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Submitted by: 2352658

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21 Nov 2024, 12:14:08

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21 Nov 2024, 13:33:58

Compliance Assessment Report 1 for Landfill Sites

Inspection Team

PPC

assignment_title

BT41 3SE, TOOMEBRIDGE, BT41 3SE

Company

ENVA (NI) Ltd

PPC/WML ID

P0618/24A

Operator

Enva

Second Officer ID

Colin millar

General weather conditions

- **Sunny**

Waste Type

- **Hazardous**

Inspection Type

Scheduled Monitoring

Is the site operational?

Yes

Location Data

Site Location

Lat: 54.751985 Lon: -6.486757

Inspection Results

1. Specified operations

0

2. Permitted waste types and quantities

0

3. Staff understanding of permit

0

4. Engineered Landfill Containment Systems

N/A

5. Leachate management and monitoring systems

N/A

6. Landfill Gas management and monitoring systems

0

7. Surface water management systems

0

8. Installation, maintenance and protection of final cap

N/A

9. Site Identification Board

0

10. Site Security

0

11. Control of mud and debris

0

12. Potentially polluting leaks and spillages

0

13. Fires on site

0

14. Waste acceptance and control procedures

0

15. Record of specified operation

0

16. Daily and intermediate cover

N/A

17. Phasing and methods of discharge and emplacement

N/A

18. Monitoring/control of dusts, fibres and particulates

0

19. Monitoring and Control of Odours

0

20. Control of noise

0

21. Control of pest infestations

0

22. Control of litter

0

23. Monitoring and control of Birds/Scavenging Animals

0

24. Security and availability of records

NI

25. Maintenance of financial provision

Yes

General Comments

Fridges located outside required process

Additional Photos

Photo

additional_photos-20241121-123109.jpg

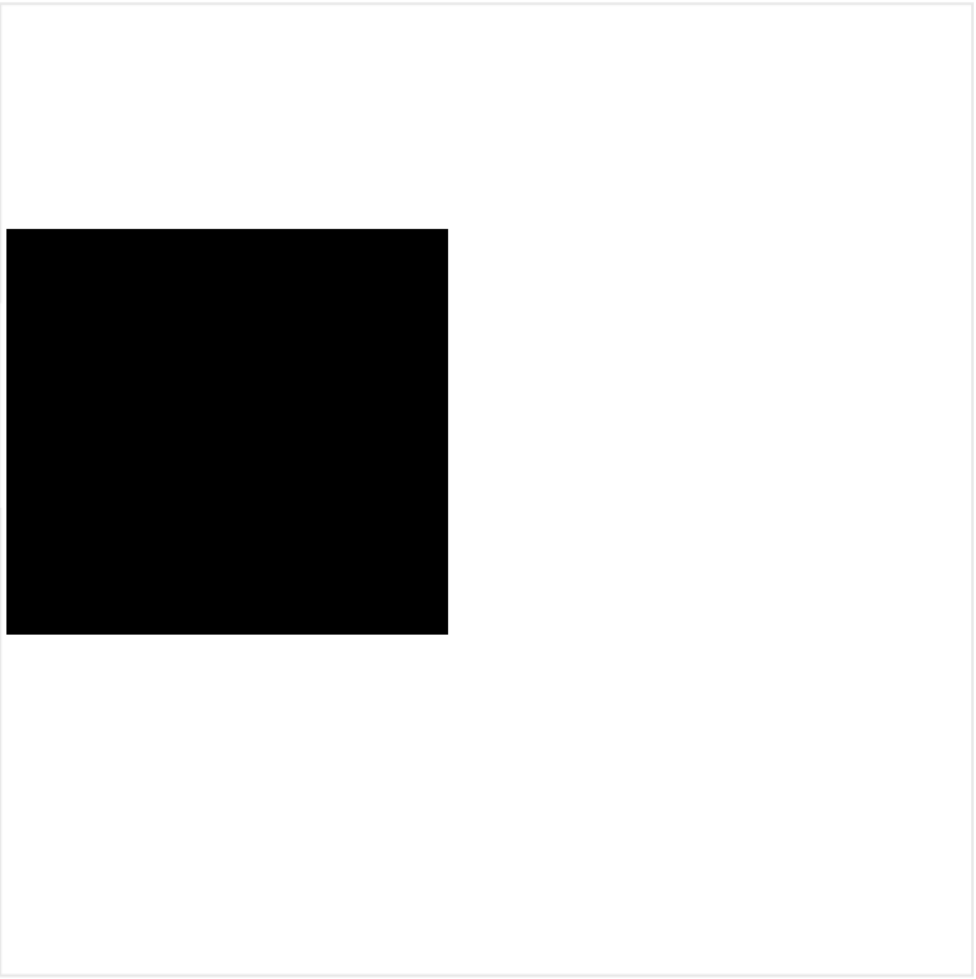
additional_photos-20241121-130458.jpg

DAERA Privacy Statement

Privacy Statement Confirmation

- **I accept the DAERA Privacy Statement**

Operator/Licence Holder Signature



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First Name

[redacted]

Surname

[redacted]

Position

Operation Manager

Lead Officer Signature

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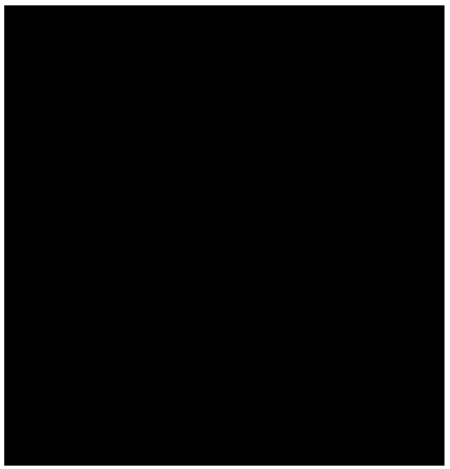
Second Officer Signature



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	ACTION - FIRE RISK ASSESSMENT 2024	RATING	WHO	WHAT	WHEN
1	Recommend that ongoing assessments are carried out regarding the control of flammable gases and liquids used and stored on the premises and any hot work carried out on site as per the Dangerous Substances and Explosive Atmospheres Regulations 2002. This assessment should include flammable gases which are recovered during the process of recycling fridges	**A**	LD / GF	On-going and continuous assessment of risks Fridge Plant process audited externally by Weeelabex Organisation and NQA annually - along with regular internal audits	On-going
2	Certificates from appropriate contractors should be provided for the fire alarm system, emergency lighting, fire extinguishers, electrical inspections, prior to the premises being occupied and operational	**A**	CM / OB Construction	All documentation to be supplied prior to Plant commissioning	24th June 2024
3	A self-closing fire door to be fitted in maintenance workshop and switch room prior to the site becoming operational and occupied	**A**	OB Construction	Door is on site and will be installed when construction works are complete	24th June 2024
4	Openings at ceiling level in the maintenance workshop and switch room should be sealed with fire resisting material to provide separation in case of fire for no less than 30 minutes.	B	OB Construction	To be completed before construction works are complete	24th June 2024
5	Corrective action is required to have the directional exit emergency fitting at the final exit door on the LHS of the premises, visible	**B**	J O'D	This will be managed internally by Enva - relatively easy correction	24th June 2024
6	Fire Safety signs should be installed prior to the sited becoming operational and occupied	**A**	CM	Signs ordered on Monday 3rd June - due delivery in 10 days and will be installed before commissioning	24th June 2024
7	Recommend providing a manual call point in the high-risk electrical switch room to raise the alarm manually.	**A**	J O'D	This will be managed internally by Enva - relatively easy correction	24th June 2024
8	Dust covers should be removed from automatic detectors in the maintenance workshop at the time of commissioning the fire alarm system.	**A**	OB Construction	To be completed before construction works are complete	24th June 2024
9	A zone plan for the fire alarm system should be available at the fire alarm panel.	**B**	OB Construction	To be completed before construction works are complete	24th June 2024
10	Firefighting equipment to be installed as per BS 5306 part 3 2017 prior to the sited becoming operational and occupied.	**A**	CM	To be completed before construction works are complete	24th June 2024
11	Consideration should be given to inviting the local fire crews to carry out a familiarisation visit of the site.	**C**	CM	Invitation will be extended to local crews post-startup	Aug-24
12	A fire evacuation drill is to be carried out on occupation and six-monthly thereafter.	**A**	LD / GF	Noted and planned	On-going

13	Insulated core cladding is used in the construction of the premises, a check may need to be made of the cladding used to ensure materials are of limited combustibility for the purpose of building protection.	**E**	CM	On-going checks supported by regular inspections by HSEQ Officer	On-going

Habitats Regulations Assessment

In accordance with Regulation 43(1) of the Conservation (Natural Habitats, etc) Regulations (Northern Ireland) 1995 (as amended), NIEA has considered whether the application either alone or in combination (neither being directly connected with or necessary to the management of the site) is likely to have a significant effect on the Natura 2000 site.

As part of that consideration, NIEA has:-
(a) taken into account the mitigation measures contained in the application, along with all legally enforceable obligations designed to avoid environmental effects; and

(b) applied the precautionary approach set out in Commission Guidance: Managing Natura 2000 Sites and as required by the European Court of Justice in C-127/02 (Waddenzee).

Stage 1: Test of Likely Significance

Name of Project or Plan.	ENVA Fridge Plant, Toomebridge
Project reference *(Planning ref. etc.):*	LA09 2022 1268 F
File number:	P0618/24A
Name and location of Natura 2000 site.	The SPA of Lough Neagh and Lough Beg (UK9020091) is located 641.77m away from the site, as shown on the location map in content manager.

Natura 2000 site features: (refer to JNCC website)	**Lough Neagh and Lough Beg SPA (UK9020091)** Lough Neagh is a large, shallow, eutrophic lake contained within Counties Antrim, Down, Londonderry and Tyrone. Lough Neagh is the largest freshwater lake in the UK and is one of the top ten sites in the UK for wintering waterfowl (based on annual mean numbers). The SPA also includes the smaller lakes, Lough Beg and Portmore Lough. The main habitats within the SPA are open water with beds of submerged aquatic vegetation, species-rich wet grassland, reedbed, islands, swamp, fen and carr woodland. The SPA supports internationally important numbers of wintering waterfowl and is internationally important for a number of wildfowl species including Whooper Swan, Bewick's Swan, Pochard, Tufted Duck, Scaup and Goldeneye. It is also internationally important for breeding Common Tern. The boundary takes in the main waterbodies, including Portmore Lough and Lough Beg, together with all adjoining natural and semi-natural habitat of conservation significance. All islands within Lough Neagh are also included. Adjoining agriculturally improved areas utilised by swans have not been included but their importance must not be underestimated. The Conservation Objectives for this site are: To maintain each feature in favourable condition. SPA SELECTION FEATURE OBJECTIVES To maintain or enhance the population of the qualifying species Fledging success sufficient to maintain or enhance population To maintain or enhance the range of habitats utilised by the qualifying species To ensure that the integrity of the site is maintained; To ensure there is no significant disturbance of the species and to ensure that the following are maintained in the long term: - Population of the species as a viable component of the site - Distribution of the species within site - Distribution and extent of habitats supporting the species - Structure, function and supporting processes of habitats supporting the species

	The list below is not exhaustive, but deals with the most likely factors that are either affecting Lough Neagh SPA, or could affect it in the future. Adjoining habitat, Boating activity – commercial and recreational, Coastal (shoreline) protection schemes, Cull of fledglings/ young, Drainage, Enhanced bird competition, Fishing – commercial or recreational, Habitat extent – open water,

	Habitat quality – open water, Habitat extent and quality-breeding, Introduced species, Power cables, Predation, Recreational activities, Research activities, Sand dredging – commercial, System dynamics, Water abstraction, Water level control, Wildfowling, grazing and changes in Abiotic and Biotic conditions.
Description of the Project or Plan • **Size and scale;** • **Land-take;** • **Distance from Natura 2000 site or key features of the site;** • **Resource requirements (water abstraction etc);** • **Emission (disposal to land, water or air);** • **Excavation requirements;** • **Transportation requirements;** • **Duration of construction, operation, de-commissioning etc;** • **Other.**	Size and scale- The total area of the site is approximately 1.78 hectares. Land-take Land take from any Natura 2000 site will not occur. Distance from Natura 2000 site or key features of the site **Lough Neagh and Lough Beg SPA-** approx. 641.77m Resource requirements (water abstraction etc) Not applicable Emission (disposal to land, water or air) There are two point source emissions to air as a result of the ventilation from the dust and gas collection systems at the proposed installation. Air from the system is passed through filters and a cryo-condensation system prior to discharge and is monitored for elevated Pentane and other HC-concentrations and the results displayed at the control panel. If these are elevated an alarm sounds and the system will shut down. Air from the dust collection system is passed through a filter prior to being discharged to atmosphere. Both of the point source emissions systems are monitored using the PLC and the systems can be shut down in the event of any issues such as failure of the filter system. Sensors are located within the exhaust to ensure that the CFC concentration is ≤20mg/m_3 and Isopentane/Cyclopentane ≤50mg/m_3. There are also fugitive emissions because of operations undertaken within the facility when the doors are open. To address this, hard standing areas will be manually swept and hovered as and when required to remove the build-up of dust. Dust extraction has been installed within the plant to reduce the fugitive emission of dust on the

	site. Procedures are in place for the monitoring of visible emissions (e.g. dusts, fibres and particulates) from the installation. The installation will be visually inspected for evidence of emissions during waste handling operations. Should emissions be identified, action is taken to identify the source and prevent the emission.

	There is no drainage from the Fridge plant process and therefore no emissions to surface or groundwater. All skips, drums and other mobile tanks and containers used for the storage and treatment of wastes shall be constructed and maintained so that they do not leak any liquids contained in them. All fixed tanks; fixed bays and other fixed containers used for the storage and treatment of wastes are constructed and maintained to a standard which is fit for purpose. All storage of liquids on site shall be bunded with a capacity in excess of 110% of the largest tank. The waste holds small quantities of liquids and spill kits are provided at various locations at the installation to deal with any leaks or spills. Tanks / vessels will be regularly inspected and inspections recorded in the site diary. All tanks / vessels will be identified with the date of installation and their anticipated design life. The facility will receive a range of hazardous and non-hazardous wastes which will be stored internally within the building. Containment of all hazardous waste substances is realised by its placement on the concrete floor which has no drainage system thereby minimising the risk of groundwater pollution. There are no emissions to surface water or sewer other than clean rainfall runoff from the building roof. The building has a concrete impervious floor without any need for drainage. The surface water from the roof enters the wider site drainage network and passes through a by-pass separator (interceptor) located to the south of the building (52 Creagh Road site) prior to discharge to storm sewer. Domestic wastewater does not arise in this building as the welfare facilities are located elsewhere in the wider Site. This waste water is discharged to the NI Water foul sewer. The most significant risk from the installation to designated sites is considered to be that from the escape of contaminants to groundwater and surface water. Appropriate mitigation measures and safe working practices have been incorporated into the design and operational procedures for the installation to minimise risk to the environment and the measures in place to protect groundwater and surface water are detailed above. The nature of the waste being treated also means

	that the potential for liquids to escape is very limited as there are only small quantities of liquids involved. Further, the storage and processing of the waste within the building means that there is no leaching potential from the action of rainwater on the waste.

	In addition, the management procedures in place to deal with spills and the control of the process with the use of sensors and a PLC means that the potential for any emission is very low and the potential for any emission to impact surface water and in turn, groundwater is very low as there is no direct connectivity from the surface of the building floor to surface water. Therefore, the risk to groundwater and consequently Lough Neagh, is negligible.

Is the proposal directly connected with or necessary to management of the site for conservation of N2K features? **If yes proceed no further.**	No
Describe the individual elements of the project (either alone or in combination with other plans or projects) likely to give rise to impacts on the Natura 2000 site.	

N2K Feature: Mention all features	**Describe any likely direct or indirect effects to the N2K features arising as a result of:** • **loss;** • **reduction of habitat area;** • **disturbance;** • **habitat or species fragmentation;** • **reduction in species density;** • **changes in key indicators of conservation value (e.g. water quality, climate change).**	***Effect Significant/Not Significant? Why?**
	Surface water contamination- *presence of Blue/Green in Lough Neagh being of particular concern in recent times*	NOT SIGNIFICANT There is no drainage from the Fridge plant process and therefore no emissions to surface water. In addition to the information provided above, fuel storage will comply with The Control of Pollution (Oil Storage) Regulations (Northern Ireland) 2010, as amended by The Control of Pollution (Oil Storage) (Amendment) Regulations (Northern Ireland) 2011.
	Groundwater contamination	NOT SIGNIFICANT The site is located in an area where there is low GW vulnerability with >3 m of superficial deposits above the bedrock. Leaching will be limited as the soils will be covered by extensive hardstanding. As detailed above, the receipt and processing of the refrigeration units is confined to the building, with only

		recovered products removed and no external storage proposed. The building is a purpose built facility, with an impermeable concrete floor. The process itself is undertaken in an enclosed system which will prevent any spills, but even if a spill occurs then the floor will prevent these from entering the environment, particularly with the small volumes of fluids being managed.
	Noise	NOT SIGNIFICANT A noise assessment has been booked for Safety Advice Centre (SAC) during the Plant's testing and commissioning phase.
	Air emissions	NOT SIGNIFICANT There are two point source emissions to air as a result of the ventilation from the dust and gas collection systems at the proposed installation. As detailed above, point source emission systems are monitored and alarmed using the PLC and can be shut down in the event of any issues such as failure of the filter system. As mentioned, Dust extraction has been installed within the plant to reduce the fugitive emission of dust on the site. Procedures are in place for the monitoring of visible emissions (e.g. dusts, fibres and particulates) from the installation. Liquid Nitrogen is one of the key elements of this process therefore it's important to includde that if this were to spill it would quickly vaporize. This would be classed as a fugitive emission, however, the addition of nitrogen gas to the surrounding air which is already circa. 80% nitrogen, would not constitute a pollution event.

	Climate change	NOT SIGNIFICANT CFCs, widely used as refrigerant gases, are a major contributor to global warming and in turn climate change. As mentioned above, the QZ machine is encapsulated to prevent CFCs or pentane from escaping into the atmosphere. If pressure within the system drops, the system will shut down and will be sealed off to stop further input and to contain the gas that has been released. The main purpose of this process is to remove CFCs and gases from the refrigeration units safely and efficiently, thus preventing its escape into the atmosphere and contributing to global warming.

***Only mitigation measures designed within the application can be considered at this stage. Any conditions that NIEA would impose must be assessed through the appropriate assessment stage.**

Describe any potential effects on the Natura 2000 site as a whole in terms of: interference with the key relationships that define the structure or function of the site	**Effect considered significant/non-significant: Finding of No significant effects Matrix**
NONE	

Provide details of any other projects or plans that together with the project or plan being assessed could (directly or indirectly) affect the site.	**Provide details of any likely in-combination effects and quantify their significance -**
	N/A

Is the potential scale or magnitude of any effect likely to be significant?	
Alone?	**Yes** ☐ **No** ☑

In-combination with other projects of plans?	**Yes☐ No ☐**

List of Agencies Consulted: Provide contact name and telephone or email address.	None
Above consultee response.	N/A

Conclusion: Is the proposal likely to have a significant effect on an N2K site?	**Yes☐ No☑**
IF IT HAS BEEN DETERMINED THAT THE PROPOSAL WILL NOT HAVE A SIGNIFICANT EFFECT THEN ASSESSMENT IS COMPLETED. **IF ANY PART OF THE PROPOSAL IS LIKELY TO HAVE A SIGNIFICANT EFFECT AN APPROPRIATE ASSESSMENT WILL BE REQUIRED – STAGE 2 AA.**	

Data collected to carry out the assessment

Who carried out the assessment?	NIEA PPC
Sources of data	PPC Permit documentation, NIEA natural environment Map viewer
Level of assessment completed	No appropriate assessment required as proposal will not have a significant effect
Where can the full results of the assessment be accessed and viewed?	NIEA,17 Antrim Road, Tonagh, Lisburn County Antrim, BT28 3AL.
NIEA CDP Response to consultation.	

Stage 2: Appropriate Assessment Report

Fig 1 Assessment of Effects of the Project or Plan on the Integrity of the Site

Describe the elements of the project or plan (alone or in combination with other projects or plans) that are likely to give rise to significant effects on the site (from screening assessment)	
Set out the Conservation objectives of the site	
Describe how the project or plan will affect key species, key habitats and the integrity of the site (determined by structure and function and conservation objectives). Acknowledge uncertainties and any gaps in information.	
Describe what mitigation measures are to be introduced to avoid or reduce the adverse effects on the integrity of the site. Acknowledge uncertainties and any gaps in information	

Fig 2 Appropriate Assessment: Mitigation Measures

List measures to be introduced **(i)** **(ii)** **(iii)**	**Explain how the measures will avoid the adverse effects on the integrity of the site.**	**Explain how the measures will reduce the adverse effects on the integrity of the site.**	**Provide evidence of how they will be implemented and by whom.**
List mitigation measures (as above) **(i)** **(ii)** **(iii)**	**Provide evidence of the degree of confidence in their likely success**	**Provide time-scale, relative to the project of plan, when they will be implemented**	**Explain the proposed monitoring scheme and how any mitigation failure will be addressed**

Stage 3: Assessment of Alternative Solutions Matrix

Assessment of Alternative Solutions		
The objectives of the Plan or Project	The 'Do Nothing' Alternatives	
Predicted adverse effects of the project or plan on the Natura 2000 site following the Appropriate Assessment		
Comparison with chosen project or plan		
Possible Alternatives	Evidence of how the alternative solutions were assessed	Describe the relative effects on the conservation objectives of on Natura 2000 (greater or less adverse effects)
Alternative locations/routes		
Alternative One		
Alternative Two		
Alternative Three		
Alternative Size and Scale		
Alternative One		
Alternative Two		
Alternative Three		
Alternative means of meeting objectives (e.g. demand management)		

Alternative One		
Alternative Two		
Alternative Three		

Assessment of Alternative Solutions (continued)

Comparison with chosen project or plan		
Possible Alternatives	Evidence of how the alternative solutions were assessed	Describe the relative effects on the conservation objectives of on Natura 2000 (greater or less adverse effects)
Alternative methods of construction		
Alternative One		
Alternative Two		
Alternative Three		
Alternative operational methods		
Alternative One		
Alternative Two		
Alternative Three		
Alternative decommissioning methods		
Alternative One		

Alternative Two		
Alternative Three		
Alternative time-scales		
Alternative One		
Alternative Two		
Alternative Three		
Conclusions on Assessment of Alternatives		

Alternative Solutions Assessment Statement

Describe the alternative solution that would avoid or minimise significant impacts on the Natura 2000 site	**Explain why the proposed project or plan is favoured over the other alternatives solutions assessed.**	
Provide an overall statement to explain why it is considered that in this instance there are no alternatives that would avoid reducing the conservation value of the Natura 2000 site.		

Evidence of Assessment Matrix

Consultation on Alternative Solutions			
List of Agencies Consulted:	**Response to consultation**	**Impact of alternatives on the Natura 2000 site are considered adverse (explain)**	**Impact of alternatives on the Natura 2000 site are considered positive or neutral (explain)**

Data Collected to carry out the Assessment	
Who carried out the assessment	
Sources of Data	
Level of assessment completed.	
Where can the full results of the assessment be accessed and viewed?	

Stage 4: Assessment where no alternative solutions exist and where adverse impacts remain

Compensatory Measures Assessment Matrix

Name and brief description of the project or plan and how it will adversely affect the Natura 2000 site
Description of the compensatory measures

Assessment Questions	Response
How were compensatory measures identified?	
What alternative measures were identified?	
How do these measure relate to the conservation objectives of the site?	
Do these measures address, in comparable proportions, the habitats and species negatively affected?	
How would the compensatory measures maintain or enhance the overall coherence of Natura 20000	
Do these measures relate to the same biogeographical region in the same Member State?	
If the compensation measures require the use of land outside of the affected Natura 2000 site, is that land in the long term ownership and control of the project or plan proponent or relevant national or local authority?	

Do the same geological, hydrogeological, soil, climate and other local conditions exist on the compensation site as exist on the Natura 2000 site adversely affected by the project or plan?	
Do the compensatory measures provide functions comparable to those that had justified the selection criteria of the original site?	
What evidence exists to demonstrate that this form of compensation will be successful the long term?	

Evidence of Assessment Matrix

Consultation on Compensatory Measures			
List of Agencies Consulted	**Response to consultation**	**Compensatory Measures were considered acceptable**	**Compensatory Measures were not considered acceptable**
Data collected to carry out the Assessment			
Who carried out the assessment			
Sources of Data			
Level of assessment			
Where can the full results of the assessment be accessed and viewed?			