

Farmer ID:

Surveyor:

**Total Score**

(A+B+C)

**/100**

Plot number:

Survey date:

**Dominant grassland type:**

Wet grassland

Dry grassland

**Soil type:**

Mineral soil

Peat soil

**Describe river/stream flow:**

Low

Normal

Above normal

**Is the river/stream fenced? Y/N**

**What is the average width of the fencing?**

 (m)

## A Ecological integrity

**Total Score A (sum of A1 to A4):**

**/65**

**A1** What is the number of **positive indicators** in the plot? Tick all positive indicators below.

Note all positive indicators present as you walk a 'W' through the plot.

\* Refers to wetland indicator species (see B1 overleaf)

|               |   |                |    |
|---------------|---|----------------|----|
| Low: 0-4      | 0 | High: 9-12     | 7  |
| Moderate: 5-8 | 3 | Very high: 13+ | 10 |

**Positive indicators:**

(tick those present)

- Bedstraws & Stitchworts
- Bird's-foot-trefoil
- Carline thistle
- Cowslips & Primrose
- Eyebrights
- Forget-me-nots
- Heathers
- Kidney vetch
- Knapweeds
- Lady's mantle

- Lady's smock (Cuckooflower)
- Lesser spearwort
- Louseworts (Common & Marsh)
- Marsh cinquefoil
- Marsh marigold
- Marsh pennywort
- Marsh thistle
- Meadowsweet
- Meadow thistle
- Mints (all species)

- Orchids
- Ox-eye daisy
- Purple loosestrife
- Ragged robin
- Scabious (Devil's-bit & field)
- \*Sedges
- Self-heal & Bugle
- Sorrel (Common & Sheep's)
- Small rushes (Spike, Woodrushes, Heath)

- Sphagnum & branched mosses
- Tormentil (Common & English)
- Umbels large (and/or Common Valerian, Common hogweed)
- Umbels small (Pignut, Yarrow, Wild carrot)
- Vetches & vetchlings
- Violets (all species); Harebell
- Wild Thyme
- Yellow Composites (Cat's ear, Hawkweeds, Hawkbits & Goat's beard - not Dandelion)
- Yellow flag iris
- Yellow rattle (Hay rattle)

**A2** What is the cover of **all positive indicators** (listed above) throughout the entire plot?

Cover is the proportion of the plot taken up by all positive indicators present.

|  |    |
|--|----|
| <b>Low:</b> None present or you can take several steps without encountering any positive indicators at all.          | 0  |
| <b>Moderate:</b> You encounter a positive indicator with every few steps taken.                                      | 5  |
| <b>High:</b> You encounter positive indicators with every step taken.  | 10 |
| <b>Very high:</b> You encounter multiple different positive indicators with every step taken (and in between steps). | 15 |

**A3 Vegetation Structure.** Note: If grassland is primarily grazed use A3a; OR, if grassland is cut for hay or silage, use A3b. Refer to the guidance for sward quality details.

A3a What is the **vegetation structure in grasslands** that are **PRIMARILY GRAZED**?

|   |     |
|---|-----|
| <b>Over-grazed:</b> Sward short throughout with little variation in height of vegetation. Few plants in flower                                | -10 |
| <b>Moderate (over-grazed):</b> Mostly short vegetation. >50% of field has short sward with occasional to frequent patches of tall vegetation. | 5   |
| <b>Good:</b> Field sward medium height throughout with positive indicators flowering. Areas of taller and /or shorter sward also occur        | 20  |
| <b>Moderate (under-grazed):</b> Mostly tall vegetation. 50-75% of field has tall sward. Litter and dead vegetation occurring.                 | 10  |
| <b>Under-grazed:</b> Rank vegetation present throughout the field   | -5  |

OR

A3b What is the **vegetation structure in grasslands** that are **PRIMARILY CUT FOR HAY or SILAGE**

|   |    |
|---|----|
| <b>Poor structure:</b> No field margins present. Field topped right up to the field boundary line. No grazing of after-grass. Little or no variation in sward height.   | -5 |
| <b>Moderate structure:</b> Narrow field margins present (~1m). Low number of flowering plants and vegetation structure within the field margin poor to moderate. Some grazing of after-grass providing some structural variation. | 10 |
| <b>Good structure:</b> Wide field margins present (2m+) and or good headlands. Grazing of after-grass takes place providing variations in height of sward; sward does not look uniform in appearance.                             | 20 |

#### A4 Riverside Habitat

Is the gradient of the bank visible and is there trees, shrubs or dry herbs visible with less sedges/reeds present? **Go to A4a**

Is the riverside habitat waterlogged underfoot with no clear bank edge and tall herbs/large sedges/reeds dominating with a very gradual gradient towards the river? **Go to A4b**

#### A4a – Non-swamp dominant riverside habitat

**A4a1** How **continuous** are the riverside trees?

*Assess bank face and bank top along water's edge (see guidance).*

*Non-native invasive species to be excluded from assessment.*

|  |    |
|--|----|
| <b>Poor:</b> Trees absent or largely absent (occasional isolated tree).  | -5 |
| <b>Moderate:</b> Trees present but scattered along riverside with large gaps/breaks between either isolated trees or occasional clumps of trees. | 5  |
| <b>Good:</b> Trees occurring as frequent clumps with large gaps/breaks present.  | 10 |
| <b>Very good:</b> Trees either (a) semi-continuous along riverside but some gaps/breaks OR (b) continuous along riverside with few gaps/breaks.  | 15 |

**A4a2** Is there **overhanging or in-stream woody vegetation** along channel margin?

*Assess bank face along water's edge (see guidance).*

|  |   |
|--|---|
| <b>Poor:</b> Overhanging or in-stream woody vegetation absent or largely absent along channel margin AND/OR evidence of recent cutting/removal   | 0 |
| <b>Moderate:</b> Scattered overhanging or in-stream woody vegetation along channel margin AND/OR evidence of historic vegetation cutting/removal but now showing evidence of regrowth. | 2 |
| <b>Good:</b> Frequent overhanging or in-stream woody vegetation along channel margin.  | 5 |

#### A4b – Swamp dominant riverside habitat

|   |    |
|---|----|
| <b>Poor:</b> A small section (3m or less depth) of species poor reed/tall sedge habitat, or herb community that is single species dominated. Open in sections. Little to no shading provided.   | -5 |
| <b>Moderate:</b> Tall wet flora community with reeds and may have some wet tree species such as Alder, Willow and Pedunculate Oak. Not highly variable in species composition but still mostly continuous and provides some shelter and shading along riverside.  | 10 |
| <b>Good:</b> Tall and diverse reed/sedge habitat that is deep (5m+) and without gaps, provides refuge for birds and fish, provides shading and is continuous along the riverside. OR the area is dominated by species-rich stands of tall and robust herbaceous vegetation with an understory of smaller wetland plants. Wet tree species such as Alder, Willow and Pedunculate Oak may be present. | 20 |

## B Hydrological integrity

**Total Score B** (sum of B1 to B3): /35

**B1** To what extent are there any **surface artificial drainage** features within the plot? Assess the **WORST 30 m of drain** in the plot. Only assess artificial drains and heavily modified watercourses, ignore unmapped natural streams, see guidance.

|  |     |
|--|-----|
| <b>Functional:</b> Drains predominantly free flowing (though may be dry at the time of survey), largely unvegetated and unblocked. | -15 |
| <b>Part functional:</b> Drains present but flow is partially impeded (by vegetation etc.).   | 10  |
| <b>Non-functional:</b> Drains absent or present but non-functioning. No flow, highly vegetated and/or dammed.                      | 30  |

**B2** To what extent are there any **subsurface drainage** features within the plot?

|                                       |     |
|---------------------------------------|-----|
| Present and functional                | -30 |
| Absent or present but non-functioning | 0   |

**B3** Floodplain connectivity?

Assess the 20 m from top of riverbank or water's edge (see guidance).

|  |   |
|--|---|
| <b>Low:</b> River is artificially constrained to channel, Riverside soils dry/firm underfoot. No evidence that the soil is saturated for all/part of the year. River restricted to single flow direction through embankments and/or bankside protection.   | 0 |
| <b>Medium:</b> The river has been allowed to move outside its channel, with some bank topping, natural deposition and erosion (not severe). Water-logged (surface moist/fluid underfoot) riverside soils occasionally observed. There may be some bankside protection but no significant hard measures such as riprap and/or concrete. If embankments are away from the river edge (+10m) and allow the river to top its natural bank. | 3 |
| <b>High:</b> Water-logged (surface moist/fluid underfoot) riverside soils frequently observed. The river has never been artificially disconnected from floodplain, or has had its connectivity fully restored. The only bankside protection permitted is soft revetments such as willow and/or tree planting which have been installed as part of a river restoration project.   | 5 |

## C Threats & pressures

**Total Score C**  
(sum of C1 to C9):

**C1** Is there any **evidence of damaging activities** to habitat or vegetation throughout the plot?

|   |     |
|---|-----|
| <b>High:</b> Damage occurring across a large area ( $\geq 21\%$ ) or of a serious nature if confined            | -30 |
| <b>Moderate:</b> Damage occurring across a moderate area ( $\geq 6-20\%$ ) or of a moderate nature if confined. | -20 |
| <b>Low:</b> Damage occurring across a small area ( $\leq 5\%$ ) or of a minor nature if confined.               | -10 |
| <b>None:</b> No damaging activities.  | 0   |

**Damaging activities:**

(tick relevant and describe in comments)

- Damage from supplementary feeding
- Inappropriate herbicide use
- Quarrying
- Burning
- Dumping/rubbish
- Removal of mature scrub/trees
- Other (please specify)

**C2** What is the extent of **bare soil & erosion** throughout the plot?

|   |     |
|---|-----|
| <b>High:</b> Excessive areas of bare soil within the body of the field. Bare soil may also be extending out significantly from the main feed sites and/or water troughs and/or livestock access points, where poaching evident. Significant rutting and soil disturbance caused by vehicle/tractor access.  | -30 |
| <b>Moderate:</b> Bare soil mainly along regularly used stock routes or congregation areas, with minor soil loss occurring at a few points. Bare soil may extend a short distance beyond the main feed site and/or water points and/or livestock access points. Minor rutting and soil disturbance caused by occasional vehicle/tractor access may be present. | -10 |
| <b>Low:</b> Bare soil more or less restricted to regular stock paths, 'pinch' points & small congregation areas. No soil loss.  | 0   |

**C3** What is the cover of **non-native invasive species** throughout the plot?

|  |     |
|--|-----|
| <b>High:</b> Abundant. Some forming dense clumps, many seedlings.  | -20 |
| <b>Moderate:</b> Frequent. Some flowering, many seedlings present. | -10 |
| <b>Low:</b> Scattered. Plants mostly small and not flowering.      | -5  |
| <b>None:</b> No non-native invasive species present.               | 0   |

**Non-native invasive species:** (tick if present)

- Giant hogweed
- Giant rhubarb
- Himalayan balsam
- Himalayan honeysuckle
- Himalayan knotweed
- Japanese knotweed
- Montbretia
- Rhododendron
- Self-sown conifers
- Other (please specify):

**C4** What is the cover of **bracken** throughout the plot?

|   |     |
|---|-----|
| <b>High:</b> Very dense stands of bracken covering over half or more of the field, forming closed canopy.   | -10 |
| <b>Moderate:</b> Bracken forming dense stands covering parts of the field, mostly forming closed canopy.  | -5  |
| <b>Low:</b> Bracken absent or some scattered fronds and none forming closed canopy. Can include some isolated small patches or some larger patches on steep slopes. | 0   |

**C5** What is the extent of **livestock access to the watercourse?**

Assess the 20 m from top of riverbank or water's edge (see guidance).

|  |     |
|--|-----|
| <b>Extensive access:</b> Grazing occurs right up to watercourse and there is constant access to the river for drinking   | -15 |
| <b>Limited access:</b> Access is limited to short periods of the year, or the watercourse is mainly inaccessible due to the presence of thick vegetation, however there is still a possibility of livestock accessing the river. | -7  |
| <b>No access:</b> The river or the riverside habitat is fenced and/or there is no possibility for livestock to access the watercourse  | 0   |

**C6** How **stable** is the riverbank?

Assess bank face (see guidance).

|  |     |
|--|-----|
| <b>Poor:</b> Bank unstable of loose soil, which is easily disturbed. Significant areas of banks cut away, undercut or showing erosion scars. | -10 |
| <b>Moderate:</b> Bank moderately stable (not easily disturbed). Infrequent small areas of erosion mostly healed over.                        | -5  |
| <b>Good:</b> Bank largely stable, held firmly by grasses, shrubs and tree roots.   | 0   |

**C7** What is the cover of **non-native invasive species** along the riverside habitat? (tick if present) Assess the 20 m from top of riverbank or water's edge (see guidance).

|   |     |
|---|-----|
| <b>High:</b> Abundant. Some forming dense clumps, many seedlings  | -30 |
| <b>Moderate:</b> Frequent. Some flowering, many seedlings present | -20 |
| <b>Low:</b> Scattered. Plants mostly small and not flowering      | -10 |
| <b>None:</b> No non-native invasive species present               | 0   |

**Non-native invasive species:** (tick if present)

- Giant hogweed
- Giant rhubarb
- Himalayan balsam
- Himalayan honeysuckle
- Himalayan knotweed
- Japanese knotweed
- Montbretia
- Rhododendron
- Self-sown conifers
- Other (please specify):

**C8** Is there any evidence of **damaging activities/bare soil** along the riverside habitat?

Assess the 20 m from top of riverbank or water's edge (see guidance).

|   |     |
|---|-----|
| <b>High:</b> Damage/bare soil occurring across a large area ( $\geq 21\%$ ) or of a serious nature if confined.           | -20 |
| <b>Moderate:</b> Damage/bare soil occurring across a moderate area ( $\geq 6-20\%$ ) or of a moderate nature if confined. | -10 |
| <b>Low:</b> Damage/bare soil occurring across a small area ( $\leq 5\%$ ) or of a minor nature if confined.               | -5  |
| <b>None:</b> No damaging activities.  | 0   |

**Damaging activities:**

- (tick relevant and describe in comments)
- Livestock poaching/dung
  - Rutting/soil disturbance due to machinery
  - Inappropriate herbicide/pesticide use
  - Dumping/rubbish
  - Flailing/cutting/removal of riverside vegetation
  - Burning
  - Other (describe in comments)

**C9** What is the extent of **gorse** along the riverside habitat? (refer to Project team if 'high')

Assess the 20 m from top of riverbank or water's edge (see guidance).

|  |                          |
|--|--------------------------|
| <b>High:</b> Gorse dominating throughout the plot ( $>75\%$ cover).              | <input type="checkbox"/> |
| <b>Moderate:</b> Gorse occurs frequently throughout the plot ( $25-50\%$ cover). | <input type="checkbox"/> |
| <b>Low:</b> Scattered presence or no gorse present ( $<25\%$ cover).             | <input type="checkbox"/> |

**Common management recommendations:**

- Continue current management of this high-quality grassland.
- Control the occurrence and spread of invasive species.
- Control the occurrence and spread of encroaching scrub/bracken.
- Control reducing fertiliser inputs.
- Consider using supporting actions of slow or impede the flow of drains.
- Use stock to graze field more evenly.
- Improve stock management. e.g. fencing/drinking facilities
- Move feeders/troughs regularly, and keep away from drains and rivers.
- No management advice
- Other (see comments box)

**Management recommendation(s):**