotland on a scale of 1 (*poor*) to 10 (*excellent*) ?
- 20. What is positive about that relationship?
- 21. What is negative about that relationship?
- 22. Does Hobbyist Metal detecting contribute positively or negatively to the safeguarding of Scotland's heritage?

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