



Mr and Mrs West

Sophie Moeng
Consultation Manager
Network Rail
Fourth Floor
One Victoria Square
Birmingham
B1 1BD

By e-mail

28 January 2019

Ref: OBJ/223

Dear Mr and Mrs West,

I write in response to the objection (ref: OBJ/223) made by Mr West sent on 7th September 2018 in respect of the proposed Network Rail (East West Rail Bicester to Bedford Improvements) Order (the Order).

Before turning to the specific points raised in your objection, it might be helpful to set out the strategic context and background against which the Order is sought, which will address the issues you have raised in the general comments section of your objection.

Once completed, the East West Rail (EWR) project will provide a direct rail link between Oxford and Cambridge and join up key towns and cities across the corridor. EWR Western Section Phase 2 (EWR2), the section of EWR to be authorised by the Order, will reinstate and upgrade railway lines to enable new train services to run between Oxford and Milton Keynes, Oxford and Bedford and Milton Keynes and Aylesbury.

As part of the Government's wider investment in the Cambridge to Oxford Arc (the Arc), EWR2 will improve public transport connectivity and journey times, reduce car journeys and improve productivity, economic growth and housing in the region. This vital infrastructure will help enable the Arc to 'realise its potential as a globally competitive, knowledge intensive economic cluster'.

As you may be aware, 'rail patronage in the UK has more than doubled over the last 20 years to 1.71 billion in 2017/18, reflecting the essential role the railway plays in supporting economic growth by enabling the safe, fast and efficient movement of passengers and goods between economic centres'.

At present, the east-west Arc corridor, in contrast to the strong north-south links extending from London, is not served by high-quality transport links. Journeys between key economic centres along this corridor are often long and impractical.

Journey times between newly connected towns have the potential to be considerably lowered and, in some cases, halved¹. Additionally, with traffic growth in the region forecast to grow significantly, EWR2 will help 'alleviate some congestion and traffic between towns where people do not currently have convenient rail options'.

For further information about EWR2 and EWR2's strategic aims, please see below a link to 'The case for East West Rail, Western Section Phase 2', (the Case for EWR2 Report) which can be found on the Department for Transport website at:

<https://www.gov.uk/government/publications/the-case-for-east-west-rail-western-section-phase-2>

Please see below our response to the points raised within your objection.

You state that the application should be rejected as it is 'not necessary and the overall cost will be far too expensive when we currently cannot afford it'. The benefit cost ratio (BCR) for EWR2, can be found in the 'The case for East West Rail, Western Section Phase 2' (through the link provided above). The benefits quantified in the BCRs presented within this report include transport user benefits and wider economic impacts such as improved productivity through improved connectivity of both businesses and people. Given the potential for housing growth along the line there is also a need to consider and plan for future demand. Network Rail has worked with the Department for Transport and the East West Railway Company to develop EWR2 to strike the right balance between initial capital costs and appropriate provision for future growth.

The statement that the project will "transform" connectivity, create more journey opportunities & avoid the need to travel via London is very broad & yet (on the basis of documents available to the public) is supported by limited & flimsy evidence

The lines to be upgraded by EWR2 will connect to the Great Western network at Oxford, the Chiltern Mainline at Bicester, the London to Aylesbury line at Aylesbury, the West Coast Main Line at Bletchley and the Midland Mainline at Bedford.

By virtue of connecting these key lines, the new rail services to operate on EWR2, whilst consisting of an initial primarily local service, will facilitate interchange between each route which will significantly shorten the journey times between a number of destinations; to many of which travel is currently only possible via time-consuming interchange at London.

There is no compelling evidence that the project will reduce congestion on the roads & in fact there will be increased traffic in the short term and possibly long term locally

One of EWR's main strategic objectives is improving public transport connectivity, which is a key part of realising the economic potential of the Oxford-Cambridge Arc. It complements the Government's wider programme of investment in the Arc, including the 'Oxford to Cambridge Expressway', promoted by Highways England under the Roads Investment Strategy. The new road is expected to improve connectivity between Oxford, Milton Keynes and Cambridge, to divert through-traffic away from Oxford's ring road and mitigate congestion on the A34. The Expressway is intended to complement EWR in supporting growth across the corridor.

¹ Oxford – Milton Keynes current journey time: 1h19m
Oxford –Bedford current journey time: 2h 22m

EWR journey time: 42m
EWR journey time: 1h6m

The journey time savings on the new EWR line between newly connected towns have the potential to be considerable. The table below taken from the Case for EWR2 report shows that the time saving is particularly noticeable, where journey times between Oxford and Bedford and Aylesbury and Milton Keynes have the potential to be more than halved.

Journey	Current Rail Journey Time (National Rail)	East West Rail Journey Time
Oxford – Milton Keynes	1 h 19m	42m
Aylesbury – Milton Keynes	2h 28m	38m
Oxford – Bedford	2h 22m	1h 6m

Whilst traffic growth in the Arc is forecast to continue to grow strongly, EWR2 provides additional connectivity in its own right, but will also help alleviate some congestion and traffic between places where people do not currently have a convenient rail option but will once EWR2 is operational.

There is no evidence that the project enjoys strong local support or that the Consortium has engaged in "meaningful" consultation with affected stakeholders.

Consultation for EWR has been led by Network Rail, not the East West Rail Consortium. Between August 2014 to March 2018 Network Rail, as promoter of the Order, undertook extensive consultation with both key stakeholders and the local community. The purpose of this consultation was to ensure that statutory bodies, landowners and members of the public had an opportunity to understand and comment on the scheme and its potential environmental effects.

Three rounds of public consultation were carried out by Network Rail on the EWR2 scheme prior to submission of an application for the Transport and Works Act Order. Round One consultation presented initial scheme design, Round Two consultation presented findings of the draft Environmental Statement, and Round Three consultation presented changes in design that had taken place since Round Two. There were 33 events in total for Rounds One, Two and Three consultation. Each event was well publicised with a total of 136,700 leaflets (providing details on where information could be viewed and accessed) delivered by hand. Similarly, the Order application has been publicised (i.e. through site notices, local newspapers and websites) in accordance with the statutory Rules covering applications for Transport and Works Act Orders and currently has 411 submissions of support.

Has a thorough Environmental Statement with mitigation plans been presented addressing the adverse effect on biodiversity/local wildlife?

The Environmental Statement (ES) submitted in support of the application provides information on all the habitats and species potentially affected by EWR2.

Due to access and other constraints, not all the ecological survey work was complete at the time of the production of the ES. This survey work continued throughout 2018 and was published as Further Environmental Information (FEI) on 16th November 2018. The FEI provides a comprehensive update on the potential impacts and the proposed mitigation and compensation measures of the Order

scheme on great crested newt, otter, water vole, invertebrates, reptiles, bats and barn owl.

The proposed mitigation measures are inadequate – given the proximity to the line, we are concerned about noise and vibration levels and increased emission to air.

Construction Impacts - Noise

Sheet 24 of the Scheme Drawings (Volume 4 of the ES) shows your property is located 120m from the closest point of construction compound B2 and 70m from the proposed compound entrance. Appendix 10.3 of Volume 3 of the ES provides the noise assessment for the construction of the scheme and the construction and use of compounds. The assumed plant, equipment and operating characteristics are given as Activity 1 in Table 1.1 in Appendix 10.3 of the ES. This shows that, overall, site clearance and compound construction are expected to generate noise levels of 83dB L_{Aeq} at 10m, the general works, at worst, are expected to generate noise levels of 82dB L_{Aeq} at 10m and the use of the compounds, at worst, is expected to generate noise levels of 81dB L_{Aeq} at 10m.

Table 1.2 of Appendix 10.3 of the ES indicates that site clearance and compound construction may give rise to 65dB L_{Aeq} at receptors within 63m of the compound, general works may give rise to 65dB L_{Aeq} at receptors within 58m, and the use of the compound may give rise to 65dB L_{Aeq} at receptors within 52m of the compound. 65dB L_{Aeq} is the threshold for the onset of adverse effects. Littleworth Farm is further than 63m from the compound and from the main works.

As your property is further away than those indicated by these thresholds, adverse noise effects are not expected from the construction and use of compound B2 or construction of the main works at your property and mitigation is not therefore required.

Construction Impacts - Vibration

Appendix 10.3 of Volume 3 of the ES provides the vibration assessment for the construction of the Order scheme and the construction and use of compounds. This shows that overall, adverse vibration effects may be expected at distances closer than 40m from ground compaction activities and adverse vibration effects may be expected at distances closer than 160m from piling works.

As Littleworth Farm is further away than the distances indicated by these thresholds, adverse vibration effects are not expected at your property and mitigation is not required.

Operational Impacts - Noise

The assessment presented in the Chapter 10 (Noise and Vibration) Volume 2ii Route Section 2B of the ES reports the impacts at your property. The operational impacts are shown on sheet C of Figure 10.6 in Volume 4 of the ES; Littleworth Farm is shown to have a major adverse impact, that is the change in noise levels between the current situation in the opening year (2024) and the proposed situation of EWR2 in the future year (2035). Noise levels are shown to increase by at least 10.0dB L_{Aeq} .

The current noise climate at your property has been taken from the baseline noise measurements. A night time façade baseline level of 41dB L_{Aeq} and a daytime façade baseline level of 45dB L_{Aeq} have been used, based on the lowest representative freefield baseline measurements undertaken in the area, as reported in Section 3.2 of Appendix 10.2 in Volume 3 of the ES. The future (2035) noise levels at these properties are calculated to be 54dB L_{Aeq} at night and 56dB L_{Aeq} during the day,

giving rise to impacts of +13dB during the night and +11dB during the day.

The future daytime and night-time noise levels with the scheme in operation at your property are below the threshold for significant effects (defined in Table 10.13 in Chapter 10 of Volume 2i of the ES) and below the threshold for statutory noise insulation under the Noise Insulation Regulations, (defined in Table 10.7 in Chapter 10 of Volume 2i of the ES). The assessment shows that these adverse effects are not considered to be significant, as detailed in paragraphs 10.3.80 and 10.3.81 in Chapter 10 of Volume 2i of the ES.

Since publication of the ES, the noise insulation proposals have been extended to include five properties, in addition to those fifteen properties identified for noise insulation in the ES, where major or moderate adverse impacts are predicted but where the resulting noise levels will be below but within 3dB of the threshold for a significant adverse effect. These five properties would not be otherwise eligible for statutory noise insulation under the Noise Insulation Regulations 1975 (as amended).

This list of five properties includes your property, Littleworth Farm. ***Network Rail welcomes discussions with you on whether you would be interested in receiving noise insulation and, if so, the timing of the insulation being installed.***

Operational Impacts – Vibration

Appendix 10.5 of Volume 3 of the ES assesses ground borne vibration. This shows that adverse effects are not expected at distances greater than 20m from the Order scheme. Littleworth Farm is more than 20m from the scheme and as such adverse effects are not expected and mitigation is not required.

Air quality

Baseline

The Project-specific baseline survey for nitrogen dioxide (NO₂) and particulate matter (PM₁₀ and PM_{2.5}) are presented in Appendix 8.4 of Volume 3 of the ES. The concentrations for these pollutants are well below the Government's national air quality strategy objectives. For example, at Verney Junction (monitoring site 2B-25, in Figure 8.1C in Volume 4 of the ES) the annual mean NO₂ concentration in 2016 was 9 µg/m³, less than a quarter of the NO₂ annual mean objective of 40 µg/m³. Existing concentrations in the town centres of Bicester, Aylesbury and Bedford, where road traffic flows are heavier and subject to congestion, were, in contrast, over 40 µg/m³ (ES Volume 2i Chapter 8, paragraphs 8.4.14, 8.4.17, 8.4.22)

Construction emissions

Construction traffic emissions are assessed in Chapter 8 (Air Quality), Volume 2i Project-wide (paragraphs 8.5.30 to 8.5.37). The construction traffic emissions during peak construction for an assessment year of 2019 result in negligible changes to annual mean concentrations of NO₂, PM₁₀ and PM_{2.5}.

Construction dust is also assessed in Chapter 8 (Air Quality, paragraphs 8.5.1 to 8.5.26). Further detail is provided for Verney Junction in Chapter 8 (Air Quality), Volume 2ii Route Section Assessment, Route Section 2B. Around Verney Junction, the construction dust risk was assessed

as low for all activities, with one exception. A medium dust risk was assigned for construction (Table 8.10 of the ES, Chapter 8 (Air Quality), Volume 2i Project-wide, where works are proposed to replace or reinstate the track at Verney Junction, where there are sensitive properties within 20m of the track. Your property is located 120m from the closest point of construction compound B2, 70m from the proposed compound entrance and is one of two properties within 20m of the Construction Access Route. The risk of significant dust effects at your property was assessed as low for all activities. Appropriate dust mitigation measures for low dust risks are set out within the Code of Construction Practice (CoCP) (Appendix 2.1, ES Volume 3, Section 5 Air Quality).

Network Rail is committed to the correct application of the measures in the CoCP which will mean residual effects will not be significant. These measures include the following:

- Use water-assisted dust sweeper(s) on the access and local roads, to remove, as necessary, any material tracked out of the site;
- Avoid dry sweeping of large areas;
- Ensure vehicles entering and leaving sites are covered to prevent escape of materials during transport;
- Record all inspections of all Construction Access Routes and haul roads and any subsequent action taken to prevent dust emissions;
- Implement controls where necessary to remove accumulated dust and mud from vehicles prior to leaving the site; and
- Conduct inspections on and off the site, including at the site boundary, sensitive receptors and public roads within 100m as appropriate, to monitor compliance with the CoCP.

The CoCP also describes the framework for management, monitoring and reporting.

Operational emissions

The assessment of rail emissions is reported in ES Chapter 8 (Air Quality), Volume 2i Project-wide. The assessment of emissions from diesel trains was undertaken following Government guidance published by DEFRA² for local air quality management and used emission rates published by the DfT³. The assessment was undertaken on a conservative basis:

- The long-term estimates of train frequency for the “growth” service in 2035 (Table 2.15 in Chapter 2 (Project Description), Volume 2i Project-wide) of the ES have been used to calculate total emission rates rather than the frequency in the opening year 2024.
- The NO₂ concentrations measured as part of the Project Survey (Chapter 8 (Air Quality), Volume 2i Project-wide, paragraph 8.4.33) were used unadjusted as background concentrations to represent the future year 2031. Ambient concentrations are in fact expected to improve in future (as they have done in the past), as a result of air quality policy and legislation and projects that reduce reliance on road transport.

Detailed assessment of rail emissions was undertaken for Route Section 2B (Chapter 8 (Air Quality), Volume 2i Project-wide, paragraph 8.5.55). The results are found in Table 1.16 in Appendix 8.5 of Volume 3 of the ES. Littleworth Farm is located more than 100m south of the railway track at Verney Junction. A slight increase in NO₂ concentrations (as defined by air quality impact descriptors in Chapter 8 (Air Quality), Volume 2i Project-wide Table 8.5) of 2 µg/m³ with EWR2 was modelled at

² DEFRA (2016) *Local Air Quality Management Technical Guidance (LAQM.TG(16))*. Retrieved 2017, from <https://laqm.defra.gov.uk/documents/LAQM-TG16-April-16-v1.pdf>

³ DfT (2015) *Transport Analysis Guidance, Unit A3*. Retrieved November 2017 from https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/638648/TAG_unit_a3_envir_imp_app_dec_15.pdf

100m from the track at Winslow (Appendix 8.5, ES Volume 3, Table 1.16), which is also representative of the maximum projected number of train movements at Verney Junction in 2035. As reported in the ES (paragraphs 8.5.59 and 8.5.60, Chapter 8 (Air Quality), Volume 2i Project-wide), the effect on air quality is not significant as total concentrations will remain well below the annual mean objective for NO₂, despite the conservative basis for the assessment. There is no risk of the air quality objective being exceeded, even at the properties closest to the rail track, thus there is residual effect for which mitigation is required at Littleworth Farm.

Network Rail welcomes an opportunity to meet with you and discuss any of the issues raised in your objection further. Please contact Charles Hurst [email at charles.hurst@networkrail.co.uk or telephone 07515 620 485] to arrange a convenient time and location for a meeting. Alternatively, if you feel your concerns have been addressed sufficiently to withdraw your objection, please could you notify the Transport and Works Act Orders Unit, quoting your objection number (OBJ/223) for reference.

Post

Transport and Works Act Orders Unit
General Counsel's Office
Department for Transport
Zone 1/18, Great Minister House
33 Horseferry Road
London
SW1P 4DR

Email

transportandworksact@dft.gsi.gov.uk

Yours sincerely,



Sophie Moeng

Consultation Manager

For and on behalf of Network Rail