



Aggregate Recycling Plant,
Asphalt Production Plant and
Gully Waste Recycling Plant,
Hayes, Bulls Bridge

Ecological Impact Assessment

Prepared for:
FM Conway Ltd.

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**ENVIRON,
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1 Introduction

1.1 Background

ENVIRON UK Limited (ENVIRON) was commissioned by F M Conway Ltd. ('the Applicant') to complete an Ecological Impact Assessment (EclA) in regards to the proposed development of the former Powergen site ('the Site'), Bulls Bridge, Hayes (Ordnance Survey Grid Reference TQ 107 792)

The Applicant proposes to redevelop the Site into an aggregate recycling plant, asphalt storage and production plant, and gully waste recycling plant ('the Proposed Development'). Accordingly, the Applicant intends to submit a detailed planning application to the London Borough of Hillingdon (LBH).

Following an Environmental Impact Assessment (EIA) Screening Request prepared by ENVIRON, on behalf of the Applicant, in May 2011, LBH confirmed that the redevelopment proposals do not fall within Schedule 2 of the Town and Country Planning (Environmental Impact Assessment) (England and Wales) Regulations (as amended) (the EIA Regulations). However, discrete technical assessment reports would be required to accompany the planning application.

This document therefore provides an assessment of the Proposed Development's likely construction and operational impacts on existing ecological receptors at and surrounding the Site.

A draft version of this report was submitted to LBH, Natural England (NE) and the Environment Agency (EA) for comments. Comments received have been considered in the finalisation of this the report.

1.2 Scope and Objectives of Report

The aim of this document is to provide an understanding of the existing on-site ecological conditions, as well as the context of the Site; to assess the likely impacts in relation to the Proposed Development; and to outline measures, where required, to avoid, off-set or mitigate any significant adverse effects.

The content of this document is based on the findings of:

- a desk study and an Extended Phase 1 Survey of the Site (Institute of Environmental Assessment, 1995)¹; and
- a bat survey.

The objectives of the assessment are to:

- identify designated nature conservation sites on or in the vicinity of the Site;
- identify populations of protected, notable or scarce species on or in the vicinity of the Site;
- record main habitats and features of ecological interest on the Site;
- assess the ecological importance of the Site;
- assess potential impacts to the Site's ecological features; and
- provide recommendations for the protection of the Site's ecology.

¹ IEA, 1995. Guidelines for Baseline Ecological Assessment, Institute of Environmental Assessment. E&FN Spon, An Imprint of Chapman and Hall. London.

The report is supported by the following annexes:

- Annex A: Legislation Context; and
- Annex B: Site Photographs.

1.3 Legislation and Policy Framework

There are several different acts of legislation and planning policies which refer to the protection of wildlife. These are summarised in Annex A; this is a brief summary of the legislation and policies and is not to be regarded as a definitive legal opinion. When dealing with individual cases, it is advised to consult the full texts of the relevant documents and obtain further legal advice.

2 Methodology

2.1 Overview

This assessment has been completed based on the results of a desk study and an Extended Phase 1 Survey; as well as a bat survey.

2.2 Desk Study

The purpose of the desk-top study was to collect existing baseline data about the Site and the surrounding area such as the location of designated sites or other natural features of potential ecological value such as woodland and ponds. The following zone of influence was considered:

- internationally, nationally and locally designated sites, up to 1 km from the Site; and
- records of protected species up to 1 km of the Site.

Greenspace Information for Greater London (GiGL) was contacted to provide details of designated sites and protected species within 1 km of the Site. Due to restrictions in the reproduction of the GiGL report [Report Ref. ENVIRON 11379], it is not included in this report but is available free for LBH on request to GiGL. In addition, the Multi Agency Geographic Information for the Countryside (MAGIC) website was searched for supplementary information on statutory sites within 5 km of the Site, with particular emphasis on sites designated due to populations of bats.

Ecological investigations were completed on the Site in 2007, including an Extended Phase 1 survey² and a reptile survey³, in support of an earlier warehouse development proposal for the previous Site owner Kenmore. This was followed by a destructive search for reptiles, which was completed during the site preparation for the Kenmore development; however the latter subsequently did not proceed. The results of the previous ecology surveys have been reviewed and referred to in this report where relevant.

2.3 Extended Phase 1 Survey

An Extended Phase I Habitat Survey (Institute of Environmental Assessment, 1995) of the Site was undertaken by Peter Burston, an experienced ecologist, on the 20th September 2011. The weather during the survey period was overcast but with no rain and good visibility.

The survey involved a Site walkover and preliminary assessment of key habitats, land use and ecological features, particularly focusing on areas of natural interest which will be affected by the Proposed Development. The main habitats present were recorded using standard Phase I Habitat Survey methodology as described in the Handbook for Phase I Habitat Survey⁴. Target notes were used to record habitats and features of particular interest. In addition to general habitat classification, a list was compiled of all observed plant species. The abundance of each species was estimated for each habitat respectively using standard 'DAFOR' codes: D = Dominant, A = Abundant, F = Frequent, O = Occasional, R =

² ENVIRON, 2007a. Ecological Assessment, Bulls Bridge, North Hyde Gardens, Hayes.

³ ENVIRON, 2007b. Reptile Survey, Bulls Bridge, North Hyde Gardens, Hayes.

⁴ Joint Nature Conservation Committee, 2007. Handbook for Phase I Habitat Survey: A technique for Environmental Audit. Peterborough

Rare. The Site was inspected for signs of any invasive plant species subject to legal controls.

The Site was assessed for its potential to support protected species such as bats, badgers and reptiles; this was in order to identify potential ecological constraints and to guide recommendations for further survey requirements for these species.

2.4 Bat Survey

A bat activity survey was completed on the night of 1st October 2011. The survey was carried out in accordance with Bat Conservation Trust guidelines⁵ by two licensed bat surveyors: Laurent Duvergé and James Baker. One surveyor was equipped with a Pettersson time expansion bat detector and the second was equipped with a Batbox Griffin (heterodyne, frequency division and time expansion detector). Digital recordings were made to provide a record of the survey and assist with species identification.

The activity survey started 15 minutes before sunset and continued for 3 hours after sunset. A transect which included the entire Site boundary was followed independently by each of the surveyors (see Figure 2.1). The weather conditions during the survey were considered to be favourable for bat activity (see Table 2.1).

Table 2.1: Weather Conditions									
Date	Sunset	Weather at Start of Survey				Weather at End of Survey			
		Cloud	Wind	Temp	Humidity	Cloud	Wind	Temp	Humidity
		% cover	m/s	°C	%	% cover	m/s	°C	%
01/10/2011	18:40	0	0	23.1	59.7	0	0	15.7	79.7

The activity survey results were supplemented with the use of 2 automatic bat detectors (Anabat SD1) which were left in-situ for 2 ½ weeks (2nd October – 21st October 2011). One of the detectors was installed on the underside of the A312 bridge crossing the Yeading Brook. The second was installed on the eastern boundary of the Site. The locations of the two detectors are shown on Figure 2.1.

⁵ Bat Conservation Trust, 2007. Bat Surveys – Good Practice Guidelines. Bat Conservation Trust, London

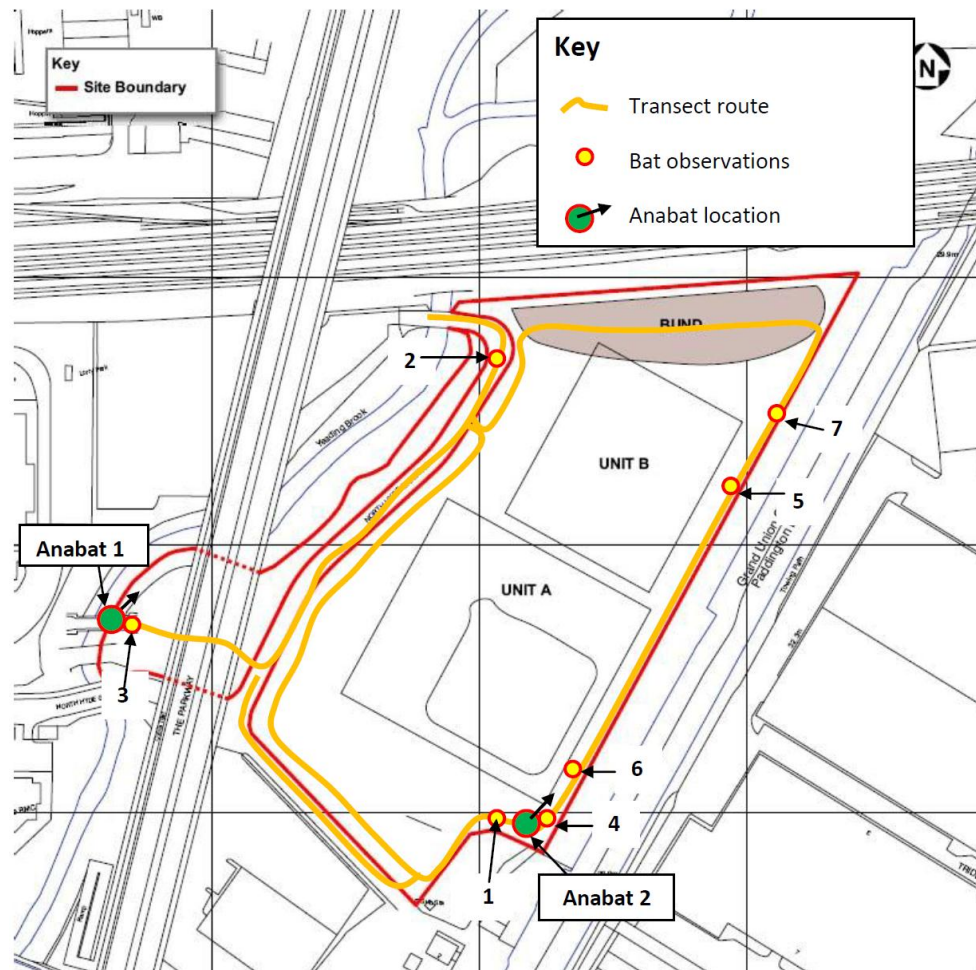


Figure 2.1: Bat Survey Transect Routes, Anabat Locations and Survey Results

2.5 Limitations

The availability and quality of the data obtained during desk studies is reliant on third party responses. This varies region to region and for different species groups. Furthermore the comprehensiveness of data often depends on the level of coverage, the expertise and experience of the recorder and the submission of records to the local recorder. In addition it should be noted that the report does not necessarily record plants or animals that may appear on the Site at different times of the year and were therefore not evident at the time of the field walkover.

Observations of surrounding land in respect of its potential to support protected species or habitats are limited to those that can be made from within the target Site boundary during the site walkover inspection.

The northern and eastern boundaries of the Site could not be inspected in detail due to access constraints imposed by the very steep bunded stockpiled material surrounding the boundary of the Site, which is covered by tall and very dense vegetation. However, this limitation is not considered to be significant in terms of the objectives of this report.

Only a single bat survey has been completed. However, the use of remote detectors greatly increased the robustness of the survey. Given the lack of bat roost potential on the Site and relatively low levels of bat recorded during the survey, it is considered that the level of survey effort is sufficient to provide an accurate assessment of the Site's importance for bats.

2.6 Ecological Assessment

Habitats and species (i.e. ecological receptors) identified within the Site boundary have been assigned ecological values using the standard Institute of Ecology and Environmental Management (IEEM) scale that classifies ecological receptors within a defined geographic context⁶. The classification uses recognised and published criteria⁷ (e.g. Ratcliffe 1977) where the habitats and site are assessed in relation to their size, diversity, naturalness, rarity, fragility, typicalness, connectivity with surroundings, intrinsic value, recorded history and potential value. The following frame of reference has been used:

- International importance;
- UK importance;
- National importance (Wales);
- Regional importance;
- County (or Metropolitan) Importance;
- District (or Unitary Authority, City or Borough) Importance;
- Local or Parish Importance;
- Site level only (limited to the site boundary); and
- Negligible.

2.7 Impact Assessment

The potential impacts on designated sites, habitats and species have been considered in relation to the Proposed Development. The potential impacts have been assessed without consideration of any specific mitigation measures that might be employed. The assessment of likely ecological impacts has been made in relation to the baseline conditions on the Site. The likely impacts of development activities upon ecological receptors have been characterised according to several variables including:

- magnitude and extent – quantitative size of an impact (e.g. area of habitat/ number of individuals);
- duration and reversibility – timescale of impact (days/ weeks/ months/ years) until recovery. Permanent impacts are described as such, and likelihood of recovery is detailed where appropriate;
- frequency – frequency of impact (if appropriate; described as low to high and quantified where possible);
- complexity – whether the impact will directly or indirectly affect the feature; and
- negative/positive – if the impact will be beneficial or detrimental to the feature.

The assessment also includes an indication of the confidence level that the change will take place. The following terminology has been used:

- certain: probability estimated to exceed 95%;
- likely / probable: probability estimated to be 50-95%;

⁶ Institute for Ecology and Environmental Management, 2006. Guidelines for Ecological Impact Assessment in the United Kingdom (version 7 July 2006). IEEM.

⁷ Ratcliffe, D.A. (ed.), 1977. A Nature Conservation Review. Cambridge University Press, Cambridge

- unlikely / possible: probability estimated to be 5-49%; and
- extremely unlikely: probability estimated to be less than 5%.

Each impact has been assessed as being significant or not significant upon each ecological receptor. An ecologically significant impact has been defined as an impact on the integrity of a defined site or ecosystem and/ or the conservation status of habitats or species⁵.

3 Baseline Conditions

3.1 Desk Study

3.1.1 Site Location and Landscape Context

The Site of the Proposed Development is located in Bulls Bridge, Hayes, Middlesex and centred at national grid reference NGR TQ 107 792 as shown in Figure 3.1. It is an industrial and commercial area falling within the Hayes/East Drayton Corridor on the eastern boundary of the London Borough of Hillingdon (LBH).

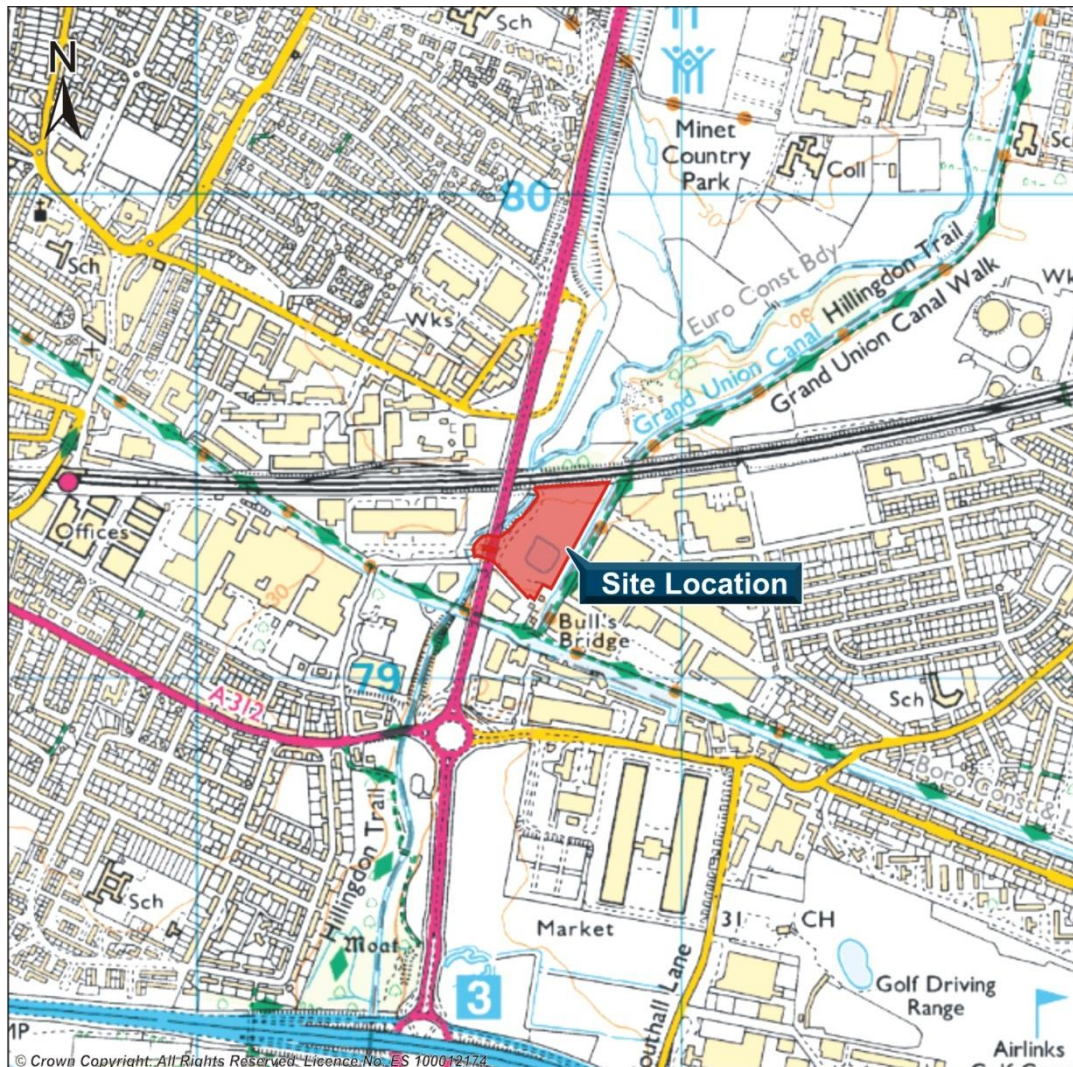


Figure 3.1: Site Location

The Site is bound to the north by the Paddington to Bristol railway line, to the east by the Paddington Branch of the Grand Union Canal, to the south by North Hyde Gardens Road and to the west by the Yeading Brook. North Hyde Gardens Road passes under the flyover of the A312 (the Parkway) to terminate at the Grand Union Canal. An access road off North Hyde Gardens Road to the DHL Lorry Park cuts north-south through the western extent of the Site.

Access to the Site is off North Hyde Gardens Road, which connects to the A312 via North Hyde Road. The A312 southbound provides access to Junction 3 of the M4 motorway, approximately 1.3 km south of the Site.

The dominant landuses to the east, south, west and north-west are industrial and commercial properties, as well as some residential properties south-west of Roseville Road, approximately 400 m distant.

Key landscape features surrounding the Site comprises Minet Country Park approximately 25 m to the north; the Paddington Branch of the Grand Union Canal immediately to the east; the Grand Union Canal approximately 75 m to the south; and the Yeading Brook immediately to the west.

Beyond the Grand Union Canal, a narrow green corridor of land follows the A312 southwards, which includes woodland, scrub and open ground habitats. This green corridor links the Site with a more extensive area of habitats including Cranford Country Park, situated south of the M4 motorway.

3.1.2 Designated Sites

Statutory Sites

The data provided by GiGL shows that there are no sites with European or national designations, including Local Nature Reserves (LNR) within 1 km of the Site.

Non-Statutory Sites

A total of three Sites of Importance for Nature Conservation (SINC) occur within 1 km of the Site namely:

1. London's Canals Site of Metropolitan Importance for Nature Conservation (SMINC): includes the entire Grand Union Canal (closest point 50 m south of the Site) and the Paddington branch which lies immediately adjacent to the eastern boundary of the Site. The canal system in London supports a range of notable plant and aquatic invertebrates;
2. Crane Corridor SMINC: a corridor of habitats that follows the River Crane and includes a diverse range of habitats including running water, ponds, lakes, wet grassland and wet woodland. The site is important for a range of plant and bird species. The SINC is situated approximately 380 m to the south-east of the Site; and
3. Yeading Brook, Minet Country Park and Hitherbroom Park Site of Borough Grade I Importance for Nature Conservation (SBINC): approximately 68 hectares of grassland, hedgerows, woodland and ponds, situated approximately 25 m to the north of the Site.

3.1.3 Protected Species

GiGL holds records for a range of protected and notable species within 1 km of the Site. Table 3.1 provides a summary of the records provided.

Table 3.1: Protected Species Records within 1 km of the Site

Protected Species	No. of records within 1 km (most recent date)	Closest Record Distance
Invertebrates		
Small heath <i>Coenonympha pamphilus</i>	11 (2004)	379 m to the NE
Amphibians		
No records of amphibian species	-	-
Reptiles		
Grass snake <i>Natrix natrix</i>	1 (2005)	678 m to the NE
Birds		
Greylag <i>Anser anser</i>	2 (1999)	895 m to the N
Lapwing <i>Vanellus vanellus</i>	3 (2006)	895 m to the N
Common cuckoo <i>Cuculus canorus</i>	1 (2005)	895 m to the N
Common kingfisher <i>Alcedo atthis</i>	8 (2009)	458 m to the SW
Eurasian wryneck <i>Jynx torquilla</i>	2 (2006)	895 m to the N
Skylark <i>Alauda arvensis</i>	6 (2006)	895 m to the N
Sand martin <i>Riparia riparia</i>	1 (2006)	895 m to the N
Tree pipit <i>Anthus trivialis</i>	2 (2005)	895 m to the N
Yellow wagtail <i>Motacilla flava</i>	2 (2005)	895 m to the N
Dunnock <i>Prunella modularis</i>	1 (1999)	895 m to the N
Ring Ouzel <i>Turdus torquatus</i>	1 (1999)	895 m to the N
Redwing <i>Turdus iliacus</i>	1 (2006)	895 m to the N
Grasshopper warbler <i>Locustella naevia</i>	5 (2005)	895 m to the N
House sparrow <i>Passer domesticus</i>	6 (2005)	117 to the E
Common linnet <i>Carduelis cannabina</i>	6 (2006)	444 m to the SE
Common Redpoll	1 (2003)	895 m to the N
Common bullfinch <i>Pyrrhula pyrrhula</i>	1 (2005)	895 m to the N
Mammals		
Unidentified bat species Vespertilionidae	1 (1986)	840 m to the NE
Water vole <i>Arvicola amphibius</i>	1 (2002)	920 m to the S

3.2 Extended Phase 1 Survey

3.2.1 General Site Description

The Site is approximately 3 hectares in size. The Site is split into two by an access road off North Hyde Gardens Road to the DHL Lorry Park. It is brownfield having been previously

operational as a Powergen site, a fuel storage facility for the nearby Bulls Bridge Power Station and a creosote works.

All previous structures have been demolished, leaving a largely level site surrounded by a 3 metre tall bund constructed from stockpiled material and rubble. This area now comprises predominantly either tall ruderal or ephemeral / short perennial vegetation. To the west of the DHL access road, the Site includes a narrow roadside verge, which widens out to the south underneath the A312 flyover. Much of this western portion of the Site supports scrub vegetation. Small patches of scrub also occur to the east of the DHL access road, particularly along the hoarding on the Site's southern boundary with North Hyde Gardens Road. A line of broad-leaved woodland extends along the eastern boundary of the Site beside the Paddington Branch of the Grand Union Canal.

The habitats as identified on-site are shown in Figure 3.2 and are described in more detail in the sections below. Site Photographs are provided in Annex B.

3.2.2 Tall Ruderal

The eastern portion of the Site is surrounded by steep 3 m high bund of stockpiled material and rubble (Photograph 1). This area has been colonised by dense tall ruderal vegetation dominated by hedge mustard *Sisymbrium officiale*, with abundant creeping thistle *Cirsium arvense*, common nettle *Urtica dioica*, as well as teasel *Dipsacus fullonum*, lesser burdock *Arctium minus*, ragwort *Senecio jacobaea* and cleavers *Galium aparine*. Bramble *Rubus fruticosus* agg. and butterfly bush *Buddleja davidii* also occurs occasionally on the bund scattered through the tall ruderal vegetation.

3.2.3 Ephemeral / Short Perennial

The main body of the Site enclosed by the bund to the east of the DHL access road is a level area of ephemeral / short perennial vegetation (Photograph 2). This vegetation supports a diverse range of species typical of brownfield sites including creeping bent *Agrostis stolonifera*, Yorkshire fog *Holcus lanatus*, bristly oxtongue *Picris echioides*; mugweed *Artemisia vulgaris*, perforate St John'swort *Hypericum perforatum*, ribwort plantain *Plantago lanceolata*; rosebay willowherb *Epilobium angustifolium*, teasel, scented mayweed *Matricaria recutita*, spear thistle *Cirsium vulgare*, broad-leaved dock *Rumex obtusifolius*, black meddick *Medicago lupulina*, cleavers *Galium aparine* and creeping cinquefoil *Potentilla reptans*. Narrow-leaved ragwort *Senecio inaequidens*, an alien species from South Africa, now naturalised in England, was recorded in this area.

Short perennial vegetation also occurs along the roadside verge on the western side of the DHL access road, interspersed by patches of bramble scrub.

3.2.4 Dense Scrub

A small patch of dense scrub is situated in the south western corner of the Site adjacent to the Yeading Brook. The dominant species is crack willow *Salix fragilis* with occasional ash *Fraxinus excelsior*, sycamore *Acer pseudoplatanus*, birch *Betula* sp., rowan *Sorbus acuparia* and butterfly bush.

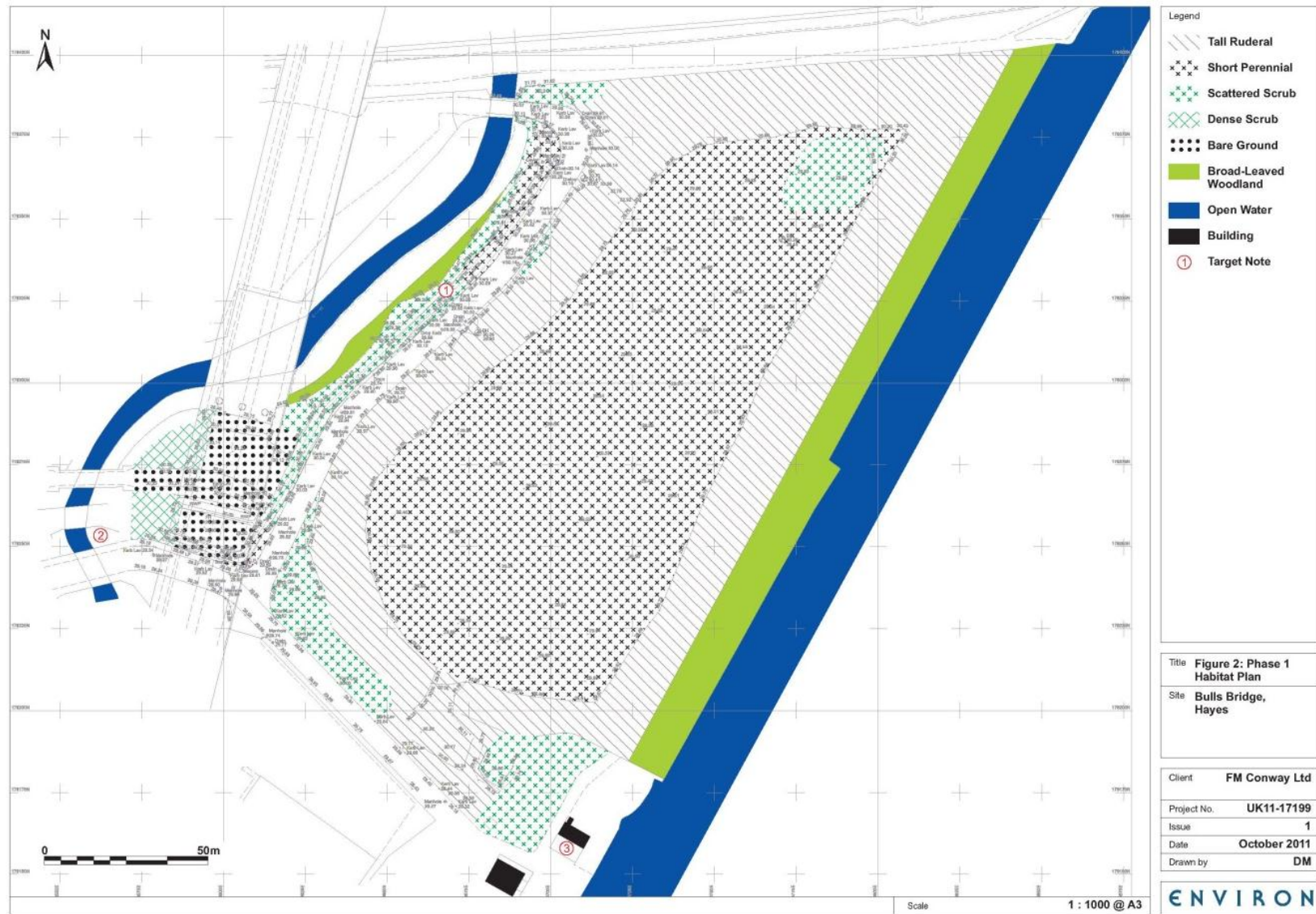


Figure 3.2: Phase I Habitat Plan

3.2.5 Scattered Scrub

Patches of bramble and butterfly bush occurs scattered throughout the Site, with larger patches on the roadside verges of the DHL access road (Photograph 3), the southern boundary of the Site bordering North Hyde Gardens Road (Photograph 4), and in the north east corner of the Site (Photograph 5).

3.2.6 Broad-leaved Woodland

A dense strip of broad-leaved woodland dominated by non-native Norway Maple *Acer platanoides* forms the eastern boundary of the Site alongside the Paddington branch of the Grand Union Canal (Photograph 6). Some of the tree trunks appear to occur off-site, although the canopies spread over into the Site. The ground flora of the woodland is sparse comprising mainly Ivy *Hedera helix*. Broad-leaved woodland also occurs off-site along the Yeading Brook to the west of the Site.

3.3 Protected Species

3.3.1 Invertebrates

There are no significant areas of suitable grassland habitats on-site that could support a population of small heath butterflies. The habitats on-site are likely to support a range of common and widespread invertebrate species.

3.3.2 Amphibians

No ponds occur on the Site. No ponds were identified from aerial photographs or Ordnance Survey maps within 250 m of the Site. The area of woodland and scrub provides some limited terrestrial habitat for amphibians. However, the Site is almost entirely isolated from surrounding habitats by canals (to the east and south), a wide railway line (to the north) and the Yeading Brook (to the west). The canals have hard vertical banks which provide a significant barrier to dispersal. Likewise, the Yeading Brook is situated within a very steep sided gully that would prevent amphibians from crossing. Therefore, it is considered unlikely that any significant populations of amphibians occur on-site.

3.3.3 Reptiles

The mixture of ephemeral / short perennial vegetation and scattered scrub provides suitable habitat for reptiles. However, the isolating landscape features surrounding the Site (see section 3.3.2) provide significant barriers to prevent colonisation by reptiles. The extensive trapping programme completed in 2007, failed to record any reptiles. It is understood that reptile fencing was installed along the northern boundary to prevent the potential colonisation of the Site from the railway line; however the condition of the fencing could not be verified as the area could not be accessed due to the steep slopes of the bund and the dense vegetation. Overall, it is considered unlikely that reptiles are present on the Site.

3.3.4 Birds

The scrub on the Site provides suitable bird breeding habitat for a range of common and widespread bird species, although the relatively small size of the Site will limit the overall population of any species that might be present.

3.3.5 Bats

No potential bat roosts were identified within the Site boundary. The trees within the broad-leaved woodland along the eastern boundary are semi-mature and lack features that could support roosting bats. However, two derelict buildings to the south-east of the Site on adjacent land, were assessed to have medium bat roost potential (Photograph 7).

The habitats on-site are assessed as suitable to support foraging bats. The broad-leaved woodland along the Paddington branch of the Grand Union Canal and along the Yeading Brook both have the characteristics typically used by commuting bats.

3.4 Bat Survey Results

A total of nine bat passes were recorded during the activity survey (see Table 3.2 and Figure 2.1). Two species were recorded, common pipistrelle *Pipistrellus pipistrellus* and soprano pipistrelle *Pipistrellus pygmaeus*. The first common pipistrelle bat appeared 46 minutes after sunset, and the others intermittently during the survey period. The timing of the bats observed suggests that there are no nearby roosts present.

Table 3.2: Bat Survey Results		
Time	Location (Figure 2.1)	Observation
19:26	7	Common pipistrelle travelling S-N along tree canopy.
19:49	1	Common pipistrelle faintly detected, unseen.
20:10	2	Common pipistrelle, unseen.
20:10	3	Common pipistrelle overhead
20:19	3	Common pipistrelle flying E-W through under-pass, and across old bridge.
20:29	4	Soprano pipistrelle pass, unseen.
21:04	5	Common pipistrelle faintly detected, unseen. Other side of bank/tree-line.
21:08-10	6	Common pipistrelle and soprano pipistrelle foraging nearby. Other side of bank/tree-line.

The Anabat located on Yeading Brook (Anabat 1, Figure 2.1) recorded a total of 133 bat passes including, 92 soprano pipistrelle, 34 common pipistrelle and 5 *Myotis* sp.. The Anabat located on the eastern boundary of the Site (Anabat 2, Figure 2.1) recorded a total of 75 bat passes including 36 soprano pipistrelle, 35 common pipistrelle and 3 *Myotis* sp.. A single Nathusius' pipistrelle *Pipistrellus nathusii*, a rare migratory bat species, was recorded at 01:52 on the 3rd October 2011. The number of bat passes recorded was not large given the length of time that the detectors were in the field. However, the recording of the *Myotis* sp. bats and the Nathusius' pipistrelle increase the Site's significance in relation to bats.

3.5 Invasive Plant Species

Giant hogweed *Heracleum mantegazzianum* is present on the roadside verge along the DHL access road (Photograph 3) and within the dense scrub on the banks of the Yeading Brook. Japanese knotweed *Fallopia japonica* is also present along the Yeading Brook (Photograph 8). It is possible that Japanese knotweed is also present along the Site's boundaries in areas that were inaccessible during the present survey.

3.6 Ecological Assessment

The habitats on-site are assessed for their ecological value at levels described in Table 3.3.

Table 3.3: Ecological Assessment of Habitats		
Habitat	Value	Reasoning
Tall ruderal	Site only	Small area of common and widespread habitat of recent origin, lacking in naturalness or fragility.
Ephemeral / short perennial	Site only	Small area of common and widespread habitat of recent origin, lacking in naturalness or fragility.
Dense scrub	Local	The dense scrub on the banks of Yeading Brook form part of a wildlife corridor between designated sites situated to the north and the south of the Site.
Scattered scrub	Site only	Small area of common and widespread habitat of recent origin, lacking in naturalness or fragility.
Broad-leaved woodland	Metropolitan Level	Forms part of Grand Union Canal SINCS. Forms an important wildlife corridor between designated sites situated to the north and the south of the Site.
Invertebrates	Site only	The habitats on-site are likely to support a range of common and widespread invertebrate species.
Amphibians	Site only	It is considered unlikely that any significant populations of amphibians occur on-site.
Reptiles	Negligible	It is considered unlikely that reptiles are present on the Site.
Breeding birds	Site only	The small size of the Site will limit the overall population of any species that might be present.
Bats	Local	The Site's boundary features of the broad-leaved woodland (eastern boundary) and the Yeading Brook are assessed to be of Local importance for bats as commuting habitat due to the range of bat species recorded.

4 Consultations

Comments were received from LBH, NE and EA, following submission of a draft version of this report for their review. The comments received are summarised in Table 4.1, along with a description of how the scheme has been changed in light of the comments.

Table 4.1: Consultation Responses		
Consultee	Comment Received	Response
LBH Received from Ian Thynne, dated 13th December 2011.	Recommended pre-application discussions with Natural England. Commented that the Site is likely to support some types of wildlife and will play a role in foraging animals (bats and other mammals). It is also likely to play a role in the wider ecosystem, birds, worms, bees etc... Mitigation required for loss of habitats from the Site. Where this cannot be delivered on site, LBH would expect to see some offsite compensation, possibly through a S106 contribution – e.g. in this instance, it could be to improve areas alongside the canal or in Minet Country Park.	As recommended, Natural England was consulted (see response below). This report identifies the main habitats on-site and assesses the potential for protected and notable species to be present. Mitigation is described in the relevant section below.
NE Received from David Hammond (Lead Adviser), dated 11th January 2012	The approach and methodology are in line with the advice and guidance that would be offered by Natural England, covering the areas and issues of interest to Natural England. Natural England is pleased to see the consideration of the scheme proposal on the surrounding designated sites such as Minet Country Park, the Paddington Branch of the Grand Union Canal and Yeading Brook. The proposal for additional surveys as per Section 5.1 is to be welcomed and encouraged, especially in respect of noise, light and air pollution in both construction and operational phase of the scheme. Given that the proposal site is adjacent to local wildlife sites, e.g. Site of Nature Conservation Importance (SNCI) or Local Nature Reserve (LNR), as mentioned above, the county ecologist and/or local Wildlife Trust should be contacted. The developer or applicant should also be aware of the potential for species to traverse or use the site, especially in relation to the surrounding areas, therefore if representations from other parties highlight the possible presence, or the Council or applicant is aware of a	The impacts of noise and air pollution are dealt with by specific studies that have been completed and that will accompany the planning application. Potential impacts from lighting are addressed in the mitigation section of this report. The LBH ecologist has been consulted and the comments received are reported above. The potential presence of protected species has been considered and addressed with further surveys in relation to bats undertaken.

Table 4.1: Consultation Responses

Consultee	Comment Received	Response
	protected or Biodiversity Action Plan (BAP) species on the site, further survey information may need to be submitted to the Council before determining the application.	
EA Received from Natasha Smith (Sustainable Places Advisor), dated 6 th June 2012.	This site is adjacent to the Grand Union Canal and Yeading Brook as well as being surrounded by Local Wildlife Sites. As such an ecological assessment will need to accompany any planning application submitted. This assessment must address what the risks to these features are and the enhancements and mitigation proposed. There must be sufficient buffer zones between the development and the above features. This is usually a minimum of 8 m but will be informed by the results of the ecological assessment. The aim of the buffer zone is to maintain a natural habitat and wildlife corridor as well as allow access. The buffer zone to the Yeading Brook must be measured from the top of the bank. This is defined as the point at which the bank becomes level with the surrounding land.	This report provides an ecological assessment of the Site, assesses potential impacts and describes the proposed mitigation measures. A buffer of existing trees will be retained along the eastern Site boundary with the Paddington Branch of the Grand Union Canal. A buffer of new native shrub planting will established along the majority of the length of the Yeading Brook along the western Site boundary.

5 Proposed Development

5.1 Proposed Development Scope

The development proposals are for the construction and operation of an Aggregate Recycling Plant; Asphalt Production Plant; Gully Waste Recycling Plant; together with associated ancillary structures and facilities, car and HGV parking, regrading and landscaping.

The redevelopment proposals provide for:

- clearance and spreading of the existing bund material across the Site (as outlined in the Proposed Development's Land Contamination Strategy Report);
- capping of the Site with concrete and/or asphalt as appropriate for circulation and parking;
- construction of administration offices;
- construction of an Aggregate Recycling Plant;
- construction of a Gully Waste Recycling Plant;
- construction of an Asphalt Production Plant; and
- implementation of landscaping.

Upon completion the Aggregate Recycling Plant will have a maximum process and recycle capacity of approximately 300,000 tonnes per annum (tpa) of waste material extracted from pavements that will otherwise have been landfilled. Some of this material will be used within the Asphalt Production Plant which will at completion, have a production capacity of 300,000 tpa. In addition, the Gully Waste Recycling Plant, will accept material from road sweepers and gully suckers (that will otherwise have been sent to landfill) to recycle up to 20,000 tpa. The recycled water and the recovered solid materials from this process will be redirected back into the Aggregate Recycling Plant.

The Proposed Development's key objective will be to recycle all the waste materials that arise from the delivery of the Applicant's wide ranging services. These include asphalt; road and pavement sub base, paving, concrete and gully wastes such as gully waste and road sweepings.

The Proposed Development will also serve as an operating centre for the Applicant's Term Maintenance Division by providing parking for vehicles and storage for equipment and materials.

A maximum of 79 workers will be catered for at the Site upon completion of the full development which will include lorry drivers and Term Maintenance operatives working out of the Site.

5.2 Proposed Development Layout

Figure 5.1 illustrates the layout of the Proposed Development, which has been informed by a number of site limitations, environmental considerations and operational requirements, including:

- the constrained area of the Site, especially following the set back of the eastern Site boundary to safeguard existing woodland trees on-site and immediately to the east of the Site;

- environmental issues including the location of sensitive receptors, the visibility of the Site, the setting of the Site; the past uses at the Site;
- the Applicant's operational experience based on their existing facilities at Dartford and Erith;
- site logistical arrangements including internal circulation and swept path analyses; and
- design criteria, including the desire to ensure uniformity in building appearance and to 'contain' industrial features to least visible areas of the Site.

In light of the re-spread of existing bund material across the Site and capping layers on top, the current site levels are likely to be raised by up to a maximum of 1.2 m. These materials will be retained by means of a 1.2 m high retaining wall along the entire site perimeter. The following boundary treatment will be implemented on top of this retaining wall:

- north-west: 2.4 m palisade fence;
- north-east :6 m acoustic boundary wall;
- east: 7 m acoustic boundary wall;
- south-east: 3-5 m acoustic boundary wall with 1.2 m high landscaping planters;
- south: 2 m acoustic boundary wall with 1.2 m high landscaping planters; and
- west: 2.4 m palisade fence.

In all instances the walls, and their respective heights, are provided for acoustic attenuation purposes.

Road access will be provided from two points along the existing road - one access point to the main facility and one access point to the staff car parking located beneath the A312 Parkway.

The development layout will comprise the following:

Northern and North-Eastern Site Area:

- Aggregate Recycling Plant including Washing Plant and Inbound Material Stockpile up to 5 m high
- Low level cement silo
- Water storage tank
- Staff welfare and storage facilities

Eastern Site Area:

- Inbound storage bays
- Covered aggregate storage bays
- Site storage and/or parking (comprising hardstanding areas, enclosed as necessary)
- Water storage tank

Southern Site Area:

- Asphalt Plant
- Asphalt HGV tracking lanes and parking spaces
- Site storage

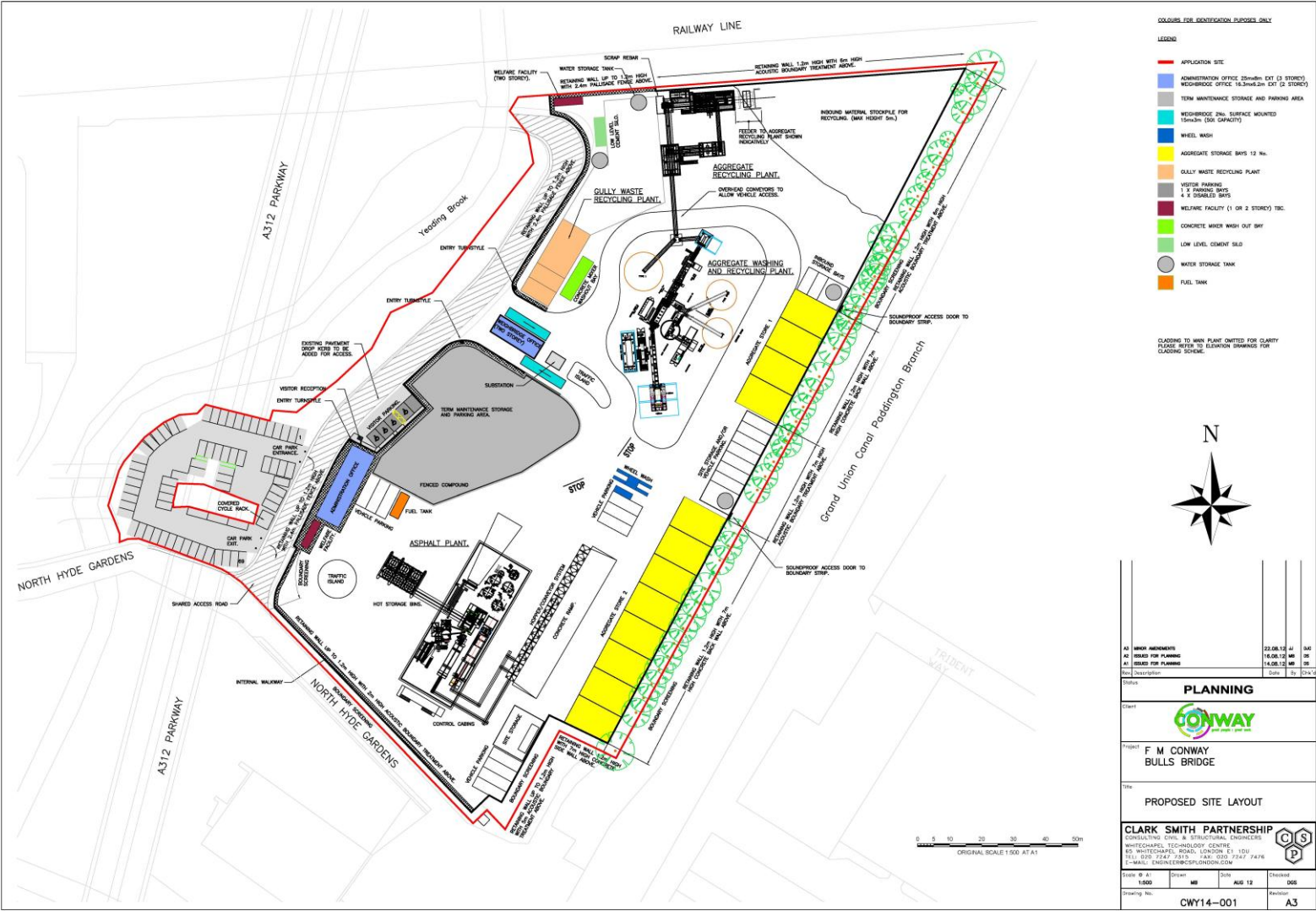


Figure 5.1: Proposed Development Layout

Western Site Area:

- Landscaped car park with 70 car parking spaces, five cycle and five motorcycle spaces
- Staff welfare facilities
- Office building and visitor car parking spaces
- Term Maintenance Yard (enclosed as necessary) and fuel storage areas
- Main site entrance point with entry and exit roads, incorporating weighbridges, on either side of the weighbridge office including the plant control room
- Gully Waste Recycling Plant
- Concrete washout bay
- Water storage tank
- Diesel fuel tank with 60,000 litre capacity and bunded containment of 110%.

Central Site Area:

- Hardstanding and circulation routes
- Drive-through wheel wash

5.3 Proposed Development Appearance**5.3.1 Massing and Scale**

The scale and massing of proposed buildings and structures are dictated by standard plant and process requirements, although a reduction in the height of the Asphalt Plant has been achieved during the design process by separating the proposed storage facility from the main production plant. This will limit visual impact considerably. The principal elements of the proposal will range from 7.55 to 27.8 m as outlined in Table 5.1.

Table 5.1: Proposed Development Built Heights	
Plant Component	Height above Finished Site Level
Aggregate Recycling Plant	9.5 and 10.4 m
Asphalt Plant	27.8 m
Asphalt Stack	30.0 m
Asphalt Storage Facility	20.0m
Aggregate Storage Bays	9.5 m
Office Buildings	Weighbridge Office 7.55m Admin Office 11.4m
Cement Silo	6 m
Welfare Facilities	Single storey 3m, stacked two storey 6 m
Water Storage Tanks	Up to 6 m and 4 m diameter
Acoustic Boundary Treatment	Up to 7 m

5.4 Materials and Finishes

Buildings will be steel frame constructed with holorib decking and concrete structural floors. Exterior finishes will be similar to that adopted at the Applicant's Erith and Dartford Facilities and therefore will comprise:

- proprietary metal composite roof panels with an approximate 5 degree duo pitch;
- non-combustible metal profiled panel system cladding, finished with a coloured PVC coating; and
- ventilation louvres at various external locations, which will be finished with a coloured polyester powder coating or standard paint finish.

The colour coding of the building elevations will comprise goose wing grey and Conway green. The same coding would be applied to welfare facilities and storage containers.

Process Plant will be fully enclosed and will comply with the noise limits prescribed in the Proposed Development's Noise and Vibration Impact Assessment.

5.5 Landscaping and Biodiversity Enhancements

Landscaping and biodiversity enhancement proposals, as shown in Figure 5.2, will comprise the following:

- a 1 m wide strip of ivy planting along the northern Site boundary;
- a 1m wide strip of ivy planting along the eastern Site boundary, in addition to approximately 4 m of native woodland understorey shrub, ground layer planting and twining plants (on the existing chain link fence);
- two new semi mature maple trees along the eastern Site boundary to complete the existing row;
- 2 - 5 m wide terrace planting on the south-eastern Site boundary with native thicket planting and specimen trees;
- 2 m wide planting on the southern and south-western Site boundary with native thicket planting and specimen trees;
- native thicket planting in the car parking area, as well as the western boundary along the Yeading Brook with ground cover planting and occasional trees, space permitting;
- living roofs (brown roofs) on the two aggregate storage bays;
- timber cladding to the perimeter acoustic wall where appropriate; and
- bird and bat boxes within the existing woodland.

In total an area of approximately 3,000 m² will be landscaped, whilst up to 1,200 m² will be provided as living (brown) roofs.



6 Potential Impacts

6.1 Designated Sites

Two non-statutory designated sites lie in very close proximity to the Site - Yeading Brook, Minet Country Park and Hitherbroom Park SBINC located approximately 25 m to the north of the Site and London Canals SMINC located on the Site's eastern boundary. The Proposed Development has the potential to cause impacts to these two sites from a variety of construction and operational activities and processes. These include:

- direct impacts from the physical construction of the Proposed Development;
- indirect impacts from pollution (from spills, run-off and air deposition);
- indirect impacts from noise disturbance; and
- indirect impacts from light spill.

To assess the potential impacts on these designated sites, additional studies have been commissioned by the Applicant, including an air quality impact assessment and a noise impact assessment. In addition, a detailed lighting design including 3D isolux plans will be developed at the detailed design stage. The detailed results of the noise and air quality impact assessments are provided in separate reports. However, no significant negative impacts to designated sites are expected to occur from either noise pollution or air quality.

The boundary wall to be constructed alongside the woodland within the London Canals SMINC has the potential to harm the roots and aerial parts of the trees. An arboricultural survey of the Site has been carried out and reported separately (Tim Moya Associates, 2012⁸). The boundary wall along the eastern boundary of the Site will avoid the root protection areas and all construction works will be outside the tree protection zone, although minor pruning might be required in places. In conclusion, the Proposed Development is unlikely to cause any significant negative impacts to designated sites.

6.2 Habitats

The Proposed Development proposes to level the existing bunded stockpiled material that surrounds the Site boundary. This will remove majority of the existing habitats on the Site including the ephemeral / short perennial vegetation, tall ruderal and scrub. In addition, the area of dense scrub on the western side of the DHL access road will be removed to make way for car parking. The loss of these habitats will cause a negative ecological impact, however the significance of the impacts is limited to the Site-level only.

6.3 Species

6.3.1 Invertebrates

The Proposed Development would result in the loss of a relatively small area of habitat that is likely to support a range of common and widespread species; however the significance of the impact is unlikely to be significant beyond the Site-level.

⁸ Tim Moya Associates, 2012. Arboricultural Report Assessment of trees in relation to development for planning purposes: Former Powergen Site, Bulls Bridge Road, Southall, Greater London, UB2 5LU. Report reference 211205-PD-11.

6.3.2 Amphibians

Due to their probable absence from the Site, there is unlikely to be any significant impacts to amphibian populations as a result of the Proposed Development.

6.3.3 Reptiles

Reptiles are considered unlikely to be present within the Site. Therefore, no significant impacts to reptile populations are considered likely to occur as a result of the Proposed Development.

6.3.4 Birds

The Proposed Development will remove a small area nesting and foraging habitat for birds. However, the impacts at the population level are unlikely to be significant. There is the potential for individual nests to be destroyed or damaged when vegetation is cleared depending on the timing of such works. Therefore, any significant negative impacts are likely to be limited to the Site-level only.

6.3.5 Bats

No bat roosts are considered to be present on Site and therefore no roosts will be destroyed as a result of the Proposed Development. Bat species belonging to the genus *Myotis* tend to be sensitive to artificial light levels. Therefore, additional artificial lighting of commuting corridors could, in the absence of appropriate mitigation, cause a permanent significant negative impact at the Local level. This would include both the Grand Union Canal Paddington Branch and the Yeading Brook.

7 Mitigation

7.1 Designated Sites

It is understood that in relation to noise, anticipated mitigation will include the appropriate enclosure of potentially noisy plant and the erection of acoustically attenuated boundary walls.

The operation of equipment associated with site preparation and construction of the Proposed Development will have the potential to result in noise impacts at existing noise sensitive receptors in the vicinity of the Site. In order to predict and assess the potential impact, noise predictions have been undertaken using the noise modelling suite Cadna/A, which implements the full range of UK calculation methods, including British Standard 5228. The results of the construction noise predictions and assessment identified that construction noise levels are likely to remain well below the levels recommended within the Standard at all receptor locations. Standard, best practicable management measures and controls will be adopted at the Site and will be implemented through adherence to a Construction Environmental Management Plan (CEMP) to be secured by means of an appropriately worded planning condition.

The noise prediction and assessment for the Proposed Development identify that once operational, both daytime and night-time $L_{Aeq,T}$ specific noise levels are predicted to remain within the target criteria adopted for the assessment at all sensitive receptor locations. The $L_{A_{r,T}}$ rating noise level is predicted to remain at least 5dB below the quietest $L_{A90,T}$ background noise level at all existing traditional residential receptor locations, which is considered to demonstrate that the impact of noise from the Proposed Development will be adequately controlled and ensure that complaints are unlikely.

In addition, no detectable increase in noise has been predicted within ecological receptors. As such, no further mitigation measures will be required to reduce the impact of operational noise, and the requirements of the LBH will be met.

In relation to air quality, it is understood that the Applicant will adopt strict construction management measures and controls, as set out in the Institute of Air Quality and Management Guidance, to reduce impacts from a medium/high risk site such as this and ensure that the residual effects are Negligible during the course of construction works

Once operational, the proposed recycling plant will incorporate the latest technology to eliminate and reduce emissions, as far as practicable, and to optimise energy efficiency and performance. Measures will meet current best available techniques and will include:

- applying dust suppression sprays;
- enclosing potentially dusty operations;
- dampening down of stockpiles; and
- implementing a fugitive emissions plan.

Emissions to air of NO_x and fine particulates will arise from the operation of the rotary driers associated with the asphalt plant. Although combustion gases will be passed through a bag filter to remove particulate matter, before being emitted to atmosphere through a 30m raised stack, the main impact from these emissions will arise at receptors closest to the Site, including the leisure moorings and Minet Country Park. In these locations the operation of

the asphalt plant is likely to result in a small increase in NO₂ concentrations with, at maximum, a medium increase in PM₁₀ and PM_{2.5} concentrations.

In addition, the development proposals will result in new road vehicle movements on local roads. The assessment of vehicle emission impacts has indicated that this will result in a medium increase in NO₂ concentrations at the residential properties on North Hyde Garden and a small increase at residential properties on North Hyde Road.

The significance of impacts takes into account both the increase in concentrations and the existing poor baseline air quality. Due to the existing high concentrations of NO₂, the impact of the Proposed Development is considered to result in a slight adverse impact at ecological receptors. With regards to PM₁₀ the development proposals result in a negligible impact at ecological receptors, whilst for PM_{2.5} the Proposed Development is predicted to result in a negligible to slight adverse impact, although concentrations are predicted to remain comfortably within the objective.

In relation to physical damage to the existing woodland trees within the London Canals SMINC during the construction of the eastern boundary wall, potential impacts will be avoided through the implementation of appropriate tree protection measures in accordance with BS5837 *Trees in Relation to Construction: Recommendations* (see arboricultural report). As such the wall will be set back by approximately 5 m from the boundary line to avoid root protection areas and all construction works will be undertaken outside the tree protection zone, although minor pruning might be required in places.

In relation to light spill, a detailed lighting design for the Site will be developed during the detailed design stage to produce 3D isolux plans. The lighting design will demonstrate that light spill to the scrub and woodland habitats surrounding the Grand Union Canal and the Yeading Brook will be minimised as far as possible to ensure both safe on-site working conditions and maintenance of existing background light levels. Where this is not possible; increases of no more than 0.1 lux will be targeted.

The risk of contamination will be addressed through the development of a Land Remediation Strategy, as well as the development of and implementation of a CEMP. The CEMP will include standard mitigation measures such as the appropriate storage and filling of fuels, oils, lubricants away from surface water bodies, seals and the field deployment of spill kits to ensure that in the unlikely event that accidental spillages occur during the construction works, risks are minimised. A similar document will be produced for the operational stage of the Proposed Development.

7.2 Habitats

The Proposed Development's landscape proposals are illustrated in Figure 5.2 and described in section 5.5.

Due to the limited size of the Site and the Proposed Development's operational space requirements, it is not possible to incorporate any significant areas of soft landscaping that could provide new replacement habitats.

However, the eastern boundary wall has been set back to safeguard the existing on-site and adjacent woodland trees. The boundary wall will avoid these trees' root protection areas and all construction works will be undertaken outside the tree protection zone, although minor pruning might be required in places.

In addition, approximately 3,000 m² of the Site will be landscaped, whilst up to 1,200 m² will be provided as living (brown) roofs.

7.3 Amphibians and Reptiles

It is not considered likely that any amphibians and reptiles are present on-site and no specific mitigation measures are therefore recommended.

7.4 Breeding Birds

The scrub and broad-leaved woodland have the potential to support some breeding birds. Accordingly to avoid potential impacts on these breeding birds and Wildlife and Country Act offences, vegetation clearance and demolition works should be timed to take place between September and February (inclusive) outside the main bird breeding season.

Bird boxes suitable for hole nesting species such as house sparrows and starlings will be provided. In addition boxes suitable for swifts, will be provided. The exact number and location of the bird boxes would be decided in conjunction with an experienced ornithologist at the detailed design stage.

7.5 Bats

As mentioned earlier, a detailed lighting design will be produced in consultation with an experienced bat ecologist and an isolux plan produced for approval by the LBH. The main habitat features that could provide bat commuting corridors, including the Grand Union Canal Paddington Branch and the Yeading Brook, should be maintained at background light levels or not exceed a 0.1 lux increase. Appropriate lighting design will also be employed to ensure that the Proposed Development does not cause light spill onto the two off-site derelict buildings to the south-east.

Proposed buildings situated alongside the Site's boundaries could be suitable for the incorporation of bat boxes. The precise number and location of bat boxes would be decided in conjunction with an experienced bat ecologist.

7.6 Invasive Plant Species

The Proposed Development's Land Remediation Strategy will ensure the eradication of Japanese knotweed and giant hogweed.

Annex A: Legislation and Policy Framework

National Legislation and Policy

Ecological features are protected under various United Kingdom (UK) and European legislative instruments. These are described below. European legislation is not included as it is incorporated in UK legislation by domestic provisions.

The Countryside and Rights of Way Act, 2000

The Countryside and Rights of Way Act 2000⁹ primarily extends to England and Wales. It provides a new statutory right of access to the countryside and modernises the rights of way system, bringing into force stronger protection for both wildlife and countryside.

The Act is divided into five distinct sections, Part III is of relevance to ecology:

Part III - Nature Conservation and Wildlife Protection: The Act details a number of measures to promote and enhance wildlife conservation. These measures include improving protection for Sites of Special Scientific Interest (SSSIs) and increasing penalties for deliberate damage to SSSIs. Furthermore, the Act affords statutory protection to Ramsar Sites which are wetlands designated under the International Convention on Wetlands;

Wildlife and Countryside Act 1981, as Amended in Quinquennial Review and by the Countryside and Rights of Way Act 2000

The Wildlife and Countryside Act 1981¹⁰ forms the basis of much of the statutory wildlife protection in the UK. Part I deals with the protection of plants, birds and other animals and Part II deals with the designation of SSSIs.

This Act covers the following broad areas:

Wildlife - listing endangered or rare species in need of protection and creating offences for killing, disturbing or injuring such species. Additionally, the disturbance of any nesting bird during breeding season is also noted as an offence;

Nature Conservation - protecting those Sites which are National Nature Reserves (NNR) and Sites of Special Scientific Interest;

Public Rights of Way - placing a duty on the local authority (normally the County Council) to maintain a definitive map of footpaths and rights of way. It also requires that landowners ensure that footpaths and rights of way are continually accessible; and Miscellaneous General Provisions.

The Act also makes it an offence to cause to grow in the wild certain plant species.

⁹Secretary of State, 2000. The Countryside and Rights of Way Act. Her Majesty's Stationery Office

¹⁰Secretary of State, 1981. Wildlife and Countryside Act. Her Majesty's Stationery Office

The Act is enforced by local authorities.

The Conservation of Habitats and Species Regulations 2010

In 1992 the Habitats Directive (Council Directive 92/43/EEC)¹¹ came into force. This provides for the creation of a network of protected wildlife areas across the European Union, known as 'Natura 2000'. The Natura 2000 network will consist of Special Areas of Conservation (SACs) designated under the Habitats Directive and Special Protection Areas (SPAs) designated under the Birds Directive (Council Directive 79/409/EEC).¹² These Sites are part of a range of measures aimed at conserving important or threatened habitats and species.

The Conservation of Habitats and Species Regulations 2010 commonly known as 'the Habitats Regulations' transpose the Habitats Directive into national law and set out the provisions for the protection and management of species and habitats of European importance, including Natura 2000 sites. The Regulations have been amended in England in relation to candidate SACs. These are Sites submitted by the Government for consideration as Natura 2000, and are also now defined as European Sites. All European Sites are of national importance and have been notified as SSSI.

Biodiversity Action Plans

In 1994, Government produced the UK Biodiversity Action Plan (BAP)¹³, a national strategy for the conservation of biodiversity. This led to the creation of the UK Biodiversity Steering Group, which has published 391 Species Action Plans (SAPs) and 45 Habitat Action Plans (HAPs). Regional and District/Borough BAPs apply the UK BAP at a local level.

London Biodiversity Action Plan

The London Biodiversity Action Plan (BAP) has 26 action plans for habitats and species that are important in London:

Habitats

- acid grassland
- built structures
- canals
- chalk grassland
- churchyards & cemeteries
- heathland
- parks & urban greenspaces
- private gardens
- reedbeds
- rivers and streams

¹¹European Commission, 1992. Council Directive 92/43/EEC on the conservation of natural habitats and of wild fauna and flora. European Commission, Brussels.

¹²European Commission, 1979. Council Directive 79/409/EEC on the conservation of wild birds, European Commission, Brussels.

¹³ Her Majesty's Stationery Office, 1994. Biodiversity: The UK Action Plan. London.

- standing water
- tidal Thames
- wasteland
- woodland

Species

- bats
- black poplar
- black redstart
- grey heron
- house sparrow
- mistletoe
- peregrine falcon
- reptiles
- sand martin
- stag beetle
- tower mustard
- water vole

Annex B: Site Photographs



Photo 1: Tall ruderal vegetation on the bund.



Photo 2: Ephemeral / short perennial vegetation in centre of the Site.

Title:	Ecological Impact Assessment	Client:	FM Conway
Site:	Aggregate Recycling and Asphalt Plant, Bulls Bridge	Date:	02 November 2011



Photo 3: DHL access road, with scrub and short perennial vegetation on verge. Giant Hogweed also visible.



Photo 4: Scrub along North Hyde Gardens Road

Title:	Ecological Impact Assessment	Client:	FM Conway
Site:	Aggregate Recycling and Asphalt Plant, Bulls Bridge	Date:	02 November 2011



Photo 5: Scattered butterfly bush scrub in north east corner of the Site.



Photo 6: Broad-leaved woodland along eastern boundary.

Title:	Ecological Impact Assessment	Client:	FM Conway
Site:	Aggregate Recycling and Asphalt Plant, Bulls Bridge	Date:	02 November 2011



Photo 7: Two derelict buildings (off-site) with medium bat roost potential.

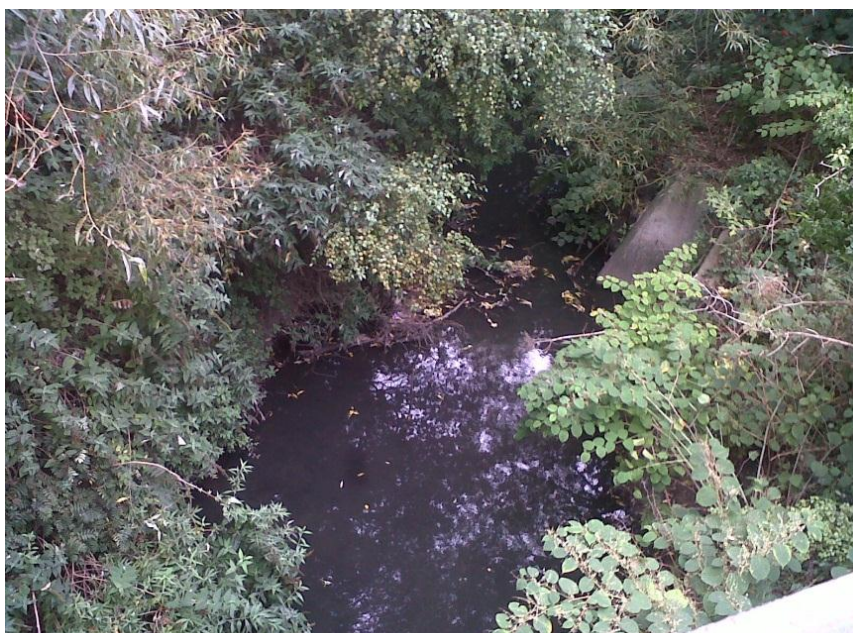


Photo 8: Yeading Brook. Japanese knotweed visible in bottom right corner.

Title: Ecological Impact Assessment	Client: FM Conway
Site: Aggregate Recycling and Asphalt Plant, Bulls Bridge	Date: 02 November 2011