

S.73 APPLICATION TO VARY CONDITIONS 3 AND 4

ENVIRONMENTAL STATEMENT ADDENDUM

CHAPTER 17: NOISE

**Ffos-y-Fran Land Reclamation Scheme, East of Merthyr Tydfil
CF48 4AE**

Merthyr (South Wales) Limited

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17.1.0 Introduction

S.73 Application Context

- 17.1.1 Planning permission for the operational surface coal mine at Ffos-y-Fran ('the Site'), was originally granted under ref. A-PP 152-07-014 ('the original application'). The description of development was as follows:

"Application by Miller Argent (South Wales) Limited for the Ffos-y-Fran Land Reclamation Scheme, incorporating the extraction of coal by open cast methods, and being the final phase of the east Merthyr Reclamation Scheme."

- 17.1.2 The above permission was subsequently varied under a S.73 planning application (application ref. P/08/0316) which sought consent for:

"[The] Variation of condition 37 of planning permission A-PP 152-07-014 to permit the limited dispatch by road of up to 5% of the annual output of coal from the Ffos-y-Fran land reclamation scheme or a maximum of 50,000 tonnes of coal per annum (whichever is the lesser) via Cwmbargoed Disposal Point."

- 17.1.3 The application was refused by Merthyr Tydfil County Borough Council but the proposals were subsequently allowed at Appeal (Appeal ref. APP/U6925/A/10/2129921). The Appeal Decision was issued by an appointed Inspector on the 11th of March 2011 and contained a comprehensive list of updated conditions, thereby superseding the original planning permission for the site as detailed above (permission ref. A-PP 152-07-014).

- 17.1.4 The purpose of this S.73 application is to allow for an extension to the lifespan of the mine. As such, the application seeks to vary the following conditions as contained within Appeal ref. APP/U6925/A/10/2129921:

- **Condition 3** – "All coal extraction from the development hereby permitted shall cease no later than 06 September 2022"; and
- **Condition 4** – "Final restoration of the land shall be completed no later than 06 December 2024 and aftercare shall be undertaken for a period of not less than 5 years upon certification of completion of each phase of the progressive restoration scheme."

- 17.1.5 The S.73 application, as submitted, seeks to extend the lifespan of the mineral's extraction by a further 9 months. As such, the timescales stipulated within the above conditions will be varied to match this extended life span for the mine. No alterations are proposed to the extraction area or working practices at the mine as previously consented.

- 17.1.6 Whilst reasonable effort has been made to make this report easily understandable, it is technical in nature. To assist the reader, a glossary of acoustic terminology has been included in **Appendix 17-1**.

Consideration of S.73 Application

17.1.7 The following needs to be reviewed regarding noise on the context of the proposed Material Amendment:

- Review of any changes in Legislation, Guidance, and Planning Policy, to determine whether any changes in these documents would alter the conclusions of the original application, and relevant chapters within the original Environmental Statement (ES).
- Review of the baseline environment to determine whether this is likely to have significantly changed since the original application, which in turn could alter the conclusions of the original application and relevant chapters within the original ES.
- Review of the methodology, identified impacts, mitigation measures, and conclusions of the original ES, in conjunction with a review of legislation and the baseline environment, to determine whether these remain valid and if there is a requirement for further assessment for the S.73 application.

17.1.8 The following information relating to noise and vibration, was submitted in support of the original planning application (ref. A-PP 152-07-014) for minerals consent at the site:

- Chapter 17 (Noise) contained in the original ES (Ref: FLRS ES/1 – 020503, dated May 2003); and
- Technical Appendices associated with the ES chapter described above (dated May 2003).

17.1.9 To discharge conditions at the site and in support of the ongoing mitigation and monitoring at the site, the following documents were prepared/have been produced:

- Air Quality, Noise and Vibration Strategy (Ref: 11992/304, dated January 2007)
- Annual Noise Assessment reports, produced by Curload Consultants.

17.1.10 All of the above technical assessments and associated appendices have been reviewed in the undertaking of this Environmental Statement Addendum and the findings contained herein.

Purpose and Structure of Chapter

17.1.11 This chapter of the Environmental Statement Addendum (ESA) considers the impact of the proposed material amendments on the planning policy and context of the area relating to noise.

17.1.12 The following is included with this Technical Chapter

- The methodologies utilised for the noise and vibration assessments, including:
 - A review of the Legislation, Guidance and Planning Policy.
 - A summary of the methodologies utilised as part of the original ES.
 - Details of an updated significance criteria in conjunction with current EIA regulations.

- A review of the baseline conditions
- Detailed assessment of effects in conjunction with the review of any changes to legislation, guidance or planning policy, any potential changes in baseline conditions, and the conclusions of the original ES.

17.2.0 Methodology

Changes in Legislation, Guidance and Planning Policy

- 17.2.1 Where there have been subsequent changes to legislation, policy, or guidance contained within Chapter 17 of the original ES, those documents and changes are detailed below. Where legislation, policy or guidance has changed, a summary of the changes and an assessment as to whether they alter the original assessment is detailed.
- 17.2.2 With regard to noise, Section 17.2 of listed the documents used in the chapter; however, a number of these documents were not actually referred to or utilised within the assessment; therefore, these have not been considered any further. The documents in question are as follows:
- *Guidelines for Community Noise*, World Health Organization 1999; and
 - *BS4142 1997 Method for rating industrial noise affecting mixed residential and industrial areas*
- 17.2.3 Further to the above the following documents have not changed or been superseded, since the issue of the original ES:
- Minerals Planning Guidance 11 (MPG 11): *The Control of Noise at Surface Mineral Workings*, Department of the Environment (Welsh Office), 1993; and
 - BS 5228 Noise and Vibration Control on Construction and Open Sites Part 3: *Code of Practice Applicable to Surface Coal Extraction by Opencast Methods*

The Propagation of Noise from Petroleum and Petrochemical Complexes to Neighbouring Communities, CONCAWE, 1981

- 17.2.4 The noise propagation algorithms contained within this guidance were utilised within the original ES, to predict the noise being generated by operations at the Site at the nearest noise-sensitive receptors.
- 17.2.5 The title of the guidance is misleading as it refers that it only relates to noise from petroleum and petrochemical installations; however, the algorithms contained within the CONCAWE prediction method were utilised for the assessment of all noise generating sources.
- 17.2.6 With reference to the above, it is current standard practice to use the calculation algorithm contained in BS5228:2009+A1:2014 for this type of development.
- 17.2.7 On a review between the two calculation methods, it has been concluded that the CONCAWE method included allowances for attenuation due to atmospheric absorption. However, as noted in BS5228, the size of any effects arising from these factors will be small, whereas at longer distances there will be a tendency towards an increase in sound attenuation.
- 17.2.8 Furthermore, BS5228 also states that at distances over 300m noise predictions have to be treated with caution, especially where a soft ground correction factor has been applied, because of the increasing importance of meteorological effects.

17.2.9 Therefore, where predictions are made to locations over 300m from the works, as is the case for many of the operations at the Site, it may be more appropriate, to use the method presented in CONCAWE method.

17.2.10 Therefore, to conclude the use of the CONCAWE method is considered robust and the results of the noise predictions remain valid.

BS5228 Noise and Vibration Control on Construction and Open Sites Part 1: Code of Practice for Basic Information and Procedures for Noise and Vibration

17.2.11 The original ES referenced BS 5228 *Noise and Vibration Control on Construction and Open Sites Part 1: Code of Practice for Basic Information and Procedures for Noise and Vibration (1997)* this has since been superseded by *BS 5228-1:2009+A1:2014 Code of practice for noise and vibration control on construction and open sites – Part 1: Noise*.

17.2.12 The general basis for the revised BS5228-1:2009+A1:2014 is derived from the application of previous editions. Key changes between BS5228:1997 and BS5228:2014 are as follows:

- Update of information relating to legislative requirements (i.e. EU Directives, Control of Noise at Work 2005, Building Regulations 2000); and
- Update of information relating to modern methods and equipment.

17.2.13 Based on information and the assessment of operational effects contained within the original ES, it is considered that revisions to the methodology contained within BS 5228:2009+A1:2014 would not lead to significant changes in the assessment methodology or findings of the original ES.

Policy

17.2.14 The following policy has come into practice since the submission of the original ES.

Planning Policy Wales

17.2.15 Planning Policy Wales was updated in 2021 (Edition 11), the last paragraph of Page 115 of the document is entitled '*Reducing the Impacts of Mineral Extraction and Related Operations*'

17.2.16 Further to the above, 5.14.42 states:

"Mineral workings should not cause unacceptable adverse environmental or amenity impact. Where this is not possible working needs to be carefully controlled and monitored so that any adverse effects on local communities and the environment are mitigated to acceptable limits. Any effects on local communities and the environment must be minimised to an acceptable standard."

17.2.17 In relation to noise paragraph 5.14.43 states:

"Development plans should set out clearly the criteria that will be applied to minerals proposals to ensure that they do not have an unacceptably adverse impact on the environment and the amenity of nearby residents. Issues that must be addressed include:

- *noise, in terms of limits, type and locations."*

- 17.2.18 With reference to the above the Site have developed an *Air Quality, Noise and Vibration Strategy*, which outlines the acceptable levels of noise from the Site at the nearest receptors, a noise monitoring and complaints procedure, consequently the policies relating to noise from mineral extraction operations contained in Planning Policy Wales do not alter the assessment methodology or findings of the original ES.

MTAN 2

- 17.2.19 *Minerals Technical Advice Note 2: Coal* (MTAN 2), came into practice in 2009.
- 17.2.20 The section specifically relating Noise is contained in paragraphs 167 to 177 on pages 37-39 of the document.
- 17.2.21 The paragraphs describe the potential impacts from environmental noise and outline the requirement for a baseline survey the associated noise limits which would be specified at sensitive locations during differing periods of the day.
- 17.2.22 The noise limits contained in MTAN 2 mirror those contained in MPG11, which was utilised as the bases of the assessment within the original ES. In fact, paragraph 177 of MTAN 2 references MPG 11 as appropriate guidance.
- 17.2.23 In view of the above implementation of MTAN 2 does not alter the assessment methodology or findings of the original ES.

Merthyr Tydfil County Borough Council Local Development Plan

- 17.2.24 The Merthyr Tydfil County Borough Council Local Development Plan, came into force in 2016 and will remain in place until 2031.
- 17.2.25 Policy EnW4 relates to Environmental Protection and with regards to noise and states:
- “Development proposals will be required to demonstrate they will not result in an unacceptable impact on people, residential amenity, property and / or the natural environment from*
- *Noise, vibration, dust, odour nuisance and light pollution.*
- Where impacts are identified the Council will require applicants to demonstrate that appropriate measures have been incorporated to reduce, or minimise the impact identified to the lowest possible acceptable level.*
- Planning conditions may be imposed or legal obligation entered into, to secure any necessary mitigation and monitoring processes.”*
- 17.2.26 The original ES demonstrated that the noise levels being generated by the Site would not result in unacceptable impacts on people, in addition the levels of noise permitted to be generated by the Site at the nearest sensitive receptors were stipulated within a relevant planning condition.
- 17.2.27 In view of the above the policy relating to noise contained in the Merthyr Tydfil County Borough Council Local Development Plan does not alter the assessment methodology or findings of the original ES.

Assessment Methodology

Study Area

- 17.2.28 The study area is as defined within the original ES, and does not require amendment as a result of the proposed material amendment. On this basis, the study area as utilised within the original ES is robust and has been utilised in undertaking this ESA.

Sensitivity Criteria

- 17.2.29 Sensitivity criteria for receptors are not described within Chapter 17 of the original ES. The significance of the noise effect will depend on the receptor type and its sensitivity to the noise impact. An example matrix indicating the sensitivity of the receiving environment is shown in Table 17-1.

Table 17-1 Sensitivity Criteria

Sensitivity	Definition
Very High	Residential properties (night-time), Schools and healthcare building (daytime)
High	Residential properties (daytime), Special Areas of Conservation, Special Protection Areas, Sites of Special Scientific Interest (or similar areas of special interest)
Medium	Offices and other non-noise producing employment areas
Low	Industrial areas

- 17.2.30 All receptors considered within Chapter 17 of the original ES are residential and therefore sensitivity would be defined as '**very high**' during the night-time and '**high**' during the daytime.

Magnitude of Change (Impact)

- 17.2.31 Criteria to describe magnitude of changes are as defined within Section 17.2.6 of the original ES, and have been replicated in Table 17-2 below. It must be noted that in-line with current EIA regulations the magnitude definitions have been slightly amended.

Table 17-2 Magnitude of Change (Impact)

Magnitude	Criteria (Exceedance in the specified $L_{Aeq,T}$ noise limits)	Definition
Major	Noise limits exceeded by 10dB(A) or more	Fundamental, permanent/ irreversible changes over the whole receptor, and/ or fundamental alteration to key characteristics or features of the particular receptors character or distinctiveness.
Moderate	Noise limits exceeded by between 5 and 10dB(A)	Considerable, permanent/ irreversible changes over the majority of the receptor, and/ or discernible alteration to key characteristics or features of the particular receptors character or distinctiveness.

Magnitude	Criteria (Exceedance in the specified $L_{Aeq,T}$ noise limits)	Definition
Minor	Noise limits exceeded by between 3 and 5dB(A)	Discernible, temporary (throughout project duration) change over a minority of the receptor, and/ or limited but discernible alteration to key characteristics or features of the particular receptors character or distinctiveness.
Negligible	Noise limits exceeded by 3dB or less	Discernible, temporary (for part of the project duration) change, or barely discernible change for any length of time, over a small area of the receptor, and/ or slight alteration to key characteristics or features of the particular receptor's character or distinctiveness.

Significance of Effect

- 17.2.32 A significance of effect is not described within Chapter 17 of the original ES. It will depend on the collective effect of the sensitivity of the receptor, and magnitude of impact. Table 17-3 below is used as a guide to determine the level of effect; '**major**' and '**moderate**' effects are considered to be '**significant**' in terms of the EIA Regulations.

Table 17-3 Significance of Effect

Magnitude of Effect	Sensitivity of Receptor				
		High	Medium	Low	Negligible
	High	Major	Major	Moderate	Negligible
	Medium	Major	Moderate	Minor	Negligible
	Low	Moderate	Minor	Minor	Negligible
	Negligible	Negligible	Negligible	Negligible	Negligible

- 17.2.33 Where appropriate, the significance of effect will be classified as being;

- Direct or indirect effects.
- Permanent or temporary effects; and
- Beneficial or adverse effects arising from the development.

- 17.2.34 The consideration of effects is contained within Section 17.4 of this Chapter.

Mitigation Hierarchy

- 17.2.35 Mitigation measures to reduce sound from the operational phases have been recommended within Section 17.8 of the original ES. Whilst not defined within the original ES, the preference would always be to reduce noise at source where practicable, before the implementation of other measures (e.g. screening). The recommended mitigation measures have been proposed with reference to best practice guidance.

Effects Not Requiring Further Assessment

- 17.2.36 As stated in paragraph 17.1.5 no alterations are proposed to the extraction area or working practices at the mine as previously consented, therefore there will be no new or different impacts associated with noise during operation will arise as a result of the S.73 application.

17.3.0 Changes in Baseline Conditions

Original ES - Baseline

- 17.3.1 The baseline at the time of the original application is set out within Section 17.3 of the original ES.

Original ES - Future Baseline

- 17.3.2 The future baseline was not considered within the original ES.

Current Baseline

- 17.3.3 Chapter 17 of the original ES identified human noise sensitive receptors (NSR's) in the vicinity of the then proposed surface coal mine, namely

- Receptor 1 – Blaen Dowlais Street to the north of the Site.
- Receptor 2 – Japonica Drive to the north of the Site
- Receptor 3 – Mount View to the west of the Site
- Receptor 4 – Ffos-y-fran Cottages to the south of the Site
- Receptor 5 – Nant y ffin Farm to the south-east of the Site.

- 17.3.4 All the receptors identified were residential premises and from studying recent Google Earth images (July 2021), it is considered that all of the identified receptors are still being utilised for residential purposes.

- 17.3.5 With reference to Table 17-1 it can be seen that the sensitivity for all receptors would therefore be defined as '**very high**' during the night-time and '**high**' during the daytime.

- 17.3.6 The receptor locations described above are shown on Figure FLRS/ES14 in **Appendix 17-2**.

Changes in Baseline

- 17.3.7 On further inspection of the Google Earth images and relevant planning portals, it has been determined that there are no new, or planned developments, in the near vicinity of the Site which would either:

- Have a significant impact on the baseline noise climate at the nearest NSR's; or
- Would have to be considered as additional NSR's which would need to be assessed as part of this ESA.

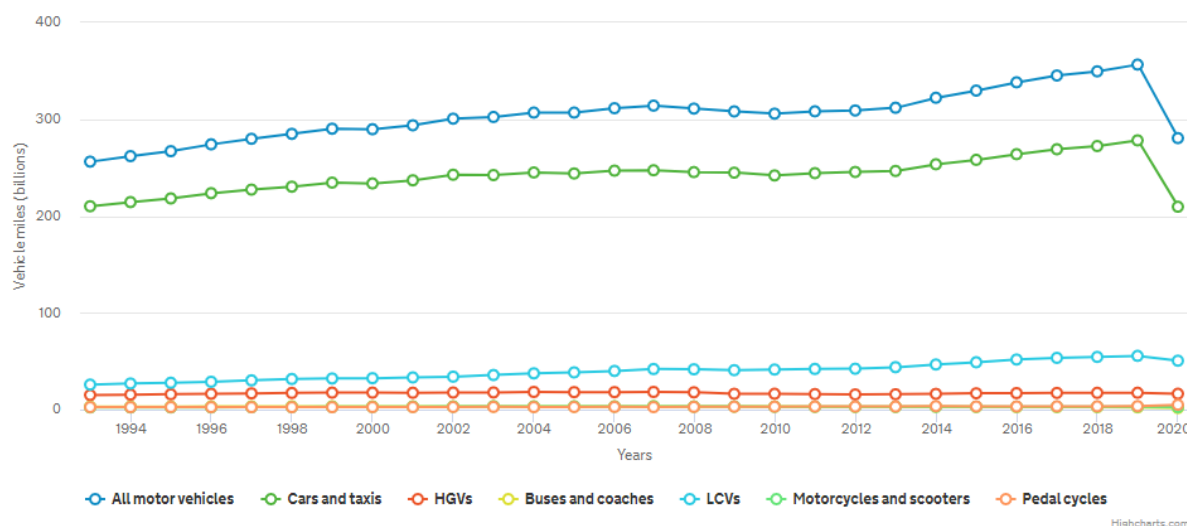
- 17.3.8 Though there was no description of the prevailing noise climate at each of the baseline survey locations contained within the original ES, it is considered that road traffic noise from the A465, A4060 and Bogey Road would have a significant contribution to the prevailing soundscape at receptors 1 to 4.

- 17.3.9 The original baseline sound survey was undertaken in 2002, in general traffic levels across the UK have increased over the last 20-years as shown in Figure 17-1 below.

Figure 17-1 Annual Traffic 1993-2020¹

Annual traffic by vehicle type

Traffic in Great Britain from 1993 to 2020 by vehicle type in vehicle miles (billions)



- 17.3.10 As it is considered that road traffic noise would contribute to the baseline sound climate at the majority of the receptors then any increases in traffic volumes are likely to increase the baseline sound levels at the nearest NSR's.
- 17.3.11 In conjunction with Minerals Planning Guidance 11 (MPG 11): *The Control of Noise at Surface Mineral Workings, Department of the Environment (Welsh Office), 1993* any increases in the baseline sound levels at the NSR's would potentially increase the operational noise limits at the receptor locations which subsequently would have the potential to reduce any identified noise impacts.
- 17.3.12 The anomaly in the traffic figures is for the year 2020, when the COVID-19 pandemic had a significant impact on traffic volumes across the UK, in fact it can be seen from Figure 17-1 that the traffic volumes in 2020 were below the 2002 volumes.
- 17.3.13 However, from studying the traffic volumes contained on the National Highways database² for the Prince of Wales Bridge, which links England to Wales, it has been determined that 2022 road traffic volumes are only approximately 2% less than 2019 volumes.
- 17.3.14 With reference to Figure 17-1, a 2% drop from the 2019 traffic volumes would still mean that 2022 traffic volumes are well above those experiences in 2002.
- 17.3.15 In view of the above, it is considered likely that baseline sound levels will have increased over the last 20 years, which would subsequently provide further masking of potential site noise, at receptors

¹ [Road traffic statistics - Summary statistics \(dft.gov.uk\)](https://www.dft.gov.uk/road-traffic-statistics/summary-statistics)

² [National Highways Open Data](https://nationalhighways.open.data.gov.uk/)

1 to 4.

- 17.3.16 With regard to receptor 5, this is located in a very rural location away from any major roads or commercial premises; consequently, it is considered that there would likely be no significant change in the baseline sound climate at this location, when compared to the 2002 results.

17.4.0 Assessment of Effects

17.4.1 The conclusions of the noise assessment contained in the original ES stated the following:

“Measurement locations, appropriate standards/guidance, and prediction methodology, have all been selected and agreed in consultation with Merthyr Tydfil County Borough Council.

The proposed works at Ffos-y-fran would be controlled to within acceptable limits by a combination of best practical means and earth bunding at specified locations.”

17.4.2 The above was based on the predicted noise levels from operations at the Site being, at worst, 1dB over the specified noise limits at the nearest NSR's, namely at Receptor 4 (Ffos-y-fran Cottages) during Disposition 1, when the Site is working from South to North, and during Disposition 3 when the Site is working from North to South. It also should be noted that it was predicted that the exceedances would only occur during the dawn, evening and weekend periods for the first 9-months of working in each Disposition.

17.4.3 Further to the above, it has been confirmed that the coal extraction will only take place in the northern and eastern areas, during the extended life span of the Site, as the western edge of the Site already backfilled. The Site has also been operating for longer than 9-months in all dispositions therefore in accordance with the conclusions of the original ES, all current and future operations should be within the specified noise limit. Consequently, there are no further areas of concerns or consideration with regards to noise.

Additional Effects

17.4.4 As no alterations are proposed to the extraction area or working practices at the consented mine, , there will be no change in the predicted noise impacts associated during extended life of the Site. Consequently, there are no additional noise effects to consider.

Additional Cumulative Effects

17.4.5 There are no additional cumulative effects to consider.

Consideration of Original ES

17.4.6 As stated in Paragraph 17.2.13, in line with current EIA regulations the magnitude of impact definitions has been slightly amended, in addition the sensitivity of the receptors have also been amended as outlined in Table 17-1.

17.4.7 Based on the above, the conclusions of the original ES, and with reference to Tables 17-1, 17-2 and 17-3, the extended life span of the Site would have a:

- **Direct, Temporary, Negligible Adverse Noise Effect** on receptors of **High Sensitivity**.

17.4.8 A negligible adverse effect is not considered significant in EIA terms.

17.5.0 Requirement for Additional Mitigation or Monitoring

Original ES Mitigation

17.5.1 The following mitigation measures were recommended within the original ES:

- The south-eastern overburden dump would be constructed so that the outer edge is built first, and therefore all plant will be working behind a 4m screen at all times while on the main area of the dump. The outer edge of the dump closest to Nant-y-ffin Farm would be constructed during the daytime (0900 to 1700 hrs), in order to reduce the potential for noise disturbance at other times of the day.
- Any plant which needs to remain running overnight (pumps etc), will be suitably selected and attenuated such that the overall noise level transmitted to the residential properties does not exceed 42 dB(A).
- Best Practicable Means would be used at all times in order to reduce noise impact upon the community. This includes the selection of quietest available equipment, local screening to any noisy static equipment, and working behind a tipped earth mound during reinstatement works. Attention will be paid to the guidance given in BS 5228 Noise and Vibration Control on Construction and Open Sites *Part 3: Code of Practice Applicable to Surface Coal Extraction by Opencast Methods*.

17.5.2 In addition, although noise from blasting was not included within the original ES it was recommended that the level of air overpressure be kept below 120dB in order to reduce disturbance from blasting. It was stated that this could be controlled by use of the following methods:

- Control of the quantity of explosive used.
- Timing of the delay period.
- Direction of the initiation.
- Charge depth and confinement.

17.5.3 Assuming that the above mitigation is/has been implemented at the Site, it is considered that no further measures are required.

Subsequent Mitigation or Monitoring

17.5.4 Part 2 of Planning Condition 17 for the Site contained in the Appeal Decision (Ref: APP/U6925/A/10/2129921, dated 6th May 2011), states:

"The development hereby permitted shall be monitored by the site operator in accordance with the scheme approved by the Local Planning Authority in accordance with condition 17(b) of permission APP 152-07-014."

17.5.5 Condition 18 States:

"During baffle mound construction and removal, soil stripping and removal of soil heaps, noise level

shall not exceed a daytime noise level of 70 dB $L_{Aeq, 1hr}$ over periods not exceeding eight weeks in any one year."

17.5.6 Condition 19 States:

"Efficient silencing equipment shall be fitted to and used by all vehicles and other plant and machinery on site and shall be efficiently maintained in accordance with the manufacturer's recommendations."

17.5.7 Condition 20 States:

"All haul roads in direct line of sight and within 500 metres of any dwelling shall be adequately screened, where practicable, to attenuate noise levels"

17.5.8 Condition 21 States:

"Equipment operating on a 24-hour basis, such as pumps, shall be placed in acoustic enclosures and positioned away from noise sensitive locations where practicable."

17.5.9 Condition 22 States:

"The rating level of noise emitted from such pump enclosures shall not exceed the existing background noise level by more than an amount to be agreed in writing by the Local Planning authority before the development hereby permitted starts."

17.5.10 With regard to Condition 17(2), noise monitoring, has been undertaken, at the Site on a continuous basis in conjunction with the *Air Quality, Noise and Vibration Strategy* (and will continue to occur), the noise data is then analysed and assessed by 'Curload Consultants' and collated into annual Noise Assessment Reports.

17.5.11 With regard to the other conditions relating to mitigation, it has been confirmed that these were/have been appropriately implemented at the Site.

Alternate or Additional Mitigation and Monitoring

17.5.12 SLR have reviewed the results of the noise monitoring undertaken at the Site in 2015, based on these results, and the fact that very few noise complaints have been received from the residents living on close proximity of the Site (the last noise complaint was received in February 2019 and the situation was immediately resolved), it is considered that no additional noise mitigation or monitoring is required.

17.6.0 Residual Effects

17.6.1 As already stated in Paragraphs 17-4-7 and 17-4-8 when considering the conclusions of the original ES and with reference to Tables 17-1, 17-2 and 17-3, the operations at the Site would lead to the following residual impact:

- ***Direct, Temporary, Negligible Adverse Noise Effect*** on receptors of ***High Sensitivity***.

17.6.2 A negligible adverse effect is not considered significant in EIA terms.

Consideration of Original ES

17.6.3 As no alterations are proposed to the extraction area or working practices at the consented mine, , there will be no change in the predicted noise impacts associated during extended life of the Site. Consequently, there are no changes to the Residual Effects previously identified as part of the original ES.

17.7.0 Other Environmental Issues

- 17.7.1 This Section seeks to detail any considerations and environmental effects which have been identified with regard to the range of topics which have been introduced into EIA requirements through the EIA Regulations 2017. Where there are no such considerations or environmental effects, this is also specified below for clarity.
- 17.7.2 Please see Chapter 22 for a summary of the 'Other Environmental Issues' identified across all of the technical assessments undertaken and the Chapters prepared as part of the ES.

Other Environmental Issues of Relevance

Infrastructure

- 17.7.3 None identified

Waste

- 17.7.4 None identified

Population and Human Health

- 17.7.5 The scope of any noise assessment inherently considers the population and human health, given the known impacts of noise on human health, as assessment criteria contained within the relevant guidance documents are based on human response to noise and vibration.
- 17.7.6 Potential impacts on human health have therefore been assessed for the operation of the Site. As potential noise upon sensitive receptors have been assessed as '*negligible*' at worst, significance of effects upon population and human health are concluded to be '*not significant*'.

Climate and Carbon Balance

- 17.7.7 None identified

Risks of Major Accidents and/or Disasters

- 17.7.8 The risks of major accidents and/or disasters is not considered of relevance to the noise Chapter.

Summary

- 17.7.9 With the exception of population and human health, which is concluded as being 'not significant', no other environmental issues of relevance have been identified.

17.8.0 Summary of Effects

- 17.8.1 Chapter 17 of the original ES has been reviewed in the context of the proposed material amendment, to determine whether the proposals, and subsequent changes in policy, guidance and baseline conditions have the potential to lead to changes in the findings as described within the original ES.
- 17.8.2 In addition, noise monitoring has been undertaken on a continuous basis at the nearest receptors to the Site in conjunction with condition 17 of the planning permission and the results of the noise monitoring have also been reviewed.
- 17.8.3 Following this review, no changes have been identified that would alter the assessment of effects as described within the original ES.

17.9.0 Conclusions

- 17.9.1 This review has identified that the proposed material amendment, and changes in policy, guidance and baseline conditions that have occurred since the original application, will not alter the findings presented within the original ES. On this basis, it is not necessary to undertake further technical assessments in support of the proposed material amendment.
- 17.9.2 It is therefore concluded that Chapter 17: *Noise* of the original ES remains valid, and that the proposed material amendment is entirely appropriate in the context of the extant application.

REFERENCES

- Chapter 17 of the original ES - Ref: FLRS ES/1 – 020503, dated May 2003.
- Minerals Planning Guidance 11 (MPG 11): The Control of Noise at Surface Mineral Workings, Department of the Environment (Welsh Office), 1993.
- BS 5228 Noise and Vibration Control on Construction and Open Sites Part 3: Code of Practice Applicable to Surface Coal Extraction by Opencast Methods.
- Planning Policy Wales 2021 (Edition 11).
- Minerals Technical Advice Note 2: Coal (MTAN 2).
- The Merthyr Tydfil County Borough Council Local Development Plan 2016-2031.
- Review of Measured Noise Data, 2015 produced by Curload Consultants.
- Road traffic statistics - Summary statistics ([dft.gov.uk](https://www.dft.gov.uk))
- National Highways Open Data

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