

Grassland Assessment Survey of Selected Sites within the High Weald AONB

A report for Tunbridge Wells Borough
Council (TWBC)

September 2020



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Controlled Copy

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01 Tunbridge Wells Borough Council (TWBC)

02 Greenspace Ecological Solutions Ltd

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The content of this report is the responsibility of Greenspace Ecological Solutions Ltd.

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CONTENTS

1	PROJECT OVERVIEW	1
2	NON-TECHNICAL SUMMARY	2
3	INTRODUCTION	3
3.1	Context	3
3.2	Site Locations	3
3.3	Legislation and Policies	4
3.4	Objectives	5
3.5	Constraints	5
4	METHODOLOGY	7
4.1	Desk Study	7
4.2	Habitat Survey	7
4.3	UK Habitat Classification Conversion to Assist Biodiversity Metric 2.0 Calculations	7
4.4	Reporting	8
5	RESULTS	9
	BENENDEN	10
5.1	BENENDEN – BE3	11
	MATFIELD	14
5.2	MATFIELD – BM2	15
	CRANBROOK	18
5.3	CRANBROOK – CRS1	19
5.4	HARTLEY – CRS4	22
5.5	CRANBROOK – CRS5	25
5.6	HARTLEY – CRS6 (EAST)	28
5.7	HARTLEY – CRS6 (WEST)	31
5.8	SISSINGHURST – CRS12	34
5.9	SISSINGHURST – CRS13	36
5.10	WILSLEY POUND – CRS15	39
5.11	SISSINGHURST – CRS17	42
	HAWKHURST	45
5.12	HAWKHURST – HA6	46
5.13	GILL’S GREEN – HA8	50
5.14	GILL’S GREEN – HA9	53
	HORSMONDEN	56
5.15	HORSMONDEN – HO2	57
	PEMBURY	60
5.16	PEMBURY – PE1	61
5.17	PEMBURY – PE2	66
5.18	PEMBURY – PE3	69

SANDHURST	72
5.19 SANDHURST – SA1	73
SPELDHURST	75
5.20 SPELDHURST – SP1	76
TUNBRIDGE WELLS	79
5.21 TUNBRIDGE WELLS – RTW12	80
5.22 TUNBRIDGE WELLS – RTW13	84
6 SUMMARY	87
6.1 A summary of the findings per site are presented below.	87
7 CONCLUSION	90
8 REFERENCES	92
9 APPENDICES	93

1 PROJECT OVERVIEW

Client:	Tunbridge Wells Borough Council (TWBC)
Site Proposals:	Grassland surveys of selected proposed allocation sites within the High Weald AONBA
Attending Ecologists:	Guy Newman MCIEM Tanya Rowlinson QCIEEM Jacob Tassaker QCIEEM

Source of Relevant Documents:

Document:	Source:
Site Location Plans:	Tunbridge Wells Borough Council
Desk Study:	Google Earth Pro Kent Landscape Information Centre (KLIS) Kent and Medway Biological Records Centre (KMBRC) Magic.gov.uk
Site Maps:	Google Earth Pro

2 NON-TECHNICAL SUMMARY

- 2.1 In response to the potential for development of site allocated in the Tunbridge Wells Borough Councils Draft Local Plan, to affect grasslands that may have an importance in the context of the High Weald Area of Outstanding Natural Beauty, Greenspace Ecological Solutions were commissioned to assess the status of grasslands within 21 separate sites.
- 2.2 Located across the Tunbridge Wells Borough, the 21 sites were set across nine area clusters, these being *Benenden, Matfield, Cranbrook, Hawkhurst, Horsmonden, Pembury, Sandhurst, Speldhurst and Tunbridge Wells*.
- 2.3 The survey assessed the grassland habitats only. Consideration to boundary vegetation and the presence of protected or priority faunal species was given for the purposes of context only. To provide understanding of the historical and geological nature of the sites, the desk study was extended to include assessment of historical aerial imagery, soil / geological mapping and the presence of designated sites and habitats of principal importance within and adjacent to the sites. Botanical species of interest as set out within the Wildlife and Countryside Act 1981 (as amended) were provided by the Kent Wildlife Trust.
- 2.4 Conducted during the period 21st July to 3rd September 2020, the survey concluded that predominantly the sites subject to survey area areas of historically farmed / managed land that supports grassland which are between Low and Moderate in their botanical importance.
- 2.5 The presence of an unconfirmed Rye Brome type grass within Hawkhurst HA6 and the presence of this species within the desk study area may require further survey / consideration.
- 2.6 An area of historic orchard has been identified within Matfield BM2 and further consideration / survey to determine its status as the BAP habitat of Traditional Orchard may be required.
- 2.7 The habitats identified are considered replaceable and proportionate compensation should be sought through use of an appropriate Biodiversity Net Gain calculator
- 2.8 Although none were considered exceptional in their ecological value, consideration to the sites suitability to support both avian faunal species of conservation concern will be required.

3 INTRODUCTION

3.1 Context

3.1.1 Prepared on behalf of Tunbridge Wells Borough Council (TWBC), Greenspace Ecological Solutions Ltd (GES) were commissioned to undertake botanical surveys to assess the condition of the grassland habitats within 21 separate sites that are areas of land proposed to be allocated for housing and commercial development as part of the TWBC Draft Local Plan 2016 to 2036.

3.1.2 The surveys cover those sites where there is significant areas of grassland and serve to determine the likely value and quality of the habitats present. The schedule of the 21 sites of interest are located in the following areas: Benenden (BE3), Matfield (BM2), Cranbrook (CRS1 and CRS5), Hartley (CRS4, CRS6A and CRS6B), Sissinghurst (CRS12, CRS13 and CRS17), Wisley Pound (CRS15), Gills Green (HA8 and HA9), Hawkhurst (HA6), Horsmonden (HO2) , Pembury (PE1, PE2, and PE3), Sandhurst (SA1), Royal Tunbridge Wells (RT12 and RT13) and Speldhurst (SP1).

3.2 Site Locations

3.2.1 All sites are located within the district of the TWBC and set across the following nine area clusters, *Benenden, Matfield, Cranbrook, Hawkhurst, Horsmonden, Pembury, Sandhurst, Speldhurst and Tunbridge Wells*. For ease of reference these are set out within this report alphabetically in accordance with the area codes (e.g. BE3, BM2, etc.).

3.2.2 The locations of all sites are depicted in Image 1.

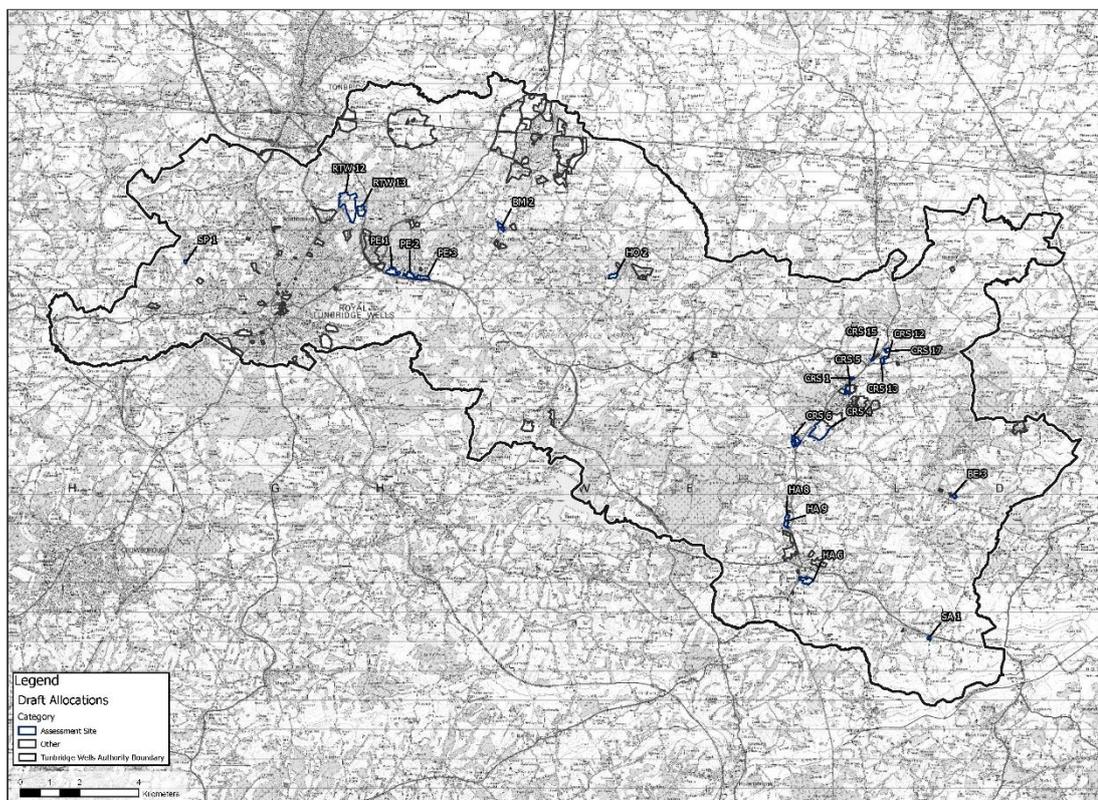


Image 1 – 21 x Allocated Sites Subject to Survey.

3.3 Legislation and Policies

Legislation

3.3.1 The main legislation that applies to ecological issues within England and Wales are:

- The Conservation of Habitats and Species Regulations (Amendment) (EU Exit) Regulations 2019 provides safeguards for European Protected Sites and Species as listed in the Conservation of Habitat and Species Regulations 2018. These regulations provide for the designation and protection of 'European Sites', the protection of 'European Protected Species' and the adaptation of planning controls for the protection of such sites and species. Under the regulations, public bodies have a duty in exercising their functions to have regard to the EC Habitats Directive.
- The Wildlife and Countryside Act 1981 (as amended) provides detail on a range of protection and offences relating to wild plants. The level of protection depends on which Schedule of the Act the species is listed on. Licences are available for specific purposes to permit actions that would otherwise constitute an offence in relation to species.

Planning Policies

- 3.3.2 Local planning policies relating to ecology are invariably based on the conservation of species protected under the above legislation, including species and Habitats of Principal Importance (HPI) listed under Section 41 (s41) of the NERC Act 2006; and the protection of designated sites.

3.4 Objectives

- 3.4.1 The objectives of the project are to:

- Determine the historic status of the sites through application of a desktop study;
- Assess current status of habitats within the sites through application of ground-based surveys;
- Classify the habitats present within the sites using JNCC Phase I Habitat Survey Techniques and categorisations;
- Convert JNCC Phase I Habitat Classification into UK Habitats Regulations Assessment criteria, for the purpose of clarity for later Biodiversity Net Gain Calculation assessments;
- Present a written report which includes: an overall description of the site in general terms for land use and habitats present and relevant contextual information, map and target notes of the phase 1 survey, reference to or note of results of previous surveys where available noting any similarities or differences, advice on the likely importance of the grassland communities surveyed both individually and comparatively in relation to priority habitats and species, a full species list recorded and site notes and, the need for further surveys if necessary;

3.5 Constraints

- 3.5.1 The KMBRC supplied all vascular plant records that intersected the sites as square polygons which represented the spatial resolution of the captured grid reference, i.e. a 1 km square for 6 figure references down to a 1m square for 12 figure grid references. In response the accuracy of the desk study data was restricted to within site or within 2km of a site.

- 3.5.2 Although every effort was made to ensure the surveys were conducted in a timely manner, the seasonal temperatures and rainfall during 2020 has been exceptional and certain botanical species were beyond the optimal period for identification.

- 3.5.3 Due to seasonality, some sites had been subject to recent management due to the collections / cutting of hay crops. Where these events occurred, it is highlighted within the site text.

Where apparent, botanical species identification was somewhat restricted to the edge habitats

- 3.5.4 Although every effort has been taken to accurately measure the extent of all habitats discussed herein, all measurements and indications of area given within this report remain approximate.

4 METHODOLOGY

4.1 Desk Study

4.1.1 A desk study was undertaken to determine the presence of sites and habitats of conservation importance within the boundaries of each site and also a sites historic use since 1940.

4.1.2 The following bodies were consulted for the desk study:

- Google Earth Pro
- Magic.gov.org
- Kent Landscape Information System (KLIS)
- Kent and Medway Biological Record Centre (KMBRC)

4.1.3 The desk study data presented within this report is restricted to botanical species protected by the Wildlife and Countryside Act 1981 (as amended) or those qualifying as Endangered (E), Vulnerable (V), or Near Threatened (NT) as presented in the IUCN Red List. The survey data was provided to Greenspace Ecological Solutions by KMBRC in the form of Geographic Information Systems (GIS) shape files with a varying sample size of 1km and 2km squares across each site.

4.2 Habitat Survey

4.2.1 The sites were surveyed using the methodology outlined in 'The Handbook for Phase I Habitat Survey: A Technique for Environmental Audit' (JNCC, 2010). This method involves identifying the main plant/grass communities present on the site and classifying the habitat types following the JNCC methodology. This technique provides an inventory of the basic habitat types present and enables areas of greater botanical interest which may require further, more detailed, surveys to be identified. Any occurrences of recognised invasive species as listed on Schedule 9 of the Wildlife and Countryside Act 1981 (as amended) were also noted.

4.2.2 Conducted during the period 21st July to 3rd September 2020, all surveys were conducted in suitably weather conditions, with botanical species identified in the field where possible. Where field identification proved difficult, botanical samples were taken and further identification later conducted in the confines of the GES office.

4.3 UK Habitat Classification Conversion to Assist Biodiversity Metric 2.0 Calculations

4.3.1 As requested by TWBC, to facilitate confidence in later Net Gain Calculation Assessments, the JNCC Habitat Classifications were subject to conversion into the respective habitats as set out within the UK Habitats Classification Assessment Criteria. The habitat type transfer was

conducted in accordance with “*UKHab/Phase 1 translation*” page presented within the Technical Data page of the [DEFRA Biodiversity Metric 2](#) net gain calculator, which provides a from JNCC for both habitat type and quality assessment.

- 4.3.2 For ease of reference, maps of the grassland habitats as they identify in the UK Habitat Classification Assessment criteria are provided in Figures 1-22.

For the purpose of context, the sites have also been assigned a category of Ecological Importance. As no pre-determined metric to assess this parameter is available, the assessment of ecological importance has been based on a sites potential to supporting protected species (e.g - reptiles, GCN, ground nesting birds etc.), this being deemed either High, Moderate or Low. As noted above, specific survey to determine the sites potential to support protected species is beyond the scope of this assessment and these results are presented to context and to assist with future ecological considerations only.

4.4 Reporting

- 4.4.1 As noted above, for ease of reference the sites have been set out within their area clusters. The order of the sites in no way reflects ecological importance or geographic continuity and for the purpose of this report all sites are presented alphabetically.

5 RESULTS

BENENDEN

5.1 BENENDEN – BE3

Description

- 5.1.1 Benenden BE3 is an area of historically harvested / managed grassland that is located within the village of Benenden, Kent at the National Grid Reference (NGR): TQ812329. Located south of the Walkhurst Road, the site occupies 1.4 hectares (ha). Having been subject to management / harvesting prior to the survey, the sward height was predominantly <10cm. An un-mown field margin of c. 1m – 1.5m wide had a sward height of >15cm.

Desk Study

- 5.1.2 Historically the site was likely to be grazing pasture in 1940, this having been established as what appears to be a top fruit orchard by 1960. Presenting again as pasture in 1990, a hay field in 2003 and arable in 2013 it is apparent that the site has undergone change in its use over time.
- 5.1.3 A single parcel of Ancient Replanted Woodland (APW) is located adjacent to the site's south eastern boundary. The same parcel of land identifies as 'deciduous woodland', a habitat listed under s41 of the NERC Act (2006).
- 5.1.4 The data study returned 2 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell *Hyacinthoides non-scripta*. Species recorded under the ICUN redlist include near threatened (NT) wood-sorrel *Oxalis acetosella*.
- 5.1.5 The soil type within the site identifies as slightly acid with base-rich loam and clay soil also present.

Field Survey Results

- 5.1.6 The grassland habitat within BE3 is relatively uniform and fits within the same habitat classification across the whole parcel.
- 5.1.7 Grass species present include abundant common bent *Agrostis capillaris*, sweet vernal *Anthoxanthum odoratum*, Yorkshire fog *Holcus lanatus* and perennial rye grass *Lolium perenne*, locally abundant false oat-grass *Arrhenatherum elatius*, red fescue *Festuca rubra* and false brome *Brachypodium sylvaticum*, frequently occurring cock's foot *Dactylis glomerata* and cat's tail *Phleum bertolonii*, occasional smooth meadow grass *Poa pratensis* and rarely occurring wall barley *Hordeum murinum*. Herbaceous species present include locally abundant bracken *Pteridium aquilinum*, frequent dandelion *Taraxacum officinale* agg., white clover *Trifolium repens*, creeping thistle *Cirsium arvense* and occasional common

hogweed *Heracleum sphondylium*, bird's foot-trefoil *Lotus corniculatus*, meadow buttercup *Ranunculus acris*, creeping buttercup *R. repens*, bramble *Rubus fruticosus* sp. agg., common sorrel *Rumex acetosa*, common nettle *Urtica dioica* and yarrow *Achillea millefolium*. Rarely occurring ribwort plantain *Plantago lanceolata*, common ragwort *Jacobaea vulgaris*, great willow herb *Epilobium hirsutum*, lords and ladies *Arum maculatum*, cow parsley *Anthriscus sylvestris* and upright hedge parsley *Torilis japonica* were also present.

Conclusion

5.1.8 In accordance with JNCC criteria (2010), the site Benenden BE3 qualifies as:

- **B2.2 Neutral Grassland Semi-Improved.**

5.1.9 As depicted in Figure 1, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Neutral Grassland of Moderate** quality.

5.1.10 The site Benenden BE3 supports grassland of **Moderate – Low** botanical interest and is considered of **Moderate** ecological importance.

Figure 1 – Habitat Assessment Criteria Map (Benenden BE3)



Site Photos (Benenden BE3)



MATFIELD

5.2 MATFIELD – BM2

Description

- 5.2.1 Matfield BM2 is located west of the Maidstone Road and centrally within the village of Matfield, Kent (NGR: TQ659420). The site occupies approximately 0.9 hectares (ha) and is predominantly managed grassland set beneath what was historically a top fruit orchard.

Desk Study

- 5.2.2 Historically the site has been in use as a top fruit orchard since 1940, this steadily falling into a state of disfunction over time.
- 5.2.3 The data study returned 18 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) lesser spearwort and near threatened (NT) greater butterfly-orchid *Platanthera chlorantha*, star sedge, tormentil, wild strawberry, heath speedwell, corn mint, common cow-wheat, bitter-vetch, heather, bell heather, cross-leaved heath *Erica tetralix*, wood-sorrel, goldenrod, marsh valerian *Valeriana dioica*, and sanicle.
- 5.2.4 The soil type has been identified as slightly acid loamy and clayey soil.

Field Survey Results

- 5.2.5 The site is dominated by the relic orchard trees, beneath which the vegetation is infrequently managed grass typical of that expected in a former agricultural setting. Grass species present include locally dominant false-oat grass, abundant Yorkshire fog and locally abundant red fescue. Frequent cock's foot and common bent and occasional creeping bent *A. stolonifera*, sweet vernal-grass, common couch *Elymus repens*, perennial rye grass, smooth meadow-grass, rough meadow-grass *P. trivialis*, cat's tail. Rarely occurring yellow oat-grass *Trisetum flavescens*. Herbaceous species present on-site include locally abundant white clover, field bindweed *Convolvulus arvensis*, meadow vetchling *Lathyrus pratensis*, musk mallow *Malva moschata*, common vetch *V. sativa* and Atlantic ivy *Hedera hibernica*, frequent common hogweed, occasional bird's-foot trefoil, common nettle, common sorrel. Rarely occurring ribwort plantain, self-heal *Prunella vulgaris*, meadow buttercup, creeping buttercup, cow parsley, wood cranes bill *Geranium sylvaticum*, greater plantain *P. major*, nipplewort *Lapsana communis*, tormentil *Potentilla erecta* and yarrow.
- 5.2.6 The grassland habitat within BM2 is relatively uniform and fits within the same habitat classification across the whole parcel.

Conclusion

5.2.7 In accordance with JNCC criteria (2010), the BM2 site identifies as:

- **B2.2 Neutral Grassland Semi Improved**
- **A3 Scattered Trees**

5.2.8 As depicted in Figure 2, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Neutral Grassland of Moderate** quality

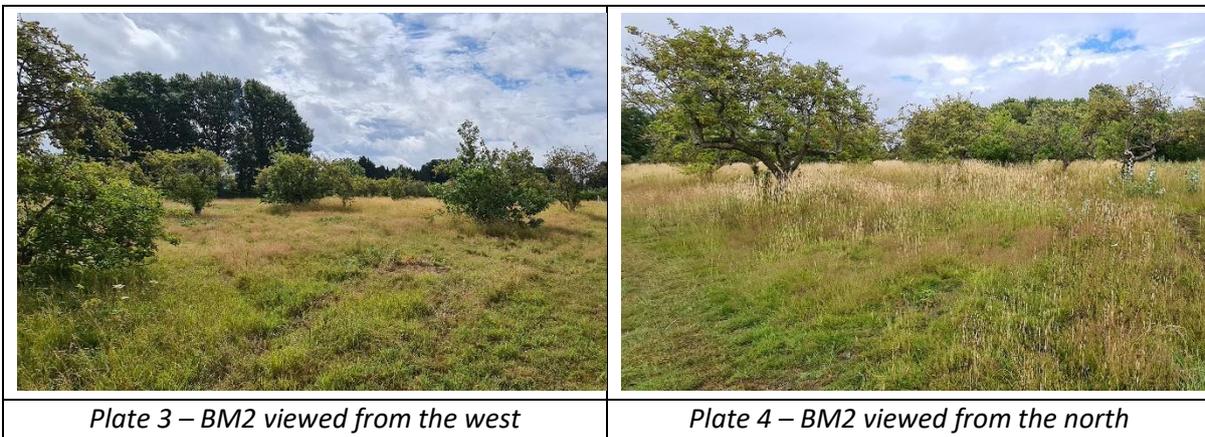
5.2.9 The site Matfield BM2 supports grassland of **Moderate – Low** botanical interest and is considered of **Moderate** ecological importance.

5.2.10 Identification of the historic orchard trees should be considered / surveyed further, this to determine whether the site qualifies as the S41 priority habitat of Traditional Orchard.

Figure 2 – Habitat Assessment Criteria Map (Matfield BM2)



Site Photos (Matfield BM2)



CRANBROOK

5.3 CRANBROOK – CRS1

Description

- 5.3.1 Cranbrook CRS1 lies within the village of Wilsley Green, Kent (NGR: TQ777369). Located north of the A229, the site occupies 0.67 ha and is predominantly well-managed grassland with a sward height of <10cm.

Desk Study

- 5.3.2 Historically the site depicts as a top fruit orchard in 1940, having been laid to what appears to be grass by 1960. Presenting as arable in 1990 and returning to grass by 2013 the site appears to have undergone regular management since that time.

- 5.3.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

- 5.3.4 The data study returned 15 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) chaffweed *Centunculus minimus* and yellow-glandular hawkweed *Hieracium sabaudum*, vulnerable (VU) lesser spearwort *Ranunculus flammula*, allseed *Radiola linoides* and stinking chamomile *Anthemis cotula*, and near threatened (NT) tormentil *Potentilla erecta*, wild strawberry *Fragaria vesca*, heath speedwell *Veronica officinalis*, corn mint *Mentha arvensis*, heather *Calluna vulgaris*, bell heather *Erica cinerea*, wood-sorrel, goldenrod *Solidago virgaurea*, devil's-bit scabious *Succisa pratensis*.

- 5.3.5 The soil type within the site identifies as clay.

Field Survey Results

- 5.3.6 The grassland habitat within CRS1 is relatively uniform and fits within the same habitat classification across the whole parcel.
- 5.3.7 Grass species present on-site include abundant perennial rye grass and red fescue, locally abundant Yorkshire fog, frequent false oat-grass and occasional common bent, sweet vernal, cock's foot and meadow grass. Herbaceous species present on-site include occasional creeping buttercup, bramble, white clover and common nettle. Rarely occurring lords and ladies, common ragwort, common hogweed and common sorrel.

Conclusion

- 5.3.1 In accordance with JNCC criteria (2010), the survey area CRS1 identifies as:

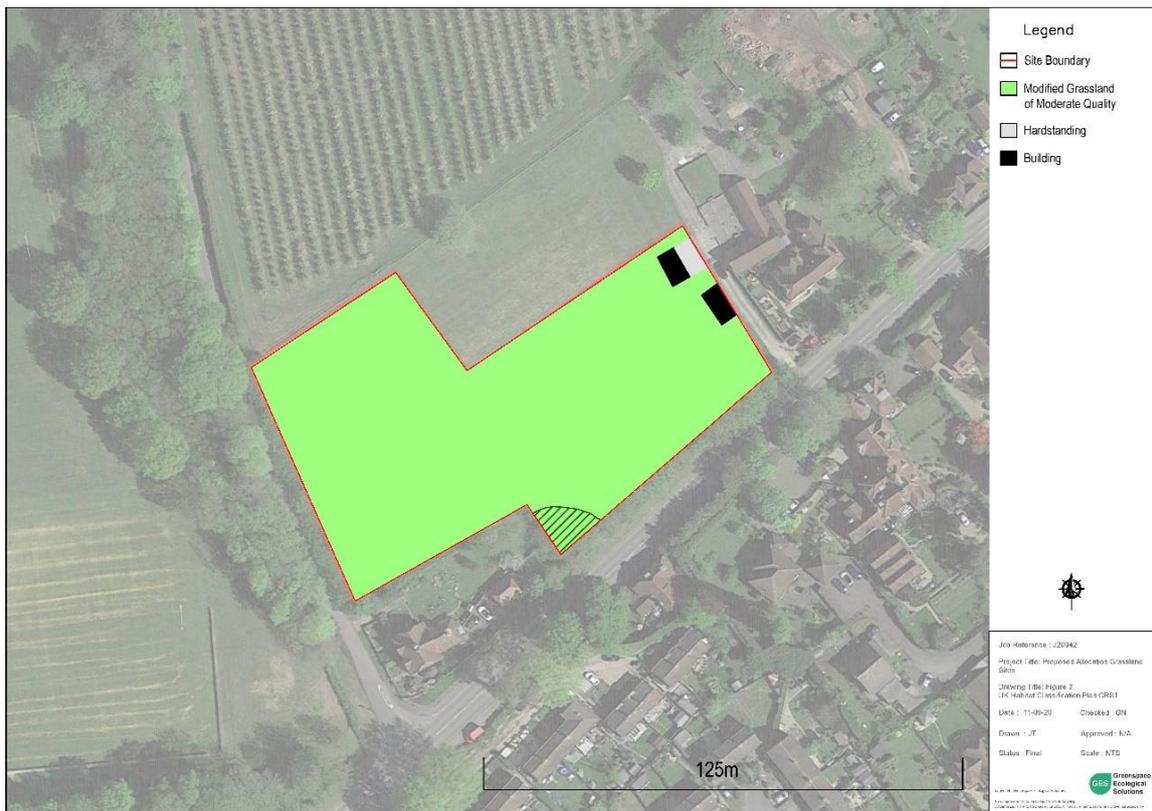
- **B2.2 Neutral Grassland Semi-Improved.**

5.3.2 As depicted in Figure 3, in accordance with the UK habitat classification index the grassland habitats is considered to be

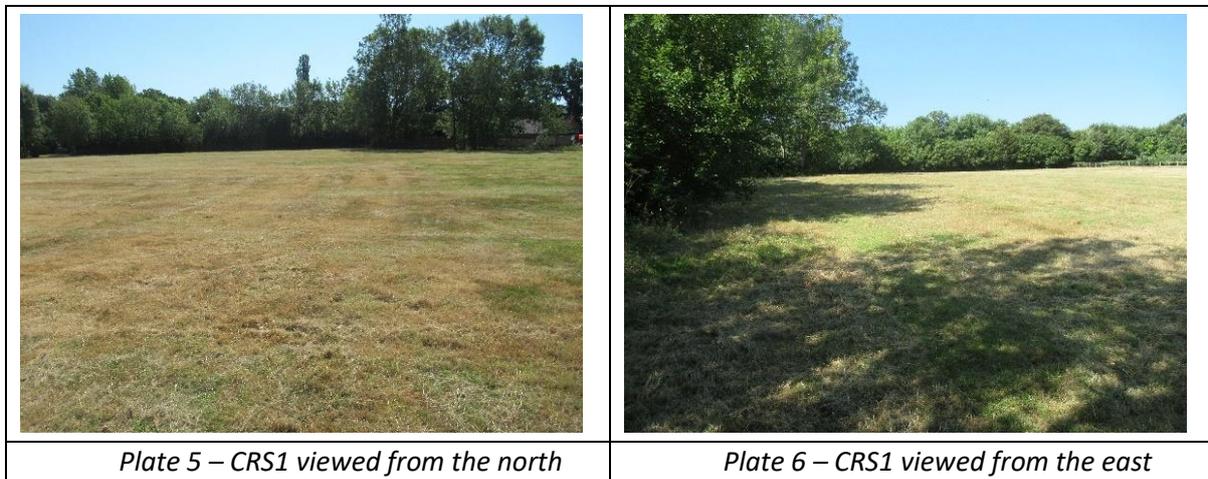
- **Modified Grassland of Moderate** quality.

5.3.3 The site Cranbrook CRS1 supports grassland of **Moderate – Low** botanical interest and is considered of **Moderate** ecological importance.

Figure 3 – Habitat Assessment Criteria Map (Cranbrook CRS1)



Site Photos (Cranbrook CRS1)



5.4 HARTLEY – CRS4

Description

- 5.4.1 Hartley CRS4 lies south of the A229 (NGR: TQ767352). The site occupies approximately 16 hectares (ha) and comprises a built farmstead which lies centrally within the plot, the surrounds of which are dominated by unmanaged / unused paddocks.

Desk Study

- 5.4.2 Historically, with the exception of the bottom south east corner, which was set to top fruit trees, the site appears to have been used predominantly for grazing and hay between 1940 and 2008. Between 2011 and 2015 the site was subject to extensive and intensive livestock grazing (potentially pigs), an action that resulted in the site being separated into a number of separate fenced off parcels, the interiors of which were subsequently grazed to bare earth.
- 5.4.3 Two parcels of 'deciduous woodland', a habitat listed under s41 of the NERC Act (2006), are located adjacent to site, along the site's southern boundary.
- 5.4.4 The data study returned 11 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) chaffweed, vulnerable (VU) lesser spearwort, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, heather, wood-sorrel, allseed and devil's-bit scabious.
- 5.4.5 The soil type has been identified as slightly acid but base-rich loamy and clayey soil.

Field Survey Results

- 5.4.6 The site comprises a mix of hardstanding, recolonising bare ground and derelict buildings within the central farmstead. The wider grounds comprise a mix of managed and un-managed grassland, scrub, trees and hedgerows.
- 5.4.7 Botanical species present within the managed and unmanaged grasslands remain the same with grass species recorded including abundant common bent, creeping bent, false oat-grass and red fescue, locally abundant sweet vernal grass, cock's foot. Frequent Yorkshire fog and perennial rye grass and occasional common couch, meadow oat-grass *Helictotrichon pratense*, smooth meadow-grass, timothy *Phleum pratense* and cat's tail with rarely occurring Italian rye grass *F. perennis*. Herbaceous species present on-site include abundant creeping buttercup, locally abundant bird's foot trefoil and ox-eye daisy *Leucanthemum vulgare*. Frequent dandelion and common nettle and occasional ribwort plantain, bramble, common

sorrel, white clover, creeping thistle, common ragwort, greater plantain, common daisy *Bellis perrenis* with rarely occurring lesser stitchwort *Stellaria graminea*, greater willowherb, curled dock *Rumex crispus* and common hogweed. Rush species of soft rush *Juncus effusus* and compact rush *J. conglomeratus* were also present

Conclusion

5.4.8 In accordance with JNCC criteria (2010), the Hartley CRS4 site identifies as:

- **B2.2 Neutral Grassland Semi Improved**

5.4.9 As depicted in Figure 4, in accordance with the UK habitat classification index the grassland habitat is considered to be:

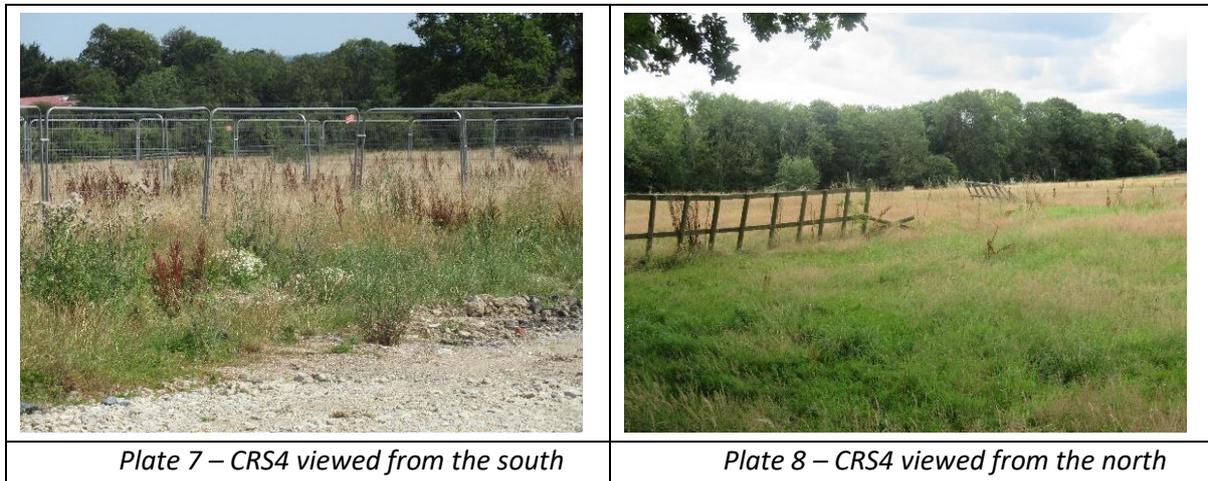
- **Modified Grassland of Moderate** quality.

5.4.10 The site Hartley CRS4 supports grassland of **Low** botanical interest and is considered of **Low – Moderate** ecological importance.

Figure 4 – Habitat Assessment Criteria Map (Hartley CRS4)



Site Photos (Hartley CRS4)



5.5 CRANBROOK – CRS5

Description

- 5.5.1 Cranbrook CRS5 lies to the east and north of the Church of England Primary School which lies within the village of Cranbrook, Kent (NGR - TQ776366). Restricted to omit the allotments, the site occupies 2.34 ha and is predominantly well-managed grassland (<10cm sward height) with unmanaged field margins. Although access to an area of the site which lies within the grounds of the Cranbrook Primary School was restricted, it was observed and identified as amenity grassland with a sward height of <10cm.

Desk Study

- 5.5.2 Historically the site appears to have been laid to a mix of grass and allotments since 1940, with the amenity grounds of the associated school presenting from 1990 onwards. Appearing to have lacked management between 1990 and 2013, the northern parcel looks to have been subject to frequent management since that time.
- 5.5.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.
- 5.5.4 The data study returned 15 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) chaffweed and yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, allseed and stinking chamomile, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint *Mentha arvensis*, heather, bell heather, wood-sorrel, goldenrod, devil's-bit scabious.
- 5.5.5 The soil type within the site identifies as clay.

Field Survey Results

- 5.5.6 Grass species present on-site include abundant perennial rye grass and red fescue, frequent Yorkshire fog and occasional common bent, creeping bent and cock's foot. Herbaceous species present on-site include locally abundant bird's foot trefoil, common sorrel, field bindweed and garlic mustard *Alliaria petiolata*. Occasional common hogweed and common ivy *H. helix*, rarely occurring ribwort plantain, meadow buttercup, creeping buttercup, dandelion, herb Robert *Geranium robertianum*, broad-leaved dock *R. obtusifolius* common ragwort, sow thistle *Sonchus* sp. and greater plantain.

5.5.7 Himalayan balsam *Impatiens glandulifera*, an invasive species listed under schedule 9 of the Wildlife and Country Act 1981 (as amended), exists and is denoted TN2 in Figure 3.

Conclusion

5.5.8 In accordance with JNCC criteria (2010), the CRS5 site identifies as

- **B4 Improved Grassland**

5.5.9 As depicted in Figure 5, in accordance with the UK habitat classification index the grassland habitats is considered to be:

- **Urban Amenity Grassland of Moderate** quality.

5.5.10 The site Cranbrook CRS5 supports grassland of **Low** botanical interest and is considered of **Moderate – Low** ecological importance.

Figure 5 – Habitat Assessment Criteria Map (Cranbrook CRS5)



Site Photos (Cranbrook CRS5)



Plate 9 – CRS5 viewed from the north



Plate 10 – CRS5 viewed from the east

5.6 HARTLEY – CRS6 (EAST)

Description

- 5.6.1 Hartley CRS6 (east) is located east of Glassenbury Road within the village of Hawkhurst, Kent (NGR TQ760300). The site occupies approximately 3.6 ha and is predominantly one of hard standing with agricultural buildings to the south and grassland to the north and west.

Desk Study

- 5.6.2 Historically the site appears to have supported agricultural structures in the south west corner since 1940, the remainder of the site being used either for the purpose of grazing or hay since that time.
- 5.6.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site
- 5.6.4 The data study returned 12 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) chaffweed and yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, heather, wood-sorrel, allseed and devil's-bit scabious.
- 5.6.5 The soil type has been identified as slightly acid but base-rich loamy and clayey soil

Field Survey Results

- 5.6.6 The site was divided into two distinct areas, these described below as Area A and Area B.
- 5.6.7 Area A is an unmanaged meadow grassland which extends to 1.1ha, is located in the north of the site and is bounded by trees on all sides. Grass species present include dominant sweet vernal grass, locally abundant Yorkshire fog, red fescue, occasional perennial rye grass, common couch and common bent and rarely occurring creeping bent. Herbaceous species present on-site include locally abundant bracken, bird's foot trefoil, meadow thistle *C. dissectum*. Frequent common sorrel, creeping thistle and common ragwort. Occasional common nettle, meadow vetch and greater willowherb and rarely occurring knapweed, lesser hawkbit *Leontodon taraxacoides*, ground ivy *Glechoma hederacea* and yarrow are also present. Soft rush and compact rush were identified in the damp depression denoted TN1 in Figure 6.
- 5.6.8 Area B is a mix of both unmanaged and managed grassland which lies in the south of the site

- 5.6.9 The botanical species composition within both the managed and un-managed habitats remain similar. Grass species recorded include locally dominant Yorkshire fog and sweet vernal grass, locally abundant creeping bent with locally abundant creeping bent and red fescue. Frequent common bent with occasional false oat-grass, tall fescue and cat's tail were also present. Rarely occurring meadow foxtail *Alopecurus pratensis*, compact rush, yellow oat-grass and hard rush were recorded. Herbaceous species present on-site include locally abundant lesser stitchwort and silverweed *Argentina anserina*. Frequent meadow buttercup and creeping thistle. Occasional common hogweed, bird's foot trefoil, creeping buttercup, bramble, common sorrel, white clover, common nettle, common ragwort, broad-leave dock and yarrow. Rarely occurring weld *Reseda luteola*, broad-leaved plantain, sow thistle, common daisy and red clover *T. pratense*.
- 5.6.10 The species composition within the amenity grassland includes frequently occurring perennial rye, red fescue and common bent, occasional Yorkshire fog and rarely occurring cats ear. Herbaceous species recorded include occasional white clover and common sorrel.

Conclusion

- 5.6.11 In accordance with JNCC criteria (2010) the CRS6 site identifies as:

- **J1.2 Amenity**
- **B3.2 Neutral Grassland Semi-Improved**
- **B5 Marshy Grassland**
- **A2.2 Scattered Scrub**
- **J2.6 Dry Ditch**
- **C1.2 Scattered Bracken**
- **J3.6 Buildings**

- 5.6.12 As depicted in Figure 6, in accordance with the UK habitat classification index the grassland habitats are considered to be:

- **Urban Amenity** of **Moderate** Quality
- **Modified Grassland** of **Moderate** quality,

- 5.6.13 The site Hartley CRS6 East supports grassland of **Moderate – Low** botanical interest and is considered of **Low – Moderate** ecological importance.

Figure 6 – Habitat Assessment Criteria Map (Hartley CRS6 East)



Site Photos (Hartley CRS6 East)



5.7 HARTLEY – CRS6 (WEST)

Description

- 5.7.1 Hartley CRS6 (west) is located west of Glassenbury Road within the village of Hartley, Kent (NGR: TQ757349). The site occupies approximately 2 hectares (ha) and is one of hard standing and amenity grassland with agricultural buildings to the south and unmanaged / hay fields to the north.

Desk Study

- 5.7.2 Historically the site appears to have been in use as a mix of top fruit, arable and grazing in 1940, this use being retained on rotation through to 1960. The agricultural buildings become apparent by 1990, at which time the remainder of the site appears to be in use for grazing. With the exception of what appears to be a hay cut in 2013 and 2018, the status of grazing appears to be retained throughout the remaining years.
- 5.7.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site
- 5.7.4 The data study returned 12 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) chaffweed and yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, heather, wood-sorrel, allseed and devil's-bit scabious.
- 5.7.5 The soil type has been identified as slightly acid but base-rich loamy and clayey soil.

Field Survey Results

- 5.7.6 The site comprises a mix of hardstanding and built structures to the south, the immediate surrounds of which are dominated by amenity grassland and tall ruderal. The wider site is dominated by infrequently managed grassland which is surrounded by hedgerows and trees, within which is set a more frequently managed fenced paddock. Pockets of scrub and bracken are also present in the north of the site.
- 5.7.7 Species within the less frequently managed grassland include dominant creeping bent and abundant common bent. Frequent red fescue and Yorkshire fog and occasional common couch, false oat-grass, cock's foot, perennial rye grass, timothy and cat's tail with rarely occurring wall barley, sweet vernal-grass and meadow foxtail also present. Herbaceous species include locally abundant upright hedge bindweed *Calystegia sepium* and bracken,

frequent creeping buttercup, occasional common sorrel, white clover and rarely occurring common hogweed, dandelion, common nettle, greater plantain, greater willowherb, lesser hawkbit, sheep sorrel *R. acetosella*, common sow thistle and common nipplewort.

Conclusion

5.7.8 In accordance with JNCC criteria (2010), the main body of the site Hartley CRS6 West supports a mix of;

- **B4 Improved Grassland**
- **B3.2 Neutral Grassland Semi-Improved**
- **J1.3 Ephemeral / Short Perennial on Cultivated / Disturbed Ground**
- **J2.1 Intact Hedgerow**
- **J4 Bare Ground**
- **A2.2 Scattered Scrub**
- **C1.2 Scattered Bracken**
- **J3.6 Buildings**

5.7.9 As depicted in Figure 7, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Modified Grassland** of **Poor** quality,
- **Neutral Grassland** of **Moderate** quality,

5.7.10 The site Hartley CRS6 West supports grassland of **Moderate – Low** botanical interest and is considered of **Moderate** ecological importance.

Figure 7 – Habitat Assessment Criteria Map (Hartley CRS6 West)



5.8 SISSINGHURST – CRS12

Description

5.8.1 Sissinghurst CRS12 lies east of Mill Lane and centrally within the village of Sissinghurst (NGR: TQ788376). The site occupies approximately 0.81 hectares (ha) and is predominantly managed grassland that is bounded by trees with mature trees centrally within the site.

Desk Study

5.8.2 Although subject to varying degrees of management, historically the site has been set to grass since 1940.

5.8.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.8.4 The data study returned 4 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include near threatened (NT) wild strawberry, ragged-robin and wood-sorrel.

Field Survey Results

5.8.5 Unmanaged and with a sward height of <5cm, grass species present include dominant Yorkshire fog, locally abundant red fescue and frequent common bent with occasional creeping bent and compact rush. Herbaceous species present on-site include locally abundant creeping buttercup, frequent white clover and occasional bird's-foot trefoil, common nettle and yarrow with rarely occurring creeping thistle and lesser stitchwort.

5.8.6 The soil type has been identified as slightly acid loamy and clayey soil.

Conclusion

5.8.7 In accordance with JNCC criteria (2010). The CRS12 site identifies as:

- **B6 Poor Semi-Improved Grassland**
- **A2.2 Scattered Scrub**
- **A3.1 Scattered Trees**

5.8.8 As depicted in Figure 8, in accordance with the UK habitat classification index the grassland habitat is considered to be:

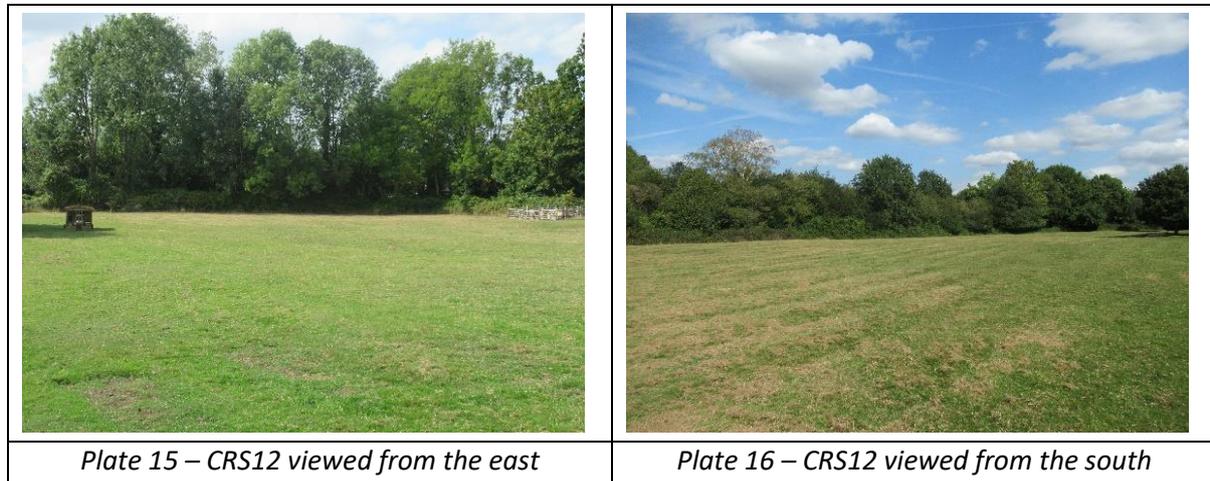
- **Modified Grassland of Poor** quality.

5.8.9 The site Sissinghurst CRS12 supports grassland of **Low** botanical interest and is considered of **Moderate – Low** ecological importance.

Figure 8 – Habitat Assessment Criteria Map (Sissinghurst CRS12)



Site Photos (Sissinghurst CRS12)



5.9 SISSINGHURST – CRS13

Description

- 5.9.1 Sissinghurst CRS13 is located north of the A262 highway and west the village of Sissinghurst, (NGR: TQ787375). The site occupies approximately 1.95hectares (ha) and is dominated by unmanaged tussock grassland that is bounded by broad-leaved woodland to the south and mature trees and hedgerows on alternate boundaries.

Desk Study

- 5.9.2 Although subject to varying degrees of management, historically the site has been set to grass since 1940.
- 5.9.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.
- 5.9.4 The data study returned 4 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include near threatened (NT) wild strawberry, ragged-robin and wood-sorrel.
- 5.9.5 The soil type has been identified as slightly acid loamy and clayey soil.

Field Survey Results

- 5.9.6 The site is dominated by a parcel of unmanaged grassland that has a sward height of >20cm and is interspersed with scrub and scattered trees. Grass species present include locally dominant Yorkshire fog and false oat-grass, abundant red fescue, locally abundant sweet vernal-grass, frequent common bent, creeping bent, cock's foot and occasional meadow foxtail, compact rush, cat's tail, timothy with rarely occurring soft rusH. Herbaceous species present include abundant bird's-foot trefoil and yarrow, locally abundant tormentil and creeping thistle. Occasional common hogweed, meadow buttercup, creeping buttercup, bramble, common sorrel, common nettle and cow parsley with rarely occurring dandelion, knapweed, lesser stitchwort and common ragwort.

Conclusion

- 5.9.7 In accordance with JNCC criteria (2010), the Sissinghurst CRE13 site identifies as:

- **B2.2 Neutral Grassland Semi-Improved**
- **A2.2 Scattered Scrub**
- **A1.1.1 Semi-natural Broadleaved Woodland**
- **A3.1 Scattered Trees**

5.9.8 As depicted in Figure 9, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Neutral Grassland** of **Moderate** quality.

5.9.9 The site Sissinghurst CRS13 supports grassland of **Moderate** botanical interest and is considered of **Moderate** ecological importance.

Figure 9 – Habitat Assessment Criteria Map (Sissinghurst CRS13)



Site Photos (Sissinghurst CRS13)



Plate 17 – CRS13 viewed from the east



Plate 18 – CRS13 viewed from the south

5.10 WILSLEY POUND – CRS15

Description

5.10.1 Wilsley Pound CR15 is located north of the A229 highway and on the north western outskirts of the Sissinghurst (NGR: TQ784376). The site occupies approximately 1ha and is an area of developed land with areas of amenity grassland and hardstanding to the east and heavily grazed pasture to the west. Bounded by hedgerows and trees, a parcel of land that lies centrally within the site was fenced off as a paddock was bare ground with no notable botanical species present at the time of the survey.

Desk Study

5.10.2 Historically the site was to grass in its entirety between 1940 and 1990. By 2003 the western area had been developed, with the surrounding habitats subject to varying degrees of management since that time.

5.10.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.10.4 The data study returned 4 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include near threatened (NT) wild strawberry, ragged-robin and wood-sorrel.

5.10.5 The soil type has been identified as slightly acid loamy and clayey soils.

Field Survey Results

5.10.6 The main body of the site is laid to pasture which was under heavy grazing pressure at the time of the survey. Grass species present within this area include abundant perennial rye grass and cock's foot, locally abundant Yorkshire fog, occasional common bent and rarely occurring bread wheat *Triticum aestivum*. Herbaceous species present on-site include abundant creeping buttercup, locally abundant ribwort plantain, frequent common sorrel and white clover. Occasional common nettle, common ragwort, creeping thistle and common daisy.

5.10.7 Of a similar species composition to that noted in the pasture, the amenity grassland present within the developed eastern part of the site was regularly mown to a height of <1cm.

Conclusion

5.10.8 In accordance with JNCC criteria (2010) the CRS15 site identifies as:

- **J1.2 Amenity Grassland**
- **B4 Improved Grassland**

- **J4 Bare Ground**
- **J3.6 Buildings**

5.10.9 As depicted in Figure 10, in accordance with the UK habitat classification index the grassland habitat are considered to be:

- **Urban Amenity Grassland** of **Poor** quality
- **Modified Grassland** of **Poor** quality.

5.10.10 Development of the site Wilsley Green CRS15 will result in the loss of a parcel of grassland of **Low** botanical and of **Low** ecological importance.

Figure 10 – Habitat Assessment Criteria Map (Wilsley Green CRS15)



Site Photos (Wilsley Green CRS15)



Plate 19 – CRS15 viewed from the east



Plate 20 – CRS15 viewed from south

5.11 SISSINGHURST – CRS17

Description

- 5.11.1 Sissinghurst CRS17 lies west of Common Road and in the north of the village of Sissinghurst, Kent (NGR: TQ791380). The site occupies approximately 2 hectares (ha) and is a mix of broad-leaved woodland and managed meadow grassland to the east (Area A) and amenity grassland within a rural residential garden setting to the west (Area B).

Desk Study

- 5.11.2 Historically the site was laid to grass in 1940, this being replaced with what appears to be fruit / arable farming by 1960. The grassland and curtilage present today was present again by 1990, after which time the now broad-leaved woodland habitat in the south east corner of the site was becoming established.
- 5.11.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.
- 5.11.4 The data study returned 7 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include vulnerable (VU) lesser spearwort, and near threatened (NT) wild strawberry, ragged-robin, heath milkwort *Polygala serpyllifolia* and wood-sorrel.
- 5.11.5 The soil type has been identified as slightly acid but base-rich loamy and clayey soils.

Field Survey Results

- 5.11.6 The dominant habitat type within area A is that of managed grassland with an area of broad-leaved woodland present in the south easternmost corner. Grass species present include abundant perennial rye grass and red fescue, frequent false oat-grass and cock's foot. Occasional common bent, creeping bent and common couch with rarely occurring cat's tail. Herbaceous species present on-site include frequent dandelion and white clover, occasional ribwort plantain, meadow buttercup, creeping buttercup, common sorrel, common nettle, creeping thistle, field bindweed and bracken. Rarely occurring yarrow, common hogweed, bird's-foot trefoil and tormentil.
- 5.11.1 Area B forms the western part of the site and is an area of extended residential garden that supports grassland, ornamental planting, scrub and trees. Grass species present include locally abundant Yorkshire fog, perennial rye grass and red fescue, frequent creeping bent, false oat-grass and cock's-foot with rarely occurring pendulous sedge. Herbaceous species present on-

site include locally abundant ribwort plantain and creeping buttercup, frequent dandelion and white clover. Occasional bird's-foot trefoil, common nettle, ground ivy, creeping thistle, common ragwort, ox-eye daisy and hedge bindweed with rare occurring yarrow, common sorrel, tormentil, ivy, cow parsley, herb Robert and cranesbill sp.

Conclusion

5.11.2 In accordance with JNCC criteria (2010), CRS17 site identifies as:

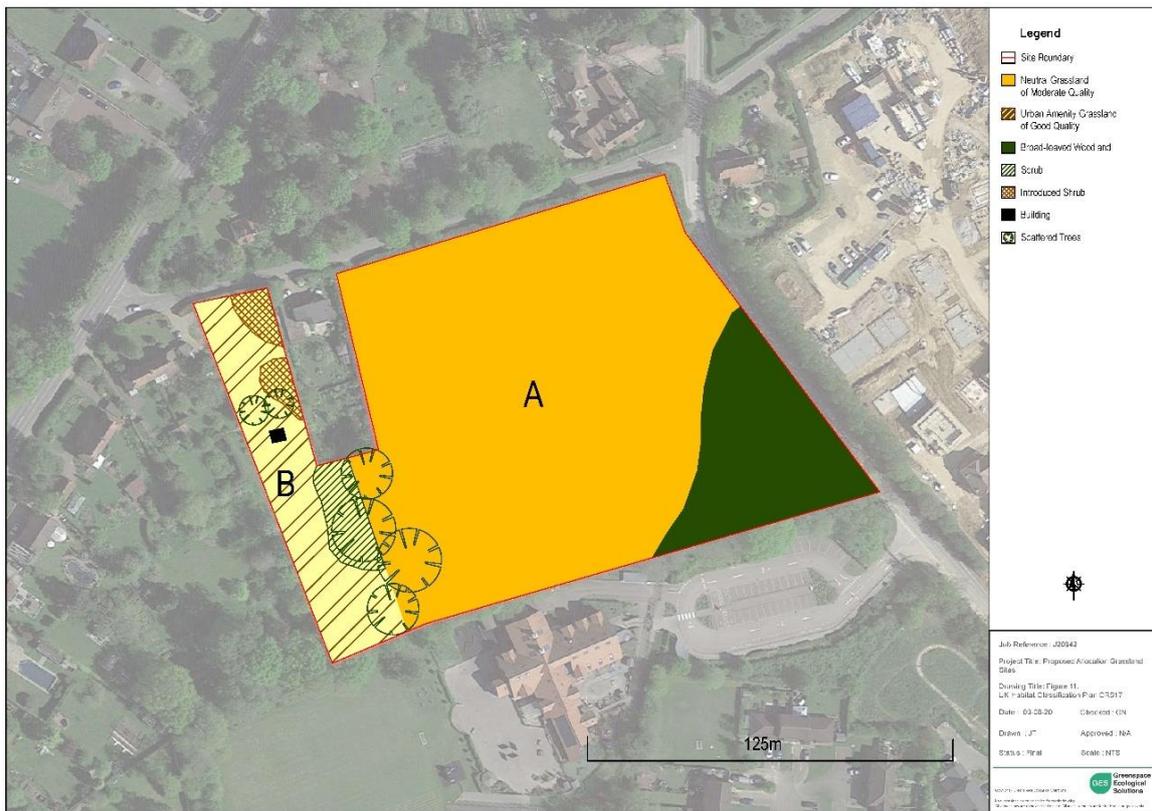
- **B2.2 Neutral Grassland Semi-improved** (Area A)
- **J1.2 Amenity Grassland** (Area B)
- **A1.1.1 Semi Natural Broad-leaved Woodland**
- **A3.1 Scattered Broad-leaved Trees**
- **A2.2 Scattered Scrub**
- **J1.4 Introduced Shrub**

5.11.3 As depicted in Figure 11, in accordance with the UK habitat classification index the grassland habitats are considered to be:

- **Neutral Grassland** of **Moderate** quality (Area A).
- **Urban Amenity** of **Good** quality (Area B)

5.11.4 The site Sissinghurst CRS17 supports grassland of **Moderate – Low** botanical interest and is considered of **Moderate** ecological importance.

Figure 11 – Habitat Assessment Criteria Map (Sissinghurst CRS17)



Site Photos (Sissinghurst CRS17)



Plate 21 – CRS17 viewed from the south



Plate 22 – CRS17 viewed from the south

HAWKHURST

5.12 HAWKHURST – HA6

Description

5.12.1 Hawkhurst HA6 lies to the south of the village of Hawkhurst, Kent (NGR: TQ760300). The site occupies approximately 3.6 hectares (ha).

5.12.2 The site comprises built habitats and hardstanding associated with residential dwellings, a broad-leaved woodland block located centrally within the site and areas of hedgerow and scattered scrub which are set within parcels of grassland of varying degrees of management. For the purpose of this report the site is divided into two surveys areas (A and B). Area A is predominately unmanaged meadow grassland. Area B is a mix of unmanaged and amenity grassland which is present in the western area of the site.

Desk Study

5.12.3 Historically, whilst the remainder of the site was laid to grass, the north west corner of the site appears to have been dominated with undeveloped housing plots in 1940. The grassland appears to have lacked management whilst the housing of the allocated plots had commenced by 1960. Post 1960 with exception of varying degrees of grassland management / grazing pressure the site has undergone little change in regard to use.

5.12.4 Two parcels of 'deciduous woodland', a habitat listed under s41 of the NERC Act (2006), are located adjacent to site, along the site's southern and eastern boundaries.

5.12.5 The data study returned 12 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) rye brome *Bromus secalinus* and lesser spearwort, and near threatened (NT) wild strawberry, heath speedwell, common cow-wheat, bitter-vetch, heather, wood-sorrel, treacle-mustard *Erysimum cheiranthoides* and goldenrod.

5.12.6 The soil type has been identified as slightly acid but base-rich loamy and clayey soil.

Field Survey Results

5.12.7 Located in the south of the site, the grassland denoted Area A is identified due to decreased management. Generic in form and with a deep thatch and a sward height of >15cm, grass species present include abundant perennial rye grass, red fescue and Yorkshire fog, locally abundant sweet vernal grass, cat's tail, timothy and false oat-grass and frequent common bent, creeping bent and cock's foot with a rarely occurring un-confirmed rye brome type

grass. Herbaceous species present on-site include abundant creeping thistle, locally abundant bird's foot trefoil, common ragwort and cow parsley and frequent common nettle and creeping buttercup. Occasional yarrow, common sorrel and meadow buttercup with rarely occurring white clover.

5.12.8 Forming the northern and western extremities of the site and extending to include the residential curtilage of two separate properties, Area B comprises both frequently managed amenity and less frequently managed semi-improved grassland habitats.

5.12.9 With no notable thatch and a sward height of >10cm, grass species presented within the less frequently managed grassland include abundant creeping bent with locally abundant false-oat grass, Yorkshire fog and perennial rye grass. Frequent red fescue with occasional common couch and rarely occurring annual meadow-grass, cat's tail and wall barley. Herbaceous species present on-site include locally abundant lesser stitchwort and white clover. Frequent meadow buttercup, common ragwort and bramble with occasional bird's foot trefoil, creeping buttercup, common sorrel, dandelion, common nettle, herb Robert, yarrow, common daisy and ground ivy. Rarely occurring ribwort plantain, creeping thistle, ox-eye daisy, hedge bindweed, broad-leaved dock and common centaury.

5.12.10 With a sward height of <5cm, where access was available botanical species present in the frequently managed amenity / residential lawns loosely reflect those present in the less managed areas.

Conclusion

5.12.11 In accordance with JNCC criteria (2010), the site Hawkhurst HA6 identifies as a mix of:

- **B2.2 Neutral Grassland Semi-Improved**
- **B6 Poor Semi-Improved Grassland**
- **J1.2 Amenity Grassland**
- **A1.1.1. Broad leaved Woodland**
- **A2.2. Scattered Scrub**
- **A3.1 Scattered trees**
- **J2.1 Intact Hedgerow**

5.12.12 As depicted in Figure 12, in accordance with the UK habitat classification index the grassland habitats are considered to be:

- **Neutral Grassland of Moderate quality**

- **Modified Grassland** of **Moderate** quality
- **Urban Amenity** of **Poor** quality

5.12.13 The site Hawkhurst HR6 supports neutral grassland of **Moderate** and modified and amenity grassland Low botanical interest and the site is considered of **Moderate – Low** ecological importance.

5.12.14 Note: Identification of an unidentified Rye type grass during the field survey and the vulnerable Rye Brome within the desk study data may require further consideration.

5.13 GILL'S GREEN – HA8

Description

5.13.1 Gills Green HA8 lies east of Slip Mill Road within the village of Gill's Green, Kent (NGR: TQ755322). The site occupies 2.2 ha and is predominantly unmanaged grassland with areas of bare ground, recolonising vegetation and spoil.

Desk Study

5.13.2 Historically the site appears to have been in use as a top fruit orchard in 1960, for arable / agricultural in 2003, after which it was stripped and set to grass in 2007.

5.13.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.13.4 The data study returned 17 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) hawkweed *Hieracium cantianum* and yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, common cow-wheat *Melampyrum pratense*, eyebright *Euphrasia nemorosa*, bitter-vetch *Lathyrus linifolius*, heather, bell heather *Erica cinerea*, wood-sorrel, goldenrod, devil's-bit scabious, and sanicle *Sanicula europaea*.

5.13.5 The soil type has been identified as slightly acid loamy and clayey soil.

Field Survey Results

5.13.6 The site is dominated by areas of infrequently managed grasslands that are bounded by hedgerows and lines of mature trees. An area of hardstanding with recolonising bare ground exists centrally within the site.

5.13.7 Botanical species present within the grassland includes abundant common bent, creeping bent, red fescue and perennial rye grass. Locally abundant common bent, cock's foot and compact rush. Occasional meadow oat-grass, soft brome *Bromus hordeaceus*, common couch and cat's tail. Rarely occurring pendulous sedge. Herbaceous species present on-site include locally abundant bird's-foot trefoil and creeping buttercup and frequent ribwort plantain, dandelion, white clover, common daisy and creeping thistle. Occasional broad-leaved willow herb, bramble, common sorrel, cow parsley, broad-leaved dock, common chickweed *Stellaria media*, hawksbeard *Crepis* sp. and rarely occurring common nettle, hogweed and lesser stitchwort.

5.13.1 Rubble piles comprising broken concrete are denoted TN1 in Figure 13.

Conclusion

5.13.2 In accordance with JNCC criteria (2010), the site Gills Green HA8 identifies as:

- **B2.2 Neutral Grassland Semi-Improved**
- **J1.3 Ephemeral / Short Perennial on Cultivated / Disturbed Ground**
- **J4 Bare Ground**

5.13.3 As depicted in Figure 13, in accordance with the UK habitat classification index the grassland habitats present are considered to be:

- **Neutral Grassland of Moderate** quality.

5.13.4 The site Gills Green HA8 supports grassland of **Low** botanical interest and is considered of **Moderate** ecological importance.

5.14 GILL'S GREEN – HA9

Description

- 5.14.1 Gills Green HA9 lies east of Slip Mill Road and south of HA8. Located within the village of Gill's Green, Kent at National Grid Reference: TQ755320, the site occupies 2.5 hectares (ha) and is predominantly a parcel of heavily grazed pasture.

Desk Study

- 5.14.2 Historically the site appears to have been a mix of residential curtilage to the south and in hay cultivation to the north in 1960, to have been developed with a series of farm buildings to the south and used for grazing in the north by 1990, and to have been subject to varying degrees of management since. .
- 5.14.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.
- 5.14.4 The data study returned 17 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) hawkweed and yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, common cow-wheat, eyebright, bitter-vetch, heather, bell heather, wood-sorrel, goldenrod, devil's-bit scabious, and sanicle.
- 5.14.5 The soil type has been identified as slightly acid loamy and clayey soil.

Field Survey Results

- 5.14.6 The site is dominated by an area of heavily grazed pasture, within which is a mix of built structures, hardstanding which is surrounded by heavily managed amenity grassland recolonising, bare ground, boundary hedgerows, scrub and lines of mature trees.
- 5.14.7 With a sward height of <5cm, grass species present within the grazed pasture include abundant red fescue and perennial rye grass. Locally abundant common bent and creeping bent and frequent cock's foot with occasional Yorkshire fog. Herbaceous species present on-site include frequent white clover with occasional creeping buttercup, creeping thistle and common sorrel with locally abundant common nettle and broad-leaved dock.
- 5.14.8 Of a similar species composition to that noted in the pasture, the amenity grassland present within the developed eastern part of the site was regularly mown to a height of <1cm.

5.14.9 Rubble /spoil piles are denoted TN1 on Figure 5.

Conclusion

5.14.10 In accordance with JNCC criteria (2010), the Gills Green HA9 site identifies as:

- **B4 Improved Grassland**
- **A2.2 Scattered Scrub**
- **J2.1.2 Intact Species Poor Hedgerow**

5.14.11 As depicted in Figure 14, in accordance with the UK habitat classification index the grassland habitats present are considered to be:

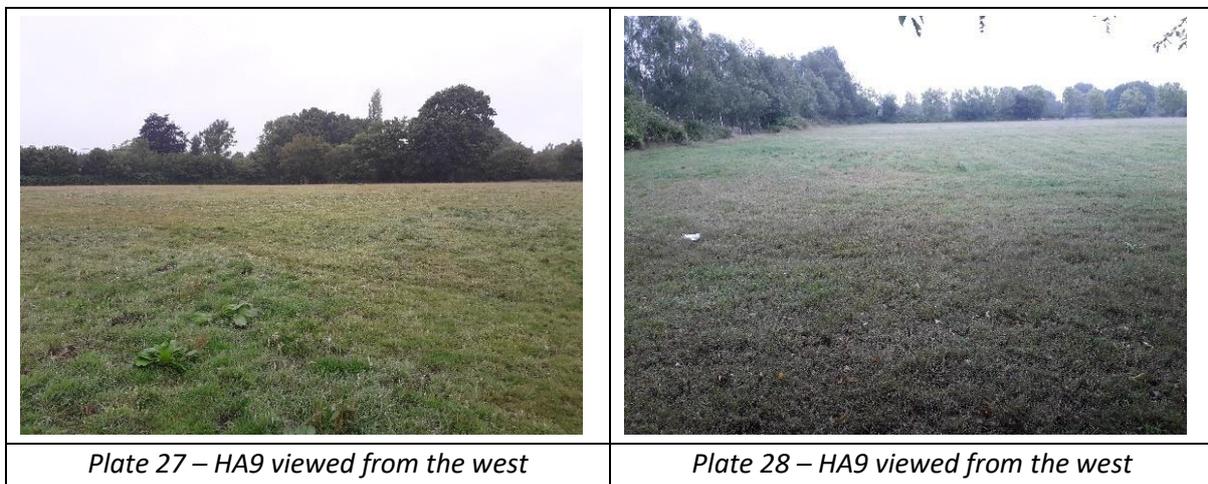
- **Modified Grassland of Poor** quality

5.14.12 The site Gills Green HA9 supports grassland of **Low** botanical interest and is considered of **Low** – **Moderate** ecological importance.

Figure 14 – Habitat Assessment Criteria Map



Appendix N – Site Photos (Gill Green HA9)



HORSMONDEN

5.15 HORSMONDEN – HO2

Description

- 5.15.1 Horsmonden HO2 is located west of the village of Horsmonden, Kent (NGR: TQ696404). The site occupies approximately 3.25 hectares (ha) and is predominantly managed grassland with areas of unmanaged field margins.

Desk Study

- 5.15.2 Historically the site appears to have been a mix of top fruit orchards and arable between 1940 and 1960. By 1990 the parcel had been laid to grass, this remaining until 2007 at which time the site appears to be set to arable.
- 5.15.3 A single parcel of Ancient and Semi-Natural Woodland (ASNW) is located adjacent to the site's western boundary. The same parcel of land is identified as 'deciduous woodland', a habitat listed under s41 of the NERC Act (2006).
- 5.15.4 The data study returned 14 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) bladder-sedge *Carex vesicaria* and lesser spearwort, and near threatened (NT) star sedge *Carex echinata*, tormentil, wild strawberry, heath speedwell, corn mint, common cow-wheat, heather, wood-sorrel, devil's-bit scabious.
- 5.15.5 The soil type has been identified as slightly acid loamy and clayey soil.

Field Survey Results

- 5.15.6 The site is dominated by a single generic grassland that is subject to management / harvesting in the main body, with less managed field margins present around the perimeter. Grass species present include abundant perennial rye grass and red fescue, locally abundant sweet vernal grass and frequent common bent, creeping bent, false oat-grass and cock's foot. Occasional common couch and yellow oat grass with rarely occurring wall barley, cat's tail and meadow oat. Herbaceous species present on-site include locally abundant bramble, bird's foot trefoil and silverweed and frequent white clover. Occasional common hogweed, ribwort plantain, creeping buttercup, common nettle, yarrow, creeping thistle and field speedwell *Veronica persica*. Rarely occurring meadow vetch, common ragwort and common sorrel.
- 5.15.1 Brash piles and log piles present on-site are denoted TN1 on Figure 10.

Conclusion

5.15.2 In accordance with JNCC criteria (2010), the site HO2 identifies as:

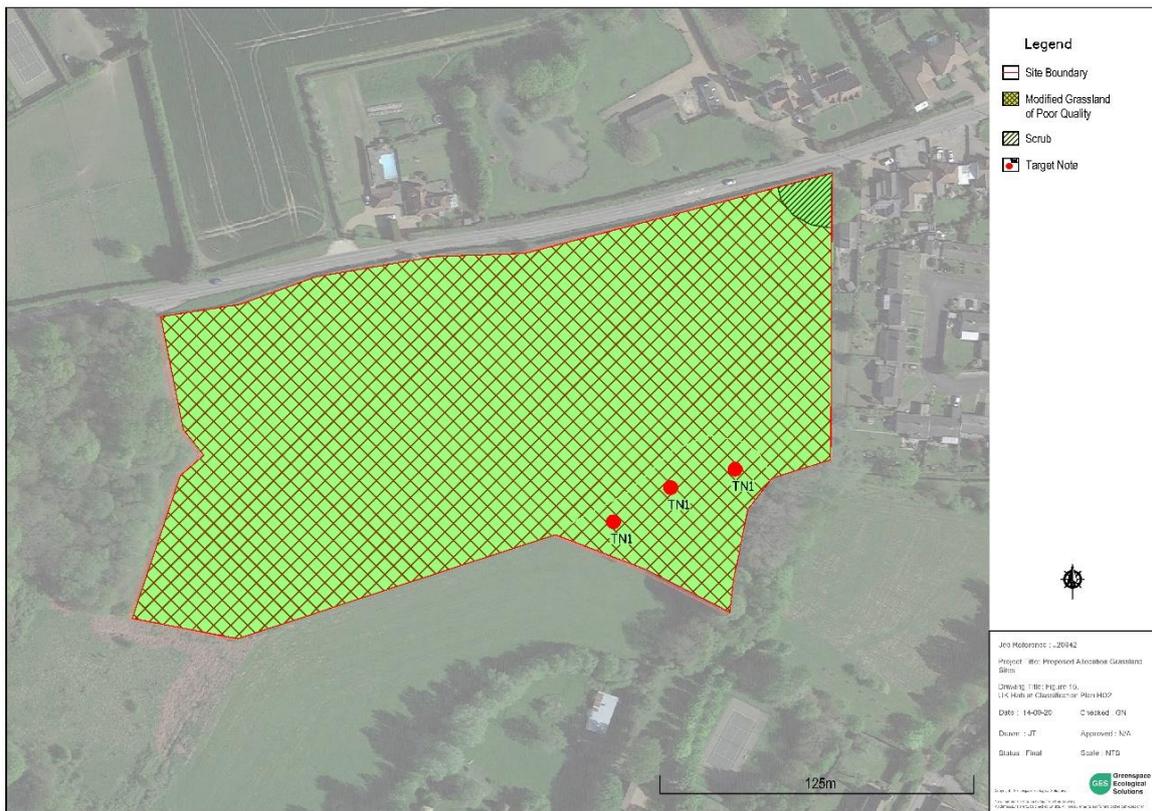
- **B4 Improved Grassland**

5.15.3 As depicted in Figure 15, in accordance with the UK habitat classification index the habitat is considered to be;

- **Modified Grassland of Poor** quality

5.15.4 The site Horsmonden HO2 supports grassland of **Low** botanical interest and is considered of **Low - Moderate** ecological importance.

Figure 15 – Habitat Assessment Criteria Map (Horsmonden HO2)



Site Photos (Horsmonden HO2)

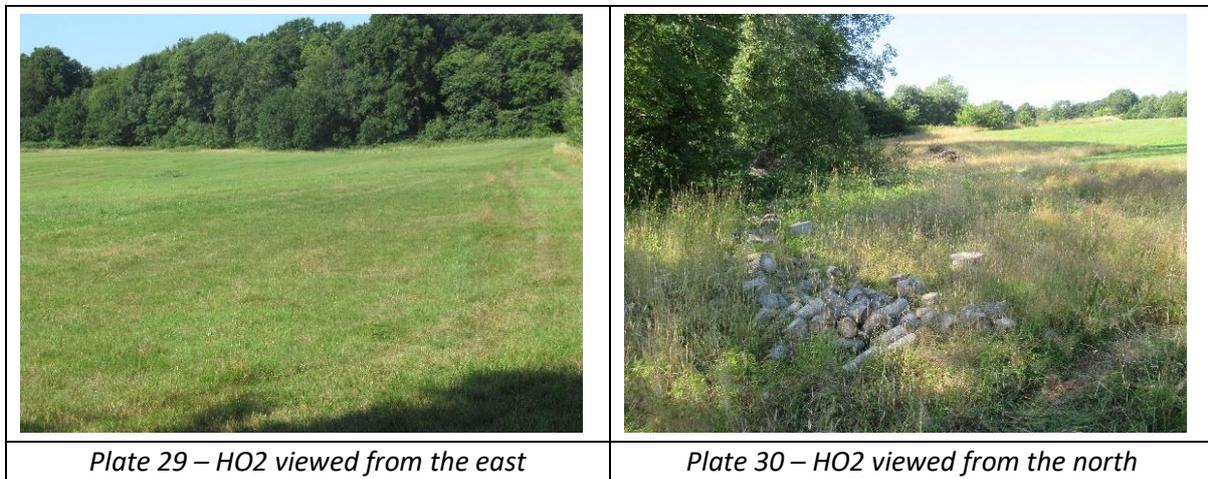


Plate 29 – HO2 viewed from the east

Plate 30 – HO2 viewed from the north

PEMBURY

5.16 PEMBURY – PE1

Description

5.16.1 Pembury PE1 lies north of the A21 highway and south of the village of Pembury, Kent (NGR: TQ621406). The site occupies approximately 6.6 hectares (ha) and is divided across five distinct fields / survey areas. For clarity these are described as areas A- E below.

Desk Study

5.16.2 Historically the site was a mix of woodland and arable in 1940, with the northern centre of the site (Site A) being set to soft fruit by 1960 and the woodland having been cleared by 1990. The soft fruit farming was ceased, and the remaining areas of the site were set to grass by 1990.

5.16.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.16.4 The data study returned 13 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) lesser spearwort and corn spurrey *Spergula arvensis*, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, bitter-vetch, heather, bell heather, wood-sorrel, and goldenrod.

5.16.5 The soil type has been identified slightly acid loamy and clayey soils.

Field Survey Results

5.16.6 Area A is an extension of the residential curtilage and is an area predominately regularly managed grassland with a sward height of <5cm with areas of bramble scrub. Grass species present on-site include abundant red fescue, Yorkshire fog, rough meadow-grass and annual meadow-grass, occasional common bent and creeping bent and rarely occurring false-oat grass. Herbaceous species present on-site include locally abundant white clover and creeping buttercup, frequent common mouse-ear *Cerastium fontanum* and bird's-foot trefoil, occasional dandelion with rarely occurring cranesbill sp., scentless mayweed *Tripleurospermum inodorum*, lesser hawkbit *Leontodon taraxacoides*, creeping thistle and field bindweed.

5.16.7 Area B is an area of frequently managed grassland that has a sward height of <10cm. Grass species present on-site include abundant common bent and creeping bent, frequent Yorkshire fog, occasional rough meadow-grass and false oat-grass with rarely occurring common couch.

Herbaceous species present on-site include locally dominant bramble, locally abundant meadow vetchling, occasional broad-leaved dock and dogs mercury *Mercurialis perennis*. Rarely occurring common sorrel, redshank *Persicaria maculosa*, common ragwort, cranesbill sp., and hedge bindweed

5.16.8 Area C is a low intensity grazing pasture that was occupied by cattle at the time of the survey and had a sward height of <10cm. Grass species present include frequent creeping bent, sweet vernal-grass, Yorkshire fog, perennial rye-grass, annual meadow-grass and rough meadow-grass, occasional red fescue and rarely occurring cat's tail and Italian rye. Herbaceous species present on-site include frequent creeping buttercup and creeping thistle, occasional common nettle, meadow buttercup and common sorrel with rarely occurring common mouse-ear.

5.16.9 Area D is a low-lying area of marshy grassland and bramble scrub that lies within the historically cleared woodland in the south east corner of the site. Grass species present include abundant red fescue, creeping bent and sweet vernal-grass, locally abundant compact rush, occasional Yorkshire fog and cock's foot and rarely occurring meadow foxtail. Herbaceous species present on-site include locally dominant bramble and abundant bird's-foot trefoil. Occasional ribwort plantain, common sorrel, creeping thistle, willowherb and lesser stitchwort. Rarely occurring common mouse-ear, common hogweed, tormentil, meadow buttercup, creeping buttercup, redshank and common ragwort.

5.16.10 Area E is within the location of the historic woodland and is currently an unmanaged tussock grassland with a sward height of 30-60cm. Grass species present on-site include abundant common bent, creeping bent, sweet vernal-grass, red fescue and Yorkshire fog, frequent cock's foot and occasional rough meadow-grass and meadow foxtail. Herbaceous species present on-site include abundant bird's-foot trefoil and frequent lesser stitchwort. Occasional meadow buttercup, bramble, common sorrel and lesser willowherb with rarely occurring common hogweed, rough hawkbit and orange hawkweed *Pilosella aurantiaca*.

Conclusion

5.16.11 In accordance with JNCC criteria (2010), the PE1 site qualifies as a mix of:

- **J1.2 Amenity Grass (Area A)**
- **B4 Improved Grassland (Areas B and C)**
- **B5 Marshy Grassland (Area D)**
- **B2.2 Neutral Grassland Semi Improved (Area E)**

- **A2.2 Scattered Scrub**
- **J2.1 Intact Hedgerow**
- **A3.2 Scattered Trees**

5.16.12 As depicted in Figure 16, in accordance with the UK habitat classification index the grassland habitats present are considered to be:

- **Urban Amenity Grassland** of **Poor** quality (Area A)
- **Modified Grassland** of **Moderate** quality (Areas B and C)
- **Neutral Grassland** of **Moderate** quality (Areas D and E)

5.16.13 The site Pembury PE1 supports grassland of **Low** botanical and **Low** ecological importance in Area A, of **Moderate – Low** botanical and of **Moderate** ecological importance within Areas B and C. grassland of **Moderate** botanical and **Moderate** ecological importance in areas D and E.

Figure 16 – Habitat Assessment Criteria Map (Pembury PE1)



Site Photos (Pembury PE1)





Plate 33 – PE1c viewed from the east



Plate 34 – PE1d viewed from the east



Plate 35 – PE1d viewed from the south



Plate 36 – PE1e viewed from the south

5.17 PEMBURY – PE2

Description

5.17.1 Pembury PE2 lies north of the A21 highway, east of PE1 and south of the village of Pembury, Kent (NGR: TQ627404). The site occupies approximately 5.45 hectares (ha) and is predominantly heavily grazed pasture of amenity land associated with residential curtilage.

Desk Study

5.17.2 Historically the site was set to grassland in 1940, was a mix of top fruit orchards to the east and grassland to the west by 1960 and had reverted back to grassland by 1990. Subject to varying degrees of grazing / management pressure, the site has remained grassland since that time.

5.17.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.17.4 The data study returned 11 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) dryer's greenweed *Genista tinctorial* and corn spurrey, and near threatened (NT) tormentil, wild strawberry, heath speedwell, bitter-vetch, heather, wood-sorrel, and goldenrod.

5.17.5 The soil type has been identified as loamy soils with naturally high groundwater.

Field Survey Results

5.17.6 The site is dominated by heavily grazed pasture that interspersed with hedgerows and an area of scrub. Generic across the site, grass species present within the grazed pasture include abundant red fescue and common bent, frequent sweet vernal-grass and Yorkshire fog, occasional cat's tail and rarely occurring Italian rye, rough meadow-grass and perennial ryegrass. Herbaceous species present include locally abundant bird's-foot trefoil, frequent sheep sorrel and yarrow. Occasional meadow buttercup, creeping buttercup, white clover, creeping thistle and broad-leaved dock. Rarely occurring common daisy, common ragwort, lesser stitchwort, common sorrel, curled dock and knapweed.

5.17.7 Access to the amenity areas was not fully available, but from visual observation it was determined that the botanical suite was typical of that expected in highly maintained lawns.

Conclusion

5.17.8 In accordance with JNCC criteria (2010), the Pembury PE2 site identifies as:

- **B1.2 Neutral Grassland Semi-improved**
- **J1.2 Amenity Grassland**
- **A2.2 Scattered Scrub**
- **J2.1 Intact Hedge**

5.17.9 As depicted in Figure 17, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Neutral Grassland** of **Moderate** quality.
- **Urban Amenity Grassland** of **Poor** quality

5.17.10 The site Pembury PE2 supports grassland of **Moderate – Low** botanical interest and is considered of **Moderate – Low** ecological importance.

Figure 17 – Habitat Assessment Criteria Map (Pembury PE2)



Site Photos (Pembury PE2)



5.18 PEMBURY – PE3

Description

5.18.1 Pembury PE3 lies north of the A21 highway, east of PE2 and south of the village of Pembury, (NGR): TQ632404. The site occupies approximately 4.5 hectares (ha) and is dominated by hay pasture that is intersected centrally by a tree line and scrub.

Desk Study

5.18.2 Historically the site appears to have been set to agricultural use in 1940, with the westernmost half of the site having been set to grass by 1960. The entirety of the site was set to grass by 1990 after which time the practice of hay harvesting has remained since.

5.18.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.18.4 The data study returned 11 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) dryer's greenweed *Genista tinctorial* and corn spurrey, and near threatened (NT) tormentil, wild strawberry, heath speedwell, bitter-vetch, heather, wood-sorrel, and goldenrod.

5.18.5 The soil type has been identified as loamy soils with naturally high groundwater.

Field Survey Results

5.18.6 The site is dominated by a generic hay pasture that had been harvested immediately prior to survey. A central tree line with scrub below results in two distinct parcels both of which support the same species composition. Grass species present on-site include locally dominant perennial rye grass and abundant creeping bent and Yorkshire fog. Frequent cock's foot, sweet vernal-grass and false-oat grass and occasional timothy. Rarely occurring smooth meadow-grass and common couch. Herbaceous species present on-site include occasional common hogweed, meadow buttercup, creeping buttercup and dandelion. Rarely occurring common ragwort and redshank.

Conclusion

5.18.7 In accordance with JNCC criteria (2010), the Pembury PE3 site identifies as:

- **B6 Poor Semi-Improved grassland**

5.18.8 As depicted in Figure 18, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Modified Grassland of Moderate** quality.

5.18.9 The site Pembury PE3 supports grassland of **Low** botanical interest and is considered of **Moderate – Low** ecological importance.

Figure 18 – Habitat Assessment Criteria Map (Pembury PE3)



Site Photos (Pembury PE3)



SANDHURST

5.19 SANDHURST – SA1

Description

5.19.1 The Sandhurst SA1 site is located south of the A261 highway and east of the village of Sandhurst, Kent (NGR: TQ803281). The site occupies approximately 1.1 hectares (ha) and is an area dominated by a generic block of managed grassland.

Desk Study

5.19.2 Historically the site has been set to grassland since 1940.

5.19.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.19.4 The data study returned 2 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include near threatened (NT) ragged-robin *Silene flos-cuculi*.

5.19.5 The soil type has been identified as slightly acid but base-rich loamy and clayey soil.

Field Survey Results

5.19.6 The site is dominated by frequently managed / harvested grassland that is bounded by mature trees and hedgerows. Grass species present include abundant perennial rye grass, frequent cock's foot and false oat-grass. Occasional common bent, sweet vernal- grass, smooth meadow- grass and cat's tail. Herbaceous species present on-site include frequent hedge bindweed, bramble, meadow buttercup, common nettle and creeping thistle. Occasional common hogweed, ribwort plantain, common sorrel and cow parsley with rarely occurring great hairy willowherb *E. hirsutum*, bittersweet *Solanum dulcamara*, buddleia *Buddleia davidii* lords and ladies, common ragwort and great mullein *Verbascum thapsus*.

Conclusion

5.19.7 In accordance with JNCC criteria (2010), the Sandhurst SA1 site identifies as:

- **B6 Poor Semi Improved Grassland.**

5.19.8 As depicted in Figure 19, in accordance with the UK habitat classification index the grassland habitat are considered to be:

- **Modified Grassland of Moderate** quality.

5.19.9 The site Sandhurst SA1 supports grassland of **Low** botanical interest and is considered of **Low – Moderate** ecological importance.

Figure 19 – Habitat Assessment Criteria Map (Sandhurst SA1)



Site Photos (Sandhurst SA1)



SPELDHURST

5.20 SPELDHURST – SP1

Description

5.20.1 Speldhurst SP1 is located to the west of Langton Road and the south of the village of Speldhurst, Kent (NGR: TQ551409). The site occupies approximately 0.72 hectares (ha) and is dominated by unmanaged grassland that is surrounded by hedgerows with trees.

Desk Study

5.20.2 Historically the site has been laid to grass since 1940.

5.20.3 No sites or habitats of conservation importance were recorded within or directly adjacent to the site.

5.20.4 The data study returned 16 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, corn spurrey and chicory *Cichorium intybus*, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, common cow-wheat, heather, bell heather, ragged-robin, wood-sorrel, goldenrod, and common valerian *Valeriana officinalis*.

5.20.5 The soil type has been identified as acidic soil.

Field Survey Results

5.20.6 Subject to frequent management and with a sward height of <10cm, the site is dominated by grassland within which small areas of scrub are encroaching from the boundaries. Grass species present include dominant false oat- grass, abundant sweet vernal and red fescue, locally abundant meadow foxtail, yellow oat grass and common bent, occasional cock's foot and rarely occurring Yorkshire fog. Herbaceous species present on-site include frequent bird's-foot trefoil, red clover, field bindweed and knapweed. Occasional ribwort plantain, meadow buttercup and creeping thistle. Rarely occurring common hogweed, self-heal, bramble, common sorrel, dandelion, common nettle, ox-eye daisy, yarrow and lesser hawkbit.

Conclusion

5.20.7 In accordance with JNCC criteria (2010) the SP1 site identifies as:

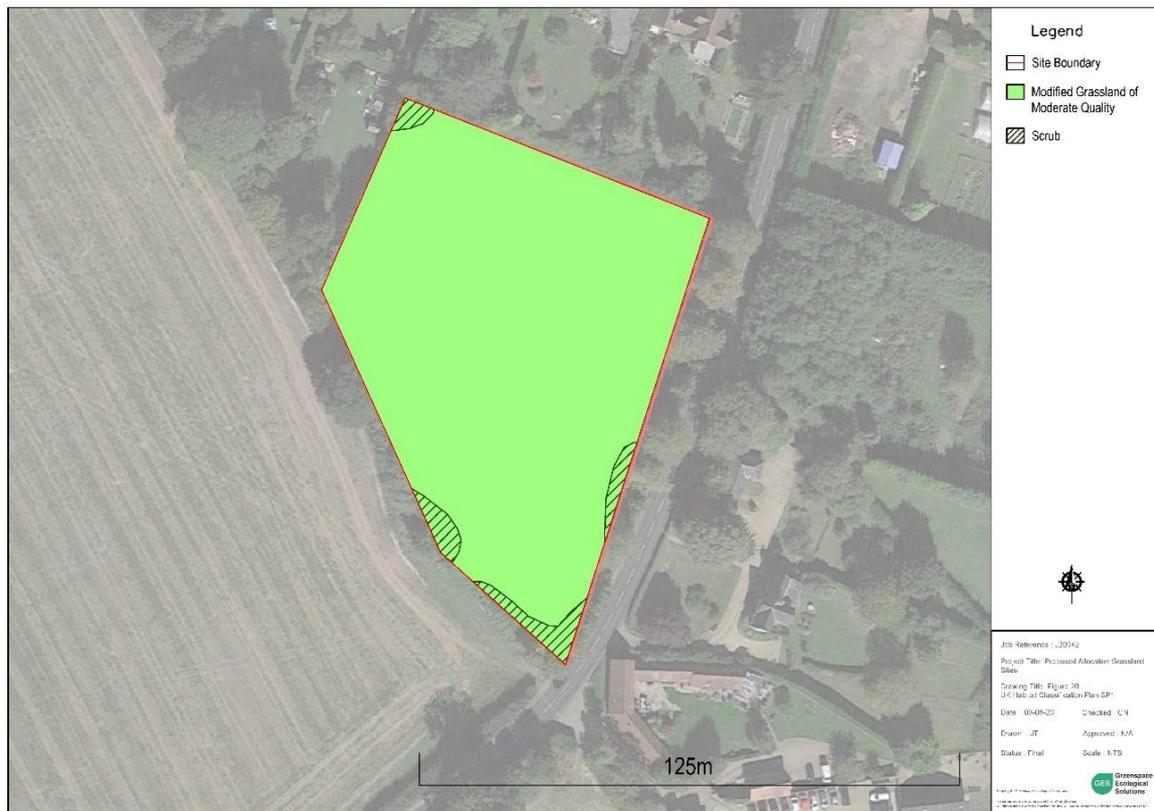
- **B6 Poor Semi-Improved Grassland**
- **A2.2 Scattered Scrub**

5.20.8 As depicted in Figure 20, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Modified Grass of Moderate** quality

5.20.9 The site Speldhurst SP1 supports grassland of **Low** botanical interest and is considered of **Low** ecological importance.

Figure 20 – Habitat Assessment Criteria Map (Speldhurst SP1)



Site Photos (Speldhurst SP1)



Plate 43 – SP1 viewed from the south

Plate 44 – SP1 viewed from the west

TUNBRIDGE WELLS

5.21 TUNBRIDGE WELLS – RTW12

Description

5.21.1 Tunbridge Wells RTW12 is located north of Longfield Road and east of the North Farm Industrial Estate in Tunbridge Wells, (NGR - TQ609426). The site occupies approximately 13.8 hectares (ha) and is predominantly one of grassland, scrub and frequently used tracks. For the purpose of this report the site is divided into three surveys areas, these denoted areas A, B and C.

Desk Study

5.21.2 Historically the northern and southernmost parts of the site appears to have been subject to agricultural practices in 1940, this having ceased by 1990. Used for the purposes of boot fairs and the yearly circus, the southern half of the site has been subject to continued maintained since that time. The northern area appears to have been retained as grassland in varying states of management.

5.21.3 A single parcel of 'deciduous woodland', a habitat listed under s41 of the NERC Act (2006), is located adjacent to site, along the site's eastern boundary.

5.21.4 The data study returned 16 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, dyer's greenweed and heath dog-violet *Viola canina*, and near threatened (NT) tormentil, wild strawberry, heath speedwell, corn mint, bitter-vetch, heather, bell heather, wood-sorrel, goldenrod, devil's-bit scabious, and sanicle.

5.21.5 The soil type has been identified as slightly acid loamy and clayey soil.

Field Survey Results

5.21.6 Area A is located is an area of infrequently managed grassland with areas of tall ruderal and trees, that is located in the south of the site. Grass species present on-site include dominant creeping bent, locally dominant red fescue, abundant common bent and sweet vernal-grass, locally abundant false oat, frequent rough meadow-grass, Yorkshire fog. Rarely occurring cock's-foot, sheep's fescue, perennial rye grass, soft rush, hard rush and cat's tail. Herbaceous species present include abundant bird's foot trefoil and locally abundant fleabane *Pulicaria dysenterica* and St john's wort *Hypericum tetrapterum*. Occasional meadow buttercup, autumn hawkbit *Scorzoneroides autumnalis*, red clover and white clover. Rarely occurring common nettle, bramble, meadow thistle *C. dissectum*, creeping thistle, knapweed, broad-

leaved dock, lesser stitchwort, agrimony *Agrimonia eupatoria*, common ragwort and sheep sorrel.

5.21.7 Area B is located north of Area A and east of the central woodland block. Defined by the presence of a well use track and is notable due to a distinct decrease in management. Grass species present include dominant false oat, abundant common couch and locally abundant cat's tail and meadow foxtail. Occasional sweet vernal grass with rarely occurring creeping bent, cock's foot, Yorkshire fog, perennial rye grass, soft rush, hard rush and Italian rye. Herbaceous species present on-site include locally abundant broad-leaved dock, fleabane and curled dock. Frequent silverweed, creeping thistle and occasional bird's foot trefoil and common vetch. Rarely occurring teasel *Dipsacus fullonum*, yarrow, borage, common nettle, white clover, meadow buttercup and common hogweed.

5.21.8 Area C forms the north west corner of the site and differs from Area in regard to increased management and the dominance of less course grasses and a great frequency of rush and sedge. Grass species present include local dominant common bent, abundant creeping bent and false oat grass. Locally abundant hairy sedge and frequent Yorkshire fog and sweet vernal-grass. Occasional timothy and rarely occurring soft rush, red fescue, cock's-foot, false oat-grass, hairy woodrush *Luzula acuminata*, hard rush, cat's tail, meadow foxtail and meadow barley *Hordeum brachyantherum*. Herbaceous species present on-site include locally abundant silverweed and curled dock, frequent common sorrel, creeping thistle and common ragwort. Occasional common vetch, yarrow, sow thistle, bird's foot-trefoil and tormentil. Rarely occurring ribwort plantain, meadow buttercup, creeping buttercup, red clover, white clover, scarlet pimpernel *Anagallis arvensis*, weld, teasel, fleabane, bristly ox-tongue *Helminthotheca echioides* and square stemmed St John's wort.

Conclusion

5.21.9 In accordance with JNCC criteria (2010), the RTW12 identifies as:

- **B2.2 Neutral Grassland Semi Improved (Area A and C)**
- **B6 Poor Semi-Improved (Area B)**
- **C3.1 Tall Ruderal**
- **J5 Bare Ground**
- **A3.1 Broad Leaved Scattered Trees**

5.21.10 As depicted in Figure 21, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Neutral Grassland** of **Good** quality (Area A and C)
- **Neutral Grassland** of **Poor** quality (Area B)

5.21.11 The site Tunbridge Wells RTW12 supports grassland of **Moderate** botanical interest and is considered of **Moderate** ecological importance.

Figure 21 – Habitat Assessment Criteria Map (Tunbridge Wells RTW12)



Site Photos (Tunbridge Wells RTW12)



5.22 TUNBRIDGE WELLS – RTW13

Description

5.22.1 Tunbridge Wells RTW13 is located east of RTW12 and west of the A21 highway (NGR: TQ611426). The site occupies approximately 7 hectares (ha) all of which lies within the grounds of the associated residential dwelling. The site comprises a mix grassland with varying degrees of management set within a boundary of broad-leaved woodland and trees. For the purpose of this report, the site was divided into three survey areas A- C due to the diverse habitats on-site. Area A is predominately amenity, Area B is predominately unmanaged amenity and Area C is an area of semi-improved grassland is present within site.

Desk Study

5.22.2 Historically the site has been laid to grass since 1940, since which time the boundaries have become established with broad-leaved woodland trees.

5.22.3 The habitat type 'deciduous woodland' listed under s41 of the NERC Act (2006) features within the site and lies adjacent to the northern and southern boundaries of the site.

5.22.4 The data study returned 22 results of botanical species of potential conservation importance recorded within 2km of the site. Species listed under schedule 8 of the Wildlife and Countryside Act 1981 (as amended) include bluebell. Species recorded under the ICUN redlist include endangered (EN) chaffweed and yellow-glandular hawkweed, vulnerable (VU) lesser spearwort, dyer's greenweed, corn spurrey, heath dog-violet and allseed, and near threatened (NT) bird's-nest orchid *Neottia nidus-avis*, tormentil, wild strawberry, heath speedwell, corn mint, bitter-vetch, heath milkwort, heather, bell heather, wood-sorrel, small cudweed *Filago minima*, goldenrod, devil's-bit scabious, and sanicle.

5.22.5 The soil type has been identified as slightly acid but base-rich loamy and clayey soil.

Field Survey Results

5.22.6 The area denoted Area A forms the grass verges of the access track and the formal lawns of the residential dwelling. Frequently mown and with a sward height of <1cm, grass species present on-site include abundant common bent, locally abundant perennial rye grass and frequent Yorkshire fog and red fescue. Herbaceous species present on-site include dominant moss sp., abundant self-heal and frequent creeping buttercup. Occasional bird's foot trefoil, white clover, common ragwort, yarrow and willow herb. Rarely occurring spear thistle, greater plantain, common centaury *Centaureum erythraea*, meadow bedstraw *Galium verum*, curled dock and tormentil.

5.22.7 Area B is a less frequently managed area of formal garden that lies on the north west corner of the Site. With a sward height of <10cm, grass species present on-site include frequent common bent and red fescue, occasional Yorkshire fog and rarely occurring soft rush. Herbaceous species present on-site include locally abundant broad-leaved dock and silverweed. Occasional bird's foot trefoil, common sorrel and curled dock. Rarely occurring creeping buttercup, white clover, common mouse-ear, meadow thistle, foxglove *Digitalis purpurea* and male fern *Dryopteris filix-mas*.

5.22.8 Forming an area of infrequently managed grassland that lies south of the residential haha, Area C creates a parkland like setting of established grassland below mature trees. Grass species present on-site include abundant common bent, sweet vernal-grass and Yorkshire fog. Occasional creeping bent and red fescue and rarely occurring soft rush, perennial rye grass and false oat-grass. Herbaceous species present on-site include locally abundant common nettle and broad-leaved dock, frequent bird's foot-trefoil and creeping buttercup. Occasional tormentil and rarely occurring sheep sorrel, bluebell, meadow bedstraw, meadow thistle, lesser stitchwort and common sorrel.

Conclusion

5.22.9 In accordance with JNCC criteria (2010), the RTW13 site identifies as:

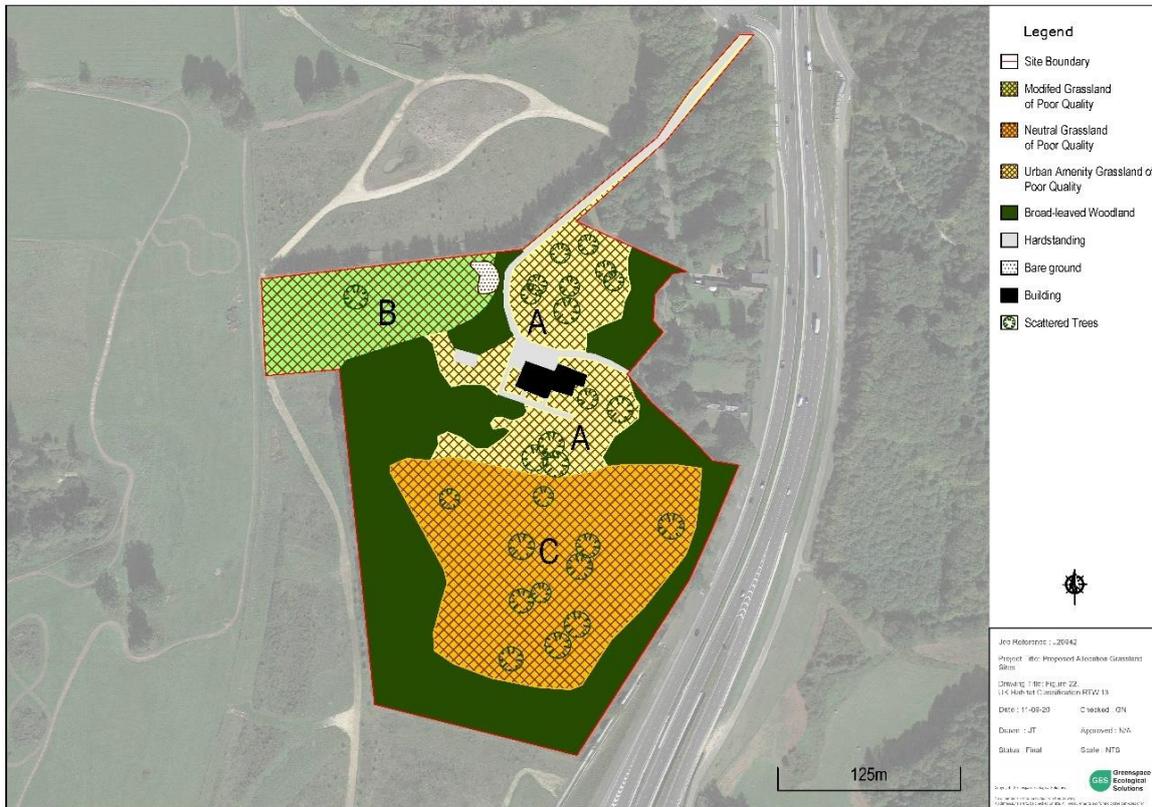
- **J1.2 Amenity Grassland** (Area A)
- **B6 Poor Semi-Improved Grassland** (Area B)
- **B2.2 Neutral Grassland Semi-improved** (Area C)
- **A1.1.1 Broad-leaved Woodland Semi Natural**
- **A3 Scattered Trees**
- **J4 Bare Ground**

5.22.10 As depicted in Figure 22, in accordance with the UK habitat classification index the grassland habitat is considered to be:

- **Urban Amenity Grassland** of **Poor** quality (Area A).
- **Modified Grassland** of **Poor** quality (Area B)
- **Neutral Grassland** of **Poor** quality (Area C)

5.22.11 The site Tunbridge Wells RTW13 supports grassland of both **Low and Moderate** botanical interest and is considered of both **Low and Moderate** ecological importance.

Figure 22 – Habitat Assessment Criteria Map (Tunbridge Wells RTW13)



Site Photos (Tunbridge Wells RTW13)



Plate 47 – RWT13A viewed from the east



Plate 48 – RTW13C viewed from north

6 SUMMARY

6.1 A summary of the findings per site are presented below.

Site	JNCC Habitat	UK Habitat	Importance	
			Botanical	Ecological
BE3	B2.2 Neutral Grassland Semi improved	Neutral Grassland of Moderate Quality	Mod -Low	Mod
BM2	B2.2 Neutral Grassland Semi improved	Neutral Grassland of Moderate Quality	Mod -Low	Mod
CRS1	B2.2 Neutral Grassland Semi improved	Neutral Grassland of Moderate Quality	Mod -Low	Mod
CR4	B2.2 Neutral Grassland Semi improved	Modified Grassland of Moderate Quality	Low	Low - Mod
CRS5	B4 Improved	Urban Amenity of Moderate Quality	Low	Mod - Low
CR6 (East)	J1.2 Amenity	Urban Amenity of Moderate Quality	Low	Low – Mod
	B3.2 Neutral Semi Improved	Modified Grassland of Moderate quality	Low	Low – Mod
	B5 Marshy Grassland	Modified Grassland of Moderate quality	Low	Low - Mod
CR6 (West)	B4 Improved Grassland	Modified Grassland of Poor quality	Mod – Low	Mod
	B3.2 Neutral Grassland Semi-Improved	Neutral Grassland of Moderate quality	Mod - Low	Mod
CR12	B6 Poor Semi-Improved Grassland	Modified Grassland of Poor quality.	Low	Mod - Low

CRS13	B3.2 Neutral Grassland Semi-Improved	Neutral Grassland of Moderate quality	Mod	Mod
CRS15	J1.2 Amenity Grassland	Urban Amenity Grassland of Poor quality	Low	Low
	B4 Improved Grassland	Modified Grassland of Poor quality	Low	Low
CRS17	B2.2 Neutral Grassland Semi-improved (Area A)	Neutral Grassland of Moderate quality (Area A).	Mod – Low	Mod
	J1.2 Amenity Grassland (Area B)	Urban Amenity of Good quality (Area B)	Mod – Low	Mod
HA6	B2.2 Neutral Grassland Semi-Improved	Neutral Grassland of Moderate quality	Mod – Low	Mod - Low
	B6 Poor Semi-Improved Grassland	Modified Grassland of Moderate quality	Low	Mod - Low
	J1.2 Amenity Grassland	Urban Amenity of Poor quality	Low	Mod - Low
HA8	B2.2 Neutral Grassland Semi-Improved	Neutral Grassland of Moderate quality.	Low	Mod
HA9	B4 Improved Grassland	Modified Grassland of Poor quality	Low	Low - Mod
HO2	B4 Improved Grassland	Modified Grassland of Poor quality	Low	Low - Mod
PE1	J1.2 Amenity Grass (Area A)	Urban Amenity Grassland of Poor quality (Area A)	Low (Area A)	Low (Area A)
	B4 Improved Grassland (Areas B and C)	Modified Grassland of Moderate quality (Areas B and C)	Mod – Low (Areas B & C)	Mod (Areas B& C)
	B5 Marshy Grassland (Area D)	Neutral Grassland of Moderate quality (Area D)	Mod (Area D)	Mod (Area D)

	B2.2 Neutral Grassland Semi Improved (Area E)	Neutral Grassland of Moderate quality (Area E)	Mod (Area E)	Mod (Area E)
PE2	B1.2 Neutral Grassland Semi-improved	Neutral Grassland of Moderate quality.	Mod – Low	Mod - Low
	J1.2 Amenity Grassland	Urban Amenity Grassland of Poor quality	Mod – Low	Mod – Low
PE3	B6 Poor Semi-Improved grassland	Modified Grassland of Moderate quality	Low	Low - Mod
SA1	B6 Poor Semi Improved Grassland	Modified Grassland of Moderate quality	Low	Low - Mod
SP1	B6 Poor Semi-Improved Grassland	Modified Grass of Moderate quality	Low	Low
RTW12	B2.2 Neutral Grassland Semi Improved (Area A and C)	Neutral Grassland of Good quality (Area A and C)	Mod (Area A and C)	Mod (Area A and C)
	B6 Poor Semi-Improved (Area B)	Neutral Grassland of Poor quality (Area B)	Mod (Area B)	Mod (Area B)
RTW13	J1.2 Amenity Grassland (Area A)	Urban Amenity Grassland of Poor quality (Area A).	Low (Area A)	Low (Area A)
	B6 Poor Semi-Improved Grassland (Area B)	Modified Grassland of Poor quality (Area B)	Mod – Low (Area B)	Mod (Area B)
	B2.2 Neutral Grassland Semi-improved (Area C)	Neutral Grassland of Poor quality (Area C)	Mod – Low (Area C)	Mod (Area C)

7 CONCLUSION

- 7.1 The sites subject to survey are predominantly areas of historically farmed / managed land which are set either to Amenity, Semi Improved or Improved grassland which support grassland habitats considered of Low to Moderate in their botanical and ecological importance at a local level.
- 7.2 The Marshy Grassland within PE1 differs from the majority, yet historically set to broad-leaved woodland and currently unmanaged, the status of this habitat currently remains Moderate from a botanical perspective. Furthermore, it is suggested that without intervention this habitat will soon revert back to scrub and woodland through the process of natural succession.
- 7.3 No rare botanical species were confirmed within any site. The presence of the Rye Brome which is listed as Vulnerable within the IUCN Red List within the desk study area of Hawkhurst HA6 and identification of an unconfirmed Rye Brome type grass within the site may require further investigation to determine presence / absence. However, as Rye Bromes is a tall grass which may reach a height of 1 metre that is associated with waste ground and arable, it is unlikely to be widespread and was found only rarely. If deemed a requirement, to assist identification it is recommended that any repeat survey be conducted during the growing period of May to July in any given year.
- 7.4 The fruit trees identified within the site Matfield BM2 identify as present since 1940 and together with the associated grassland may conform to Traditional Orchard, a Habitat of Principal Importance (HPI). The assessment of this habitat type is beyond the scope of this assessment. It is recommended that a further survey be undertaken to determine whether the orchards meets the criteria for Traditional Orchard.
- 7.5 With the exception of those noted in sites HA6 and BM2, the habitats recorded are of Low – Moderate quality, with no HPI grassland noted within any site.
- 7.6 None of the habitats identified are irreplaceable and if lost to development proportionate compensation should be sought through use of an appropriate Biodiversity Net Gain calculator
- 7.7 Considered suitable to support terrestrial and avian faunal species of conservation concern, the sites ecological importance is considered to range between Low and Moderate at a local level. Further survey to determine the presence / likely absence of protected species and

species of conservation concern would need to be considered as part of any development proposals..

8 REFERENCES

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9 APPENDICES