## **Tritax Symmetry (Hinckley) Limited**

# HINCKLEY NATIONAL RAIL FREIGHT INTERCHANGE

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# The Hinckley National Rail Freight Interchange Development Consent Order

**Project reference TR050007** 

**Environmental Statement Volume 1: Main Statement** 

## **Chapter 20: Cumulative and in-combination effects**

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November 2022

Planning Act 2008

The Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009 Regulation 5(2)(a)

The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 Regulation 14

# This document forms a part of the Environmental Statement for the Hinckley National Rail Freight Interchange project.

Tritax Symmetry (Hinckley) Limited (TSH) has applied to the Secretary of State for Transport for a Development Consent Order (DCO) for the Hinckley National Rail Freight Interchange (HNRFI).

To help inform the determination of the DCO application, TSH has undertaken an environmental impact assessment (EIA) of its proposals. EIA is a process that aims to improve the environmental design of a development proposal, and to provide the decision maker with sufficient information about the environmental effects of the project to make a decision.

The findings of an EIA are described in a written report known as an Environmental Statement (ES). An ES provides environmental information about the scheme, including a description of the development, its predicted environmental effects and the measures proposed to ameliorate any adverse effects.

Further details about the proposed Hinckley National Rail Freight Interchange are available on the project website:

The DCO application and documents relating to the examination of the proposed development can be viewed on the Planning Inspectorate's National Infrastructure Planning website:

https://infrastructure.planninginspectorate.gov.uk/projects/east-midlands/hinckley-national-rail-freight-interchange/

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# Chapter 20 ◆ Cumulative and in-combination effects

## INTRODUCTION

20.1. Schedule 4 paragraph 5 of the EIA Regulations requires:

'A description of the likely significant effects of the development on the environment resulting from, inter alia: (e) the cumulation of effects with other existing and/or approved projects, taking into account any existing environmental problems relating to areas of particular environmental importance likely to be affected or the use of natural resources'. The text goes on to state that 'the description of the likely significant effects on the factors specified in regulation 5(2) should cover the direct effects and any indirect, secondary, cumulative, transboundary, short-term, medium-term and long-term, permanent and temporary, positive and negative effects of the development'.

- 20.2. The EIA for the HNRFI assesses the *cumulative effects (inter-project effects)* of the Proposed Development and other development projects at both the construction and operational phases.
- 20.3. This chapter of the ES provides an analysis of the *in-combination effects* (*intra-project effects*) that might arise where receptors experience multiple potentially non-significant effects from a range of impacts, which taken together might become significant for example, noise and visual effects experienced in combination.
- 20.4. This chapter of the ES sets out the approach adopted for the assessment of these effects and the outcomes of the assessment.

#### METHODOLOGY

#### **Cumulative effects**

- 20.5. According to the Planning Inspectorate's Advice Note Seventeen: Cumulative effects assessment relevant to nationally significant infrastructure projects (version 2, August 2019, paragraph 3.1.1):
  - 'Other existing development and/or approved development' likely to result in significant cumulative effects should be identified and assessed by the applicant in the Cumulative Environmental Assessment (CEA) ....in order to establish the relevant 'other existing development and/or approved development' the applicant should determine the Zone of Influence (ZOI) for each environmental aspect considered within the ES . . .'.
- 20.6. The ZOI for each aspect is documented in Table 20.1. The 'other existing development and/or approved development' will be identified by reference to planning applications, relevant development plans and any other available sources including stakeholder

consultations, in particular with the relevant planning authorities. Where multiple ZOI's have been provided, the precautionary principle has been applied and the largest ZOI has been used in the assessment.

Table 20.1: Zones of Influence

Chapter	Zone of Influence
Land use and socio-economic effects	Study area of <b>30 km</b> from the Main Order Limits.
Transport and traffic	Transport cumulative effects have been assessed as part of the transport modelling work which is located in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).
Air quality	Construction phase study area of <b>700 m</b> from the Main Order Limits. This study area is derived from the 350 m study area for the HNRFI in addition to the 350 m study area used by any of the cumulative schemes assessed.
	Operational cumulative effects have been assessed as part of the transport modelling work which is located in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).
Noise and vibration	Construction phase study area of <b>10 km</b> from the Main Order Limits. This ZOI relates to consideration of development generated road traffic from all roads within a 10 km radius which was included as a worst-case scenario at the PEIR stage. The ES chapter considered a study area of 600 m from any new road link, however the 10 km ZOI was retained as a precautionary approach.
	Operational cumulative effects have been assessed as part of the transport modelling work which is located in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).
Landscape and visual	Study area of <b>5 km</b> from the Main Order Limits.

Chapter	Zone of Influence
Ecology and biodiversity	Study area of <b>15 km</b> from the Main Order Limits.
Cultural heritage	Study area of <b>5 km</b> from the Main Order Limits.
Surface water and flood risk	Study area of <b>1 km</b> from the Main Order Limits.
Hydrogeology	Study area of <b>2 km</b> from the Main Order Limits.
Geology, soils and contamination	Study area of <b>2 km</b> from the Main Order Limits.
Materials and waste	Study area of <b>32 km</b> from the Main Order Limits.

20.7. In relation to the transport, air and noise cumulative assessments, PINS Advice Note 17 Paragraph 3.4.4 states:

'Certain assessments, such as transport and associated operational assessments of vehicular emissions (including air and noise) may inherently be cumulative assessments. This is because they may incorporate modelled traffic data growth for future traffic flows. Where these assessments are comprehensive and include a worst case within the defined assessment parameters, no additional cumulative assessment of these aspects is required'.

- 20.8. The cumulative assessment of transport, and operational cumulative assessments of air and noise, have been based on comprehensive transport modelling provided in the Forecasting Report (document reference 6.2.8.1). The Forecasting Report has been subject to extensive consultation with the Transport Working Group (TWG) which led to agreement of sites to be taken into account in the modelling. It is considered that the methodologies undertaken for the assessment of operational cumulative effects for air quality and noise matches that described in Paragraph 20.7 above. Therefore, the cumulative assessments of air quality and noise focus solely on construction phase cumulative impacts, which are based off of the ZOI's provided in Table 20.1 above.
- 20.9. The cumulative effects relating to climate change have been considered within the Energy and Climate Change technical chapter (document reference 6.1.18) as a standalone assessment due to the global nature of the effects associated with climate.
- 20.10. The following principles of the four stage assessment approach to cumulative assessment, as outlined in Advice Note 17, have been adopted in the ES for the HNRFI:
  - Stage 1: Establish the Project's ZOI and Long List of 'other existing development and/or approved development'

- Stage 2: Establish a shortlist of 'other existing development and/or approved development' and apply a threshold criterion based on temporal scope, the scale and nature of development and any other relevant factors to assist in deciding whether to include or exclude the 'other existing development and/or approved development' identified;
- Stage 3: Information Gathering compile detailed information on the 'other existing development and/ or approved development' shortlisted at Stage 2 including design and location, programme of construction, operation and decommissioning and environmental assessment information;
- **Stage 4:** Assessment assess the cumulative effects of the Proposed Development with the shortlist of 'other existing development and/or approved development' based on factors including duration of effect, extent of effect, type of effect, frequency of effect, value and resilience of receptors and likely success of mitigation.
- 20.11. To enable a reasonable and proportionate assessment, the following criteria have been used to identify schemes which could result in potential cumulative effects with the Proposed Development in accordance with Table 2 in Advice Note 17:
  - projects under construction;
  - permitted application(s), but not yet implemented;
  - submitted application(s), not yet determined;
  - projects on the Planning Inspectorate's Programme of Projects where a scoping report has not been submitted;
  - development allocations identified in the relevant Development Plan (and emerging Development Plans – with appropriate weight); and
  - development allocations identified in other plans and programmes (as appropriate)
    which set the framework for future development consents/approvals, where such
    development is reasonably likely to come forward.
- 20.12. Planning applications that have been refused and are not subject to appeal, and applications that have been withdrawn, will not be considered, as their implementation is not considered to be reasonably foreseeable.
- 20.13. Using these categories, developments have been identified by reference to the large application dataset, which is an online database maintained by Glenigan, within a 5 km radius of the Main Order Limits. A first search was undertaken in March 2022 to create an initial long list, which was followed by updated searches in May and September 2022 to ensure any new applications were taken into account. For the purposes of this assessment, the other works outside of the Main Order Limits but within the DCO Site, such as junction improvements other than M69 Junction 2 Works and the A47 Link Road Works, have been excluded as they are not considered to be a source of significant cumulative effects. The

- initial 'long list' of 'other developments' is included in Appendix 20.1 (document reference 6.2.20.1) of this ES and illustrated in Figure 20.1 (document reference 6.3.20.1).
- 20.14. Allocated sites in the 5 km study area were also added to the long list in Appendix 20.1 (document reference 6.2.20.1) and were categorised as Tier 3, as suggested in PINS Advice Note 17, to indicate that less information would be available for these sites and therefore this would need to be taken into account during the assessment in Stage 2.
- 20.15. To undertake Stage 2 of the cumulative assessment process, as outlined above, the long-list was circulated to the consultant team to provide feedback on whether the schemes would overlap in temporal scope or have significant cumulative effects with the Proposed Development. This feedback was then used to filter projects out where there were no significant effects predicted and to pull through schemes to Stage 3 that had potential for significant effects. The process of filtering schemes through Stage 1 and 2 is shown in Appendix 20.1.
- 20.16. Using the schemes filtered through in Stage 2, a table was created to summarise the cumulative schemes which were pulled through to Stage 3, as shown in Appendix 20.2 (document reference 6.2.20.2). This table was then used to provide the consultant team with a list of cumulative schemes which were tailored to their technical subject. The consultant team then used the tables to assess the schemes relevant to their topic, providing any predicted effects, proposed mitigation and residual effects.

#### In-combination effects

- 20.17. As explained above, the ES also considers the in-combination effects. The in-combination effects identified in the technical chapters are assessed using professional judgement and a qualitative assessment approach. To determine whether there is potential for a significant in-combination effect on an individual receptor, all residual effects for the HNRFI are listed against the individual receptors affected, so that receptors that might be affected by more than one impact can be identified.
- 20.18. Where only neutral or negligible effects are identified, it is considered that there is no potential for in-combination effects.

#### Consultation

20.19. During the Section 42 and Section 47 consultations on the PEIR, relevant planning authorities and stakeholders were invited to advise on which projects should be considered in the assessment of cumulative effects. Where responses were received, projects have been incorporated into the ES via the cumulative long list (Appendix 20.1, document reference 6.2.20.1). These included a response from Blaby District Council recommending the inclusion of an application at Croft Quarry (planning reference 2019/CM/0125/LCC), which was added as Site 43 in the cumulative long-list, as shown by Figure 20.1 (document reference 6.3.20.1). Blaby District Council also recommended adding the Land West of Stoney Stanton and Land North of the Railway Site proposals from

the Blaby Local Plan Review Options document<sup>1</sup> and these have been added to Appendix 20.1 (document reference 6.2.20.2) as Site 65 and 66, respectively.

### **CUMULATIVE IMPACTS**

20.20. Table 20.2 below summarises the outcome of the cumulative assessments undertaken in the individual topic based chapters of this ES. The table presents a summary only and further detail on these assessments is provided in the preceding topic-based chapters of this ES and are set out in appendix 20.1 (document reference 6.2.2.1).

 $<sup>^1 \</sup> Blaby \ Local \ Plan \ Review \ Options \ document - \\ \underline{https://www.blaby.gov.uk/media/4560/bdc-new-local-plan-options-consultation-document.pdf}$ 

Table 20.2 Summary of topic-based cumulative assessments

Topic	Potential cumulative effects during construction	Potential cumulative effects during operation
Land use and socio- economic effects	The land use and socio-economics assessment presents future projections of baseline conditions, including population and employment. Therefore as the assessment takes into account changes in baseline conditions over time, changes to the population and employment occurring as a result of potential new developments are implicitly included within the assessment. This approach does not however account for all socio-economic elements such as construction workers, because projections are not available for these aspects. These elements are summarised below.	
	The construction of the Proposed Development cumulatively with the other sites screened into the stage 3 CEA process would help to support construction in the region, which would be a non-significant beneficial effect.	Operationally should all the developments proposed come forward they would support job creation in the area, providing in the region of 10,400-12,900 jobs which would be a moderate beneficial effect, which is significant in EIA terms.  The impact of additional homes and commercial floorspace will lead to an additional demand for housing, but the forecasts suggest that this will result in a neutral effect.
Transport and traffic	The Transport Assessment factors in future committed development, general population growth and job growth. The model has considered all significant planned and/or committed development in the area, where the detailed development information was known this was inputted into the model directly, other developments are included under the assumptions embedded in the model during its development.  Cumulative effects in relation to transport are therefore inherent within the modelling work that has been undertaken. As a result any effects arising from the assessments based on the model values are also cumulative effects. Modelling details are provided in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).	

Topic	Potential cumulative effects during construction	Potential cumulative effects during operation
Air quality	The construction phase dust assessment has been undertaken in accordance with the Institute of Air Quality Management (IAQM) guidance. Based upon the ZoI as set out earlier in this chapter, a search for cumulative sites within 700 m of the Main HNRFI Site has been undertaken. This has resulted in no construction phase cumulative schemes being taken through to Stage 3 and therefore no construction phase cumulative effects have been assessed.	The Transport Assessment factors in future committed growth, as such the cumulative air quality transport-related effects during operation are inherently built into the assessment. The transport modelling work is located in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).  No significant industrial sources were identified in the vicinity of the Main HNRFI Site that had the potential to give rise to cumulative effects.
Noise and vibration	The construction phase assessment has considered existing sensitive receptors surrounding the Proposed Development, and considered that any impact will be lower at existing sensitive receptors located at a greater distance than those identified. The assessment identified two potential effects relating to the cumulative sites taken through to Stage 3. These related to Sites 21 and 8 (see Appendix 20.2, document reference 6.2.20.2). Given that these developments will be subject to the same best practice measures, such as those set out in the CEMP (document reference 17.1), the effects at these sites will result in temporary, moderate at worst effects which are significant.	The Transport Assessment factors in future committed growth, as such the cumulative noise transport-related effects during operation are inherently built into the assessment. The transport modelling work is located in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).
Landscape and	The landscape and visual effects cumulative assessment considered the cumulative schemes (Appendix 20.1, document reference 6.2.20.1) against landscape character and visual effects. With regards to landscape	

Topic	Potential cumulative effects during construction	Potential cumulative effects during operation
visual effects	Landscape Character Area (LCA) in cumulation with Site the effect attributed to the 'other development'. The effect on the Elmesthorpe Floodplain LCA with Site 66.  The HNRFI is considered to produce likely significate predominantly in cumulation with Site 65 and 66 as me	significant effect on the Stoney Stanton Rolling Farmland e 65 (Land West of Stoney Stanton), with the majority of HNRFI is also predicted to have a significant cumulative (Land North of the Railway Line).  Into cumulative effects with regards to visual effects, intioned above, which are both adjacent to the Proposed dered to produced likely significant cumulative effects in
Ecology and biodiversity	The assessment identified that the majority of the potential construction impacts would be in relation to hydrological contamination and therefore would be dealt with through the CEMP (document reference 17.1), with the remainder being dealt with via the Biodiversity Impact Assessment (document reference 6.2.12.2). There would be no significant cumulative effects.	The Transport Assessment factors in future committed growth, as such the cumulative air quality transport-related effects in relation to ecology during operation are inherently built into the assessment. The transport modelling work is located in the Forecasting Report (appended to the Transport Assessment, document reference 6.2.8.1).  In addition, recreational impacts are predicted to be unlikely following the implementation of the Access Management Plan (document reference 6.2.12.4). Therefore, following the implementation of the Access Management Plan, it was concluded that there would be no significant cumulative effects.
Cultural heritage	The assessment identified four receptors with which potential residual effects were predicted. The Earl Shilton Sustainable Urban Extension Policy 6 site (Site 54, document reference 6.2.20.2) and the application on the same site under reference 20/01056/SCOPE were both assessed as having the potential for minor adverse effects at most in cumulation with the HNRFI. The Grade II* listed Church of St. Michael and Grade II	

Topic	Potential cumulative effects during construction	Potential cumulative effects during operation
	listed Church of All Saints were also assessed as having the potential for minor adverse effects at most in combination with the HNRFI which is not significant. Therefore, taking the above effects into consideration, it is concluded that the HNRFI is not predicted to have any significant cumulative effects on cultural heritage through the construction and operational phases.	
Surface water and flood risk	Based upon the cumulative site search and the relevant ZoI, there are no current existing or permitted schemes that would represent a significant cumulative impact with the Proposed Development in regard to surface water and flood risk. Each development will need to comply with national and local policy and best practice in order to not detrimentally affect the floodplain or increase flood risk in the wider catchment both now and in the future including accounting for the effects of climate change.	
Hydrogeology	Based upon the ZoI as set out earlier in this chapter, a search for cumulative sites within 2 km of the Main HNRFI Site has been undertaken. This has resulted in no construction or operation phase cumulative schemes being taken through to Stage 3 and therefore no construction phase cumulative effects have been assessed. Land contamination is subject to the same national guidance and all developments must meet a common standard for safe development with a requirement to undertake a phased investigation of the site including Phase 1 preliminary risk assessment, Phase 2 intrusive investigation remediation strategy, remediation implementation and verification. It is considered that there will be no significant cumulative effects on hydrogeology and contamination resulting from the Proposed Development and the cumulative schemes considered as part of the assessment, as each development will incorporate appropriate mitigation measures such as detailed ground investigations.	
Geology, soils and contaminated land	Based upon the ZoI as set out earlier in this chapter, a search for cumulative sites within 2 km of the Main HNRFI Site has been undertaken. This has resulted in no construction phase cumulative schemes being taken through to Stage 3 and therefore no construction phase cumulative effects have been assessed. Land contamination is subject to the same national guidance and all developments must meet a common standard for safe development with a requirement to undertake a phased investigation of the site including Phase 1 preliminary risk assessment, Phase 2 intrusive investigation remediation strategy, remediation implementation and verification. It is considered that there will be no significant cumulative effects on geology and contamination	

Topic	Potential cumulative effects during construction	Potential cumulative effects during operation
	resulting from the Proposed Development and the cumulative schemes considered as part of the assessment, as each development will incorporate appropriate mitigation measures such as detailed ground investigations.	
Materials and waste	The assessment identified one site that was predicted to result in an adverse residual cumulative effect, which was the Land West of Stoney Stanton SHELAA site (Site 65, document reference 6.2.20.2). The assessment concluded that due to the cumulative impact of waste produced by the site, it may result in a slight residual effect, which is not significant. Other effects were predicted relating to the installation of a recycling plant (Site 10) and the extension of a quarry (Site 43) (document reference 6.2.20.2), but were considered as non-significant positive effects due to the increase in waste management supply and the additional supply of mineral resources for construction, respectively. Therefore, taking the above effects into consideration, it is concluded that the HNRFI is not predicted to have any significant cumulative effects on materials and waste during the construction and operational phases.	

## IN-COMBINATION EFFECTS

- 20.22. The receptors for the in-combination assessment can be divided broadly into a number of main groups, as listed below:
  - local residents;
  - ecological receptors;
  - road users; and
  - heritage assets.
- 20.23. Receptors that are significantly adversely affected by two or more residual effects have been identified in the table below.

Table 20.3 Interaction of residual adverse effects upon receptors

Receptor group	Identified effects	Summary
Local Residents	<ul> <li>Land Use and Socio-economic Effects (Chapter 7, document reference 6.1.7)</li> <li>Transport and Traffic (Chapter 8, document reference 6.1.8)</li> <li>Noise and Vibration (Chapter 10, document reference 6.1.10)</li> <li>Landscape and Visual Effects (Chapter 11, document reference 6.1.11)</li> <li>Cultural Heritage (Chapter 13, document reference 6.1.13)</li> <li>Surface Water and Flood Risk (Chapter 14, document reference 6.1.14)</li> </ul>	These effects and interactions are covered in the relevant ES chapters. The effects in combination are considered further in the subsequent sections of this chapter.
Ecological Receptors	<ul> <li>Ecology and Biodiversity (Chapter 12, document reference 6.1.12)</li> <li>Noise and Vibration (Chapter 10, document reference 6.1.10)</li> </ul>	These effects and interactions between the receptors are dealt with in the Ecology and Biodiversity chapter (Chapter 12, document reference 6.1.12). As such these effects are not considered further here.
Road Users	<ul> <li>Transport and Traffic (Chapter 8, document reference 6.1.8)</li> <li>Noise and Vibration (Chapter 10, document reference 6.1.10)</li> </ul>	These effects and interactions between the receptors are dealt with in the Transport and Traffic chapter (Chapter 8, document reference 6.1.8). As such these effects are not considered further here.

Receptor group	Identified effects	Summary
Heritage Assets	<ul> <li>Cultural Heritage (Chapter 13, document reference 6.1.13)</li> <li>Landscape and Visual Effects (Chapter 11, document reference 6.1.11)</li> </ul>	These effects and interactions between the receptors are dealt with in the Ecology and Biodiversity chapter (Chapter 13, document reference 6.1.13). As such these effects are not considered further here.

- 20.24. The synergistic effects upon ecological receptors, road users, heritage assets, businesses and the climate are addressed within their respective technical topic chapters and as such are not considered further as part of this assessment.
- 20.25. Further assessment of the in-combination effects upon local residents is considered appropriate and therefore is addressed within this chapter. The key effects identified upon human receptors are in relation to noise and visual impact.

#### Construction phase in-combination effects on local residents

- 20.26. The effects identified during the construction phase focus on impacts relating to the historic landscape, noise and vibration and socio-economic effects. Impacts relating to the historic landscape are a result of the removal and/or partial loss of hedgerows on the Main HNRFI Site, which will be a permanent change to the historic landscape character resulting in a moderate adverse effect (Chapter 13, document reference 6.1.13). The noise and vibration chapter (Chapter 10, document reference 6.1.10) identified a moderate adverse effect relating to noise generated during the construction phase impacting nearby noise sensitive receptors. The land use and socio-economic chapter (Chapter 7, document reference 6.1.7) identified a minor beneficial effect to local residents relating to employment during the construction phase.
- 20.27. Given the nature of the effects identified during the construction phase, it is not considered that they have the potential to act cumulatively to result in a more significant effect than that was predicted for individual topics. Furthermore, the beneficial effect identified relating to construction employment is considered to improve the overall effect of the construction phase on local residents.

#### Operation phase in-combination effects on local residents

- 20.28. The effects identified during the operation phase focus on impacts relating to land use and socio-economic effects, transport and traffic, noise and vibration, landscape and visual effects and surface water and flood risk. Effects classified as moderate or greater are considered significant in EIA terms.
- 20.29. The land use and socio-economic effects chapter (Chapter 7, document reference 6.1.7) identified a number of adverse and beneficial effects relating to the operational phase of the HNRFI. The highest magnitude of likely significant effects was a major adverse effect

relating to the acquisition of land from the farm holders and landowners, although it is noted that they benefit financially from the agreement. The chapter also identified minor adverse effects relating to the reduction in amenity for local horse riders, walkers and cyclists. However, the chapter also identified a moderate beneficial effect through the operation phase from the increase in employment from the jobs created by the scheme, predicted to be between 8,410 and 10,400 once fully operational.

- 20.30. The transport and traffic chapter (Chapter 8, document reference 6.1.8) identified a minor adverse effect relating to fear and intimidation experienced by pedestrians as a result of the increase in construction traffic and activity in the local area. The noise and vibration chapter (Chapter 10, document reference 6.1.10) identified a major adverse effect relating to traffic noise at one of the noise sensitive receptors (NSR1) and a minor adverse effect from noise through operation relating to HGV deliveries, rail movements and fixed plant and equipment.
- 20.31. The landscape and visual effects chapter (Chapter 11, document reference 6.1.11) identified significant effects in respect of both landscape and visual impacts. In landscape terms, significant effects were identified on the landscape and character of the Main HNRFI Site, the landscape character and fabric of the A47 Link Road Corridor, LCA1: Aston Flamville Wooded Farmland, LCA6: Elmesthorpe Floodplain, and, LCA15: Stoney Stanton Rolling Farmland.
- 20.32. Significant adverse visual effects relating to dwellings and settlements within 1km of the Main HNRFI Site, including (but not limited to) residents at Aston Firs campsite, Stanton Road, Burbage Common Road and the Gypsy and traveller settlement off Smithy Lane. There were also a number of major adverse visual effects relating to a number of Public Rights of Way (PRoW) in the area surrounding the HNRFI. Finally, the chapter identified a major/moderate adverse effect relating to views from Burbage Common Road and a number of minor adverse effects relating to views from other public highways.
- 20.33. The surface water and flood risk chapter (Chapter 14, document reference 6.1.14) identified a minor beneficial effect relating to the reduction in flood risk for the HNRFI site and surrounding area resulting from drainage works as part of the Proposed Development.
- 20.34. Given the effects summarised above, it is considered that the HNRFI has the potential to produce significant adverse in-combination effects on local residents during the operational phase. In particular, the effects relating to land use, noise and landscape have significant potential to act cumulatively. It is noted that there are beneficial effects which help to counteract the adverse effects anticipated, such as the creation of jobs and reduction in flood risk, however it is concluded that significant adverse in-combination effects will remain during operation.

#### TRANSBOUNDARY EFFECTS

20.35. Certain types of major development might exert environmental effects that extend beyond the boundary of the nation-state in which the Proposed Development would be

located. Planning Inspectorate Advice Note 12: Transboundary Impacts and Process (version 6, April 2022) offers guidance on the procedures for transboundary consultation associated with a DCO application.

20.36. PINS Advice Note 12 (paragraphs 2.2 and 2.5) explains that:

'The UK is a signatory to the United Nations Economic Commission for Europe (UNECE) Convention on Environmental Impact Assessment in a Transboundary Context. The Convention was adopted in 1991 in the Finnish city of Espoo and is therefore known as the 'Espoo Convention'. The UK is also a signatory to the Convention on Access to Information, Public Participation in Decision-Making and Access to Justice in Environmental Matters (the 'Aarhus Convention') and its Protocol which provide people with the rights to easily access information, participate effectively in decision-making in environmental matters and to seek justice if their rights are violated.

The European Union (EU) Directive 85/337/EEC (as amended) (the EIA Directive) implements the Espoo and Aarhus Conventions in the EU and is transposed into UK law through the EIA Regulations.'

- 20.37. PINS Advice Note 12 (paragraph 4.1.2) explains the role of developers and offers the following advice:
  - '... the Applicant is requested to provide information to the Inspectorate to enable a view to be reached as to whether the development is likely to have significant transboundary effects on other EEA States. Information about the potential for transboundary effects should be provided by the Applicant as part of:
  - ...The suite of documents accompanying the application for development consent'
- 20.38. The 2020 Scoping Opinion provided by the Inspectorate in relation to the Proposed Development (ES appendix 6.2, document reference 6.2.6.2) stated the following in relation to transboundary effects
  - Having considered the nature and location of the Proposed Development, the Inspectorate is not aware that there are potential pathways of effect to other EEA states but recommends that, for the avoidance of doubt, the ES details any such consideration and assessment.
- 20.39. The screening of transboundary effects is an iterative process and has been continually reviewed as further assessment work has become available. This review process has confirmed that it is not considered that the Proposed Development would give rise to significant transboundary effects on European Economic Area (EEA) States and so the issue is screened out from further consideration as part of this ES.