

Ecology Survey Data Guidance Note

Introduction

The data provided within this release relates to ecological survey data that has been collected since 2012 as part of the environmental statement, construction and delivery of HS2 Phase One (London to West Midlands), and, since 2015 as part of the environmental statement, the construction and delivery of HS2 Phase 2a (West Midlands to Crewe).

Please note that survey information is held by HS2 Ltd as data and is not held in other report formats. Tabular survey data is presented in comma-separated values (CSV) file format and contains Ordnance Survey British National Grid easting and northing coordinate references. Spatial survey data is presented in shapefile format. The shapefiles and coordinate references provided in the data can be used in a geographic information system (GIS) application to visualise the data in a map-based environment. Freely available internet-based systems can also be used to locate georeferenced location using the easting and northing coordinates held within the data.

These are live datasets and therefore subject to change over time. Only data which has been assured by HS2 Ltd is provided within this release. Ecological surveys remain an ongoing activity and the data associated with ongoing surveys will be released, via this website, following HS2's assurance of the data. For more information, please see the HS2 open data policy <https://www.hs2.org.uk/about-us/our-documents/open-data-policy/>.

Survey data collected up to circa 2020 was captured using a different data structure compared to data collected after circa 2020. All data up to circa 2020 has undergone conversion into the latest data structure, which may result in records displaying missing values where such information was not collected during earlier surveys.

Whilst every effort has been made to ensure accuracy of information provided in this release, minor errors/issues may exist within the data provided. HS2 Ltd will aim to resolve any such identified issues in future updates to this data.

Records covering badger and Schedule 1 birds have been omitted from this release for reasons of animal welfare.

Using the datasets

Some survey types in this release may record information in multiple datasets. Records for these surveys can be joined together using a one-to-many relationship based on unique identifiers.

An example of this is a National Vegetation Classification (NVC) survey which is comprised of the following datasets:

1. **NVC_Vegetation_Survey_Details**: A single overarching NVC survey record describing the overall habitat types observed and survey limitations. This record will have a unique '**Habitat Survey ID**' identifier.
2. **NVC_Survey_Quadrat_Locations**: Many survey quadrat location records captured as part of the NVC survey (e.g. 10 survey 'stops') describing the vegetation structure at each location. Each quadrat record will record the unique **Habitat Survey ID** of the NVC survey (1) and have its own unique '**Sample ID**' identifier.
3. **Habitat_Survey_Species_Observations**: Many individual flora species records, each recording a measure of cover-abundance, listing all species identified at each of the 10 quadrat locations. Each of these records will record the unique **Sample ID** of the quadrat to which it relates (2).

An overview of the datasets that have related records in other datasets is shown in Table 1 below.

Table 1: One-to-many dataset relationship overview.¹

Dataset (one record)	Related Dataset (many result/observation records)	Unique ID field for relationship
Habitat Surveys		
Coastal_Floodplain_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Ditch_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Fen_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Grassland_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Heathland_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Hedgerow_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
National_Pond_Survey_Results	National_Pond_Survey_In_Out_Flow_Details	Habitat Survey ID
National_Pond_Survey_Results	National_Pond_Survey_Land_Use_Details	Habitat Survey ID
NVC_Vegetation_Survey_Details	NVC_Survey_Quadrat_Locations	Habitat Survey ID
NVC_Survey_Quadrat_Locations	Habitat_Survey_Species_Observations	Sample ID

Dataset (one record)	Related Dataset (many result/observation records)	Unique ID field for relationship
PSYM_Pond_Survey_Details	PSYM_Pond_Survey_Invertebrate_Observations	Habitat Survey ID
	PSYM_Pond_Survey_Plant_Observations	Habitat Survey ID
Purple_Moorgrass_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Reedbed_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Woodland_Condition_Survey_Results	Habitat_Survey_Species_Observations	Habitat Survey ID
Woodland_Survey_Results	Woodland_Survey_10mPlot_Details	Habitat Survey ID
Woodland_Survey_10mPlot_Details	Habitat_Survey_Species_Observations	Sample ID
Species Surveys		
Amphibian_Pond_Survey_Details	Amphibian_Pond_Survey_Results	Species Survey ID
Fish_Survey_Details	Fish_Survey_Results	Species Survey ID
	Fish_Survey_Results_Minor_Species	Species Survey ID
Reptile_Habitat_Survey_Results	Reptile_Survey_Observations	Species Survey ID
Survey_Station_Location_Details See 'Station Type' column for details of the type of survey station e.g., bat static monitoring device or dormouse nest tube.	Bat_Emergence_Survey_Results	Station ID
	Bat_Activity_Static_Monitoring_Survey_Observations	Station ID
	Bat_Trapping_Survey_Results	Station ID
	Herptile_Survey_Results	Station ID
	Dormouse_Nest_Tube_Results	Station ID
	Pine_Marten_Survey_Evidence	Station ID
	Camera_Trap_Results	Station ID
	Mink_Survey_Evidence	Station ID
Mink_Trapping_Results	Station ID	
General		
Multiple datasets	Survey_Additional_Weather_Details	Survey ID
	Where surveys are carried out over a number of days additional weather observations may be recorded.	
Baseline_Ecological_Features / HS2_Ecological_Assets (shapefile format)	Survey records may be related to an ecological feature or HS2 Asset. All pre-existing/natural ecological features such as waterbodies or bat roosts are recorded in the Baseline_Ecological_Features dataset. Details of HS2 Assets are not provided within this release other than an easting/northing recorded against each survey result.	Baseline Feature ID / HS2 Asset ID

ⁱ Note: Table 1 may list datasets that are not yet available and are not included in this release.