

## **B.      Appendix B: Nature Conservation Status Categories (Definitions)**

## Introduction

The up to date status of species of conservation concern have been taken from Pantheon, the web-based analytical package maintained by the national biological records centre and developed by Webb *et al.* (2018) but reference to the various published Species Status Reviews; and the <sup>20</sup>Joint Nature Conservation Committee database of species designations has been undertaken where the author is aware there might be a discrepancy. However, no guarantee is given that this has been entirely comprehensive and reliance has largely been placed on Pantheon's accuracy.

## Great Britain Rarity Status

Nationally Rare (NR) species are those that have been recently reassessed and are roughly equivalent to the old Red Data Book categories. These are defined as occurring in 15 or fewer hectads (10 km Ordnance Survey grid squares) and where there is reasonable confidence that intensive recording effort won't increase the number of hectads above 15.

Nationally Scarce (NS) species are those that are not NR and which have not been recorded in more than 100 hectads, and where there is reasonable confidence that intensive recording effort won't increase the number of hectads above 100.

Where taxa have yet to be reassessed under the Species Status Reviews, they formally retain their status based on historical reviews, which may date back to the late 1980s or early 1990s. These status' should be treated with caution as it is likely a significant proportion are no longer accurate, either due to a better understanding of their ecology, or have subsequently spread due to climate change or other amenable factors (e.g. they are more frequent and no longer deserve a nature conservation status); or they have declined; and may merit upgrading to a threat category.

Nationally Notable - species recorded, or likely to be restricted to 16 - 100 hectads in Britain. Historically, for some better recorded invertebrate taxa, they were further divided between Notable-A (Na) for species thought to occur in 30 or fewer hectads, and Notable-B (Nb) for those thought to occur between 31-100 hectads. These are referred to as Nationally Scarce (Na), or Nationally Scarce (Nb). Within Pantheon, some status' have been placed in square brackets, e.g. [Nationally Scarce (Nb)]. This denotes that in the professional judgement of the specialists (Webb *et al.*, 2018), this status is unreliable, but they have not been formally assessed against up to date criteria. The species are included in the relevant table in this report for the avoidance of doubt.

Red Data Book (RDB) species –species occurring in fewer than 16 10-km squares of the National Grid, divided as:

RDB 1: Endangered - for species known from a single population or in continuous recent decline and now known from five or fewer 10-km squares;

RDB 2: Vulnerable - likely to become endangered (RDB 1) if causal factors continue;

RDB 3: Rare: - species at risk but not qualifying as vulnerable; and

RDB K: Insufficiently Known - species likely to qualify at least as rare.

## UK Biodiversity Action Planning

Species of Principal Importance as listed in Section 41 of the National Environment and Rural Communities Act 2006. These are abbreviated as SoPI. Approximately 70 species of moth have been included in a list which proposes 'for Research only'; a frequently encountered example is the cinnabar (*Tyria jacobaeae*). These are widespread species which are believed to have experienced a decline and have been included to enable funding to be allocated for research. These species have not been included in Table 6.

<sup>20</sup> Joint Nature Conservation Committee, <http://jncc.defra.gov.uk/page-3408>

## UK Legal Protection

Approximately 50 species of invertebrate species in Britain receive legal protection through Schedule 5 of the Wildlife and Countryside Act 1981 (as amended). About half receive limited protection; for example it is illegal to sell, or advertise for sale, a number of butterfly species. The remaining 28 species are more strictly protected, for example it is an offence to take or kill specimens without an appropriate licence. These species are generally extremely rare, restricted to a few, or a single site and none are likely to occur anywhere in the region.

## IUCN Threat Categories

In recent years, invertebrate taxa in Great Britain have been assessed against the International Union for the Conservation of Nature's (IUCN) threat criteria that considers factors influencing a species survival. These include population decline or geographic contraction through habitat loss. These assessments are ongoing as part of the Species Status Reviews, overseen by the Joint Nature Conservation Committee and mostly published by Natural England. The criteria are defined by the IUCN, which places an assessed taxon in one of seven categories from Extinct down to Least Concern, based on one of the five main criteria. The following categories are defined as Threatened (Red List):

**Critically Endangered (CR):** A taxon is Critically Endangered when the best available evidence indicates that it is considered to be facing an extremely high risk of extinction in the wild.

**Endangered (EN):** A taxon is Endangered when the best available evidence indicates that it is considered to be facing a very high risk of extinction in the wild.

**Vulnerable (VU):** A taxon is Vulnerable when the best available evidence indicates that it is considered to be facing a high risk of extinction in the wild.

A further category, Near Threatened (NT), is applied to a taxon, which following assessment, came close to, but failed to qualify as a Threatened species. However, it is considered that if the factors influencing its assessment continue, it is likely to move in to one of the threat categories; and thus it acts as a watching brief.

## C.      **Appendix C: Species Lists**

Table 9: Species recorded within the former Llandarcy Oil Refinery during 2020.

| Class     | Order   | Family      | Taxon                                 | Vernacular | National Status | Records | Northern Sector | Southern Sector |
|-----------|---------|-------------|---------------------------------------|------------|-----------------|---------|-----------------|-----------------|
| Arachnida | Araneae | Theridiidae | <i>Episinus angulatus</i>             |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Theridiidae | <i>Anelosimus vittatus</i>            |            |                 | 4       | x               | x               |
| Arachnida | Araneae | Theridiidae | <i>Phylloneta sisypchia</i>           |            |                 | 4       | x               | x               |
| Arachnida | Araneae | Theridiidae | <i>Theridion varians</i>              |            |                 | 3       | x               |                 |
| Arachnida | Araneae | Theridiidae | <i>Neottiura bimaculata</i>           |            |                 | 2       |                 | x               |
| Arachnida | Araneae | Theridiidae | <i>Paidiscura pallens</i>             |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Theridiidae | <i>Enoplognatha ovata sens. str.</i>  |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Theridiidae | <i>Enoplognatha latimana</i>          |            |                 | 3       | x               | x               |
| Arachnida | Araneae | Theridiidae | <i>Enoplognatha thoracica</i>         |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Walckenaeria atrotibialis</i>      |            |                 | 1       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Hylyphantes graminicola</i>        |            |                 | 3       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Gnathonarium dentatum</i>          |            |                 | 2       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Dismodicus bifrons</i>             |            |                 | 2       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Peponocranium ludicrum</i>         |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Pocadicnemis pumila sens. str.</i> |            |                 | 3       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Pocadicnemis juncea</i>            |            |                 | 1       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Oedothorax fuscus</i>              |            |                 | 7       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Oedothorax retusus</i>             |            |                 | 5       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Pelecopsis parallela</i>           |            |                 | 4       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Cnephalocotes obscurus</i>         |            |                 | 10      | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Troxochrus scabriculus</i>         |            |                 | 1       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Gongylidiellum vivum</i>           |            |                 | 2       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Erigonella hiemalis</i>            |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Savignia frontata</i>              |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Diplocephalus latifrons</i>        |            |                 | 1       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Erigone dentipalpis</i>            |            |                 | 4       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Erigone atra</i>                   |            |                 | 9       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Prinerigone vagans</i>             |            |                 | 2       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Porrhomma pygmaeum</i>             |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Agyneta rurestris</i>              |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Agyneta saxatilis sens. str.</i>   |            |                 | 1       |                 | x               |
| Arachnida | Araneae | Linyphiidae | <i>Agyneta affinis</i>                |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Tenuiphantes tenuis</i>            |            |                 | 6       | x               | x               |
| Arachnida | Araneae | Linyphiidae | <i>Nerienne peltata</i>               |            |                 | 1       | x               |                 |
| Arachnida | Araneae | Linyphiidae | <i>Microlinyphia pusilla</i>          |            |                 | 3       | x               | x               |

| Class     | Order   | Family           | Taxon                                   | Vernacular    | National Status     | Records | Northern Sector | Southern Sector |
|-----------|---------|------------------|-----------------------------------------|---------------|---------------------|---------|-----------------|-----------------|
| Arachnida | Araneae | Tetragnathidae   | <i>Tetragnatha extensa</i>              |               |                     | 3       | x               | x               |
| Arachnida | Araneae | Tetragnathidae   | <i>Tetragnatha montana</i>              |               |                     | 3       | x               |                 |
| Arachnida | Araneae | Tetragnathidae   | <i>Pachygnatha clercki</i>              |               |                     | 1       |                 | x               |
| Arachnida | Araneae | Tetragnathidae   | <i>Pachygnatha degeeri</i>              |               |                     | 3       | x               | x               |
| Arachnida | Araneae | Araneidae        | <i>Gibbaranea gibbosa</i>               |               |                     | 1       |                 | x               |
| Arachnida | Araneae | Araneidae        | <i>Araneus diadematus</i>               | Garden Spider |                     | 2       | x               | x               |
| Arachnida | Araneae | Araneidae        | <i>Araneus quadratus</i>                |               |                     | 2       | x               | x               |
| Arachnida | Araneae | Araneidae        | <i>Larinioides cornutus</i>             |               |                     | 1       |                 | x               |
| Arachnida | Araneae | Araneidae        | <i>Nuctenea umbratica</i>               |               |                     | 1       | x               | x               |
| Arachnida | Araneae | Araneidae        | <i>Agalenatea redii</i>                 |               |                     | 2       | x               | x               |
| Arachnida | Araneae | Araneidae        | <i>Araniella cucurbitina sens. str.</i> |               |                     | 2       | x               |                 |
| Arachnida | Araneae | Lycosidae        | <i>Pardosa pullata</i>                  |               |                     | 6       | x               | x               |
| Arachnida | Araneae | Lycosidae        | <i>Pardosa prativaga</i>                |               |                     | 1       |                 | x               |
| Arachnida | Araneae | Lycosidae        | <i>Pardosa nigriceps</i>                |               |                     | 1       | x               |                 |
| Arachnida | Araneae | Lycosidae        | <i>Pardosa tenuipes</i>                 |               | Nationally Scarce   | 8       | x               | x               |
| Arachnida | Araneae | Lycosidae        | <i>Xerolycosa miniata</i>               |               | Nationally Scarce   | 1       |                 | x               |
| Arachnida | Araneae | Lycosidae        | <i>Trochosa terricola</i>               |               |                     | 2       | x               |                 |
| Arachnida | Araneae | Lycosidae        | <i>Pirata piraticus</i>                 |               |                     | 2       |                 | x               |
| Arachnida | Araneae | Lycosidae        | <i>Piratula latitans</i>                |               |                     | 6       | x               | x               |
| Arachnida | Araneae | Pisauridae       | <i>Pisaura mirabilis</i>                |               |                     | 1       | x               | x               |
| Arachnida | Araneae | Agelenidae       | <i>Agelena labyrinthica</i>             |               |                     | 4       | x               | x               |
| Arachnida | Araneae | Dictynidae       | <i>Argenna subnigra</i>                 |               | Nationally Scarce   | 2       | x               |                 |
| Arachnida | Araneae | Anyphaenidae     | <i>Anyphaena accentuata</i>             |               |                     | 1       | x               |                 |
| Arachnida | Araneae | Phrurolithidae   | <i>Phrurolithus festivus</i>            |               |                     | 3       | x               | x               |
| Arachnida | Araneae | Clubionidae      | <i>Clubiona reclusa</i>                 |               |                     | 1       | x               |                 |
| Arachnida | Araneae | Clubionidae      | <i>Clubiona stagnatilis</i>             |               |                     | 1       |                 | x               |
| Arachnida | Araneae | Clubionidae      | <i>Clubiona neglecta sens. str.</i>     |               |                     | 2       | x               | x               |
| Arachnida | Araneae | Cheiracanthiidae | <i>Cheiracanthium virescens</i>         |               | Nationally Scarce   | 1       | x               | x               |
| Arachnida | Araneae | Zodariidae       | <i>Zodarion fuscum</i>                  |               | VU; Nationally Rare | 1       | x               |                 |
| Arachnida | Araneae | Gnaphosidae      | <i>Drassyllus pusillus</i>              |               |                     | 1       | x               |                 |
| Arachnida | Araneae | Gnaphosidae      | <i>Micaria pulicaria sens. str.</i>     |               |                     | 1       |                 | x               |
| Arachnida | Araneae | Philodromidae    | <i>Philodromus dispar</i>               |               |                     | 1       | x               |                 |
| Arachnida | Araneae | Philodromidae    | <i>Philodromus aureolus</i>             |               |                     | 2       | x               |                 |
| Arachnida | Araneae | Philodromidae    | <i>Philodromus cespitum</i>             |               |                     | 1       | x               |                 |
| Arachnida | Araneae | Thomisidae       | <i>Misumena vatia</i>                   |               |                     | 1       | x               | x               |
| Arachnida | Araneae | Thomisidae       | <i>Xysticus cristatus</i>               |               |                     | 1       | x               |                 |

| Class      | Order            | Family         | Taxon                                   | Vernacular         | National Status   | Records | Northern Sector | Southern Sector |
|------------|------------------|----------------|-----------------------------------------|--------------------|-------------------|---------|-----------------|-----------------|
| Arachnida  | Araneae          | Thomisidae     | <i>Xysticus kochi</i>                   |                    |                   | 2       | x               |                 |
| Arachnida  | Araneae          | Thomisidae     | <i>Xysticus ulmi</i>                    |                    |                   | 1       |                 | x               |
| Arachnida  | Araneae          | Thomisidae     | <i>Ozyptila sanctuaria</i>              |                    |                   | 2       | x               | x               |
| Arachnida  | Araneae          | Salticidae     | <i>Heliophanus cupreus</i>              |                    |                   | 3       | x               | x               |
| Arachnida  | Araneae          | Salticidae     | <i>Heliophanus flavipes</i>             |                    |                   | 8       | x               | x               |
| Arachnida  | Araneae          | Salticidae     | <i>Marpissa nivoyi</i>                  |                    | Nationally Scarce | 2       | x               | x               |
| Arachnida  | Araneae          | Salticidae     | <i>Euophrys frontalis</i>               |                    |                   | 1       |                 | x               |
| Arachnida  | Araneae          | Salticidae     | <i>Talavera aequipes</i>                |                    |                   | 3       | x               |                 |
| Arachnida  | Araneae          | Salticidae     | <i>Synageles venator</i>                |                    | Nationally Scarce | 1       | x               |                 |
| Arachnida  | Opiliones        | Nemastomatidae | <i>Nemastoma bimaculatum</i>            |                    |                   | 1       |                 | x               |
| Arachnida  | Opiliones        | Phalangiidae   | <i>Phalangium opilio</i>                |                    |                   | 6       | x               | x               |
| Arachnida  | Opiliones        | Leiobunidae    | <i>Dicranopalpus ramosus sens. str.</i> |                    |                   | 1       | x               | x               |
| Arachnida  | Opiliones        | Leiobunidae    | <i>Leiobunum rotundum</i>               |                    |                   | 1       | x               |                 |
| Arachnida  | Pseudoscorpiones | Chernetidae    | <i>Dinocheirus panzeri</i>              |                    |                   | 1       | x               | x               |
| Chilopoda  | Lithobiomorpha   | Lithobiidae    | <i>Lithobius forficatus</i>             |                    |                   | 1       | x               |                 |
| Gastropoda | Pulmonata        | Helicidae      | <i>Cornu aspersum</i>                   | Garden Snail       |                   | 1       | x               |                 |
| Insecta    | Coleoptera       | Haliplidae     | <i>Haliphus mucronatus</i>              |                    | Nationally Scarce | 1       | x               | x               |
| Insecta    | Coleoptera       | Dytiscidae     | <i>Agabus bipustulatus</i>              |                    |                   | 1       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Carabus problematicus</i>            |                    |                   | 1       |                 | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Nebria brevicollis</i>               |                    |                   | 1       | x               |                 |
| Insecta    | Coleoptera       | Carabidae      | <i>Nebria salina</i>                    |                    |                   | 2       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Notiophilus biguttatus</i>           |                    |                   | 1       | x               |                 |
| Insecta    | Coleoptera       | Carabidae      | <i>Notiophilus palustris</i>            |                    |                   | 1       |                 | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Notiophilus substriatus</i>          |                    |                   | 5       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Cicindela campestris</i>             | Green Tiger Beetle |                   | 1       |                 | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Trechus quadristriatus</i>           |                    |                   | 2       |                 | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Bembidion lampros</i>                |                    |                   | 2       | x               |                 |
| Insecta    | Coleoptera       | Carabidae      | <i>Bembidion properans</i>              |                    |                   | 1       |                 | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Elaphropus parvulus</i>              |                    | Nationally Scarce | 2       |                 | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Poecilus cupreus</i>                 |                    |                   | 2       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Poecilus versicolor</i>              |                    |                   | 2       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Pterostichus madidus</i>             |                    |                   | 3       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Pterostichus niger</i>               |                    |                   | 3       | x               | x               |
| Insecta    | Coleoptera       | Carabidae      | <i>Pterostichus melanarius</i>          |                    |                   | 1       | x               |                 |
| Insecta    | Coleoptera       | Carabidae      | <i>Abax parallelepipedus</i>            |                    |                   | 1       | x               |                 |
| Insecta    | Coleoptera       | Carabidae      | <i>Olisthopus rotundatus</i>            |                    |                   | 7       | x               | x               |

| Class   | Order      | Family        | Taxon                            | Vernacular | National Status | Records | Northern Sector | Southern Sector |
|---------|------------|---------------|----------------------------------|------------|-----------------|---------|-----------------|-----------------|
| Insecta | Coleoptera | Carabidae     | <i>Anchomenus dorsalis</i>       |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Agonum muelleri</i>           |            |                 | 1       | x               |                 |
| Insecta | Coleoptera | Carabidae     | <i>Amara plebeja</i>             |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Amara aenea</i>               |            |                 | 1       | x               |                 |
| Insecta | Coleoptera | Carabidae     | <i>Amara similata</i>            |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Amara tibialis</i>            |            |                 | 1       | x               |                 |
| Insecta | Coleoptera | Carabidae     | <i>Harpalus affinis</i>          |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Harpalus rubripes</i>         |            |                 | 2       | x               | x               |
| Insecta | Coleoptera | Carabidae     | <i>Harpalus rufipes</i>          |            |                 | 2       | x               |                 |
| Insecta | Coleoptera | Carabidae     | <i>Ophonus puncticeps</i>        |            |                 | 1       | x               | x               |
| Insecta | Coleoptera | Carabidae     | <i>Anisodactylus binotatus</i>   |            |                 | 2       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Stenolophus mixtus</i>        |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Acupalpus dubius</i>          |            |                 | 2       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Acupalpus parvulus</i>        |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Carabidae     | <i>Paradromius linearis</i>      |            |                 | 2       | x               | x               |
| Insecta | Coleoptera | Carabidae     | <i>Syntomus foveatus</i>         |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Helophoridae  | <i>Helophorus aequalis</i>       |            |                 | 1       | x               | x               |
| Insecta | Coleoptera | Hydrophilidae | <i>Anacaena lutescens</i>        |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Hydrophilidae | <i>Sphaeridium scarabaeoides</i> |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Hydrophilidae | <i>Megasternum concinnum</i>     |            |                 | 1       | x               |                 |
| Insecta | Coleoptera | Silphidae     | <i>Silpha atrata</i>             |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Metopsia clypeata</i>         |            |                 | 2       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Sepedophilus nigripennis</i>  |            |                 | 2       | x               | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Tachyporus dispar</i>         |            |                 | 5       | x               | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Tachyporus nitidulus</i>      |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Tachyporus solutus</i>        |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Aloconota gregaria</i>        |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Philhygra volans</i>          |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Mocyta fungi agg.</i>         |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Drusilla canaliculata</i>     |            |                 | 1       | x               |                 |
| Insecta | Coleoptera | Staphylinidae | <i>Cypha longicornis</i>         |            |                 | 4       | x               | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Carpelimus corticinus</i>     |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Stenus clavicornis</i>        |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Stenus juno</i>               |            |                 | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Stenus brunnipes</i>          |            |                 | 4       | x               | x               |
| Insecta | Coleoptera | Staphylinidae | <i>Stenus fulvicornis</i>        |            |                 | 1       |                 | x               |

| Class   | Order      | Family         | Taxon                                | Vernacular          | National Status        | Records | Northern Sector | Southern Sector |
|---------|------------|----------------|--------------------------------------|---------------------|------------------------|---------|-----------------|-----------------|
| Insecta | Coleoptera | Staphylinidae  | <i>Stenus flavipes</i>               |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Stenus nitidiusculus</i>          |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Stenus aceris</i>                 |                     |                        | 3       | x               | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Stenus ossium</i>                 |                     |                        | 12      | x               | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Paederus fuscipes</i>             |                     | Nationally Scarce (Nb) | 2       | x               | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Staphylinus dimidiaticornis</i>   |                     |                        | 2       | x               | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Ocypus olens</i>                  | Devil's Coach-horse |                        | 1       | x               |                 |
| Insecta | Coleoptera | Staphylinidae  | <i>Quedius levicollis</i>            |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Staphylinidae  | <i>Quedius persimilis</i>            |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Staphylinidae  | <i>Quedius schatzmayri</i>           |                     |                        | 2       | x               | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Quedius semiobscurus</i>          |                     |                        | 4       | x               | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Gyrophypnus wagneri</i>           |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Staphylinidae  | <i>Xantholinus longiventris</i>      |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Scirtidae      | <i>Cyphon coarctatus</i>             |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Scirtidae      | <i>Cyphon padi</i>                   |                     |                        | 2       | x               | x               |
| Insecta | Coleoptera | Byrrhidae      | <i>Cytilus sericeus</i>              |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Elateridae     | <i>Agrypnus murinus</i>              |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Elateridae     | <i>Athous haemorrhoidalis</i>        |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Elateridae     | <i>Agriotes lineatus</i>             |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Elateridae     | <i>Agriotes pallidulus</i>           |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Elateridae     | <i>Melanotus villosus sens. str.</i> |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Elateridae     | <i>Zoroachros minimus</i>            |                     |                        | 2       |                 | x               |
| Insecta | Coleoptera | Cantharidae    | <i>Cantharis cryptica</i>            |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Cantharidae    | <i>Cantharis decipiens</i>           |                     |                        | 2       | x               | x               |
| Insecta | Coleoptera | Cantharidae    | <i>Cantharis flavilabris</i>         |                     |                        | 1       |                 | x               |
| Insecta | Coleoptera | Cantharidae    | <i>Rhagonycha limbata</i>            |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Cantharidae    | <i>Rhagonycha fulva</i>              |                     |                        | 1       | x               | x               |
| Insecta | Coleoptera | Malachiidae    | <i>Anthocomus rufus</i>              |                     |                        | 1       | x               | x               |
| Insecta | Coleoptera | Nitidulidae    | <i>Meligethes carinulatus</i>        |                     |                        | 2       | x               | x               |
| Insecta | Coleoptera | Nitidulidae    | <i>Meligethes fulvipes</i>           |                     | Nationally Scarce      | 1       | x               |                 |
| Insecta | Coleoptera | Nitidulidae    | <i>Meligethes rotundicollis</i>      |                     | Nationally Scarce      | 1       |                 | x               |
| Insecta | Coleoptera | Phalacridae    | <i>Olibrus aeneus</i>                |                     |                        | 1       | x               |                 |
| Insecta | Coleoptera | Phalacridae    | <i>Olibrus liquidus</i>              |                     |                        | 6       | x               | x               |
| Insecta | Coleoptera | Cryptophagidae | <i>Micrambe ulicis</i>               |                     |                        | 2       | x               | x               |
| Insecta | Coleoptera | Coccinellidae  | <i>Rhyzobius litura</i>              |                     |                        | 8       | x               | x               |
| Insecta | Coleoptera | Coccinellidae  | <i>Coccidula rufa</i>                |                     |                        | 1       |                 | x               |

| Class   | Order      | Family        | Taxon                                 | Vernacular               | National Status          | Records | Northern Sector | Southern Sector |
|---------|------------|---------------|---------------------------------------|--------------------------|--------------------------|---------|-----------------|-----------------|
| Insecta | Coleoptera | Coccinellidae | <i>Nephus redtenbacheri</i>           |                          |                          | 4       | x               | x               |
| Insecta | Coleoptera | Coccinellidae | <i>Propylea quattuordecimpunctata</i> | 14-spot Ladybird         |                          | 1       | x               |                 |
| Insecta | Coleoptera | Coccinellidae | <i>Harmonia axyridis</i>              | Harlequin Ladybird       |                          | 1       | x               | x               |
| Insecta | Coleoptera | Coccinellidae | <i>Coccinella septempunctata</i>      | 7-spot Ladybird          |                          | 5       | x               | x               |
| Insecta | Coleoptera | Latridiidae   | <i>Corticarina minuta</i>             |                          |                          | 4       | x               | x               |
| Insecta | Coleoptera | Latridiidae   | <i>Corticara gibbosa</i>              |                          |                          | 5       | x               | x               |
| Insecta | Coleoptera | Tenebrionidae | <i>Lagria hirta</i>                   |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Oedemeridae   | <i>Oedemera nobilis</i>               | Swollen-thighed Beetle   |                          | 4       | x               | x               |
| Insecta | Coleoptera | Oedemeridae   | <i>Oedemera lurida</i>                |                          |                          | 5       | x               | x               |
| Insecta | Coleoptera | Scraptiidae   | <i>Anaspis frontalis</i>              |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Scraptiidae   | <i>Anaspis garneysi</i>               |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Cerambycidae  | <i>Grammoptera ruficornis</i>         |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Bruchidius villosus</i>            |                          |                          | 2       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Bruchus loti</i>                   |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Chrysolina hyperici</i>            |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Hydrothassa glabra</i>             |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Chrysomelidae | <i>Longitarsus melanocephalus</i>     |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Chrysomelidae | <i>Longitarsus pratensis</i>          |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Neocrepidodera transversa</i>      |                          |                          | 4       | x               | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Chaetocnema hortensis</i>          |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Sphaeroderma rubidum</i>           |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Chrysomelidae | <i>Sphaeroderma testaceum</i>         |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Chrysomelidae | <i>Cryptocephalus pusillus</i>        |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Apionidae     | <i>Exapion ulicis</i>                 | Gorse Weevil             |                          | 7       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Protapion apricans</i>             |                          |                          | 5       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Protapion assimile</i>             |                          |                          | 2       |                 | x               |
| Insecta | Coleoptera | Apionidae     | <i>Protapion filirostre</i>           |                          | Nationally Scarce (Nb)   | 1       |                 | x               |
| Insecta | Coleoptera | Apionidae     | <i>Protapion fulvipes</i>             | White Clover Seed Weevil |                          | 8       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Protapion nigritarse</i>           |                          |                          | 5       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Protapion trifolii</i>             |                          |                          | 4       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Apion frumentarium</i>             |                          |                          | 1       | x               |                 |
| Insecta | Coleoptera | Apionidae     | <i>Catapion pubescens</i>             |                          | [Nationally Scarce (Nb)] | 2       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Stenopterapion melliloti</i>       |                          |                          | 1       |                 | x               |
| Insecta | Coleoptera | Apionidae     | <i>Ischnopterapion loti</i>           |                          |                          | 5       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Holotrichapion pisi</i>            |                          |                          | 2       |                 | x               |
| Insecta | Coleoptera | Apionidae     | <i>Oxystoma cerdo</i>                 |                          | [Nationally Scarce (Nb)] | 1       | x               |                 |

| Class   | Order      | Family        | Taxon                              | Vernacular         | National Status          | Records | Northern Sector | Southern Sector |
|---------|------------|---------------|------------------------------------|--------------------|--------------------------|---------|-----------------|-----------------|
| Insecta | Coleoptera | Apionidae     | <i>Oxystoma pomonae</i>            |                    |                          | 4       | x               | x               |
| Insecta | Coleoptera | Apionidae     | <i>Eutrichapion ervi</i>           |                    |                          | 1       |                 | x               |
| Insecta | Coleoptera | Erihniidae    | <i>Grypus equiseti</i>             | Horsetail Weevil   | [Nationally Scarce (Nb)] | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Otiorhynchus singularis</i>     | Raspberry Weevil   |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Polydrusus cervinus</i>         |                    |                          | 3       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Polydrusus formosus</i>         |                    | [Nationally Scarce (Na)] | 1       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Polydrusus pterygomalis</i>     |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Coelositona cambricus</i>       |                    |                          | 4       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona cylindricollis</i>       |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Sitona hispidulus</i>           |                    |                          | 5       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona humeralis</i>            |                    |                          | 3       |                 | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona lepidus</i>              |                    |                          | 3       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona lineatus</i>             |                    |                          | 4       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona puncticollis</i>         |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Andrion regensteinese</i>       |                    |                          | 2       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona striatellus</i>          |                    |                          | 4       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona sulcifrons</i>           |                    |                          | 2       |                 | x               |
| Insecta | Coleoptera | Curculionidae | <i>Sitona waterhousei</i>          |                    | Nationally Scarce (Nb)   | 1       |                 | x               |
| Insecta | Coleoptera | Curculionidae | <i>Hypera meles</i>                |                    | [Nationally Scarce (Na)] | 2       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Hypera plantaginis</i>          |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Hypera postica</i>              | Clover Leaf Weevil |                          | 3       |                 | x               |
| Insecta | Coleoptera | Curculionidae | <i>Hypera venusta</i>              |                    |                          | 2       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Dorytomus taeniatas</i>         |                    |                          | 2       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Glocianus distinctus</i>        |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Trichosirocalus troglodytes</i> |                    |                          | 1       |                 | x               |
| Insecta | Coleoptera | Curculionidae | <i>Archarius pyrrhoceras</i>       |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Tychius meliloti</i>            |                    |                          | 1       | x               |                 |
| Insecta | Coleoptera | Curculionidae | <i>Tychius picirostris</i>         |                    |                          | 3       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Mecinus pascuorum</i>           |                    |                          | 6       | x               | x               |
| Insecta | Coleoptera | Curculionidae | <i>Orchestes signifer</i>          |                    |                          | 1       | x               |                 |
| Insecta | Dermaptera | Forficulidae  | <i>Forficula auricularia</i>       | Common Earwig      |                          | 1       | x               | x               |
| Insecta | Diptera    | Tabanidae     | <i>Chrysops relictus</i>           |                    |                          | 1       | x               |                 |
| Insecta | Diptera    | Stratiomyidae | <i>Nemotelus notatus</i>           |                    |                          | 1       | x               |                 |
| Insecta | Diptera    | Stratiomyidae | <i>Oxycera trilineata</i>          |                    |                          | 1       | x               |                 |
| Insecta | Diptera    | Bombyliidae   | <i>Bombylius canescens</i>         |                    | Nationally Scarce        | 1       | x               | x               |
| Insecta | Diptera    | Empididae     | <i>Empis nuntia</i>                |                    |                          | 1       | x               |                 |

| Class   | Order   | Family          | Taxon                                   | Vernacular           | National Status | Records | Northern Sector | Southern Sector |
|---------|---------|-----------------|-----------------------------------------|----------------------|-----------------|---------|-----------------|-----------------|
| Insecta | Diptera | Empididae       | <i>Empis tessellata</i>                 |                      |                 | 2       |                 | x               |
| Insecta | Diptera | Dolichopodidae  | <i>Dolichopus griseipennis</i>          |                      |                 | 1       | x               | x               |
| Insecta | Diptera | Dolichopodidae  | <i>Tachytrechus insignis</i>            |                      |                 | 1       |                 | x               |
| Insecta | Diptera | Dolichopodidae  | <i>Syntormon pallipes</i>               |                      |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Melanostoma mellinum</i>             | a hoverfly           |                 | 2       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Melanostoma scalare</i>              | a hoverfly           |                 | 2       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Platycheirus albimanus</i>           | a hoverfly           |                 | 1       | x               |                 |
| Insecta | Diptera | Syrphidae       | <i>Platycheirus angustatus</i>          | a hoverfly           |                 | 1       | x               |                 |
| Insecta | Diptera | Syrphidae       | <i>Platycheirus clypeatus</i>           | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Platycheirus scutatus sens. str.</i> | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Chrysotoxum festivum</i>             | a hoverfly           |                 | 2       | x               |                 |
| Insecta | Diptera | Syrphidae       | <i>Episyrphus balteatus</i>             | a hoverfly           |                 | 3       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Scaeva pyrastris</i>                 | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Sphaerophoria interrupta</i>         | a hoverfly           |                 | 1       | x               |                 |
| Insecta | Diptera | Syrphidae       | <i>Sphaerophoria scripta</i>            | a hoverfly           |                 | 2       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Xanthogramma pedissequum</i>         | a hoverfly           |                 | 1       | x               |                 |
| Insecta | Diptera | Syrphidae       | <i>Cheilosia impressa</i>               | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Cheilosia pagana</i>                 | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Cheilosia proxima</i>                | a hoverfly           |                 | 1       | x               |                 |
| Insecta | Diptera | Syrphidae       | <i>Cheilosia scutellata</i>             | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Sphegina sibirica</i>                | a hoverfly           |                 | 1       |                 | x               |
| Insecta | Diptera | Syrphidae       | <i>Eristalis arbustorum</i>             | a hoverfly           |                 | 4       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Eristalis pertinax</i>               | a hoverfly           |                 | 2       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Eristalis tenax</i>                  | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Myathropa florea</i>                 | a hoverfly           |                 | 1       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Volucella bombylans</i>              | a hoverfly           |                 | 2       | x               | x               |
| Insecta | Diptera | Syrphidae       | <i>Syritta pipiens</i>                  | a hoverfly           |                 | 2       | x               |                 |
| Insecta | Diptera | Micropezidae    | <i>Micropeza corrigiolata</i>           |                      |                 | 1       |                 | x               |
| Insecta | Diptera | Conopidae       | <i>Conops quadrifasciata</i>            |                      |                 | 1       | x               |                 |
| Insecta | Diptera | Conopidae       | <i>Physocephala rufipes</i>             |                      |                 | 2       | x               |                 |
| Insecta | Diptera | Conopidae       | <i>Thecophora atra</i>                  |                      |                 | 1       | x               | x               |
| Insecta | Diptera | Neottiophilidae | <i>Neottiophilum praeustum</i>          |                      |                 | 1       |                 | x               |
| Insecta | Diptera | Platystomatidae | <i>Rivellia syngenesiae</i>             | a picture-winged fly |                 | 2       |                 | x               |
| Insecta | Diptera | Tephritidae     | <i>Tephritis matricariae</i>            |                      |                 | 4       | x               | x               |
| Insecta | Diptera | Tephritidae     | <i>Tephritis neesii</i>                 |                      |                 | 2       |                 | x               |
| Insecta | Diptera | Tephritidae     | <i>Terellia ruficauda</i>               |                      |                 | 1       |                 | x               |

| Class   | Order   | Family        | Taxon                                | Vernacular | National Status   | Records | Northern Sector | Southern Sector |
|---------|---------|---------------|--------------------------------------|------------|-------------------|---------|-----------------|-----------------|
| Insecta | Diptera | Tephritidae   | <i>Euleia heraclei</i>               |            |                   | 1       |                 | x               |
| Insecta | Diptera | Lauxaniidae   | <i>Pseudolyciella pallidiventris</i> |            |                   | 1       |                 | x               |
| Insecta | Diptera | Lauxaniidae   | <i>Minettia fasciata (=rivosa)</i>   |            |                   | 2       | x               |                 |
| Insecta | Diptera | Lauxaniidae   | <i>Sapromyza quadripunctata</i>      |            |                   | 2       | x               |                 |
| Insecta | Diptera | Chamaemyiidae | <i>Chamaemyia aridella</i>           |            |                   | 1       |                 | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Pherbellia cinerella</i>          |            |                   | 4       | x               | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Dictya umbrarum</i>               |            | Nationally Scarce | 1       | x               | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Elgiva sollicita</i>              |            |                   | 1       | x               | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Hydromya dorsalis</i>             |            |                   | 1       | x               | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Ilione albiseta</i>               |            |                   | 1       |                 | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Pherbina coryleti</i>             |            |                   | 1       | x               | x               |
| Insecta | Diptera | Sciomyzidae   | <i>Tetanocera punctifrons</i>        |            | Nationally Scarce | 1       | x               | x               |
| Insecta | Diptera | Sepsidae      | <i>Nemopoda nitidula</i>             |            |                   | 1       |                 | x               |
| Insecta | Diptera | Sepsidae      | <i>Sepsis cynipsea</i>               |            |                   | 1       | x               |                 |
| Insecta | Diptera | Opomyzidae    | <i>Opomyza germinationis</i>         |            |                   | 1       | x               | x               |
| Insecta | Diptera | Opomyzidae    | <i>Opomyza petrei</i>                |            |                   | 1       |                 | x               |
| Insecta | Diptera | Ephydriidae   | <i>Hydrellia griseola</i>            |            |                   | 1       | x               | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Anthomyia liturata</i>            |            |                   | 3       | x               | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Anthomyia procellaris</i>         |            |                   | 1       |                 | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Botanophila striolata</i>         |            |                   | 2       | x               | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Hylemya urbica</i>                |            |                   | 2       | x               | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Hylemya vagans</i>                |            |                   | 1       |                 | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Delia platura</i>                 |            |                   | 1       |                 | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Hydrophoria ruralis</i>           |            |                   | 1       |                 | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Pegoplata aestiva</i>             |            |                   | 2       | x               | x               |
| Insecta | Diptera | Anthomyiidae  | <i>Paradelia intersecta</i>          |            |                   | 1       |                 | x               |
| Insecta | Diptera | Fanniidae     | <i>Fannia corvina</i>                |            |                   | 1       | x               |                 |
| Insecta | Diptera | Fanniidae     | <i>Fannia fuscula</i>                |            |                   | 1       | x               |                 |
| Insecta | Diptera | Fanniidae     | <i>Fannia sociella</i>               |            |                   | 1       | x               | x               |
| Insecta | Diptera | Muscidae      | <i>Schoenomyza litorella</i>         |            |                   | 1       | x               | x               |
| Insecta | Diptera | Muscidae      | <i>Limnophora maculosa</i>           |            |                   | 1       | x               | x               |
| Insecta | Diptera | Muscidae      | <i>Lispe pygmaea</i>                 |            |                   | 1       |                 | x               |
| Insecta | Diptera | Muscidae      | <i>Morellia aenescens</i>            |            |                   | 2       | x               | x               |
| Insecta | Diptera | Muscidae      | <i>Musca autumnalis</i>              |            |                   | 3       | x               | x               |
| Insecta | Diptera | Muscidae      | <i>Neomyia cornicina</i>             |            |                   | 1       | x               | x               |
| Insecta | Diptera | Muscidae      | <i>Graphomya maculata</i>            |            |                   | 1       | x               |                 |

| Class   | Order                      | Family        | Taxon                             | Vernacular | National Status | Records | Northern Sector | Southern Sector |
|---------|----------------------------|---------------|-----------------------------------|------------|-----------------|---------|-----------------|-----------------|
| Insecta | Diptera                    | Muscidae      | <i>Helina depuncta</i>            |            |                 | 1       | x               | x               |
| Insecta | Diptera                    | Muscidae      | <i>Helina impuncta</i>            |            |                 | 1       | x               | x               |
| Insecta | Diptera                    | Muscidae      | <i>Helina lasiophthalma</i>       |            |                 | 1       | x               | x               |
| Insecta | Diptera                    | Muscidae      | <i>Helina reversio</i>            |            |                 | 5       | x               | x               |
| Insecta | Diptera                    | Muscidae      | <i>Phaonia incana</i>             |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Muscidae      | <i>Phaonia tuguriorum</i>         |            |                 | 2       | x               | x               |
| Insecta | Diptera                    | Calliphoridae | <i>Bellardia viarum</i>           |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Calliphoridae | <i>Calliphora vicina</i>          |            |                 | 1       |                 | x               |
| Insecta | Diptera                    | Calliphoridae | <i>Lucilia sericata</i>           |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Polleniidae   | <i>Pollenia angustigena</i>       |            |                 | 2       | x               | x               |
| Insecta | Diptera                    | Polleniidae   | <i>Pollenia rudis</i>             |            |                 | 3       | x               |                 |
| Insecta | Diptera                    | Polleniidae   | <i>Pollenia viatica</i>           |            |                 | 1       | x               | x               |
| Insecta | Diptera                    | Rhinophoridae | <i>Rhinophora lepida</i>          |            |                 | 3       | x               | x               |
| Insecta | Diptera                    | Sarcophagidae | <i>Ravinia pernix</i>             |            |                 | 1       |                 | x               |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga pumila</i>          |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga filia</i>           |            |                 | 3       | x               | x               |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga haemorrhoea</i>     |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga anaces</i>          |            |                 | 2       | x               | x               |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga nigriventris</i>    |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga carnaria</i>        |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Sarcophagidae | <i>Sarcophaga variegata</i>       |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Tachinidae    | <i>Eriothrix rufomaculata</i>     |            |                 | 1       |                 | x               |
| Insecta | Diptera                    | Tachinidae    | <i>Exorista rustica</i>           |            |                 | 1       |                 | x               |
| Insecta | Diptera                    | Tachinidae    | <i>Phasia hemiptera</i>           |            |                 | 2       | x               | x               |
| Insecta | Diptera                    | Tachinidae    | <i>Phasia obesa</i>               |            |                 | 1       | x               |                 |
| Insecta | Diptera                    | Tachinidae    | <i>Linnaemya picta</i>            |            |                 | 1       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Aphrophoridae | <i>Philaenus spumarius</i>        |            |                 | 6       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Aphrophoridae | <i>Neophilaenus campestris</i>    |            |                 | 3       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Aphrophoridae | <i>Neophilaenus lineatus</i>      |            |                 | 2       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Megophthalmus scabripennis</i> |            |                 | 1       |                 | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Megophthalmus scanicus</i>     |            |                 | 2       |                 | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Cicadella viridis</i>          |            |                 | 3       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Idiocerus lituratus</i>        |            |                 | 3       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Anoscopus albifrons</i>        |            |                 | 3       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Aphrodes bicinctus</i>         |            |                 | 5       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae  | <i>Adarrus ocellaris</i>          |            |                 | 1       |                 | x               |

| Class   | Order                      | Family           | Taxon                             | Vernacular               | National Status        | Records | Northern Sector | Southern Sector |
|---------|----------------------------|------------------|-----------------------------------|--------------------------|------------------------|---------|-----------------|-----------------|
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae     | <i>Arthaldeus pascuellus</i>      |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae     | <i>Psammotettix confinis</i>      |                          |                        | 2       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae     | <i>Euscelis incisus</i>           |                          |                        | 2       |                 | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Cicadellidae     | <i>Macrosteles horvathi</i>       |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Delphacidae      | <i>Conomelus anceps</i>           |                          |                        | 2       | x               | x               |
| Insecta | Hemiptera, Auchenorrhyncha | Delphacidae      | <i>Muellerianella fairmairei</i>  |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Acanthosomatidae | <i>Acanthosoma haemorrhoidale</i> | Hawthorn Shieldbug       |                        | 1       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Scutelleridae    | <i>Eurygaster testudinaria</i>    | Tortoise Shieldbug       |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera     | Pentatomidae     | <i>Aelia acuminata</i>            | Bishop's Mitre Shieldbug |                        | 2       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Pentatomidae     | <i>Dolycoris baccarum</i>         | Hairy Shieldbug          |                        | 5       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Pentatomidae     | <i>Palomena prasina</i>           | Common Green Shieldbug   |                        | 3       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Pentatomidae     | <i>Pentatoma rufipes</i>          | Red-legged Shieldbug     |                        | 1       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Pentatomidae     | <i>Piezodorus lituratus</i>       | Gorse Shieldbug          |                        | 3       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Coreidae         | <i>Coriomeris denticulatus</i>    | Denticulate Leatherbug   |                        | 3       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Rhopalidae       | <i>Chorosoma schillingii</i>      |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Cymus claviculus</i>           |                          |                        | 2       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Cymus melanocephalus</i>       |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Drymus pilicornis</i>          |                          | Nationally Scarce (Nb) | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Drymus sylvaticus</i>          |                          |                        | 4       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Nysius huttoni</i>             |                          |                        | 4       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Peritrechus geniculatus</i>    |                          |                        | 3       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Plinthisus brevipennis</i>     |                          |                        | 2       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Scolopostethus puberulus</i>   |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Scolopostethus thomsoni</i>    |                          |                        | 2       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Lygaeidae        | <i>Stygnocoris sabulosus</i>      |                          |                        | 6       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Berytidae        | <i>Berytinus minor</i>            |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Tingidae         | <i>Acalypta parvula</i>           |                          |                        | 2       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Nabidae          | <i>Himacerus apterus</i>          |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera     | Nabidae          | <i>Himacerus major</i>            |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Anthocoridae     | <i>Anthocoris confusus</i>        |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera     | Miridae          | <i>Adelphocoris lineolatus</i>    |                          |                        | 3       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Miridae          | <i>Atractotomus mali</i>          |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera     | Miridae          | <i>Calocoris roseomaculatus</i>   |                          |                        | 3       | x               | x               |
| Insecta | Hemiptera, Heteroptera     | Miridae          | <i>Campyloneura virgula</i>       |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera     | Miridae          | <i>Closterotomus norwegicus</i>   |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera     | Miridae          | <i>Heterocordylus tibialis</i>    |                          |                        | 3       |                 | x               |

| Class   | Order                  | Family         | Taxon                             | Vernacular               | National Status        | Records | Northern Sector | Southern Sector |
|---------|------------------------|----------------|-----------------------------------|--------------------------|------------------------|---------|-----------------|-----------------|
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Leptopterna ferrugata</i>      |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Lopus decolor</i>              |                          |                        | 2       | x               | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Lygus rugulipennis</i>         |                          |                        | 1       | x               | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Orthops campestris</i>         |                          |                        | 2       | x               |                 |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Phytocoris varipes</i>         |                          |                        | 3       | x               | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Pithanus maerkelii</i>         |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Plagiognathus chrysanthemi</i> |                          |                        | 8       | x               | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Stenodema calcarata</i>        |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Stenodema laevigata</i>        |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Stenotus binotatus</i>         |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Trigonotylus caelestialium</i> |                          |                        | 1       | x               |                 |
| Insecta | Hemiptera, Heteroptera | Miridae        | <i>Trigonotylus ruficornis</i>    |                          |                        | 1       |                 | x               |
| Insecta | Hemiptera, Heteroptera | Saldidae       | <i>Saldula saltatoria</i>         |                          |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Argidae        | <i>Arge berberidis</i>            | Berberis sawfly          |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Tenthredinidae | <i>Athalia rosae</i>              | a sawfly                 |                        | 2       | x               | x               |
| Insecta | Hymenoptera            | Tenthredinidae | <i>Tenthredo temula</i>           | a sawfly                 |                        | 1       |                 | x               |
| Insecta | Hymenoptera            | Cynipidae      | <i>Biorhiza pallida</i>           | Gall causer              |                        | 1       | x               | x               |
| Insecta | Hymenoptera            | Crabronidae    | <i>Crossocerus dimidiatus</i>     | Blunt Tailed Digger Wasp |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Crabronidae    | <i>Ectemnius continuus</i>        | a digger wasp            |                        | 3       | x               | x               |
| Insecta | Hymenoptera            | Crabronidae    | <i>Lindenius albilabris</i>       | a digger wasp            |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Crabronidae    | <i>Tachysphex pompiliiformis</i>  | a digger wasp            |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Crabronidae    | <i>Pemphredon inornata</i>        | a digger wasp            |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Sphecidae      | <i>Ammophila sabulosa</i>         | Red Banded Sand Wasp     |                        | 1       | x               | x               |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena denticulata</i>        | Grey-banded Mining Bee   |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena thoracica</i>          | Cliff Mining Bee         |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena minutula</i>           | Common Mini-miner        |                        | 2       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena subopaca</i>           | Impunctate Mini-miner    |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena congruens</i>          | Long-fringed Mining Bee  | Nationally Scarce (Na) | 1       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena dorsata</i>            | Short-fringed Mining Bee |                        | 2       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena ovatula</i>            | Small Gorse Mining Bee   |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Andrenidae     | <i>Andrena wilkella</i>           | Wilke's Mining Bee       |                        | 1       | x               |                 |
| Insecta | Hymenoptera            | Apidae         | <i>Bombus lucorum sens. lat.</i>  | White-tailed Bumblebee   |                        | 2       | x               | x               |
| Insecta | Hymenoptera            | Apidae         | <i>Bombus terrestris</i>          | Buff-tailed Bumblebee    |                        | 4       | x               | x               |
| Insecta | Hymenoptera            | Apidae         | <i>Bombus lapidarius</i>          | Red-tailed Bumblebee     |                        | 3       | x               | x               |
| Insecta | Hymenoptera            | Apidae         | <i>Bombus hypnorum</i>            | Tree Bumblebee           |                        | 2       | x               | x               |
| Insecta | Hymenoptera            | Apidae         | <i>Bombus pratorum</i>            | Early Bumblebee          |                        | 1       | x               |                 |

| Class   | Order       | Family      | Taxon                              | Vernacular               | National Status        | Records | Northern Sector | Southern Sector |
|---------|-------------|-------------|------------------------------------|--------------------------|------------------------|---------|-----------------|-----------------|
| Insecta | Hymenoptera | Apidae      | <i>Bombus humilis</i>              | Brown-banded Carder Bee  | SoPI                   | 2       | x               | x               |
| Insecta | Hymenoptera | Apidae      | <i>Bombus pascuorum</i>            | Common Carder Bee        |                        | 4       | x               | x               |
| Insecta | Hymenoptera | Apidae      | <i>Nomada flava</i>                | Flavous Nomad Bee        |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Colletidae  | <i>Colletes hederæ</i>             | Ivy Bee                  |                        | 1       | x               | x               |
| Insecta | Hymenoptera | Colletidae  | <i>Colletes daviesanus</i>         |                          |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Colletidae  | <i>Hylaeus communis</i>            | Common Yellow-face Bee   |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Colletidae  | <i>Hylaeus hyalinatus</i>          | Hairy Yellow-face Bee    |                        | 1       | x               | x               |
| Insecta | Hymenoptera | Halictidae  | <i>Lasioglossum leucopus</i>       | White-footed Furrow Bee  |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Halictidae  | <i>Lasioglossum morio</i>          | Green Furrow Bee         |                        | 3       | x               | x               |
| Insecta | Hymenoptera | Halictidae  | <i>Lasioglossum punctatissimum</i> | Rufous-footed Furrow Bee |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Halictidae  | <i>Lasioglossum leucozonium</i>    | White-zoned Furrow Bee   |                        | 2       | x               | x               |
| Insecta | Hymenoptera | Halictidae  | <i>Sphecodes geoffrellus</i>       | Geoffroy's Blood-bee     |                        | 2       | x               |                 |
| Insecta | Hymenoptera | Halictidae  | <i>Sphecodes gibbus</i>            | Dark-winged Blood Bee    |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Halictidae  | <i>Sphecodes reticulatus</i>       | Reticulate Blood-bee     | Nationally Scarce (Na) | 1       | x               |                 |
| Insecta | Hymenoptera | Pompilidae  | <i>Priocnemis parvula</i>          | a spider-hunter wasp     |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Pompilidae  | <i>Anoplius concinnus</i>          | a spider-hunter wasp     |                        | 1       |                 | x               |
| Insecta | Hymenoptera | Pompilidae  | <i>Anoplius nigerrimus</i>         | a spider-hunter wasp     |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Pompilidae  | <i>Arachnospila anceps</i>         | a spider-hunter wasp     |                        | 2       | x               |                 |
| Insecta | Hymenoptera | Pompilidae  | <i>Arachnospila spissa</i>         | a spider-hunter wasp     |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Pompilidae  | <i>Episyron rufipes</i>            | Red Legged Spider Wasp   |                        | 1       |                 | x               |
| Insecta | Hymenoptera | Pompilidae  | <i>Ceropales maculata</i>          | a spider-hunter wasp     |                        | 1       | x               | x               |
| Insecta | Hymenoptera | Tiphiidae   | <i>Tiphia minuta</i>               | The Small Tiphia         | Nationally Scarce (Nb) | 1       |                 | x               |
| Insecta | Hymenoptera | Vespidae    | <i>Ancistrocerus trifasciatus</i>  | a mason wasp             |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Vespidae    | <i>Dolichovespula norvegica</i>    | Norwegian Wasp           |                        | 1       | x               |                 |
| Insecta | Hymenoptera | Vespidae    | <i>Vespula vulgaris</i>            | Common Wasp              |                        | 1       | x               |                 |
| Insecta | Lepidoptera | Sesiidae    | <i>Bembecia ichneumoniformis</i>   | Six-belted Clearwing     |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Zygaenidae  | <i>Zygaena filipendulae</i>        | Six-spot Burnet          |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Hesperiidae | <i>Erynnis tages</i>               | Dingy Skipper            | VU; SoPI               | 2       | x               | x               |
| Insecta | Lepidoptera | Hesperiidae | <i>Thymelicus sylvestris</i>       | Small Skipper            |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Pieridae    | <i>Anthocharis cardamines</i>      | Orange-tip               |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Pieridae    | <i>Pieris brassicae</i>            | Large White              |                        | 3       | x               | x               |
| Insecta | Lepidoptera | Pieridae    | <i>Pieris rapae</i>                | Small White              |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Pieridae    | <i>Pieris napi</i>                 | Green-veined White       |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Pieridae    | <i>Gonepteryx rhamni</i>           | Brimstone                |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Nymphalidae | <i>Lasiommata megera</i>           | Wall                     |                        | 1       | x               | x               |
| Insecta | Lepidoptera | Nymphalidae | <i>Pararge aegeria</i>             | Speckled Wood            |                        | 2       | x               | x               |

| Class        | Order       | Family          | Taxon                           | Vernacular               | National Status | Records | Northern Sector | Southern Sector |
|--------------|-------------|-----------------|---------------------------------|--------------------------|-----------------|---------|-----------------|-----------------|
| Insecta      | Lepidoptera | Nymphalidae     | <i>Coenonympha pamphilus</i>    | Small Heath              | NT; SoPI        | 1       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Aphantopus hyperantus</i>    | Ringlet                  |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Maniola jurtina</i>          | Meadow Brown             |                 | 4       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Pyronia tithonus</i>         | Gatekeeper               |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Hipparchia semele</i>        | Grayling                 | VU; SoPI        | 1       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Vanessa cardui</i>           | Painted Lady             |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Aglais io</i>                | Peacock                  |                 | 2       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Aglais urticae</i>           | Small Tortoiseshell      |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Nymphalidae     | <i>Polygonia c-album</i>        | Comma                    |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Lycaenidae      | <i>Lycaena phlaeas</i>          | Small Copper             |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Lycaenidae      | <i>Callophrys rubi</i>          | Green Hairstreak         |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Lycaenidae      | <i>Polyommatus icarus</i>       | Common Blue              |                 | 3       | x               | x               |
| Insecta      | Lepidoptera | Erebidae        | <i>Orgyia antiqua</i>           | Vapourer                 |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Erebidae        | <i>Tyria jacobaeae</i>          | Cinnabar                 | SoPI - RO       | 2       | x               | x               |
| Insecta      | Lepidoptera | Erebidae        | <i>Euclidia glyphica</i>        | Burnet Companion         |                 | 1       | x               | x               |
| Insecta      | Lepidoptera | Noctuidae       | <i>Autographa gamma</i>         | Silver Y                 |                 | 2       | x               | x               |
| Insecta      | Lepidoptera | Noctuidae       | <i>Phlogophora meticulosa</i>   | Angle Shades             |                 | 1       | x               | x               |
| Insecta      | Odonata     | Coenagriidae    | <i>Pyrrosoma nymphula</i>       | Large Red Damselfly      |                 | 1       | x               | x               |
| Insecta      | Odonata     | Coenagriidae    | <i>Ischnura elegans</i>         | Blue-tailed Damselfly    |                 | 3       | x               | x               |
| Insecta      | Odonata     | Coenagriidae    | <i>Enallagma cyathigerum</i>    | Common Blue Damselfly    |                 | 5       | x               | x               |
| Insecta      | Odonata     | Coenagriidae    | <i>Coenagrion puella</i>        | Azure Damselfly          |                 | 2       | x               | x               |
| Insecta      | Odonata     | Aeshnidae       | <i>Aeshna grandis</i>           | Brown Hawker             |                 | 1       | x               | x               |
| Insecta      | Odonata     | Aeshnidae       | <i>Aeshna cyanea</i>            | Southern Hawker          |                 | 2       | x               | x               |
| Insecta      | Odonata     | Aeshnidae       | <i>Anax imperator</i>           | Emperor Dragonfly        |                 | 1       | x               | x               |
| Insecta      | Odonata     | Libellulidae    | <i>Libellula quadrimaculata</i> | Four-spotted Chaser      |                 | 1       | x               | x               |
| Insecta      | Odonata     | Libellulidae    | <i>Sympetrum striolatum</i>     | Common Darter            |                 | 1       | x               | x               |
| Insecta      | Orthoptera  | Conocephalidae  | <i>Conocephalus discolor</i>    | Long-winged Conehead     |                 | 2       | x               | x               |
| Insecta      | Orthoptera  | Tetrigidae      | <i>Tetrix subulata</i>          | Slender Ground Hopper    |                 | 1       | x               | x               |
| Insecta      | Orthoptera  | Tetrigidae      | <i>Tetrix undulata</i>          | Common Ground Hopper     |                 | 1       | x               | x               |
| Insecta      | Orthoptera  | Acrididae       | <i>Omocestus viridulus</i>      | Common Green Grasshopper |                 | 1       | x               | x               |
| Insecta      | Orthoptera  | Acrididae       | <i>Chorthippus brunneus</i>     | Common Field Grasshopper |                 | 2       | x               | x               |
| Insecta      | Orthoptera  | Acrididae       | <i>Chorthippus parallelus</i>   | Meadow Grasshopper       |                 | 1       | x               | x               |
| Malacostraca | Isopoda     | Asellidae       | <i>Asellus aquaticus</i>        | a waterlouse             |                 | 1       |                 | x               |
| Malacostraca | Isopoda     | Philosciidae    | <i>Philoscia muscorum</i>       | Common Striped Woodlouse |                 | 2       | x               | x               |
| Malacostraca | Isopoda     | Oniscidae       | <i>Oniscus asellus</i>          | Common Shiny Woodlouse   |                 | 1       | x               |                 |
| Malacostraca | Isopoda     | Armadillidiidae | <i>Armadillidium nasatum</i>    | a pill woodlouse         |                 | 3       | x               | x               |

| Class        | Order   | Family          | Taxon                        | Vernacular             | National Status | Records | Northern Sector | Southern Sector |
|--------------|---------|-----------------|------------------------------|------------------------|-----------------|---------|-----------------|-----------------|
| Malacostraca | Isopoda | Armadillidiidae | <i>Armadillidium vulgare</i> | Common Pill Woodlouse  |                 | 3       | x               | x               |
| Malacostraca | Isopoda | Porcellionidae  | <i>Porcellio scaber</i>      | Common Rough Woodlouse |                 | 2       | x               | x               |
|              |         |                 | 505                          |                        | 30              |         | 380             | 357             |

Table 10: Stenotopic species recorded within the former Llandarcy Oil Refinery Northern Sector during 2020.

| Order       | Family        | Species                           | SQS | Conservation status    | Broad biotope                  | Habitat                                   | SAT        | SAT Name                                   | Habitat score                  |
|-------------|---------------|-----------------------------------|-----|------------------------|--------------------------------|-------------------------------------------|------------|--------------------------------------------|--------------------------------|
| Diptera     | Syrphidae     | <i>Myathropa florea</i>           | 1   |                        | tree-associated                | decaying wood                             | A211       | Heartwood decay                            |                                |
| Coleoptera  | Scraptiidae   | <i>Anaspis frontalis</i>          | 1   |                        | tree-associated                | decaying wood                             | A212       | Bark & sapwood decay                       |                                |
| Coleoptera  | Scraptiidae   | <i>Anaspis garneysi</i>           | 1   |                        | tree-associated                | decaying wood                             | A212       | Bark & sapwood decay                       |                                |
| Hymenoptera | Crabronidae   | <i>Crossocerus dimidiatus</i>     | 1   |                        | open habitats; tree-associated | decaying wood                             | A212, F001 | Bark & sapwood decay; Scrub edge           |                                |
| Hymenoptera | Crabronidae   | <i>Ectemnius continuus</i>        | 1   |                        | open habitats; tree-associated | decaying wood                             | A212, F001 | Bark & sapwood decay; Scrub edge           |                                |
| Hymenoptera | Crabronidae   | <i>Pemphredon inornata</i>        | 1   |                        | open habitats; tree-associated | decaying wood                             | A212, F001 | Bark & sapwood decay; Scrub edge           |                                |
| Hymenoptera | Colletidae    | <i>Hylaeus hyalinatus</i>         | 1   |                        | open habitats; tree-associated | decaying wood                             | A212, F002 | Bark & sapwood decay; Rich flower resource |                                |
| Araneae     | Agelenidae    | <i>Agelena labyrinthica</i>       | 1   |                        | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Hymenoptera | Vespidae      | <i>Ancistrocerus trifasciatus</i> | 1   |                        | open habitats; tree-associated | decaying wood                             | F001       | Scrub edge                                 |                                |
| Araneae     | Salticidae    | <i>Heliophanus cupreus</i>        | 1   |                        | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Araneae     | Salticidae    | <i>Heliophanus flavipes</i>       | 1   |                        | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 | calcareous grassland: Low      |
| Lepidoptera | Nymphalidae   | <i>Pararge aegeria</i>            | 1   |                        | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Araneae     | Lycosidae     | <i>Pardosa nigriceps</i>          | 1   |                        | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Lepidoptera | Nymphalidae   | <i>Pyronia tithonus</i>           | 1   |                        | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Hymenoptera | Andrenidae    | <i>Andrena subopaca</i>           | 1   |                        | open habitats                  | short sward & bare ground                 | F001, F002 | Scrub edge; Rich flower resource           |                                |
| Coleoptera  | Curculionidae | <i>Andrion regensteinense</i>     | 1   |                        | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Coleoptera  | Apionidae     | <i>Exapion ulicis</i>             | 1   |                        | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Hemiptera   | Pentatomidae  | <i>Piezodorus lituratus</i>       | 1   |                        | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Coleoptera  | Curculionidae | <i>Sitona striatellus</i>         | 1   |                        | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Hymenoptera | Andrenidae    | <i>Andrena congruens</i>          | 4   | Nationally Scarce (Na) | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Andrenidae    | <i>Andrena denticulata</i>        | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Andrenidae    | <i>Andrena dorsata</i>            | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       | soft rock cliff: 3             |
| Hymenoptera | Andrenidae    | <i>Andrena minutula</i>           | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Andrenidae    | <i>Andrena ovatula</i>            | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Andrenidae    | <i>Andrena thoracica</i>          | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Andrenidae    | <i>Andrena wilkella</i>           | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus humilis</i>             | 1   | SoPI                   | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       | calcareous grassland: Moderate |
| Hymenoptera | Apidae        | <i>Bombus hypnorum</i>            | 1   |                        | open habitats; tree-associated | shaded woodland floor; tall sward & scrub | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus lapidarius</i>          | 1   |                        | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus pascuorum</i>           | 1   |                        | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus pratorum</i>            | 1   |                        | open habitats; tree-associated | shaded woodland floor; tall sward & scrub | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus terrestris</i>          | 1   |                        | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Colletidae    | <i>Colletes daviesanus</i>        | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Colletidae    | <i>Colletes hederæ</i>            | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Colletidae    | <i>Hylaeus communis</i>           | 1   |                        | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Halictidae    | <i>Lasioglossum leucopus</i>      | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Halictidae    | <i>Lasioglossum leucozonium</i>   | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Halictidae    | <i>Lasioglossum morio</i>         | 1   |                        | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       | calcareous grassland: Moderate |

| Order       | Family        | Species                                     | SQS | Conservation status | Broad biotope | Habitat                   | SAT        | SAT Name                                  | Habitat score              |
|-------------|---------------|---------------------------------------------|-----|---------------------|---------------|---------------------------|------------|-------------------------------------------|----------------------------|
| Hymenoptera | Halictidae    | <i>Lasioglossum punctatissimum</i>          | 1   |                     | open habitats | short sward & bare ground | F002       | Rich flower resource                      |                            |
| Hymenoptera | Apidae        | <i>Nomada flava</i>                         | 1   |                     | open habitats | short sward & bare ground | F002       | Rich flower resource                      |                            |
| Araneae     | Araneidae     | <i>Agalenatea redii</i>                     | 1   |                     | open habitats |                           | F003       | Scrub-heath & moorland                    |                            |
| Coleoptera  | Carabidae     | <i>Harpalus rufipes</i>                     | 1   |                     | open habitats | tall sward & scrub        | F003       | Scrub-heath & moorland                    |                            |
| Coleoptera  | Carabidae     | <i>Ophonus puncticeps</i>                   | 1   |                     | open habitats | short sward & bare ground | F003, F111 | Scrub-heath & moorland; Bare sand & chalk |                            |
| Araneae     | Dictynidae    | <i>Argenna subnigra</i>                     | 4   | Nationally Scarce   | open habitats | short sward & bare ground | F111       | Bare sand & chalk                         |                            |
| Araneae     | Miturgidae    | <i>Cheiracanthium virescens</i>             | 4   | Nationally Scarce   | open habitats | short sward & bare ground | F111       | Bare sand & chalk                         |                            |
| Lepidoptera | Nymphalidae   | <i>Hipparchia semele</i>                    | 1   | VU; SoPI            | open habitats | short sward & bare ground | F111       | Bare sand & chalk                         |                            |
| Araneae     | Salticidae    | <i>Marpissa nivoyi</i>                      | 4   | Nationally Scarce   | open habitats | short sward & bare ground | F111       | Bare sand & chalk                         |                            |
| Araneae     | Salticidae    | <i>Synageles venator</i>                    | 4   | Nationally Scarce   | open habitats | short sward & bare ground | F111       | Bare sand & chalk                         |                            |
| Araneae     | Salticidae    | <i>Talavera aequipes</i>                    | 1   |                     | open habitats | short sward & bare ground | F111       | Bare sand & chalk                         | calcareous grassland: Low  |
| Lepidoptera | Sesiidae      | <i>Bembecia ichneumoniformis</i>            | 4   |                     | open habitats | short sward & bare ground | F112       | Open short sward                          | calcareous grassland: High |
| Hemiptera   | Miridae       | <i>Calocoris (Calocoris) roseomaculatus</i> | 1   |                     | open habitats | short sward & bare ground | F112       | Open short sward                          | calcareous grassland: Low  |
| Lepidoptera | Nymphalidae   | <i>Coenonympha pamphilus</i>                | 1   | NT; SoPI            | open habitats | short sward & bare ground | F112       | Open short sward                          |                            |
| Hemiptera   | Lygaeidae     | <i>Cymus claviculus</i>                     | 1   |                     | open habitats | short sward & bare ground | F112       | Open short sward                          | calcareous grassland: Low  |
| Lepidoptera | Nymphalidae   | <i>Lasiommata megera</i>                    | 1   | NT; SoPI            | open habitats | short sward & bare ground | F112       | Open short sward                          |                            |
| Coleoptera  | Curculionidae | <i>Tychius meliloti</i>                     | 1   |                     | open habitats | short sward & bare ground | F112       | Open short sward                          | calcareous grassland: Low  |
| Coleoptera  | Malachiidae   | <i>Anthocomus rufus</i>                     | 1   |                     | wetland       | peatland                  | W314       | Reed-fen & pools                          |                            |

**Table 11:** Stenotopic species recorded within the former Llandarcy Oil Refinery Southern Sector during 2020.

| Order       | Family        | Species                                         | SQS | Conservation status | Broad biotope                  | Habitat                                   | SAT        | SAT Name                                   | Habitat score                  |
|-------------|---------------|-------------------------------------------------|-----|---------------------|--------------------------------|-------------------------------------------|------------|--------------------------------------------|--------------------------------|
| Diptera     | Syrphidae     | <i>Myathropa florea</i>                         | 1   |                     | tree-associated                | decaying wood                             | A211       | Heartwood decay                            |                                |
| Coleoptera  | Cerambycidae  | <i>Grammoptera ruficornis</i>                   | 1   |                     | tree-associated                | decaying wood                             | A212       | Bark & sapwood decay                       |                                |
| Diptera     | Syrphidae     | <i>Sphegina sibirica</i>                        | 1   |                     | tree-associated                | decaying wood                             | A212       | Bark & sapwood decay                       |                                |
| Hymenoptera | Crabronidae   | <i>Ectemnius continuus</i>                      | 1   |                     | open habitats; tree-associated | decaying wood                             | A212, F001 | Bark & sapwood decay; Scrub edge           |                                |
| Hymenoptera | Colletidae    | <i>Hylaeus hyalinatus</i>                       | 1   |                     | open habitats; tree-associated | decaying wood                             | A212, F002 | Bark & sapwood decay; Rich flower resource |                                |
| Araneae     | Agelenidae    | <i>Agelena labyrinthica</i>                     | 1   |                     | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Araneae     | Salticidae    | <i>Heliophanus cupreus</i>                      | 1   |                     | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Araneae     | Salticidae    | <i>Heliophanus flavipes</i>                     | 1   |                     | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 | calcareous grassland: Low      |
| Lepidoptera | Nymphalidae   | <i>Pararge aegeria</i>                          | 1   |                     | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Lepidoptera | Nymphalidae   | <i>Pyronia tithonus</i>                         | 1   |                     | open habitats                  | tall sward & scrub                        | F001       | Scrub edge                                 |                                |
| Coleoptera  | Curculionidae | <i>Andrion regensteinese</i>                    | 1   |                     | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Coleoptera  | Chrysomelidae | <i>Bruchidius villosus</i>                      | 1   |                     | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Coleoptera  | Apionidae     | <i>Exapion ulicis</i>                           | 1   |                     | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Hemiptera   | Miridae       | <i>Heterocordylus (Heterocordylus) tibialis</i> | 1   |                     | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Hemiptera   | Pentatomidae  | <i>Piezodorus lituratus</i>                     | 1   |                     | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Coleoptera  | Curculionidae | <i>Sitona striatellus</i>                       | 1   |                     | open habitats                  |                                           | F001, F003 | Scrub edge; Scrub-heath & moorland         |                                |
| Hymenoptera | Apidae        | <i>Bombus humilis</i>                           | 1   | SoPI                | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       | calcareous grassland: Moderate |
| Hymenoptera | Apidae        | <i>Bombus hypnorum</i>                          | 1   |                     | open habitats; tree-associated | shaded woodland floor; tall sward & scrub | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus lapidarius</i>                        | 1   |                     | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus pascuorum</i>                         | 1   |                     | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Apidae        | <i>Bombus terrestris</i>                        | 1   |                     | open habitats                  | tall sward & scrub                        | F002       | Rich flower resource                       |                                |
| Hymenoptera | Colletidae    | <i>Colletes hederæ</i>                          | 1   |                     | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Halictidae    | <i>Lasioglossum leucozonium</i>                 | 1   |                     | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       |                                |
| Hymenoptera | Halictidae    | <i>Lasioglossum morio</i>                       | 1   |                     | open habitats                  | short sward & bare ground                 | F002       | Rich flower resource                       | calcareous grassland: Moderate |
| Araneae     | Araneidae     | <i>Agalenatea redii</i>                         | 1   |                     | open habitats                  |                                           | F003       | Scrub-heath & moorland                     |                                |
| Coleoptera  | Carabidae     | <i>Carabus problematicus</i>                    | 1   |                     | open habitats                  |                                           | F003       | Scrub-heath & moorland                     |                                |
| Coleoptera  | Carabidae     | <i>Ophonus puncticeps</i>                       | 1   |                     | open habitats                  | short sward & bare ground                 | F003, F111 | Scrub-heath & moorland; Bare sand & chalk  |                                |
| Araneae     | Miturgidae    | <i>Cheiracanthium virescens</i>                 | 4   | Nationally Scarce   | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Hemiptera   | Rhopalidae    | <i>Chorosoma schillingi</i>                     | 1   |                     | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Coleoptera  | Carabidae     | <i>Cicindela campestris</i>                     | 1   |                     | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          | calcareous grassland: Low      |
| Hymenoptera | Pompilidae    | <i>Episyron rufipes</i>                         | 1   |                     | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Lepidoptera | Nymphalidae   | <i>Hipparchia semele</i>                        | 1   | VU; SoPI            | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Araneae     | Salticidae    | <i>Marpissa nivoyi</i>                          | 4   | Nationally Scarce   | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Hemiptera   | Lygaeidae     | <i>Plinthisus brevipennis</i>                   | 1   |                     | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Araneae     | Lycosidae     | <i>Xerolycosa miniata</i>                       | 4   | Nationally Scarce   | open habitats                  | short sward & bare ground                 | F111       | Bare sand & chalk                          |                                |
| Hemiptera   | Tingidae      | <i>Acalypta parvula</i>                         | 1   |                     | open habitats                  | short sward & bare ground                 | F112       | Open short sward                           | calcareous grassland: Low      |
| Coleoptera  | Elateridae    | <i>Agrypnus murinus</i>                         | 1   |                     | open habitats                  | short sward & bare ground                 | F112       | Open short sward                           | calcareous grassland: Moderate |
| Lepidoptera | Sesiidae      | <i>Bembecia ichneumoniformis</i>                | 4   |                     | open habitats                  | short sward & bare ground                 | F112       | Open short sward                           | calcareous grassland: High     |

| Order       | Family         | Species                                     | SQS | Conservation status    | Broad biotope | Habitat                   | SAT  | SAT Name                                | Habitat score                                    |
|-------------|----------------|---------------------------------------------|-----|------------------------|---------------|---------------------------|------|-----------------------------------------|--------------------------------------------------|
| Hemiptera   | Berytidae      | <i>Berytinus (Berytinus) minor</i>          | 1   |                        | open habitats | short sward & bare ground | F112 | Open short sward                        | calcareous grassland: Low                        |
| Hemiptera   | Miridae        | <i>Calocoris (Calocoris) roseomaculatus</i> | 1   |                        | open habitats | short sward & bare ground | F112 | Open short sward                        | calcareous grassland: Low                        |
| Coleoptera  | Chrysomelidae  | <i>Chrysolina hyperici</i>                  | 1   |                        | open habitats | short sward & bare ground | F112 | Open short sward                        | calcareous grassland: Low                        |
| Lepidoptera | Nymphalidae    | <i>Coenonympha pamphilus</i>                | 1   | NT; SoPI               | open habitats | short sward & bare ground | F112 | Open short sward                        |                                                  |
| Hemiptera   | Lygaeidae      | <i>Cymus claviculus</i>                     | 1   |                        | open habitats | short sward & bare ground | F112 | Open short sward                        | calcareous grassland: Low                        |
| Lepidoptera | Nymphalidae    | <i>Lasiommata megera</i>                    | 1   | NT; SoPI               | open habitats | short sward & bare ground | F112 | Open short sward                        |                                                  |
| Coleoptera  | Apionidae      | <i>Protapion filirostre</i>                 | 4   | Nationally Scarce (Nb) | open habitats | short sward & bare ground | F112 | Open short sward                        | calcareous grassland: Moderate                   |
| Coleoptera  | Curculionidae  | <i>Sitona waterhousei</i>                   | 4   | Nationally Scarce (Nb) | open habitats | short sward & bare ground | F112 | Open short sward                        | calcareous grassland: Low<br>Ssoft rock cliff: 3 |
| Diptera     | Dolichopodidae | <i>Tachytrechus insignis</i>                | 4   |                        | coastal       | saltmarsh                 | M311 | Saltmarsh & transitional brackish marsh |                                                  |
| Coleoptera  | Elateridae     | <i>Zorochros minimus</i>                    | 1   |                        | wetland       | running water             | W111 | Shingle banks                           | ERS (Coleoptera): 1                              |
| Hymenoptera | Pompilidae     | <i>Anoplius concinnus</i>                   | 4   |                        | wetland       | running water             | W122 | Riparian sand                           |                                                  |
| Coleoptera  | Malachiidae    | <i>Anthocomus rufus</i>                     | 1   |                        | wetland       | peatland                  | W314 | Reed-fen & pools                        |                                                  |

Richard Wilson Ecology Limited  
Parkhill Studio  
Walton Road  
Wetherby  
LS22 5DZ

**Email:** Richard.Wilson\_ecology@yahoo.co.uk  
**Telephone:** 07828 890298

Company Registration No.: 11265028

## **APPENDIX 5**

### Landscape Strategy

Suggested Species List

Seed Mixes:

EM8 - Emorsgate Wetland Meadow species rich grassland mix (or similar and approved) installed as per suppliers recommendations

EP1 - Emorsgate Pond Edge species mix (or similar and approved) installed as per suppliers recommendations

Localised humps and depressions left in ground profile within meadow areas

Bare ground left to naturally colonise

EXISTING BROADLEAVED WOODLAND RETAINED

EXISTING BROADLEAVED WOODLAND RETAINED

Lower sections seeded with pond edge mix to stabilise ground

Excavated fill from embankment placed on slopes leaving undulating profiles not steeper than 1:3m'

Reprofiled slopes seeded with wetland meadow mix to stabilise ground

KEY

- RED LINE BOUNDARY
- EXISTING BROAD LEAVED WOODLAND TO BE RETAINED
- EM8 WETLAND MEADOW MIX (BY EMORSGATE OR SIMILAR AND APPROVED)
- EM8 POND EDGE MIX (BY EMORSGATE OR SIMILAR AND APPROVED)
- BARE GROUND
- WATERCOURSE
- HUMPS AND DEPRESSIONS CREATED DURING GROUND RE-PROFILING
- EXCAVATED FILL FROM EMBANKMENT NOTCH

LANDSCAPE STRATEGY

The strategy for the landscape proposals the North South Reservoir is to deliver areas of meadow grassland and early successional, open sward habitats in order to secure significant net gains in semi-natural habitat relative to the current, predominantly bare baseline scenario.

Seeding will also help to ensure stabilisation of the newly profiled slopes and ground following remediation.

The following landscape types are proposed;

Seeding mixes

Prior to any sowing commencing, necessary soil remediation works will be completed, after which soils will be suitably tilled and prepared to receive seed. In preparing soils for seeding, care will be taken to create a diverse surface microtopography to enhance structural and botanical diversity in future years. This will include for localised humps and small depressions within meadow areas.

The seeded areas will require little maintenance once established. Each year, a rotational mowing regime with only 30% of the meadow cut at any time would allow more tussocky sward to develop over winter. This would provide a habitat for overwintering birds.

In order to allow for a component of natural re-colonisation, a proportion of proposed grassland (25%) habitats are proposed to be left un-seeded as bare ground. This approach will both improve overall habitat diversity, and promote local genetic stock within the site.

Watercourse / Waterbody (including aquatic and marginal vegetation)

The proposals seek to deliver a sinuous, naturalistic watercourse within the basin of the restored grassland valley. The final design will be refined as the flood modelling is completed which will included channel depth and bank gradients.

This proposal will mitigate for the net loss of unvegetated, standing water habitat providing enhancement to that which is currently present.

NOTES

GENERAL NOTES:

- This drawing is to be read in conjunction with all other relevant Engineering and Architect's details.
- The design shown is for preliminary discussion and will be subject to further design and iteration when further details of flood modelling have been carried out.
- The watercourse design shown is indicative and is subject to assessment via hydrological modelling, and further design.
- The design details presented must be reviewed in conjunction with the wider site information and site constraints which may not be evident on drawing and must be requested if not already provided. This includes, but not limited to, ground conditions (geotechnical and geo-environmental), groundwater levels, buried services, remnant obstructions, ecology, tree protection and topography.
- The Engineer shall be notified immediately, in writing, should any errors or discrepancies be found prior to the commencement or continuation of any works.
- All work is to be carried out in accordance with current British Standards, Building Regulations and NHBC Standards.
- It is the responsibility of the Contractor to execute the works at all times in strict accordance with the requirements of the Health and Safety at Work Act 1974, and the C.D.M. Regulations 2015. The Contractor will be deemed to have allowed for full compliance, including full liaison with the CDM Co-ordinator, within his rates.
- Any existing details which are shown on this drawing are for guidance only and are not suitable for construction. Any variations are to be recorded and reported to the engineer immediately.
- Before work commences contractor should consult the engineer and the SI report regarding any contamination issues. All necessary Health and safety measures to be taken
- This drawing should be read in conjunction with all relevant documents, drawings and standard details
- PJA accept no liability for the accuracy of third party data.
- PJA accept no responsibility for changes made to these drawings by third party without consent

INFORMATION

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| P01 | 17.05.23 | Text and colour amendments | PO |
| REV | DATE     | REVISION NOTE              | BY |



Seven House - High Street  
Longbridge - Birmingham  
B31 2UQ - Tel: 0121 475 0234  
Birmingham - Bristol  
Exeter - London - Reading  
pja.co.uk

CLIENT

St Modwen Developments Ltd

PROJECT

Coed Darcy

DRAWING TITLE  
NSR Landscape Strategy  
For PAC submission

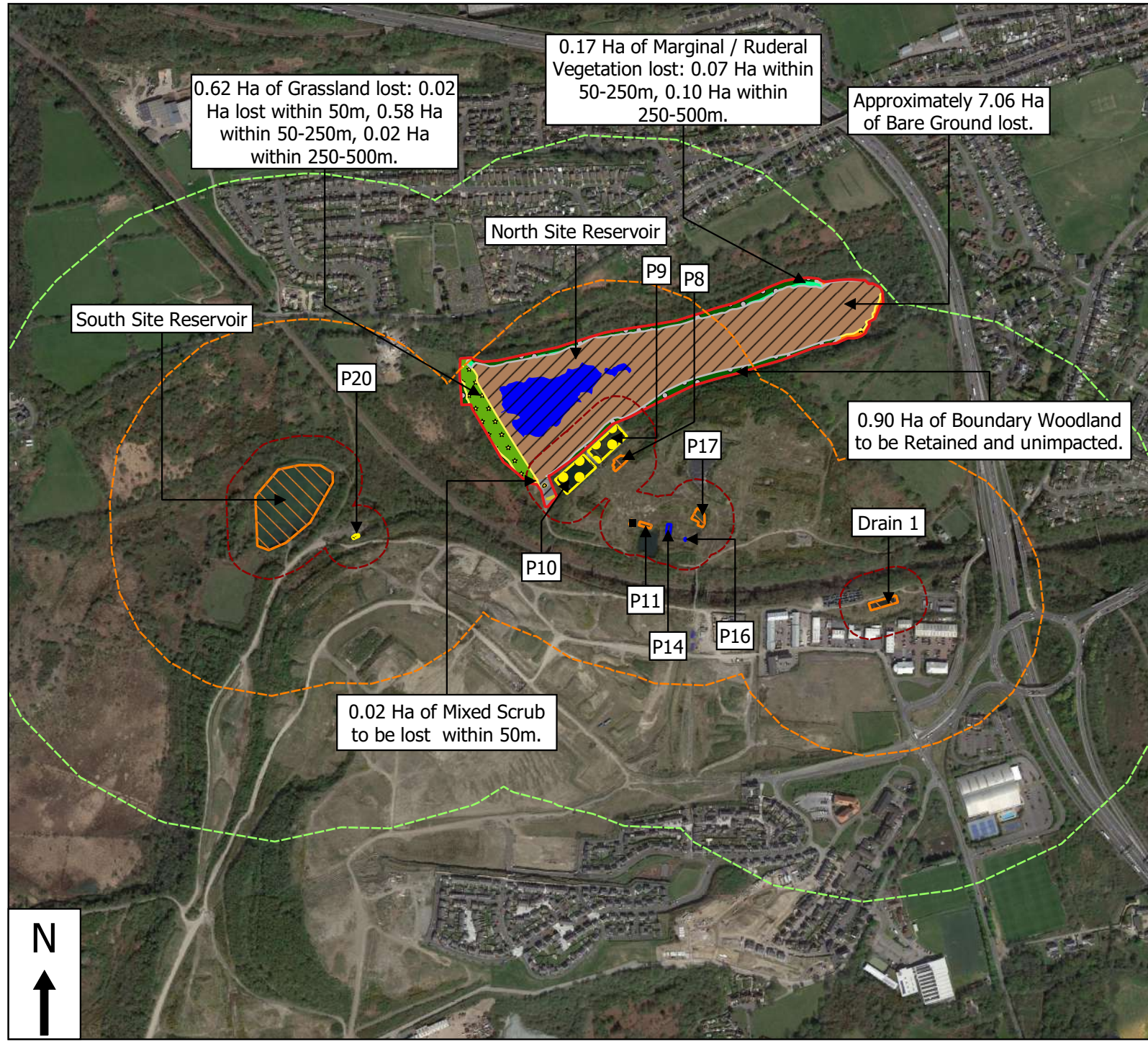
DRAWING ISSUE STATUS

|                                                                             |          |             |          |
|-----------------------------------------------------------------------------|----------|-------------|----------|
| PJA JOB No.                                                                 | SUB-CODE | DRAWING NO. | REVISION |
| 04020                                                                       | - L -    | SK919 - PO1 |          |
| Revision Letter : P = Prelim / A = Approval / T = Tender / C = Construction |          |             |          |
| BIM DRAWING REFERENCE                                                       |          |             |          |

|          |       |          |            |
|----------|-------|----------|------------|
| SCALE    | DRAWN | REVIEWED | DATE       |
| AI@1:NTS | AC    | CP       | 28.04.2023 |

## **APPENDIX 6**

### GCN Habitat Impacts



**Key:**

- Application Site
- 500m Buffer
- 250m Buffer
- 50m Buffer
- Sub-optimal Habitat
- Suitable Habitat
- Unsuitable Habitat
- GCN Recorded in 2021
- GCN Recorded in 2021 & 2023
- GCN Recorded in 2023



**ECOLOGY SOLUTIONS**  
Part of the ES Group

68 Quay Street  
Manchester  
M3 3EJ

+44(0)161 4703232  
[mcr@ecologysolutions.co.uk](mailto:mcr@ecologysolutions.co.uk)  
[ecologysolutions.co.uk](http://ecologysolutions.co.uk)

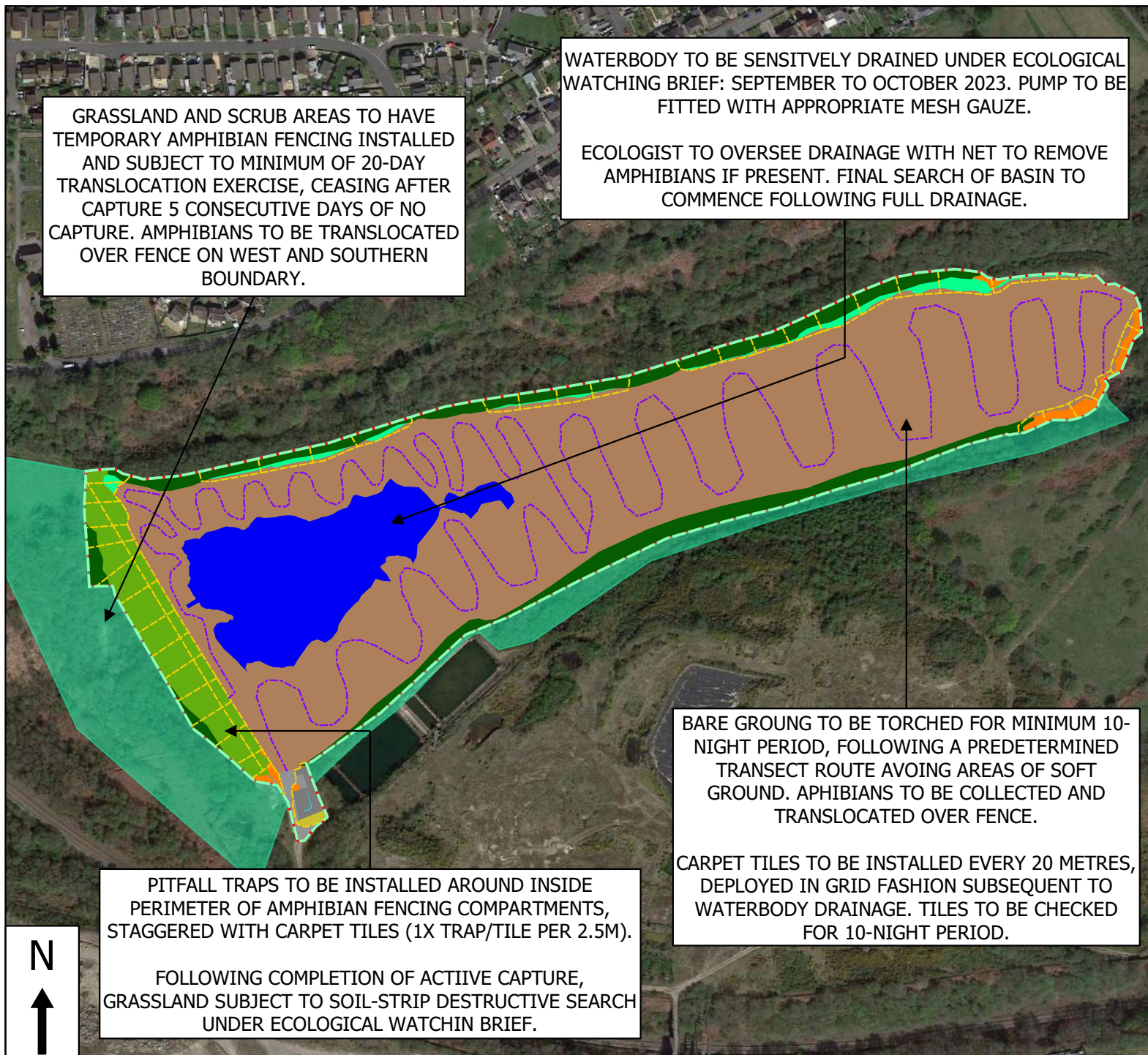
9011M: COED DARCY,  
LLANDARCY, NEATH

APPENDIX 6: GCN  
HABITAT IMPACTS

Rev: A  
May 23

## **APPENDIX 7**

### **GCN Fencing & Capture Plan**



## Key:

- Application Site
- Indicative Transect Route
- Temporary Drift Fencing
- Temporary Perimeter Fencing
- Proposed Translocation Area
- Bare Ground
- Grassland
- Marginal Vegetation
- Waterbody
- Pump Compound
- Recolonising Vegetation
- Scrub
- Access Track
- Woodland



ECOLOGY SOLUTIONS  
Part of the ES Group

68 Quay Street  
Manchester  
M3 3EJ

+44(0)161 4703232  
[mcr@ecologysolutions.co.uk](mailto:mcr@ecologysolutions.co.uk)  
[ecologysolutions.co.uk](http://ecologysolutions.co.uk)

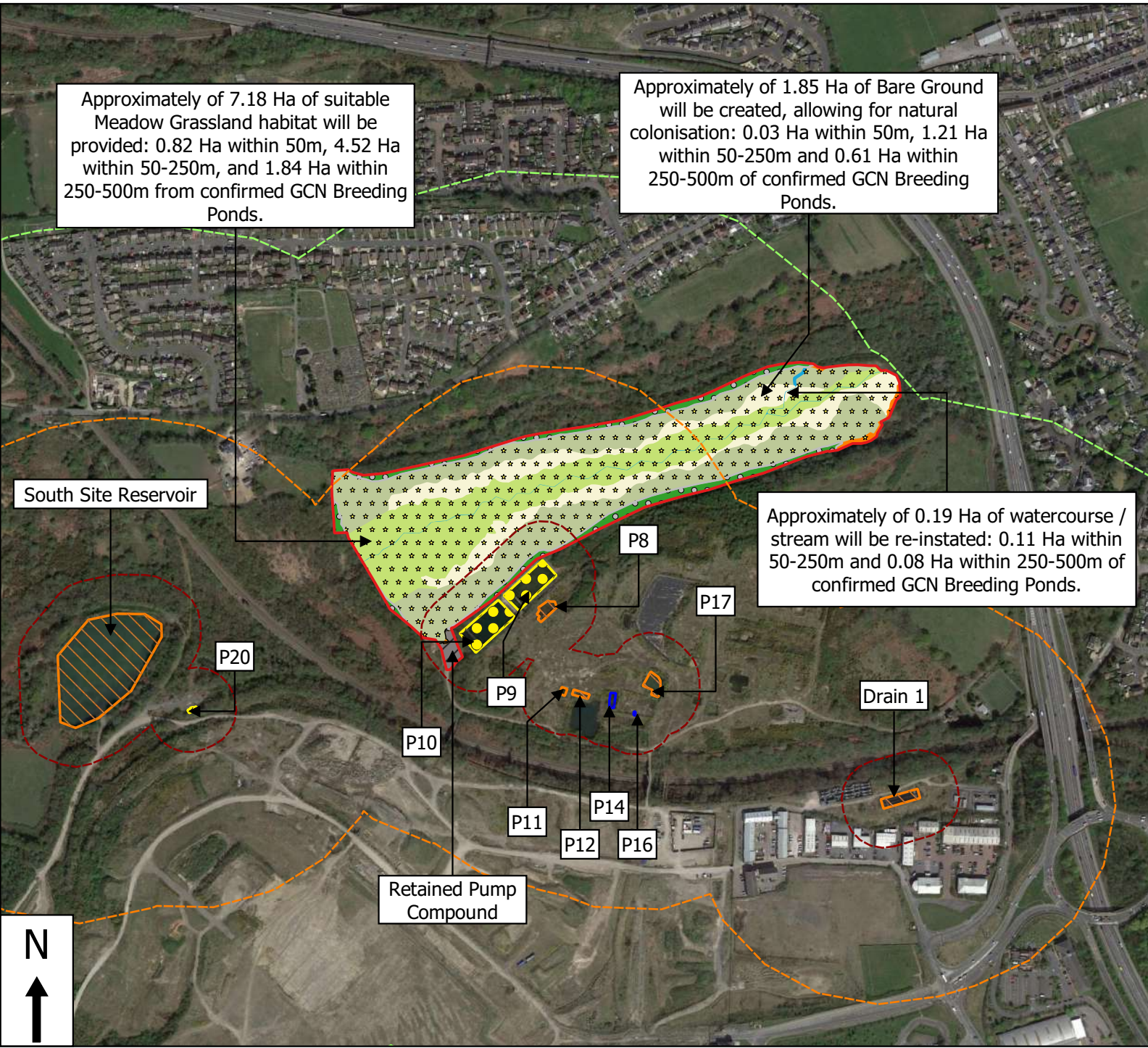
9011M: COED DARCY,  
LLANDARCY, NEATH

APPENDIX 7: GCN  
FENCING & CAPTURE

Rev: A  
May 23

## **APPENDIX 8**

### Proposed GCN Habitat Provision



### Key:

- Application Site
- 500m Buffer
- 250m Buffer
- 50m Buffer
- Sub-optimal Habitat
- Suitable Habitat
- Unsuitable Habitat
- Bare Ground
- Meadow Grassland
- Retained Pump Compound
- Retained Scrub
- Stream / Watercourse
- Meadow Grassland (Wet)
- Retained Woodland
- GCN Recorded in 2021
- GCN Recorded in 2021
- GCN Recorded in 2023



**ECOLOGY SOLUTIONS**  
Part of the ES Group

68 Quay Street  
Manchester  
M3 3EJ

+44(0)161 4703232  
[mcr@ecologysolutions.co.uk](mailto:mcr@ecologysolutions.co.uk)  
[ecologysolutions.co.uk](http://ecologysolutions.co.uk)

9011M: COED DARCY,  
LLANDARCY, NEATH

APPENDIX 8: PROPOSED  
GCN HABITAT PROVISION

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Jun 23



**ECOLOGY**SOLUTIONS

Part of the ES Group

Ecology Solutions (Manchester) Ltd | 68 Quay Street | Manchester | M3 3EJ

0161 4703232 | [mcr@ecologysolutions.co.uk](mailto:mcr@ecologysolutions.co.uk) | [www.ecologysolutions.co.uk](http://www.ecologysolutions.co.uk)