



SCOPING OPINION:

A12 Chelmsford to A120 Widening Scheme

Case Reference: TR010060

Adopted by the Planning Inspectorate (on behalf of the Secretary of State) pursuant to Regulation 10 of The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017

December 2020

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CONTENTS

1.	INTRODUCTION.....	1
1.1	Background	1
1.2	The Planning Inspectorate’s Consultation.....	2
1.3	The European Union (Withdrawal Agreement) Act 2020	3
2.	THE PROPOSED DEVELOPMENT	4
2.1	Introduction	4
2.2	Description of the Proposed Development.....	4
2.3	The Planning Inspectorate’s Comments.....	5
3.	ES APPROACH.....	8
3.1	Introduction	8
3.2	Relevant National Policy Statements (NPSs).....	9
3.3	Scope of Assessment	9
3.4	Coronavirus (COVID-19) Environmental Information and Data Collection	12
3.5	Confidential and Sensitive Information.....	12
4.	ASPECT BASED SCOPING TABLES.....	14
4.1	Air Quality.....	14
4.2	Cultural Heritage	18
4.3	Landscape.....	24
4.4	Biodiversity	28
4.5	Geology and soils	32
4.6	Materials assets and waste	36
4.7	Noise and vibration.....	37
4.8	Population and Health	40
4.9	Road drainage and the water environment	43
4.10	Climate change	46
4.11	Cumulative effects.....	47
5.	INFORMATION SOURCES	48
 APPENDIX 1: CONSULTATION BODIES FORMALLY CONSULTED		
 APPENDIX 2: RESPONDENTS TO CONSULTATION AND COPIES OF REPLIES		

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Errata sheet – A12 Chelmsford to A120 Widening Scheme – Ref. TR010060

Scoping Opinion adopted by the Planning Inspectorate (on behalf of the Secretary of State) on 7 December 2020

Corrections agreed by the Planning Inspectorate after adoption of the Scoping Opinion

Page No.	ID	Error	Correction
10	3.3.11	<i>"The ES provide this information".</i>	<i>"The ES should provide this information".</i>
14/ 15	4.1.4	<i>"Any assumptions...should also be state in the ES".</i>	<i>"Any assumptions...should also be stated in the ES".</i>
19	4.2.3	<i>"...should consider utilising lidar and historical aerial photomontages...".</i>	<i>"...should consider utilising lidar and historical aerial photographs..."</i>
24	4.3.4	<i>"...the Applicant should make effort to agree the landscape assessment study and viewpoints with the relevant statutory bodies. The Applicant should make effort to agree the study are with the relevant statutory consultation bodies".</i>	<i>"...the Applicant should make effort to agree the landscape assessment study area and viewpoints with the relevant statutory bodies".</i> Second sentence here duplicates the first and can be disregarded.
25	4.3.6	<i>"The ES should consider veteran, ancient, and notable trees as distinct LVIA receptors and assess potential impacts on their settings".</i>	<i>"The ES should consider any veteran, ancient, and notable trees in terms of their contribution to landscape character and setting".</i>
26/ 27	4.3.13	<i>"...where hedgerows are judged to be 'Important' under the Hedgerows Regulation 1997 are identified..."</i>	<i>"...where hedgerows judged to be 'Important' under the Hedgerows Regulations 1997 are identified..."</i>
28	4.4.6	Ref. 9.4.29	Ref. 9.4.28.
29/ 30	4.4.10	<i>"...and does state the location of the mitigation measures..."</i>	<i>"...and does not state the location of the mitigation measures..."</i>
30	4.4.11	<i>"Where planting of vegetation is to be undertaken as a mitigation measure. The Applicant should..."</i>	<i>"Where planting of vegetation is to be undertaken as a mitigation measure, the Applicant should..."</i>
32	4.5.4	<i>"...does not agree that these matters can be being scoped out of the ES".</i>	<i>"...does not agree that these matters can be scoped out of the ES".</i>

32	4.5.5	<i>"The Inspectorate agrees that it is unlikely..."</i>	<i>"The Inspectorate agrees it is unlikely..."</i>
33	4.5.7	<i>"Relevant cross references between the deposit model data will have to be adequately cross-referenced with the heritage and hydrogeology chapters of the ES".</i>	<i>"The deposit model data should be adequately cross-referenced with the heritage and hydrogeology chapters of the ES".</i>
36	4.6.4	<i>"Operational material assets: The Scoping Report has not provided sufficient information within the Scoping Report that evidences no significant effects will occur. The Inspectorate does not agree that this matter can be scoped out of the ES on the basis of the reasoning presented".</i>	Row ID 4.6.4 was included in the Scoping Opinion in error and can be disregarded. Impacts associated with material assets and waste during operation of the Proposed Development can be scoped out of the ES, as per row ID 4.6.3 of the Scoping Opinion.
38	4.7.10	<i>"...would not be possible or due to their cost effectiveness".</i>	<i>"...would not be possible considering their cost effectiveness".</i>
38/ 39	4.7.11	<i>"...or the numerous small settlements in proximity to the south of the proposed order limits have been chosen".</i>	<i>"...or the numerous small settlements in proximity to the south of the proposed order limits".</i>
41	4.8.8	<i>"The ES should provide justification any permanent severance..."</i>	<i>"The ES should provide justification for any permanent severance..."</i>
41	4.8.9	<i>"Where PRowS are to be diverted and/ reinstated, the ES should take into account the impact that any additionally length in PRow could have on the users of the PRow".</i>	<i>"Where PRowS are to be diverted and/or reinstated, the ES should take into account the impact that any additional length in PRow could have on the users of the PRow".</i>
42	4.8.11	<i>"...Paragraph 13.5.7 states..."</i>	<i>"...Paragraph 13.6.5 states..."</i>
43/4 4	14.3.1 2	<i>"...states that a desk-based assessment that was undertaken..."</i>	<i>"...states that a desk-based assessment was undertaken..."</i>
Appendix 1	Table A1	Schedule 1 description missing	The relevant parish council(s) or, where the application relates to land [in] Wales or Scotland, the relevant community council.

1. INTRODUCTION

1.1 Background

- 1.1.1 On 28 October 2020, the Planning Inspectorate (the Inspectorate) on behalf of the Secretary of State (SoS) received a scoping request from Highways England (the Applicant) under Regulation 10 of the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the EIA Regulations) for the proposed A12 Chelmsford to A120 Widening scheme (the Proposed Development).
- 1.1.2 In accordance with Regulation 10 of the EIA Regulations, an Applicant may ask the SoS to state in writing its opinion *'as to the scope, and level of detail, of the information to be provided in the environmental statement'*.
- 1.1.3 This document is the Scoping Opinion (the Opinion) provided by the Inspectorate on behalf of the SoS in respect of the Proposed Development. It is made on the basis of the information provided in the Applicant's report entitled A12 Chelmsford to A120 Widening Scheme: Environmental Scoping Report (the Scoping Report). This Opinion can only reflect the proposals as currently described by the Applicant. The Scoping Opinion should be read in conjunction with the Applicant's Scoping Report.
- 1.1.4 The Applicant has notified the SoS under Regulation 8(1)(b) of the EIA Regulations that they propose to provide an Environmental Statement (ES) in respect of the Proposed Development. Therefore, in accordance with Regulation 6(2)(a) of the EIA Regulations, the Proposed Development is EIA development.
- 1.1.5 Regulation 10(9) of the EIA Regulations requires that before adopting a scoping opinion the Inspectorate must take into account:
- (a) *any information provided about the proposed development;*
 - (b) *the specific characteristics of the development;*
 - (c) *the likely significant effects of the development on the environment; and*
 - (d) *in the case of a subsequent application, the environmental statement submitted with the original application.*
- 1.1.6 This Opinion has taken into account the requirements of the EIA Regulations as well as current best practice towards preparation of an ES.
- 1.1.7 The Inspectorate has consulted on the Applicant's Scoping Report and the responses received from the consultation bodies have been taken into account in adopting this Opinion (see Appendix 2).
- 1.1.8 The points addressed by the Applicant in the Scoping Report have been carefully considered and use has been made of professional judgement and experience in order to adopt this Opinion. It should be noted that when it comes to consider the ES, the Inspectorate will take account of relevant legislation and guidelines. The Inspectorate will not be precluded from requiring additional information if it

is considered necessary in connection with the ES submitted with the application for a Development Consent Order (DCO).

- 1.1.9 This Opinion should not be construed as implying that the Inspectorate agrees with the information or comments provided by the Applicant in their request for an opinion from the Inspectorate. In particular, comments from the Inspectorate in this Opinion are without prejudice to any later decisions taken (eg on submission of the application) that any development identified by the Applicant is necessarily to be treated as part of a Nationally Significant Infrastructure Project (NSIP) or Associated Development or development that does not require development consent.
- 1.1.10 Regulation 10(3) of the EIA Regulations states that a request for a scoping opinion must include:
- (a) *a plan sufficient to identify the land;*
 - (b) *a description of the proposed development, including its location and technical capacity;*
 - (c) *an explanation of the likely significant effects of the development on the environment; and*
 - (d) *such other information or representations as the person making the request may wish to provide or make.*
- 1.1.11 The Inspectorate considers that this has been provided in the Applicant's Scoping Report. The Inspectorate is satisfied that the Scoping Report encompasses the relevant aspects identified in the EIA Regulations.
- 1.1.12 In accordance with Regulation 14(3)(a), where a scoping opinion has been issued in accordance with Regulation 10 an ES accompanying an application for an order granting development consent should be based on *'the most recent scoping opinion adopted (so far as the proposed development remains materially the same as the proposed development which was subject to that opinion)'*.
- 1.1.13 The Inspectorate notes the potential need to carry out an assessment under The Conservation of Habitats and Species Regulations 2017. This assessment must be co-ordinated with the EIA in accordance with Regulation 26 of the EIA Regulations. The Applicant's ES should therefore be co-ordinated with any assessment made under the Habitats Regulations.

1.2 The Planning Inspectorate's Consultation

- 1.2.1 In accordance with Regulation 10(6) of the EIA Regulations the Inspectorate has consulted the consultation bodies before adopting a scoping opinion. A list of the consultation bodies formally consulted by the Inspectorate is provided at Appendix 1. The consultation bodies have been notified under Regulation 11(1)(a) of the duty imposed on them by Regulation 11(3) of the EIA Regulations to make information available to the Applicant relevant to the preparation of the ES. The Applicant should note that whilst the list can inform their consultation, it should not be relied upon for that purpose.

- 1.2.2 The list of respondents who replied within the statutory timeframe and whose comments have been taken into account in the preparation of this Opinion is provided, along with copies of their comments, at Appendix 2, to which the Applicant should refer in preparing their ES.
- 1.2.3 The ES submitted by the Applicant should demonstrate consideration of the points raised by the consultation bodies. It is recommended that a table is provided in the ES summarising the scoping responses from the consultation bodies and how they are, or are not, addressed in the ES.
- 1.2.4 Any consultation responses received after the statutory deadline for receipt of comments will not be taken into account within this Opinion. Late responses will be forwarded to the Applicant and will be made available on the Inspectorate's website. The Applicant should also give due consideration to those comments in preparing their ES.

1.3 The European Union (Withdrawal Agreement) Act 2020

- 1.3.1 The UK left the European Union as a member state on 31 January 2020. The European Union (Withdrawal Agreement) Act 2020 gives effect to transition arrangements that last until the 31 December 2020. This provides for EU law to be retained as UK law and also brings into effect obligations which may come in to force during the transition period.
- 1.3.2 This Scoping Opinion has been prepared on the basis of retained law and references within it to European terms have also been retained for consistency with other relevant documents including relevant legislation, guidance and advice notes.

2. THE PROPOSED DEVELOPMENT

2.1 Introduction

2.1.1 The following is a summary of the information on the Proposed Development and its site and surroundings prepared by the Applicant and included in their Scoping Report. The information has not been verified and it has been assumed that the information provided reflects the existing knowledge of the Proposed Development and the potential receptors/ resources.

2.2 Description of the Proposed Development

2.2.1 The Applicant's description of the Proposed Development, its location and technical capacity (where relevant) is provided in Scoping Report Sections 2.3, 2.4 and 2.5.

2.2.2 The Proposed Development aims to ameliorate the traffic congestion on the section of the A12 between Chelmsford and Colchester (Junction 19 Boreham interchange to Junction 25 Marks Tey interchange), which is currently exacerbated by heavy goods vehicles and commuter traffic and creates a higher than national average rate of fatalities and serious injuries from collisions. The existing A12 between Junctions 19 and 25 is 24km and is predominantly a dual two-lane carriageway, with a limited length of dual three-lane carriageway between J19 (Boreham) and J20a (Hatfield Peverel South). There are a number of graded 'ramp' accesses, particularly between J22 (Witham North) and J23 (Kelvedon South) and J24 (Kelvedon North) and J25 (Marks Tey). The Proposed Development involves widening the existing A12 to three lanes throughout in each direction with offline bypasses created between J22 and J23 (Rivenhall End Bypass) and J24 and J25 (Kelvedon to Marks Tey). This would be accompanied by junction improvements (J19 and J25), construction of new all movement junctions (J21, J22, and J24), and removal of existing junctions (J20a, J20b, and J23).

2.2.3 The Proposed Development is a linear scheme situated between the north-eastern edge of Chelmsford at its south-western extent and the village of Marks Tey to the north-east. The Proposed Development extends along the existing A12 across the northern edge of Boreham, south-eastern edge of Witham, south of Kelvedon, Feering and Marks Tey, and north of Copford. Additional areas to the north and south of the route are required as permanent areas for environmental mitigation, and temporary sites for construction compounds, temporary works, statutory undertaker diversions, local road mitigation, material storage, haul routes, and potential borrow pit areas. Site location plans are provided at Inset 1.1 and 2.1, and in Figure 1.1.

2.2.4 The Proposed Development comprises a combination of existing dual and single carriageway roads, with abutments and bridges. The A12 runs to the south of but in parallel to the Great Eastern Main Line (GEML) railway for most of its length between J19 and J25, and the Proposed Development is adjacent to the Chelmer and Blackwater Navigation for approximately 1km at its southern extent. In places the Proposed Development is immediately adjacent to industrial and residential areas. There are highway plantings and screening belts

of trees. The rural landscape surrounding the Proposed Development is generally low-lying and flat or gently undulating and includes; farm buildings, arable and pasture fields with mature hedgerows, small scattered wooded blocks and copses. There are small disused flooded quarry workings, and one aggregates quarry that is still working. The Proposed Development crosses the Rivers Blackwater, Brain, and Ter and also Domsey Brook, along with smaller streams and drainage ditches.

- 2.2.5 The Proposed Development is predominantly situated within Flood Zone 1, with small sections of the proposed order limits near river crossings being within Flood Zones 2 and 3.

2.3 The Planning Inspectorate's Comments

Description of the Proposed Development

- 2.3.1 The Scoping Report includes:

- a description of the Proposed Development comprising at least the basic information on the site, design, size and other relevant features of the development;
- a description of the location of the development and description of the broad physical characteristics of the whole development, though some details are lacking.

- 2.3.2 The description of the Proposed Development within Table 2.3 of the Scoping Report is not accompanied by any figures and lacks design details of key features such as locations and configurations of; junctions, roundabouts, bridges and abutments. No visualisations, such as photomontages, 3D models or wireframe images have been provided. There are few specific indications provided as to which areas will be utilised for environmental mitigation, borrow pits, construction compounds, material storage, and other purposes. Descriptions of such key details and impacts should be expanded and refined within the ES.

- 2.3.3 Additionally, the ES should include sufficient information on the following matters to provide a complete understanding of design and environmental impacts of the Proposed Development:

- The Scoping Report mentions that demolition works will be required for bridges and residential properties, but no details are provided.
- The Scoping Report does not provide sufficient detail regarding the extent of impacts associated with severance on the road network, Public Right of Ways (PRoW) and access to residential, commercial and agricultural properties arising from the Proposed Development to be fully understood.
- The Scoping Report does not state the locations or dimensions of the construction compounds, temporary offices, laydown areas, or haul roads. It is not stated if the construction compounds and temporary offices will require connection to utilities or any environmental impacts that may arise from connecting these sites to utilities.

- The Scoping Report does not state the total area of land required for the Proposed Development.
- The Scoping Report Paragraph 2.4.16 states that utilities including gas main and high voltage power lines would be affected but limited information is provided that describes the construction activities associated with these works, or the environmental impact of these works. The Inspectorate notes that the Applicant assumes that environmental assessment associated with these works will be undertaken by a third party, but if these works are required for the functionality of the Proposed Development, the impacts associated with these works should be included within the ES. The ES should include a clear description of all the elements that comprise the Proposed Development including any elements that may be necessary to enable the delivery of the Proposed Development but may also comprise individual NSIP's in their own right (eg power line diversions).

2.3.4 The Inspectorate notes that the distances between the Proposed Development and receptors stated in the Scoping Report are inaccurate in some instances eg Paragraph 8.4.8 which states that the Grade II Terling Place Registered Park and Gardens is located is 1.8km from the Proposed Development but it is actually located approximately 910m from the Proposed Development. The Applicant should ensure that accurate distances between receptors and the Proposed Development are reported in the ES and relevant aspect chapters.

2.3.5 The Scoping Report has provided limited information on how the traffic and transport model will be undertaken, and no information on construction traffic has been provided. This information should be provided within the ES or included within a standalone traffic and transport assessment that links to the technical chapters within the ES.

Alternatives

2.3.6 The EIA Regulations require that the Applicant provide 'A description of the reasonable alternatives (for example in terms of development design, technology, location, size and scale) studied by the developer, which are relevant to the proposed project and its specific characteristics, and an indication of the main reasons for selecting the chosen option, including a comparison of the environmental effects'.

2.3.7 The Inspectorate acknowledges the Applicant's intention to consider alternatives within the ES. The Inspectorate would expect to see a discrete section in the ES that provides details of the reasonable alternatives studied and the reasoning for the selection of the chosen option(s), including a comparison of the environmental effects. The Scoping Report considers alternatives in Chapter 3.

Flexibility

2.3.8 The Inspectorate notes the Applicant's desire to incorporate flexibility into their draft DCO (dDCO) and its intention to apply a Rochdale Envelope approach for this purpose. Where the details of the Proposed Development cannot be defined precisely, the Applicant will apply a worst-case scenario. The Inspectorate

welcomes the reference in Section 2.6 of the Scoping Report to Planning Inspectorate Advice Note Nine 'Using the 'Rochdale Envelope'¹ in this regard.

- 2.3.9 The Applicant should make every attempt to narrow the range of options and explain clearly in the ES which elements of the Proposed Development have yet to be finalised and provide the reasons. At the time of application, any Proposed Development parameters should not be so wide-ranging as to represent effectively different developments. The development parameters should be clearly defined in the dDCO and in the accompanying ES. It is a matter for the Applicant, in preparing an ES, to consider whether it is possible to robustly assess a range of impacts resulting from a large number of undecided parameters. The description of the Proposed Development in the ES must not be so wide that it is insufficiently certain to comply with the requirements of Regulation 14 of the EIA Regulations.
- 2.3.10 It should be noted that if the Proposed Development materially changes prior to submission of the DCO application, the Applicant may wish to consider requesting a new scoping opinion.
- 2.3.11 The Applicant identifies that the project design process is ongoing and as such it is not yet possible to define the exact footprint of the Proposed Scheme (Para 2.6.1). The red line boundary therefore reflects a 'worst case' scenario to allow some flexibility.

¹ Advice Note Nine: Using the Rochdale Envelope. Available at:
<https://infrastructure.planninginspectorate.gov.uk/legislation-and-advice/advice-notes/>

3. ES APPROACH

3.1 Introduction

- 3.1.1 This section contains the Inspectorate's specific comments on the scope and level of detail of information to be provided in the Applicant's ES. General advice on the presentation of an ES is provided in the Inspectorate's Advice Note Seven 'Environmental Impact Assessment: Process, Preliminary Environmental Information and Environmental Statements'² and associated appendices.
- 3.1.2 Aspects/matters (as defined in Advice Note Seven) are not scoped out unless specifically addressed and justified by the Applicant and confirmed as being scoped out by the Inspectorate. The ES should be based on the Scoping Opinion in so far as the Proposed Development remains materially the same as the Proposed Development described in the Applicant's Scoping Report.
- 3.1.3 The Inspectorate has set out in this Opinion where it has/ has not agreed to scope out certain aspects/ matters on the basis of the information available at this time. The Inspectorate is content that the receipt of a Scoping Opinion should not prevent the Applicant from subsequently agreeing with the relevant consultation bodies to scope such aspects / matters out of the ES, where further evidence has been provided to justify this approach. However, in order to demonstrate that the aspects/ matters have been appropriately addressed, the ES should explain the reasoning for scoping them out and justify the approach taken.
- 3.1.4 The Inspectorate has made effort to ensure that this Scoping Opinion is informed through effective consultation with the relevant consultation bodies. Unfortunately, at this time the Inspectorate is experiencing delays with receiving and processing hard copy consultation responses, and this may affect a consultation body's ability to engage with the scoping process. The Inspectorate also appreciates that strict compliance with COVID-19 advice may affect a consultation body's ability to provide their consultation response. The Inspectorate considers that Applicants should make effort to ensure that they engage effectively with consultation bodies and where necessary further develop the scope of the ES to address their concerns and advice. The ES should include information to demonstrate how such further engagement has been undertaken and how it has influenced the scope of the assessments reported in the ES.
- 3.1.5 Where relevant, the ES should provide reference to how the delivery of measures proposed to prevent/ minimise adverse effects is secured through dDCO requirements (or other suitably robust methods) and whether relevant consultation bodies agree on the adequacy of the measures proposed.

² Advice Note Seven: Environmental Impact Assessment: Process, Preliminary Environmental Information and Environmental Statements and annex. Available from: <https://infrastructure.planninginspectorate.gov.uk/legislation-and-advice/advice-notes/>

3.2 Relevant National Policy Statements (NPSs)

- 3.2.1 Sector-specific NPSs are produced by the relevant Government Departments and set out national policy for NSIPs. They provide the framework within which the Examining Authority (ExA) will make their recommendation to the SoS and include the Government's objectives for the development of NSIPs. The NPSs may include environmental requirements for NSIPs, which Applicants should address within their ES.
- 3.2.2 The designated NPS relevant to the Proposed Development is the:
- NPS for National Networks (NPSNN)

3.3 Scope of Assessment

General

- 3.3.1 The Inspectorate recommends that in order to assist the decision-making process, the Applicant uses tables:
- to demonstrate how the assessment has taken account of this Opinion;
 - to identify and collate the residual effects after mitigation for each of the aspect chapters, including the relevant interrelationships and cumulative effects;
 - to set out the proposed mitigation and/ or monitoring measures including cross-reference to the means of securing such measures (e.g. a dDCO requirement);
 - to describe any remedial measures that are identified as being necessary following monitoring; and
 - to identify where details are contained in the Habitats Regulations Assessment (HRA report) (where relevant), such as descriptions of European sites and their locations, together with any mitigation or compensation measures, are to be found in the ES.
- 3.3.2 The Inspectorate considers that where a DCO application includes works described as 'Associated Development', that could themselves be defined as an improvement of a highway, the Applicant should ensure that the ES accompanying that application distinguishes between effects that primarily derive from the integral works which form the proposed (or part of the proposed) NSIP and those that primarily derive from the works described as Associated Development. This could be presented in a suitably compiled summary table. This will have the benefit of giving greater confidence to the Inspectorate that what is proposed is not in fact an additional NSIP defined in accordance with s22 of the PA2008.
- 3.3.3 In general, there is a lack of information within the Scoping Report regarding details of the Proposed Development, many aspects of which have not been finalised. The red line boundary represents the 'worst-case' scenario, and within

it the layouts of proposed new roundabouts and junctions are not specified, nor are the areas that will be utilised for construction compounds, soil and material storage, or for extraction pits. No design details are included of new bridges, abutments, gantries, lighting and other infrastructure, or mitigation measures; and there are no visual representations of the completed scheme.

- 3.3.4 Some text in the Scoping Report, mostly on the figures in Appendix A, is small scale and difficult to read both on the paper and electronic copies. The Applicant is reminded that the ES should be clear and accessible to readers.

Baseline Scenario

- 3.3.5 The ES should include a description of the baseline scenario with and without implementation of the development as far as natural changes from the baseline scenario can be assessed with reasonable effort on the basis of the availability of environmental information and scientific knowledge.
- 3.3.6 Although the Applicant notes developments that will be assumed to be under construction or operational as part of the future baseline, it does not mention the proposed Longfield Solar Energy Farm that is proposed to be adjacent to the north of the A12 where the construction phase and possible glint or glare during operation might result in impacts to road users. The planned Beaulieu Park train station already has planning permission and needs to be considered.

Forecasting Methods or Evidence

- 3.3.7 The ES should contain the timescales upon which the surveys which underpin the technical assessments have been based. For clarity, this information should be provided either in the introductory chapters of the ES (with confirmation that these timescales apply to all chapters), or in each aspect chapter.
- 3.3.8 The Inspectorate expects the ES to include a chapter setting out the overarching methodology for the assessment, which clearly distinguishes effects that are 'significant' from 'non-significant' effects. Any departure from that methodology should be described in individual aspect assessment chapters.
- 3.3.9 The ES should include details of difficulties (for example technical deficiencies or lack of knowledge) encountered compiling the required information and the main uncertainties involved.

Residues and Emissions

- 3.3.10 The EIA Regulations require an estimate, by type and quantity, of expected residues and emissions. Specific reference should be made to water, air, soil and subsoil pollution, noise, vibration, light, heat, radiation and quantities and types of waste produced during the construction and operation phases, where relevant. This information should be provided in a clear and consistent fashion and may be integrated into the relevant aspect assessments.
- 3.3.11 The Scoping Report makes no reference to the total area of agricultural land that may be lost as a result of the Proposed Development. The ES provide this information.

Mitigation and Monitoring

- 3.3.12 Any mitigation relied upon for the purposes of the assessment should be explained in detail within the ES. The likely efficacy of the mitigation proposed should be explained with reference to residual effects. The ES should also address how any mitigation proposed is secured, with reference to specific dDCO requirements or other legally binding agreements.
- 3.3.13 The ES should identify and describe any proposed monitoring of significant adverse effects and how the results of such monitoring would be utilised to inform any necessary remedial actions.

Risks of Major Accidents and/or Disasters

- 3.3.14 The ES should include a description and assessment (where relevant) of the likely significant effects resulting from accidents and disasters applicable to the Proposed Development. The Applicant should make use of appropriate guidance (e.g. that referenced in the Health and Safety Executives (HSE) Annex to Advice Note 11) to better understand the likelihood of an occurrence and the Proposed Development's susceptibility to potential major accidents and hazards. The description and assessment should consider the vulnerability of the Proposed Development to a potential accident or disaster and also the Proposed Development's potential to cause an accident or disaster. The assessment should specifically assess significant effects resulting from the risks to human health, cultural heritage, or the environment. Any measures that will be employed to prevent and control significant effects should be presented in the ES.
- 3.3.15 Relevant information available and obtained through risk assessments pursuant to European Union legislation such as Directive 2012/18/EU of the European Parliament and of the Council or Council Directive 2009/71/Euratom or relevant assessments carried out pursuant to national legislation may be used for this purpose provided that the requirements of this Directive are met. Where appropriate, this description should include measures envisaged to prevent or mitigate the significant adverse effects of such events on the environment and details of the preparedness for and proposed response to such emergencies.

Climate and Climate Change

- 3.3.16 The ES should include a description and assessment (where relevant) of the likely significant effects the Proposed Development has on climate (for example having regard to the nature and magnitude of greenhouse gas emissions) and the vulnerability of the project to climate change. Where relevant, the ES should describe and assess the adaptive capacity that has been incorporated into the design of the Proposed Development. This may include, for example, alternative measures such as changes in the use of materials or construction and design techniques that will be more resilient to risks from climate change.

Transboundary Effects

- 3.3.17 Schedule 4 Part 5 of the EIA Regulations requires a description of the likely significant transboundary effects to be provided in an ES. Appendix E of the

Scoping Report examines potential transboundary effects. The Scoping Report concludes that the Proposed Development is not likely to have significant effects on another European Economic Area (EEA) State and proposes that transboundary effects do not need to be considered within the ES.

- 3.3.18 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.

A Reference List

- 3.3.19 A reference list detailing the sources used for the descriptions and assessments must be included in the ES.

3.4 Coronavirus (COVID-19) Environmental Information and Data Collection

- 3.4.1 The Inspectorate understands government enforced measures in response to COVID-19 may have consequences for an Applicant's ability to obtain relevant environmental information for the purposes of their ES. The Inspectorate understands that conducting specific surveys and obtaining representative data may be difficult in the current circumstance.
- 3.4.2 The Inspectorate has a duty to ensure that the environmental assessments necessary to inform a robust DCO application are supported by relevant and up to date information. Working closely with consultation bodies, the Inspectorate will seek to adopt a flexible approach, balancing the requirement for suitable rigour and scientific certainty in assessments with pragmatism in order to support the preparation and determination of applications in a timely fashion.
- 3.4.3 Applicants should make effort to agree their approach to the collection and presentation of information with relevant consultation bodies. In turn the Inspectorate expects that consultation bodies will work with Applicants to find suitable approaches and points of reference to allow preparation of applications at this time. The Inspectorate is required to take into account the advice it receives from the consultation bodies and will continue to do so in this regard.

3.5 Confidential and Sensitive Information

- 3.5.1 In some circumstances it will be appropriate for information to be kept confidential. In particular, this may relate to personal information specifying the names and qualifications of those undertaking the assessments and / or the presence and locations of rare or sensitive species such as badgers, rare birds and plants where disturbance, damage, persecution or commercial exploitation may result from publication of the information.
- 3.5.2 Where documents are intended to remain confidential the Applicant should provide these as separate documents with their confidential nature clearly indicated in the title and watermarked as such on each page. The information should not be incorporated within other documents that are intended for

publication or which the Inspectorate would be required to disclose under the Environmental Information Regulations 2004.

- 3.5.3 The Inspectorate adheres to the data protection protocols set down by the Information Commissioners Office³. Please refer to the Inspectorate's National Infrastructure privacy notice⁴ for further information on how personal data is managed during the Planning Act 2008 process.

³ <https://ico.org.uk>

⁴ <https://infrastructure.planninginspectorate.gov.uk/help/privacy-notice/>

4. ASPECT BASED SCOPING TABLES

4.1 Air Quality

(Scoping Report Section 6)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.1.1	N/A	N/A	No matters have been proposed to be scoped out of the assessment

ID	Ref	Other points	Inspectorate's comments
4.1.2	6.2	Study area	Within the ES, the construction air quality study area should include the potential 11 borrow pit sites that may be used to make up the cut and fill deficit.
4.1.3	6.3.4; and 6.3.5	Future NO ₂ emissions	<p>Scoping Report Paragraph 6.3.4 states "<i>There is no clear trend in the monitoring results between 2014 and 2018 at these sites, suggesting exceedances of the AQO [Air Quality Objectives] may persist at these locations for some years to come.</i>" However, Paragraph 6.3.5 states "<i>Application of the Roadside NO₂ Projection Tool would suggest compliance with the AQOs is likely at these locations in 2027.</i>"</p> <p>From these sentences, it is unclear whether the NO₂ Projection Tool is applicable to all monitoring sites. To avoid confusion, the ES should state where the Projection Tool has been used, and whether the assumptions within the tool corroborate with the data collected.</p>
4.1.4	6.3.7; 6.3.8; and Table 6.3	Monitoring locations	Limited information is provided to explain how the data presented in Table 6.3 was collected, processed and annualised. To ensure the data collected accurately represents the baseline NO ₂ concentrations the Applicant should state in the ES the entire data set collected, the timeframes for when the data was collected, and the method or

ID	Ref	Other points	Inspectorate's comments
			<p>model used to annualise the data. Any assumptions or limitations in collecting and/ or modelling the data should also be state in the ES.</p>
4.1.5	6.3.7; 6.3.8; and Table 6.3	Monitoring locations	<p>The Highway's England monitoring stations, as presented in Table 6.3 and Figure 6.2 are not always located close to the Project Control Framework 2 (PCF2) Affected Road Network (ARN). For instance, stations 11, 12 and 13 as shown in Figure 6.2 Sheet 1 of 7 are away from the Proposed Development and the ARN, and Figure 6.2, Sheet 3 of 7 shows no air quality monitoring, by Highways England or the local authorities, within Witham.</p> <p>The ES should explain the methodology used to determine the locations of the air quality monitoring stations and provide evidence that the locations chosen accurately represent the full extent of the air quality study area.</p>
4.1.6	6.3.14; and Table 6.5	Background NO _x concentrations	<p>Paragraph 6.3.14 states the background concentrations for NO₂, NO_x and PM₁₀ within the Proposed Development provisional order limits and the Traffic Reliability Area (TRA) are below the AQOs for NO₂, NO_x and PM₁₀.</p> <p>However, Table 6.5 shows that NO_x concentrations within the Proposed Development provisional order limits and the TRA could be as great as 32.9 and 36.0 µg/m³ respectively. These concentrations exceed the 30 µg/m³ AQO objective for NO_x.</p> <p>The information within Table 6.5 appears to contradict with Paragraph 6.3.14. The Applicant should ensure the information contained within the ES is coherent, accurate, and this matter should be clarified within the ES.</p> <p>Additionally, it is noted that the Defra background pollutant concentrations for NO₂, as provided in Table 6.5, are below all the monitoring NO₂ data and Pollution Climate Mapping (PCM) modelled data provided in Paragraphs 6.3.15 to 6.3.17.</p>

ID	Ref	Other points	Inspectorate's comments
			The ES should use the models/ data that best represents the study area. Justification should also be provided explaining why a particular model/ data was used instead of others.
4.1.7	Table 6.5	Background concentrations	Table 6.5 includes the locations of "Provisional order limits" and the "TRA". These locations cover a large distance which include different levels of development and infrastructure. The ES should split these locations into smaller areas and provide a breakdown of the Defra data used in order to show which areas of the provisional order limits and TRA are worst impacted by pollutants.
4.1.8	6.3.15; 6.3.16 and 6.3.17	Pollution climate mapping (PCM) census IDs	Paragraphs 6.3.15 to 6.3.17 discuss the application of Defra's PCM, but omit details such as the timeframe of the model, any assumptions included within the model, and the locations of the model's census IDs. This information should be included within the ES.
4.1.9	6.3.18; and Figure 6.3	Human health receptors	Considering the number of human receptors within 200m of the ARN, the Applicant may wish to provide a breakdown of the type of affected receptors within the ES, for example, the number of homes, schools or places of worship.
4.1.10	6.3.25	Receiving environment sensitivity	<p>The ES should include justification for assigning a 'medium' sensitivity to the receptors listed within Paragraph 6.3.25, especially for receptors where the AQO have been exceeded or are close to the AQO threshold of exceedance.</p> <p>It's noted that bullet points 2 and 3 of the Paragraph 6.3.25 have been based of the DRMB LA 105 Table 2.11b Receiving environment sensitivity. However, bullet points 2 and 3 do not accurately represent what is contained within Table 2.11b of the DMRB LA 105. Within the ES, the sensitivity criteria used should accurately follow the stated guidance.</p>

ID	Ref	Other points	Inspectorate's comments
			<p>Additionally, the Applicant may find it prudent to determine sensitivity of ecological sites on a variety of factors and not rely solely on distance from the designated site to the ARN.</p> <p>The ES should provide clear and justifiable explanations for how the sensitivity of receptors is determined.</p>
4.1.11	6.4.1	Construction impacts	The impacts associated with any demolition works should be assessed and included within the ES.
4.1.12	6.5.1; and 6.5.2	Design, mitigation and enhancements	<p>The ES should include an appropriate level of detail when describing the mitigation measures in order for the reader to ascertain the locations, dimensions and efficacy of the mitigation measures.</p> <p>The Construction Environmental Management Plan (CEMP) and Project Air Quality Action Plan (PAQAP) (if required) should be secured through the DCO or other legal mechanism.</p>
4.1.13	6.7.4	Operation study area	<p>Paragraph 6.7.4 bullet one states, "<i>A representative number of sensitive human health receptors will be selected, which will include all receptors with a likelihood of exceeding the air quality threshold.</i>"</p> <p>The ES should provide a justification for how these locations were determined and the Applicant should attempt to agree the locations of these receptors with the relevant statutory consultee(s).</p>
4.1.14	6.8.1; 6.8.2; and 6.8.3	Assessment assumptions and limitations	The ES should state all assumptions and limitations that have been used or encountered during the assessment.

4.2 Cultural Heritage

(Scoping Report Section 7)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.2.1	7.4.10; 7.4.12; 17.2.3; and Table 7.2	Operational impacts on historic landscape	Taking into consideration the nature of the Proposed Development is to replace the existing A12, it is unlikely that the Proposed Development would result in significant operational effects to the historic landscape. Therefore the Inspectorate agrees that this matter can be scoped out of the ES.

ID	Ref	Other points	Inspectorate's comments
4.2.2	7.2.2; and 7.2.3	Study area	<p>The Inspectorate considers that the extent of the study area should be informed by the nature of the heritage assets in addition to the type and extent of likely impacts on them, rather than an arbitrary pre-determined distance. The assertion that there will be no significant effects on heritage assets beyond 1km is premature as the provisional Zone of Theoretical Visibility (ZTV) depicted in Figure 8.3 suggests the Proposed Development has potential to impact on designated heritage assets across a wide area. The assessment should define a study area according to the sensitivity of the receiving environment and the potential impacts of the project (DMRB Sustainability and Environment Appraisal LA 106 Cultural heritage assessment, 3.5).</p> <p>The Applicant should make effort to agree the study area and ZTV with appropriate statutory heritage consultation bodies. The ES should also consider effects to non-designated heritage assets including locally-listed buildings.</p>

ID	Ref	Other points	Inspectorate's comments
			The Applicant should make effort to agree the ZTV with the relevant statutory bodies.
4.2.3	7.3.2	Data sources	<p>The ES should provide a detailed archaeological baseline including summaries of the results of archaeological investigations undertaken, and these investigations should be appended to the ES to support the conclusions of the ES. Furthermore, where additional data is available, such as within the Colchester Historic Environment Record, the desk based assessment should be updated with this information. See Colchester Borough Council's response in Appendix 2 for further information.</p> <p>The Applicant should consider utilising lidar and historical aerial photomontages to inform their assessment of cultural heritage impacts.</p>
4.2.4	7.3.7	Potential for Palaeolithic remains	The Inspectorate welcomes recognition of the high potential for encountering Palaeolithic remains during construction of the Proposed Development. The nature and scope of specialist palaeolithic survey and assessment ahead of the preparation of the ES should be devised in consultation with relevant statutory heritage consultees. An initial deposit model for the proposed scheme should be prepared that could be enhanced following later specialist geoarchaeological sampling. Geophysical and geoarchaeological techniques that can investigate deeper deposits of archaeological interest should be considered.
4.2.5	7.3.11	Non-designated archaeological remains	The two historic greens, Easthorpe Green and Potts Green, which form the landscape settings of Easthorpe Green Farmhouse Grade II Listed building, and the junction of two Roman roads, the south-west to north-east line of the modern A12 itself and a second broadly east-west route surviving as Easthorpe Road east of the A12 near Marks Tey should be included within the non-designated archaeological assets assessment.

ID	Ref	Other points	Inspectorate's comments
4.2.6	7.3.14; and Table 7.1	Value of receptors in the study area	Grade II listed buildings have been omitted from Table 7.1. The ES should clearly state the receptor value of Grade II listed buildings.
4.2.7	7.3.14; and Table 7.1	Assets of very low importance	Table 7.1 classes non-designated archaeological remains as field boundaries or undated cropmark features. The ES should avoid a generalised approach as no systematic archaeological investigation has been undertaken at this stage and that it is difficult to establish the value of the majority of below-ground archaeological remains along the proposed route.
4.2.8	7.4.2; and 7.4.3	Potential physical impacts and impacts to settings of assets during construction	Scoping Report Paragraphs 7.4.2 and 7.4.3 make no reference to the potential impact the location of the proposed junctions, construction compounds, and additional elements of the Proposed Development may have on heritage assets. This impact should be included within the ES cultural heritage assessment.
4.2.9	7.4.7	Potential physical impacts on heritage assets	<p>The Scoping Report notes the potential physical impacts of removal of, or damage to, archaeological remains during maintenance works, and damage through pollutants.</p> <p>The assessment should also consider physical impacts caused by continued compression during operation (especially if any significant archaeological remains are not fully excavated and recorded but preserved <i>in situ</i>), as well as long-term effects caused by drainage, dewatering and desiccation or alterations in soil pH, especially of any waterlogged deposits. The latter could affect deposits outside of the direct footprint of the proposed Development, and this should also be addressed within the ES.</p>
4.2.10	7.4.8	Alterations to settings	The Scoping Report references alterations to the setting of historic buildings where new infrastructure is present in key views towards, through and across an asset.

ID	Ref	Other points	Inspectorate's comments
			<p>The ES should consider using the terms 'built heritage' or 'built heritage assets' rather than 'historic buildings', as this then includes structures such as pillboxes, bridges, or gateposts and milestones. The ES should also assess the effects on key views looking out from assets.</p> <p>Particular consideration should be given to the effect on the setting of the Grade II Listed buildings at Easthorpe Green Farm (Easthorpe Green Farmhouse and Flispies) and the Grade II* Listed barn and Grade II Marks Tey Hall and their relationship to the wider landscape.</p>
4.2.11	7.5.1	Design mitigation	<p>The Scoping Report states design mitigation would include landscape design to avoid sensitive assets and viewpoints. The ES should provide further information on the landscape design, including an assessment of the efficacy of the mitigation measure and a figure(s) depicting the location of the landscape design. Furthermore, where landscape design is an integral part of the mitigation, future baseline photomontages should include the landscape design.</p> <p>The Applicant should make effort to agree any landscape design mitigation with the relevant statutory bodies.</p>
4.2.12	7.6.4	Likely significant effects on settings of Listed buildings	<p>The Scoping Report outlines Listed buildings likely to experience significant effects on settings, and states that the expanded junction 19 (Boreham) would affect the entrance of the Grade II Registered Park and Garden and Listed building at Boreham Hall.</p> <p>The ES should take into account that Boreham Hall is a Grade I Listed structure and therefore the setting of Boreham House includes the Grade II listed Registered Park and Garden. The assessment within the ES should ensure that setting of the heritage asset as a whole is taken into account when determining significance of effect.</p>
4.2.13	7.7.1	Assessment methodology	<p>The Scoping Report states that all further assessment will be undertaken in accordance with the relevant sections of DMRB LA 106</p>

ID	Ref	Other points	Inspectorate's comments
			<p>and guidance such as the NPPF and <i>The Setting of Heritage Assets: Good Practice Advice in Planning Note 3</i> (Historic England 2017).</p> <p>The Inspectorates suggests that the ES should also follow and reference these key national professional standards and guidelines, where relevant:</p> <ul style="list-style-type: none"> • Chartered Institute for Archaeologists (CIfA) 2014 – <i>Standard and Guidance for Commissioning Work or Providing Consultancy Advice on Archaeology and the Historic Environment</i>; • Chartered Institute for Archaeologists (CIfA) 2014 – <i>Standard and Guidance for Archaeological Field Evaluation</i>; • Chartered Institute for Archaeologists (CIfA) 2014 – <i>Standard and Guidance for Archaeological Geophysical Survey</i>; • Chartered Institute for Archaeologists (CIfA) 2017 – <i>Standard and Guidance for Archaeological Deskbased Assessment</i>; • EAC 2016 – <i>EAC Guidelines for the Use of Geophysics in Archaeology</i>; • Historic England 2015 – <i>Conservation Principles, Policies and Guidance for the Sustainable Management of the Historic Environment</i>; • Historic England 2015 – <i>Managing Significance in Decision-taking in the Historic Environment: Good Practice Advice in Planning Note 2</i>; • Historic England 2019 – <i>Statements of Heritage Significance: Analysing Significance in Heritage Assets</i>. <p>Additional national and regional research agendas and guidance documents should also be referred to and referenced.</p>

ID	Ref	Other points	Inspectorate's comments
4.2.14	7.7.3–7.7.4	Assessment methodology	The ES should provide more details concerning the methodologies and techniques utilised for the archaeological geophysical survey and geoarchaeological investigation.
4.2.15	N/A	Impacts to archaeology from changes in the water table	Consideration of potential impacts that changes to the water table during construction or operation may have on archaeological assets should be included within the ES.

4.3 Landscape

(Scoping Report Section 8)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.3.3	N/A	N/A	No matters have been proposed to be scoped out of the assessment.

ID	Ref	Other points	Inspectorate's comments
4.3.4	8.2.1	Study area and Zone of Theoretical Visibility (ZTV)	<p>The study area for the landscape assessment is described as having a buffer of approximately 2km from the Proposed Development, and a minimum of 1km from the draft order limits.</p> <p>The Inspectorate considers that the study area should be informed by the type of visual receptors and the nature, extent and severity of likely impacts on them, rather than an arbitrary pre-determined distances. Furthermore, the Scoping Report lacks evidence to support the assumption that visual effects beyond 1km are unlikely to be significant. The ES should provide further evidence to support this assumption and also take into account viewpoints from further afield that look onto the location of the Proposed Development.</p> <p>Additionally, the Applicant should make effort to agree the landscape assessment study and viewpoints with the relevant statutory bodies. The Applicant should make effort to agree the study are with the relevant statutory consultation bodies.</p>
4.3.5	8.2.2	Key professional standards and guidelines	<p>The Inspectorate welcomes mention of the <i>Guidelines for Landscape and Visual Impact Assessment</i> (3rd edition) (Landscape Institute 2019) but the ES should also reference other professional guidelines produced by the Landscape Institute – <i>Visual Representation of Development Proposals</i> (2019), <i>Reviewing Landscape and Visual Impact Assessments (LVIAs)</i> and <i>Landscape and Visual Appraisals</i></p>

ID	Ref	Other points	Inspectorate's comments
			<i>(LVAs) (2010), and Infrastructure (2020); in addition to National Infrastructure Design Principles: Primary Research (Frame Projects 2020).</i>
4.3.6	8.3.5; 8.7.4; and Table 8.1	Veteran, ancient and notable trees	<p>The ES should consider veteran, ancient, and notable trees as distinct LVIA receptors and assess potential impacts on their settings. Every effort should be made to retain any Category A and B trees which are highlighted within the survey, along with any high value veteran and ancient trees/ woodlands. Once designs of the scheme and construction methodologies have been finalised, an arboricultural method statement and a tree protection plan (TPP) should be included within, or appended to, the ES.</p> <p>If the removal of trees from the order limits is required, a tree removal plan should be provided.</p>
4.3.7	8.3.6; 8.3.19; Table 8.2; and Figure 13.1	Public Rights of Way (PRoW)	<p>Figure 13.1 depicts national and regional cycle routes, but not public footpaths or bridleways. Within the ES, a figure(s) should be presented that clearly depicts the locations of the PRoWs and bridleways, and any temporary or permanent diversions to the routes. Where severance to PRoWs or bridleways are to occur, this should also be depicted on the figure(s).</p>
4.3.8	8.3.8	Distances of Registered Parks and Gardens	<p>The Inspectorate notes that the Grade II Listed Registered Park and Garden at Hatfield Priory is in fact 600m south-east of the red line boundary of the Proposed Development and not 700m, the Grade II* Braxted Park is 720m to the south-east and not 800m, and the Grade II Terling Place is 910m to the north-west, not 1.8km. The ES should include accurate distances from the Registered Parks and Gardens to the Proposed Development.</p>
4.3.9	8.3.9	Long mortuary enclosure near Rivenhall	<p>The Inspectorate notes that there is a round barrow adjacent to the long mortuary enclosure which forms part of the Scheduled area. This</p>

ID	Ref	Other points	Inspectorate's comments
			feature should be considered within the landscape assessment within the ES.
4.3.10	8.3.15; and 8.3.16	Range of available views	<p>The Inspectorate welcomes descriptions of available views within the area but would like to see these supported and illustrated in the ES with GIS-based viewshed analyses.</p> <p>Photomontages which may include GIS based viewshed analysis should be provided of the potential visual receptor to allow the reader to understand the Proposed Development's visibility. These photomontages should include both summer and winter views.</p>
4.3.11	8.4.1 to 8.4.4	Potential landscape and visual impacts during construction	The ES should include details of the assessment of impacts on visual receptors of aspects such as construction compounds and stockpiled materials, supported by plans of the proposed scheme of works.
4.3.12	8.5.1 to 8.5.2	Mitigation and enhancement	The ES should include visualisations showing 'before' and 'after' the implementation of mitigation measures at relevant viewpoints.
4.3.13	8.7.4	Hedgerows	<p>The Hedgerows Regulations 1997 are also relevant here. Hedges classed as 'Important' under the Regulations would normally be retained fully intact and existing gaps utilised within these hedgerows for any proposed breach points. If not classified as 'Important', then sections of hedgerow could be removed to facilitate development. Hedgerow surveys are undertaken by local planning authorities. The ES should assess possible impacts upon hedgerows in consultation with the relevant local authorities, and produce detailed mitigation proposals if significant effects are identified.</p> <p>A hedgerow survey should also be undertaken and where hedgerows are judged to be 'Important' under the Hedgerows Regulation 1997 are identified, effort should be made to ensure these hedgerows are not damaged or removed by the Proposed Development.</p>

ID	Ref	Other points	Inspectorate's comments
			Furthermore, the landscape assessment should take into account potential impacts on hedgerows and how these impacts could affect the landscape character of the receiving environment. Where hedgerows are to be impacted, the ES should state any mitigation measures to be implemented and how the measures will be secured through the DCO or other legal mechanism.
4.3.14	8.7.9	Day and night-time changes for landscape and visual receptors	The ES should assess the effect of new lighting on sensitive landscape and visual receptors at night-time during construction and operation.
4.3.15	8.8.2	Access to receptors and viewpoints	The Scoping Report states that access to receptors and viewpoints to be assessed will be restricted to publicly-accessible areas. This approach has potential to limit the assessment of potential impacts on receptors such as heritage assets including Listed buildings. The Applicant should make effort to undertake photomontages at privately-owned land that might be susceptible to significant effects.

4.4 Biodiversity

(Scoping Report Section 9)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.4.3	9.3.3	Marks Tey Brickpit Site of Special Scientific Interest (SSSI)	The Applicant proposes to scope out the Mark Teys Brickpit SSSI from the biodiversity assessment due to Mark Teys Brickpit being designated for geological and not ecological reasons. On this basis the Mark Teys Brickpit SSSI can be scoped out of the ES biodiversity assessment.
4.4.4	9.4.17	Ecological designated SSSIs and National Nature Reserve (NNR)	The Applicant identifies that no ecological designated SSSIs or NNR are within the 2km Zone of Influence (ZoI) of the Proposed Development. Consequently, these sites have been scoped out of the ES. The Inspectorate agrees that due to the distance between these sites and the Proposed Development, significant effects on these sites are unlikely and these sites can be scoped out of the ES.
4.4.5	9.4.22	Impacts on dormice	<p>The Inspectorate does not consider sufficient evidence regarding the level of survey effort to date has been provided within the Scoping Report to conclude that dormice are absent within the study area. Therefore, the Inspectorate does not agree that impacts on dormice can be scoped out of the ES.</p> <p>However, if the further ecological surveys yet to be undertaken provide evidence that dormice are not present within the ecological study area, then this evidence should be presented within the ES and impacts on dormice could be scoped out.</p>
4.4.6	9.4.29	Impact to Invasive Non-Native Species (INNS)	The Inspectorate agrees that any impacts to INNS would not result in significant effects and therefore impacts to INNS can be scoped out of the ES.

ID	Ref	Other points	Inspectorate's comments
4.4.7	9.3.1	Baseline data	<p>The Applicant should consider whether the baseline data gathered in 2017 would still be representative of the environment at the time of submission of the ES. If not, the ES should include updated baseline information that accurately represents the biodiversity of the study area at the time of submission of the ES.</p> <p>The Applicant should make effort to consult with the relevant statutory consultee(s) on the baseline data used within the biodiversity assessments within the ES.</p>
4.4.8	9.2.4	Great Crested Newts (GCN) District Level Licencing (DLL)	<p>The ES should explain the DLL approach to mitigating potential impacts on GCN taken by the Applicant. The ES should also set out how the DLL and mitigation measures for GCN will be secured through the DCO or other legal mechanism.</p> <p>Scoping Report Appendix I states that no further GCN surveys are to be undertaken due to the DLL and ongoing consultation with NE. Details of these consultations should be included within the ES.</p>
4.4.9	9.4.29	Future scope of the assessment	<p>Paragraph 9.4.29 states that receptors stated to be scoped into the ES may be scoped out on the basis that further surveys and data collection suggest no impact to the receptors may arise. If this approach is followed, the ES should include all the relevant data and evidence that resulted in the change in scope of the assessment, and where agreement with statutory bodies on the change of scope has arisen, evidence of these agreements should also be included within the ES.</p>
4.4.10	9.5.1	Design, mitigation and enhancement	<p>The Scoping Report provides a high level description of potential mitigation measures and does state the location of the mitigation measures or their effectiveness at mitigating impacts. The ES should describe mitigation measures in sufficient detail that the location and effectiveness may be evaluated. To aid the reader's understanding of the mitigation measures, a figure(s) should be included within the ES</p>

ID	Ref	Other points	Inspectorate's comments
			that depicts the locations of the mitigation measures. The ES should also state how the mitigation measures will be secured through the DCO or other legal mechanism.
4.4.11	9.5.1	Vegetation planting	Where planting of vegetation is to be undertaken as a mitigation measure. The Applicant should make effort to agree the planting mix with the relevant local authority.
4.4.12	9.5.1	Design, mitigation and enhancement	<p>Paragraph 9.5.1 states that embedded mitigation has included avoiding important ecological receptors, however the Proposed Development's order limits, according to Figure 9.1, overlap with Whetmead Local Nature Reserve(LNR)/ Local Wildlife Site (LWS) and border Brockwell Meadows LNR/LWS. The ES should include an explanation as to why it is necessary for the order limits to encroach on the Whetmead LNR/LWS and border the Brockwell Meadows LNR/LWS.</p> <p>The Applicant should make effort to agree any site specific mitigation measures required to reduce impacts to these two sites with the relevant local authority. Any site specific mitigation measures required should be described in detail within the ES and secured through the DCO or other legal mechanism.</p>
4.4.13	9.5.1	River realignment	<p>The ES should include comprehensive assessments to determine any ecological impact that would arise from the construction and completion of any river realignments.</p> <p>The Applicant should make effort to agree appropriate designs to river realignments with the relevant consultation bodies.</p>
4.4.14	9.5.1	Translocation of species	If the translocation of species is required, the ES should state where the species would be translocated to, and the activities required for the translocation.

ID	Ref	Other points	Inspectorate's comments
4.4.15	9.5.1	Invasive Species Management Plan (ISMP)	The ISMP should follow appropriate guidance outline by Defra and state any potential risks that would be associated with the removal or destruction of INNS during the construction of the Proposed Development. Consultation with statutory consultees over the content of the ISMP should be sought, and the ES should state how the ISMP would be secured through the DCO or other legal mechanism.

4.5 Geology and soils

(Scoping Report Section 10)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.5.3	10.4.1; 10.4.19; and Table 10.3	Marks Tey Brickpit SSSI	The Scoping Report Paragraph 10.4.1 states that the Marks Tey Brickpit SSSI could be impacted by dust or leachate. It goes on to state that best practice methods relied upon will ensure no significant effects to Marks Tey Brickpit SSSI will occur during construction. On the basis that the site is outside the footprint of the development and that effects due to dust or leachate are capable of mitigation through standard construction measures effects on the SSSI may be scoped out. Should works be identified as required within the footprint of the SSSI at a later date, an assessment of effects would need to be included within the ES.
4.5.4	10.4.14; 10.4.17; and Table 10.3	Operational impact on soils, groundwater and surface water	The Scoping Report does not provide sufficient evidence that the drainage and run off from the Proposed Development during operation would not result in significant effects to soils, groundwater or surface water in areas adjacent to the Proposed Development. On this basis, The Inspectorate does not agree that these matters can be being scoped out of the ES. Appropriate cross references with the Road drainage and the water environment assessment should be made.
4.5.5	10.4.16; and Table 10.3	Human health for site users/ general public during operation	The Inspectorate agrees that it is unlikely for the human health of site users/ general public to be significantly affected during the operational phase, and therefore this matter can be scoped out of the ES.

ID	Ref	Other points	Inspectorate's comments
4.5.6	10.2.4; and 10.3.8	PSSR	<p>Scoping Report Paragraph 10.2.4 states 11 potential borrow pit locations identified along the Proposed Development were assessed in a Preliminary Sources Study Report (PSSR) in November 2019, followed by a ground investigation to enable selection of the most suitable sites, that will be shortlisted prior to statutory consultation.</p> <p>Paragraph 10.3.8 states that details of the geology and borehole records are also provided within the PSSR. As such, the PSSR should be included, or appended to the ES and the locations of the potential borrow pits, and borehole locations should be presented on a figure(s).</p>
4.5.7	10.3.6	Superficial geology	<p>The superficial geology within the study area has potential to contain Pleistocene and Holocene deposits of archaeological and paleo-environmental significance, as such, the ES should assess potential impacts to superficial geology.</p> <p>For superficial geology, detailed deposit model should be produced and presented within the ES, to help characterise the depth, nature, date, and potential of layers of archaeological and paleo-environmental significance. The deposit model can be used to inform borehole and geotechnical investigations, evaluation trenching, and geophysical survey, as well as assist in the preparation of the mitigation strategy.</p> <p>Relevant cross references between the deposit model data will have to be adequately cross-referenced with the heritage and hydrogeology chapters of the ES.</p>
4.5.8	10.3.8	Additional ground investigations	<p>The results of any additional ground investigations should be presented within, or appended to the ES. This information also needs to be adequately cross-referenced with heritage and archaeology, and hydrogeology.</p>

ID	Ref	Other points	Inspectorate's comments
4.5.9	10.3.9	Marks Tey Brickpit SSSI	<p>Paragraph 10.3.9 states that the SSSI is 150m north-west of Junction 25, but the correct distance is 115m; and the SSSI is 95m from the red line boundary on the GIS shapefile.</p> <p>The ES should report accurate distances from the Proposed Development to receptors.</p>
4.5.10	10.3.13; and 10.7.9	Soil Agricultural Land Classification (ALC) grade and survey	<p>The results of the further ALC survey should be included within the ES. The ES should also include a figure(s) depicting the ALC of the soil within the order limits and the ES should state the area of each soil classification that will be impacted, explaining what efforts to avoid use of Best and Most Versatile Land have been employed in the design of the Proposed Development.</p>
4.5.11	10.3.20; and 10.3.21	Surface water and groundwater	<p>Limited information on surface water and groundwater receptors is provided in Chapter 14 and there is limited cross-referencing between these two aspect chapters. The ES should ensure that groundwater receptors are described in detail and cross references are included between the two aspect chapters. Reference is made to a report titled A12 Junction 19 to 25 Surface Water Monitoring Factual Report, but this report is not included within the Scoping Report. This report, and any additional reports, surveys or investigations should be included within, or appended to, the ES.</p>
4.5.12	10.4.11; and 10.4.12	Groundwater and surface water	<p>The ES should also consider potential impacts caused by accidental spills of oil, fuel, coolant, and other chemicals during construction; along with mitigation measures set out in a Construction Environmental Management Plan.</p>
4.5.13	10.5.2	Embedded mitigation	<p>The ES should provide further details on how soils are managed once stripped, including sustainable topsoil and subsoil separation, stockpiling, and reinstatement.</p>

ID	Ref	Other points	Inspectorate's comments
4.5.14	10.7.4	Desk-based study	The ES should summarise the results of the existing desk-based study and append the report to the ES.

4.6 Materials assets and waste

(Scoping Report Section 11)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.6.3	11.4.7	Operational waste and material assets	The Applicant proposes to scope out operational impacts based on the assumption that no significant maintenance activities will occur during the opening year. The Inspectorate agrees that this matter can be scoped out of the ES on the basis of the reasoning presented.
4.6.4	Table 11.8	Operational material assets	The Scoping Report has not provided sufficient information within the Scoping Report that evidences no significant effects will occur. The Inspectorate does not agree that this matter can be scoped out of the ES on the basis of the reasoning presented.

ID	Ref	Other points	Inspectorate's comments
4.6.5	11.2.3	Study area – waste management facilities	The locations of waste facilities that may be used to dispose of the Proposed Development's waste should be described within the ES. The vehicle movements associated with the transportation of waste should be incorporated into any construction vehicle assumptions used to underpin other environmental assessments.
4.6.6	11.5.4	Design and mitigation measures	The ES should state how the design and mitigation measures, including the Site Waste Management Plan (SWMP) and Responsible Sourcing Plan (RSP) will be secured through the DCO or other legal mechanism.

4.7 Noise and vibration

(Scoping Report Section 12)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.7.3	12.2.6	Operational vibration effects	The Inspectorate agrees that significant vibration effects during operation are unlikely to arise and this matter can be scoped out of the ES.

ID	Ref	Other points	Inspectorate's comments
4.7.4	12.2.2; and Figure 12.1	Construction study area	The construction noise study area within the ES should also include haul roads and any other part of the local road network that is likely to be impacted by an increase in traffic that could result in significant noise impacts.
4.7.5	12.3.6; and Table 12.2	Sensitive receptors	The Scoping Report omits information on ecological sensitive receptors. The ES should state all ecological receptors that could be impacted by the noise effects arising from the construction and operation of the Proposed Development. The ES should include a figure(s) depicting the locations of the sensitive receptors including ecological receptors.
4.7.6	12.4.1	Potential construction impacts	Scoping Report Paragraph 12.4.1 states: " <i>Impacts from construction can be defined as those that occur between the start of advanced works and the end of the Proposed Scheme construction period</i> ". The Scoping Report does not define "advanced works" making the scope of the construction noise assessment unclear. In the absence of this definition and to ensure the full extent of construction noise

ID	Ref	Other points	Inspectorate's comments
			<p>impacts are assessed, the construction noise assessment should commence from the start of the construction.</p> <p>The ES should define "advanced works" if this term is to be used within the ES.</p>
4.7.7	12.4.4	Piling	Where piling is required during construction, the ES should state the locations of piling activities and show these locations on a figure(s).
4.7.8	12.5.9	Enhancement measures	Scoping Report Paragraph 12.5.9 states that professional judgement will be used to determine areas to benefit from enhancement measures based on knowledge gained from other projects. The ES should ensure any decision based on professional judgement is clearly set out and explained.
4.7.9	12.6.1	Night working	Where night working is required, the location of the night working and the effected receptors should be stated in the ES.
4.7.10	12.6.4	Significant effects	<p>Scoping Report Paragraph 12.6.4 states that some receptors may be subject to significant operational noise effects for which mitigation would not be possible or due to their cost effectiveness.</p> <p>In developing mitigation proposals, the Applicant must clearly identify receptors that are subject to residual significant effects and demonstrate how the requirements of the Noise Policy Statement for England have been applied for the Proposed Development.</p>
4.7.11	12.7.6	Baseline noise level	The Scoping Report states that a noise survey will be taken at 11 locations for a period of one week to ascertain the baseline noise level across the Proposed Development study area, these locations are presented on Figure 12.1. No explanation for why these 11 locations have been chosen is included within the ES, and no explanation as to the omission of noise monitoring in Chelmsford or the numerous

ID	Ref	Other points	Inspectorate's comments
			<p>small settlements in proximity to the south of the proposed order limits have been chosen.</p> <p>The ES should explain why the 11 noise monitoring locations are representative of the entire noise study area and state the reason for the noise monitoring locations chosen.</p> <p>Noise monitoring should be undertaken to a recognised standard such as BS7445-1:2003.</p>
4.7.12	12.7.9	Construction noise levels	The known noise levels of construction activities and equipment should be provided in the ES, and the calculations used to determine the construction noise should also be provided.
4.7.13	N/A	Operational noise study area	The ES should provide a figure(s) depicting the noise study area and all sensitive receptors, including ecological receptors.

4.8 Population and Health

(Scoping Report Section 13)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.8.3	13.4.3	Human health effects of large scale earthworks	On the basis that this matter will be assessed within the ES geology and soils assessment, human health effects from large scale earthworks can be scoped out of the ES population and health assessment.

ID	Ref	Other points	Inspectorate's comments
4.8.4	13.2.4; and Figure 13.1	Study area	The human health study area for air quality and noise should also include the area surrounding construction compounds and borrow pits. Within the ES, a figure depicting the study area should also depict equestrian routes.
4.8.5	13.3.4	Residential properties	The Scoping Report states that many properties are within 10 to 20m of the existing A12 but does not provide any further information on the amount of properties situated that close to the existing road. To aid the reader in understanding the extent of the impacts on residential properties, the Applicant may wish to provide the number of residential properties situated within proximity to the existing A12 route.
4.8.6	13.3.7 to 13.3.17	Community assets	Within the ES, sensitive community assets that are included within the assessment should be presented on a figure(s).

ID	Ref	Other points	Inspectorate's comments
4.8.7	13.4.1; 13.4.3; 13.4.6; and 13.4.9	Loss of land	<p>The locations of temporary and permanent loss of residential, commercial, community or agricultural land should be presented within a figure within the ES.</p> <p>Where demolition of properties is required, the locations of the properties to be demolished should be depicted on a figure(s) within the ES.</p>
4.8.8	13.4.2; 13.4.4; 13.4.7; 13.4.10; and 13.4.11	Severance	<p>The ES should provide a figure(s) depicting where severance to residential, community, commercial, agricultural and PRowS is likely to occur. The ES should also state whether the severance would be permanent or temporary, and if any alternate routes or entrances would be provided.</p> <p>Where severance of agricultural access is required, the ES should ensure any alternative access provided is suitable for agricultural vehicles.</p> <p>The ES should provide justification any permanent severance and set out why no alternative access routes would be required.</p>
4.8.9	13.4.25; and 13.4.26	Diversion and reinstated PRow	<p>Where PRowS are to be diverted and/ reinstated, the ES should take into account the impact that any additional length in PRow could have on the users of the PRow.</p> <p>The ES should also take into account the potential impact on amenity to PRowS if they are diverted or reinstated closer to a main road or other pollution pathway.</p> <p>The length of time that a PRow would be impacted should be stated in the ES.</p>
4.8.10	13.4.32	Bridges and underpasses	<p>The location, dimensions and lighting strategy for bridges and underpasses should be included within the ES.</p>

ID	Ref	Other points	Inspectorate's comments
4.8.11	13.6.5	Mitigation measures for impacted PRow	<p>Scoping Report Paragraph 13.5.7 states that best practice mitigation measures will be implemented to alleviate the impact on affected PRowS, but does not provide further details.</p> <p>A description of the best practice measures that will be implemented should be included within the ES.</p>
4.8.12	13.7.3	Surveys	<p>Details of the methodology, location and timespan of the Walkers, Cyclists and Horse Riders Assessment and Review (WCHAR) surveys to be undertaken should be included within the ES.</p>

4.9 Road drainage and the water environment

(Scoping Report Section 14)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.9.3	14.4.24 to 14.4.26; and Table 14.7	Risk of canal flooding	Paragraph 14.4.24 states that flood risk from canals has been scoped out. On the basis that the impact of flooding from the Chelmer and Blackwater Navigation is considered in terms of fluvial flooding risk, the Inspectorate does not agree that flood risks from canals can be scoped out of the ES.
4.9.4	14.4.25	Reservoir flooding	The Inspectorate agrees that flooding due to reservoir failure may be scoped out of detailed assessment on the basis that such reservoirs are subject to a monitoring and maintenance regime and the probability of an event is low.
4.9.5	14.4.27	Risk of coastal flooding	The Inspectorate agrees that coastal flooding can be scoped out of the ES as the Proposed Development is not located near the coast, and as stated in Scoping Report Paragraph 14.4.27, none of the watercourses within the study area are tidal.

ID	Ref	Other points	Inspectorate's comments
4.9.6	14.2.3 to 14.2.4	Study area	The ES should provide robust justification for the chosen 1km study area, and the Applicant should make effort to consult with the relevant consultation bodies regarding the study area of the assessment.
4.9.7	14.3.12	Desk-based assessment	Scoping Report Paragraph 14.3.12 states that a desk-based assessment that was undertaken of the existing drainage network between J19 and J25 of the A12, however no further information on

ID	Ref	Other points	Inspectorate's comments
			this desk based assessment has been provided. This information should be included within, or appended to, the ES.
4.9.8	14.3.14; and 14.3.15	Drainage infrastructure	<p>The ES should include full details of all existing drainage infrastructure that is to be impacted/ demolished and the new drainage infrastructure that is to be constructed. A figure(s) should be provided within the ES that presents the locations and changes to be made to the drainage infrastructure.</p> <p>Furthermore, the Environment Agency (EA) in their consultation response (see Appendix 2) raised concern with the existing drainage infrastructure potentially resulting in water quality declines in watercourses once they cross the existing A12. The ES should address this matter and effort should be made to consult on the drainage infrastructure with the EA and other relevant consultation bodies.</p>
4.9.9	14.3.17	Changes to drainage ditches	<p>The Scoping Report states that historical map analysis indicates little change to drainage ditches since 1876.</p> <p>The Inspectorate notes that in places within the study area of the Proposed Development there have been considerable changes to field boundaries and drainage ditches since the late 19th century, and the ES should have more effective cross-referencing between historic map regression undertaken as part of the heritage assessment chapter and the flood, drainage and water quality section.</p>
4.9.10	14.3.24	Groundwater levels	The Scoping Report states that continuous groundwater monitoring, initially for a 12-month period, is to be undertaken in a number of boreholes across the area of the Proposed Development. Monitoring data should be provided with the ES.
4.9.11	14.3.32	Superficial deposits	Analysis of existing groundwater abstraction and potential future changes to this in the ES must be adequately cross-referenced to the

ID	Ref	Other points	Inspectorate's comments
			geoarchaeological section of the heritage chapter, in addition to soils and geology.
4.9.12	14.4	Impacts to agricultural drainage systems	The ES should assess and state any potential impacts that the construction and operation of the Proposed Development could have on existing agricultural drainage systems, and how these impacts could affect the surrounding agricultural land.
4.9.13	14.4.24; and 14.7.21	Flood Risk Assessment (FRA)	Details of flood compensation areas, upgrading of structures to improve conveyance, and improved defences to prevent any increases in flood risk should all be included within the ES.
4.9.14	14.5.7; and 14.5.8	Piling and de-watering	The potential location of piling or dewatering work should be identified and presented within the ES.
4.9.15	14.5.21.	Sustainable Drainage Systems (SuDS)	The ES should include a detailed Surface Water Drainage Strategy including the locations and dimensions of any SuDS. The ES should also include a figure(s) depicting the locations of SuDS.
4.9.16	14.6.6	Flood Plain compensation	The ES should set out where flood plain compensation land will be located, how this location was determined and effort should be made to agree the location of flood plain compensation land with the relevant statutory consultation bodies. The ES should also include a figure(s) depicting flood plain compensation land.

4.10 Climate change

(Scoping Report Section 15)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.10.3	N/A	N/A	No matters have been proposed to be scoped out of the ES.

ID	Ref	Other points	Inspectorate's comments
4.10.4	N/A	N/A	N/A

4.11 Cumulative effects

(Scoping Report Section 16)

ID	Ref	Applicant's proposed matters to scope out	Inspectorate's comments
4.11.3	16.3.11	Cumulative assessment of: Material assets and waste; and Climate change	The Scoping Report proposes to scope out an assessment of material assets and waste, and climate change within the ES Assessment of cumulative effects chapter due to these matters already being assessed on a regional scale within their respective aspect chapters. On this basis, the Inspectorate agrees that these matters can be scoped out of the cumulative assessment within the ES.

ID	Ref	Other points	Inspectorate's comments
4.11.4	Table 16.1	Zone of Influence (ZoI)	The air quality and noise ZoI for construction activity should include construction compounds, borrow pits and haul roads.
4.11.5	16.3.25	Temporal scope	Paragraph 16.3.25 states that effects will be identified as " <i>short term or long term, permanent or temporary</i> " but does not provide a definition of these terms. The ES should define these terms in relation to the cumulative assessment.
4.11.6	N/A	PRoW and bridleways	Intra-cumulative impacts on PRoWs and bridleways arising from potential air quality, noise and severance impacts should be assessed within the ES.

5. INFORMATION SOURCES

5.2.1 The Inspectorate's National Infrastructure Planning website includes links to a range of advice regarding the making of applications and environmental procedures, these include:

- Pre-application prospectus⁵
- Planning Inspectorate advice notes⁶:
 - Advice Note Three: EIA Notification and Consultation;
 - Advice Note Four: Section 52: Obtaining information about interests in land (Planning Act 2008);
 - Advice Note Five: Section 53: Rights of Entry (Planning Act 2008);
 - Advice Note Seven: Environmental Impact Assessment: Process, Preliminary Environmental Information and Environmental Statements;
 - Advice Note Nine: Using the 'Rochdale Envelope';
 - Advice Note Ten: Habitats Regulations Assessment relevant to nationally significant infrastructure projects (includes discussion of Evidence Plan process);
 - Advice Note Twelve: Transboundary Impacts;
 - Advice Note Seventeen: Cumulative Effects Assessment; and
 - Advice Note Eighteen: The Water Framework Directive.

5.2.2 Applicants are also advised to review the list of information required to be submitted within an application for Development as set out in The Infrastructure Planning (Applications: Prescribed Forms and Procedures) Regulations 2009.

⁵ The Planning Inspectorate's pre-application services for applicants. Available from: <https://infrastructure.planninginspectorate.gov.uk/application-process/pre-application-service-for-applicants/>

⁶ The Planning Inspectorate's series of advice notes in relation to the Planning Act 2008 process. Available from: <https://infrastructure.planninginspectorate.gov.uk/legislation-and-advice/advice-notes/>

APPENDIX 1: CONSULTATION BODIES FORMALLY CONSULTED

TABLE A1: PRESCRIBED CONSULTATION BODIES⁷

SCHEDULE 1 DESCRIPTION	ORGANISATION
The Health and Safety Executive	Health and Safety Executive
The National Health Service Commissioning Board and the relevant clinical commissioning group (CCG)	NHS England
The relevant Clinical Commissioning Group	NHS Mid Essex Clinical Commissioning Group
	NHS North East Essex Clinical Commissioning Group
Natural England	Natural England
The Historic Buildings and Monuments Commission for England	Historic England
The relevant fire and rescue authority	Essex County Fire and Rescue Service
The relevant police and crime commissioner	Police, Fire and Crime Commissioner for Essex
	Great Braxted Parish Council
	Hatfield Peverel Parish Council
	Kelvedon Parish Council
	Witham Town Council
	Rivenhall Parish Council
	Feering Parish Council
	Boreham Parish Council
	Springfield Parish Council
	Messing Cum Inworth Parish Council

⁷ Schedule 1 of The Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009 (the 'APFP Regulations')

SCHEDULE 1 DESCRIPTION	ORGANISATION
	Copford with Easthorpe Parish Council
	Stanway Parish Council
	Marks Tey Parish Council
The Environment Agency	The Environment Agency
The relevant strategic highways company	Highways England
Public Health England, an executive agency of the Department of Health	Public Health England
The Forestry Commission	Forestry Commission
The Secretary of State for Defence	Ministry of Defence
The Office of Nuclear Regulation (the ONR)	The Office for Nuclear Regulation (the ONR)

TABLE A2: RELEVANT STATUTORY UNDERTAKERS⁸

STATUTORY UNDERTAKER	ORGANISATION
The relevant Clinical Commissioning Group	NHS Mid Essex Clinical Commissioning Group
	NHS North East Essex Clinical Commissioning Group
The National Health Service Commissioning Board	NHS England
The relevant NHS Trust	East of England Ambulance Service NHS Trust
Railways	Network Rail Infrastructure Ltd
Canal Or Inland Navigation Authorities	Chelmer and Blackwater Navigation Canal
Universal Service Provider	Royal Mail Group

⁸ 'Statutory Undertaker' is defined in the APFP Regulations as having the same meaning as in Section 127 of the Planning Act 2008 (PA2008)

STATUTORY UNDERTAKER	ORGANISATION
Homes and Communities Agency	Homes England
The relevant Environment Agency	The Environment Agency
The relevant water and sewage undertaker	Anglian Water
	Essex and Suffolk Water
The relevant public gas transporter	Cadent Gas Limited
	Energy Assets Pipelines Limited
	ES Pipelines Ltd
	ESP Networks Ltd
	ESP Pipelines Ltd
	ESP Connections Ltd
	Fulcrum Pipelines Limited
	Harlaxton Gas Networks Limited
	GTC Pipelines Limited
	Independent Pipelines Limited
	Indigo Pipelines Limited
	Murphy Gas Networks limited
	Quadrant Pipelines Limited
	National Grid Gas Plc
	Scotland Gas Networks Plc
Wales and West Utilities Ltd	
The relevant Electricity Generators With CPO Powers	Bradwell Power Generation Company Limited
The relevant electricity distributor with CPO Powers	Eclipse Power Network Limited
	Last Mile Electricity Ltd
	Energy Assets Networks Limited

STATUTORY UNDERTAKER	ORGANISATION
	ESP Electricity Limited
	Fulcrum Electricity Assets Limited
	Harlaxton Energy Networks Limited
	Independent Power Networks Limited
	Leep Electricity Networks Limited
	Murphy Power Distribution Limited
	The Electricity Network Company Limited
	UK Power Distribution Limited
	Utility Assets Limited
	Vattenfall Networks Limited
	UK Power Networks Limited
The relevant electricity transmitter with CPO Powers	National Grid Electricity Transmission Plc

TABLE A3: SECTION 43 LOCAL AUTHORITIES (FOR THE PURPOSES OF SECTION 42(1)(B))⁹

LOCAL AUTHORITY ¹⁰
Babergh Mid Suffolk District Council
Basildon Council
Braintree District Council
Brentwood Borough Council
Chelmsford City Council
Colchester Borough Council
Epping Forest District Council

⁹ Sections 43 and 42(B) of the PA2008

¹⁰ As defined in Section 43(3) of the PA2008

LOCAL AUTHORITY¹⁰
London Borough of Havering
Maldon District Council
Medway Council
Rochford District Council
South Cambridgeshire District Council
Southend-on-Sea Borough Council
Tendring District Council
Thurrock Council
Uttlesford District Council
West Suffolk District Council

APPENDIX 2: RESPONDENTS TO CONSULTATION AND COPIES OF REPLIES

CONSULTATION BODIES WHO REPLIED BY THE STATUTORY DEADLINE:
Anglian Water
Babergh District Council
Bradwell Power Generation Company Limited
Brentwood Borough Council
Cadent Gas
Cambridgeshire County Council
Chelmsford City Council
Colchester Borough Council
Enfield Council
Environment Agency
Essex County Council
Freeing Parish Council
Health and Safety Executive
Historic England
Last Mile
London Borough of Redbridge
Maldon District Council
Medway Council
Mid Suffolk Council
Ministry of Defence
National Grid
Natural England

Scoping Opinion for
A12 Chelmsford to A120 Widening Scheme

Office of Nuclear Regulation
Public Health England
Rivenhall Parish Council
Royal Mail
Southend-on-Sea Borough Council
Suffolk County Council
Tendring District Council
West Suffolk Council
Witham Town Council



Anglian Water Services Ltd
Lancaster House
Lancaster Way
Ermine Business Park
Huntingdon
PE29 6XU

Mr Michael Breslaw
EIA Advisor
Environmental Services
Central Operations
The Planning Inspectorate,
Temple Quay House,
2 Temple Quay,
Bristol,
BS1 6PN

Tel 01480 323000
www.anglianwater.co.uk

Your ref TR010060-000007

25 November 2020

Dear Mr Breslaw,

A12 Chelmsford to A120 Widening Scheme EIA Scoping Report

Thank you for the opportunity to comment on the scoping report for the above project. Anglian Water is the water and/or sewerage undertaker for the above site. The following response is submitted on behalf of Anglian Water.

General comments

Anglian Water would welcome further discussions with Highways England prior to the submission of the Draft DCO for examination. In particular it would be helpful to discuss the following issues:

- Wording of the Draft DCO including protective provisions specifically for the benefit of Anglian Water.
- Requirement for water and/or wastewater services.
- Impact of development on Anglian Water's existing assets and the need for mitigation if required.
- Pre-construction surveys.

2. The Scheme

There are existing water mains, foul and surface water sewers and associated pumping stations in the vicinity of the site which potentially be affected by the above development. These assets are critical to enable us to carry out Anglian Water's duty as a statutory sewerage undertaker.

It is therefore suggested that the Environmental Statement should include reference to the water supply network, public sewerage network and associated pumping stations where relevant.



Registered Office
Anglian Water Services Ltd
Lancaster House, Lancaster Way,
Ermine Business Park, Huntingdon,
Cambridgeshire. PE29 6XU
Registered in England
No. 2366656.

an AWG Company

The location of our existing infrastructure and assets (including both underground infrastructure and aboveground assets such as pumping stations) are available to view at the following address:

<http://www.digdat.co.uk/digdatUtilities>

14. Road Drainage and Water Environment


Reference is made to a flood risk assessment being prepared for the above development. The Scoping Report identifies a need for further assessment of the potential risk of flooding from different sources including sewerage infrastructure which is welcomed. At this stage it is unclear whether there is a requirement for a connection(s) to the public sewerage network for the above site or as part of the construction phase. We welcome the intention to have further consultation with Anglian Water and other relevant bodies in respect of the drainage strategy for the above project.

Anglian Water is responsible for managing the risks of flooding from surface water, foul water or combined water sewer systems. Consideration should be given to all potential sources of flooding including sewer flooding as part of the Environmental Statement and related flood risk assessment.

The report states that the risk of sewer flooding is likely to be low. We would suggest reference is made to any relevant records in Anglian Water's sewer flooding register as well as other information relating to flood risk as outlined in the report. Information can be obtained by contacting Anglian Water's Pre-development Team. The e-mail address for this team is as follows: planningliasion@anglianwater.co.uk;

Should you have any queries relating to this response please let me know.

Yours sincerely



Stewart Patience
Spatial Planning Manager, MRTPI

From: [Bron Curtis](#)
To: [A12chelmsfordA120](#)
Subject: Your ref TR010060-000007 Our ref DC/20/04868
Date: 04 November 2020 08:28:38
Attachments: [image001.png](#)

Good morning,

Thank you for consulting Babergh and Mid Suffolk District Councils on the EIA Scoping for the above proposed development.

I can confirm that the councils have no comment to make in respect of the content of the ES.

Kind regards,
Bron

Bron Curtis BA(Hons), MA, MRTPI
Principal Planning Officer, Strategic Projects and Delivery - Development Management **** Wednesdays and Thursdays only ****
Sustainable Communities
Mid Suffolk and Babergh District Councils - Working Together

Telephone: 07798522734

For general enquiries email: planningadmin@midsuffolk.gov.uk

Websites: www.babergh.gov.uk or www.midsuffolk.gov.uk



[Click Here](#) for the latest planning news and changes to the service coming up this year.

For our latest Coronavirus response please visit click the following link-
<https://www.midsuffolk.gov.uk/features/our-covid-19-response/>

Thank you for contacting us

We are working hard to keep services running safely to support and protect our residents, businesses, communities and staff through this period and beyond.

We will respond to your query as soon as possible. In the meantime, you can find the latest council information, including our response to Covid-19, on our website.



Emails sent to and from this organisation will be monitored in accordance with the law to ensure compliance with policies and to minimize any security risks. The information contained in this email or any of its attachments may be privileged or confidential and is intended for the exclusive use of the addressee. Any unauthorised use may be unlawful. If you receive this email by mistake, please advise the sender immediately by using the reply facility in your email software. Opinions, conclusions and other information in this email that do not relate to the official business of Babergh District Council and/or Mid Suffolk District Council shall be understood as neither given nor endorsed by Babergh District Council and/or Mid Suffolk District Council.

Babergh District Council and Mid Suffolk District Council (BMSDC) will be Data

Controllers of the information you are providing. As required by the Data Protection Act 2018 the information will be kept safe, secure, processed and only shared for those purposes or where it is allowed by law. In some circumstances however we may need to disclose your personal details to a third party so that they can provide a service you have requested, or fulfil a request for information. Any information about you that we pass to a third party will be held securely by that party, in accordance with the Data Protection Act 2018 and used only to provide the services or information you have requested. For more information on how we do this and your rights in regards to your personal information and how to access it, visit our website.



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Tel: +44 (0) 777 053 3480
Email: sarah.price@dwdllp.com

File Ref: 064-BB-L-BRNP-G-UBPI-00001

Your Ref:

Unique No.:

25 November 2020

Dear Sir / Madam,

**Re: Planning Act 2008 (as amended) and The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017(the EIA Regulations) – Regulations 10 and 11
Application by Highways England (the Applicant) for an Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme (the Proposed Development)
Scoping Consultation**

Thank you for your letter of the 28th October 2020, consulting Bradwell B on its views on the information that should be provided in the Environmental Statement (ES).

Bradwell B is a nationally significant infrastructure project being developed by the Bradwell Power Generation Company Limited. Bradwell benefits from policy support at all levels – nationally in NPS EN-6, which recognises Bradwell as a potentially suitable site for a new nuclear power station and locally in the Maldon Local Plan which states at Policy D4: The Council will strongly support the principle of the development of a new nuclear power station at Bradwell-on-Sea. Once operational, the power station would generate approximately 2.2GW of electricity, providing power for around 4 million homes for decades to come.

Bradwell B launched its [Stage One Consultation](#) in March 2020, which included initial proposals and options for the power station and its construction, which is anticipated to take place over a 9-12 year period. Whilst there is the opportunity to take a proportion of the construction material to the Bradwell B power station site by sea, and/or potentially rail, a proportion of material would still need to be brought to the site by road. The project would therefore include the potential for significant highways improvements, including new road infrastructure, to mitigate the traffic impacts of construction on the local road network.

The Stage One consultation document also explains that there will be the need for other off-site facilities to help manage the impacts of the project, including park and ride and freight management facilities.

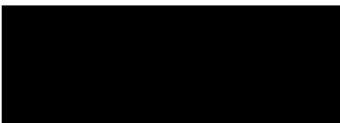


Bradwell B supports the provision of enhanced highways infrastructure on the A12; however, it is important that the ES recognises the interrelationship of the A12 to A120 widening scheme with the Bradwell B project from a number of perspectives, which are detailed below.

- Bradwell B support the recognition of the Bradwell B Project in the cumulative assessment. This will be particularly important in the early years of the construction of Bradwell B when there is the most opportunity for temporal overlap.
- There are some common sensitive receptors within the north Dengie Peninsula, for instance in Maldon and Danbury (where there is an existing Air Quality Management Area) in relation to traffic impacts. In addition, one of the search areas for park and ride that Bradwell B consulted on at Stage One is located in close proximity to the southern extent of the order limits of the scheme and therefore there is the potential for cumulative air quality, noise, landscape and heritage effects which should be taken into account. We would welcome close working with Highways England on cumulative effects and the application of relevant and consistent environmental baseline data.
- Subject to obtaining the necessary consents, there is the potential for the works to Junction 19 to be ongoing during the early years of construction of Bradwell B. Junction 19 is an important link to the strategic road network, and the order limits are located within close proximity to one of the Bradwell B search areas for park and ride. We would welcome working with Highways England to ensure that the works can be carried out safely without an undue effect on the construction programme for Bradwell B.
- Traffic associated with the construction of Bradwell B should be factored into the assessments during construction, opening year and in a future year for the widening scheme, assuming worst-case figures. There is information available in the Bradwell B Stage One consultation about the potential HGV movements associated with the project and we would be happy to engage with Highways England to provide further information on anticipated traffic flows and distribution to assist in the assessment.
- The operational assessment should also include operational traffic associated with Bradwell B.

We trust that the above will be appropriately taken into account as you prepare your scoping opinion.

Yours faithfully,



Sarah Price
Planning Lead
Bradwell Power Generation Company Ltd

Enclosures: N/A
Copies: N/A



Michael Breslaw
EIA Advisor
Planning Inspectorate
Sent to: A12chelmsfordA120@planninginspectorate.gov.uk

Date: 16 November 2020
Your reference: TR010060-000007
Our reference: 20/01579/EIA

Dear Michael

**Planning Act 2008 (as amended) and The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the EIA Regulations) – Regulations 10 & 11
Application by Highways England (the Applicant) for an Order granting
Development Consent for the A12 Chelmsford to A120 Widening Scheme (the
Proposed Development)
Scoping consultation**

Thank you for your letter of 28 October 2020 concerning the submission of the scoping request relating to the above.

I confirm on behalf of Brentwood Borough Council that it has no comments to make.

Yours sincerely

Mike Ovenden
Associate Planning Consultant
For Brentwood Borough Council



REF: A12 Chelmsford to A120 Widening Scheme- EIA Scoping Consultation

I refer to your email dated 28th October regarding the above proposed Development Consent Order. Cadent has reviewed the scoping report provided and wishes to make the following comments:

In respect of existing Cadent infrastructure, Cadent has a number of pipelines and associated apparatus located within the Order limits and will require appropriate protection including compliance with relevant standards for works proposed within close proximity of its apparatus.

Cadent Infrastructure within or in close proximity to the development

Cadent has identified at this stage the following apparatus within the vicinity of the proposed works:

- High pressure and intermediate pressure (above 2 bar) gas pipelines and associated apparatus
- Low and medium pressure gas pipelines and associated above and below ground apparatus

Where diversions of apparatus are required to facilitate the scheme, discussions between parties should be started at the earliest opportunity. It is essential that adequate temporary and permanent land take, land rights and consents are included within the Order to enable works to proceed without delay and to provide appropriate rights for Cadent to access, maintain and protect apparatus in future.

If diversions of Cadent apparatus are required, Cadent will require adequate timescales prior to the submission of the DCO to undertake essential feasibility studies to provide Highways England with the necessary information to consider as part of their application.

Please be aware that diversions for high pressure apparatus can take in excess of two years to plan and procure materials

Where the Promoter intends to acquire land, extinguish rights, or interfere with any of Cadent's apparatus, Cadent will require appropriate protection and further discussion on the impact to its apparatus and rights including adequate Protective Provisions.

Plans of affected apparatus have been provided to the Promoter and Cadent welcomes further discussion on the likely impacts.

Key Considerations:

- Cadent has a Deed of Grant of Easement for each pipeline, which prevents the erection of permanent / temporary buildings, or structures, change to existing ground levels, storage of materials etc.
- Please be aware that written permission is required before any works commence within the Cadent easement strip.
- The below guidance is not exhaustive and all works in the vicinity of Cadent's asset shall be subject to review and approval from Cadent's plant protection team in advance of commencement of works on site.

General Notes on Pipeline Safety:



- You should be aware of the Health and Safety Executives guidance document HS(G) 47 "Avoiding Danger from Underground Services", and Cadent's specification for Safe Working in the Vicinity of Cadent High Pressure gas pipelines and associated installations - requirements for third parties GD/SP/SSW22. Digsafe leaflet Excavating Safely - Avoiding injury when working near gas pipes. There will be additional requirements dictated by Cadent's plant protection team.
- Cadent will also need to ensure that our pipelines remain accessible throughout and after completion of the works .
- The actual depth and position must be confirmed on site by trial hole investigation under the supervision of a Cadent representative. Ground cover above our pipelines should not be reduced or increased.
- If any excavations are planned within 3 metres of Cadent High Pressure Pipeline or, within 10 metres of an AGI (Above Ground Installation), or if any embankment or dredging works are proposed then the actual position and depth of the pipeline must be established on site in the presence of a Cadent representative. A safe working method agreed prior to any work taking place in order to minimise the risk of damage and ensure the final depth of cover does not affect the integrity of the pipeline.
- Below are some examples of work types that have specific restrictions when being undertaken in the vicinity of gas assets therefore consultation with Cadent's Plant Protection team is essential:
 - Demolition
 - Blasting
 - Piling and boring
 - Deep mining
 - Surface mineral extraction
 - Landfilling
 - Trenchless Techniques (e.g. HDD, pipe splitting, tunnelling etc.)
 - Wind turbine installation
 - Solar farm installation
 - Tree planting schemes

Pipeline Crossings:

- Where existing roads cannot be used, construction traffic should ONLY cross the pipeline at agreed locations.
- The pipeline shall be protected, at the crossing points, by temporary rafts constructed at ground level. The third party shall review ground conditions, vehicle types and crossing frequencies to determine the type and construction of the raft required.
- The type of raft shall be agreed with Cadent prior to installation.
- No protective measures including the installation of concrete slab protection shall be installed over or near to the Cadent pipeline without the prior permission of Cadent.

Cadent Gas Limited

Registered Office Ashbrook Court, Prologis Park
Central Boulevard, Coventry CV7 8PE
Registered in England and Wales No.10080864

National Gas Emergency Service

0800 111 999* (24hrs)

*Calls will be recorded and may be monitored

5000419 (01/13)

Page 2 of 4

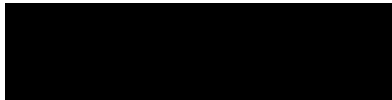


- Cadent will need to agree the material, the dimensions and method of installation of the proposed protective measure.
- The method of installation shall be confirmed through the submission of a formal written method statement from the contractor to Cadent.
- A Cadent representative shall monitor any works within close proximity to the pipeline.

New Service Crossing:

- New services may cross the pipeline at perpendicular angle to the pipeline i.e. 90 degrees.
- Where a new service is to cross over the pipeline a clearance distance of 0.6 metres between the crown of the pipeline and underside of the service should be maintained. If this cannot be achieved the service shall cross below the pipeline with a clearance distance of 0.6 metres.
- A new service should not be laid parallel within an easement strip
- A Cadent representative shall approve and supervise any new service crossing of a pipeline.
- An exposed pipeline should be suitable supported and removed prior to backfilling
- An exposed pipeline should be protected by matting and suitable timber cladding
- For pipe construction involving deep excavation (<1.5m) in the vicinity of grey iron mains, the model consultative procedure will apply therefore an integrity assessment must be conducted to confirm if diversion is required

Yours Faithfully



Vicky Cashman
Senior Consents Officer
Capital Delivery
Vicky.Cashman@cadentgas.com; 07747671508



Guidance

To download a copy of the HSE Guidance HS(G)47, please use the following link:

<http://www.hse.gov.uk/pubns/books/hsg47.htm>

Dial Before You Dig Pipelines Guidance:

<https://cadentgas.com/Digging-safely/Dial-before-you-dig>

Essential Guidance document:

https://cadentgas.com/getattachment/digging-safely/Promo-work-safely-library/Essential_Guidance.pdf

Excavating Safely in the vicinity of gas pipes guidance (Credit card):

https://cadentgas.com/getattachment/digging-safely/Promo-work-safely-library/Excavating_Safely_Leaflet_Gas-1.pdf

Copies of all the Guidance Documents can also be downloaded from the Cadent website:

<https://cadentgas.com/Digging-safely/Work-safely-library>

My ref: Essex, A12
Your ref: TR010060-000007

Date: 3 November 2020

Contact: Emma Fitch
Telephone: 01223 715518
E Mail: PlanningDC@cambridgeshire.gov.uk



Place and Economy
Environment and Commercial

Box No SH1315
Shire Hall
Castle Hill
Cambridge
CB3 0AP

Michael Breslaw (EIA Advisor)
Environmental Services, Central Operations
PINS, Temple Quay House
Bristol, BS1 6PN
A12chelmsfordA120@planninginspectorate.gov.uk
BY EMAIL ONLY

Dear Mr Breslaw,

RE: TR010060-000007 - PROPOSED A12 TO A12 WIDENING SCHEME - EIA SCOPING NOTIFICATION AND CONSULTATION

Thank you for consulting Cambridgeshire County Council, in its role as an adjoining Minerals and Waste Planning Authority (MWPA), on the above proposal. I have no comments at this time.

Yours sincerely



Emma Fitch (Miss)
Joint Interim Assistant Director, Environment and Commercial

The Planning Inspectorate
Temple Quay House
2 The Square
Bristol
BS1 6PN

Planning and Development Management
P.O. Box 7544, Civic Centre,
Duke Street, Chelmsford,
Essex, CM1 1XP

Your ref: TRO10060-000007

My ref: 20/01905/OBS4

Please ask for: Karen Short

Telephone: 01245 606779

Date: 26 November 2020

Dear Sir/Madam

TOWN AND COUNTRY PLANNING ACT 1990

PROPOSAL: Scoping consultation for application by Highways England (the Applicant) for an Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme (the Proposed Development)

APPLICATION NO: 20/01905/OBS4

DATE RECEIVED: 30th October 2020

We refer to the above application and are writing to advise you that Chelmsford City Council has reviewed the scoping opinion and has the following comments to make:

Chelmsford City Council has reviewed the scoping opinion and is satisfied with its contents with the exception of the sections of the report which refer to baseline modelling and the assessment of cumulative impacts.

The development used in the baseline modelling scenario for the Junction 19 modelling must take full account of the recently adopted Chelmsford Local Plan (May 2020).

The City Council asserts that due to the strategic nature of the Chelmsford Garden Community (CGC) proposals (Strategic Growth Site 6 of the Adopted Chelmsford Local Plan), its support by Homes England, the detailed masterplanning work which is currently underway and on the basis that the Garden Community is a continuation of the Beaulieu and Channels development sites, both of which are at an advanced stage of construction by the same promoters/developers, the 3,000 new homes in the adopted Chelmsford Local Plan should be classified as 'More Than Likely' using Highway England's table to ascertain degrees of certainty for development proposals. A masterplan is due to be approved in 2021 for the CGC with planning applications expected in late 2021, all before the submission of the DCO in March 2022. Further, this categorisation, should also apply to Strategic Growth Site 8 for 450 new homes North of Broomfield, where a masterplan has now been approved by the City Council and where a planning application is expected before Christmas. The City Council sees no rationale for leaving these sites out of the modelling baseline.

For a copy of the officers report please view our website www.chelmsford.gov.uk/planningonline and search for application 20/01905/OBS4.

Yours faithfully



DAVID GREEN
Director of Sustainable Communities

**Planning Act 2008 (as amended) and The Infrastructure Planning
(Environmental Impact Assessment) Regulations 2017(the EIA Regulations)
– Regulations 10 and 11**

**Application by Highways England (the Applicant) for an Order granting
Development Consent for the A12 Chelmsford to A120 Widening Scheme (the
Proposed Development)**

PINS Ref: TR010060-000007

CBC Ref: 202420

CBC Contact: James Ryan (james.ryan@colchester.gov.uk)

Thank you for consulting Colchester Borough Council on this matter. We have the following comments grouped into topic areas:

Air Quality:

The Environmental Scoping Report proposes an assessment of air quality in relation to the proposed widening of the A12 between Chelmsford to the A120 using the DMRB LA105 design manual for air quality.

The proposed air quality assessment methodology is acceptable however we would like to draw attention to the air pollution hotspot on the A120 in Marks Tey. The scoping report neglects monitoring data collected by Colchester Borough Council in 2019 which suggest relatively poor air quality on the A120 approx. 1km from the A12 junction 25. Air quality conditions at this location are described in the 2020 Colchester Borough Council Air Quality Annual Status Report and it is essential that any comprehensive assessment takes this into account.

Arboriculture:

The survey methodology is fine and the inhouse team are in agreement with it. We suggest a canopy cover assessment is undertaken to show the total loss so that it can inform mitigation proposals in the future.

Archaeology:

We can confirm that we support with the definitions and interpretation of the historic environment given by the NNNPS, and the emphasis placed in the sustaining and enhancement of heritage assets. From an archaeological point of view, we support the use of a study area defined by a 300m buffer surrounding the provisional order limits (para 7.2.2), and are encouraged to see that designated heritage assets within a 1km radius of the order limits have also been included in the assessment (para. 7.2.3).

We note that heritage assets recorded in the Essex Historic Environment Record at May 2018 have been used to inform the baseline assessment of the study area (para 7.3.2). However, we would draw the applicant's attention to the fact that the Colchester administrative area is no longer covered by the Essex Historic Environment Record, and that the definitive archaeological record for Colchester borough is the Colchester Historic Environment Record. It is not clear from the Scoping Report whether the desk-based assessment referenced in paragraph 7.3.2 has been informed by material held in the Colchester HER and we have yet to receive a copy of the desk-based assessment for review. It should also be noted that Historic Environment Records are continually being updated, and so the baseline data from 2018 should be updated to the present for inclusion in the full EIA,

With regard to designated heritage assets, it should be noted that Colchester borough maintains a 'local list' of heritage assets, which includes historic buildings and archaeological site designated by the Council. Details of these have been integrated into the Colchester HER and can be made available on request.

Regarding the significance summaries provided in Table 7.1, we would caution against taking too prescriptive an approach to the value of classes of heritage asset, as individual sites or features within particular feature or period classes may not all be of equivalent significance. It is also recognised that non-designated heritage assets can be considered to be of equivalent significance to designated heritage assets, and as such the potential remains for individual sites and features to belong to higher categories. With regard to the 'negligible' category in Table 7.1, it should be noted that an undated cropmark feature may still have a higher archaeological significance, which may only become apparent following its excavation or wider contextual analysis. Caution should be exercised in drawing such conclusions without ground-truthing. Similarly, while archaeological findspots may be considered to be of low significance, they may individually or collectively represent the surface trace of more significant sites, which will only be fully appreciated through further evaluation and ground-truthing.

It should be noted that the cultural heritage assets listed in the gazetteer (Appendix F) and illustrated in Figure 7.1 present an assessment of the significance of known archaeology, and the scoping report has identified high potential for presently unknown archaeological remains to lie within the route. We would also express caution as to the assessments of significance ascribed to individual heritage assets, which cannot be critiqued in more detail at this stage without access to the full desk-based assessment.

With regard to the statement given in 7.7.4, that the archaeological desk-based assessment will be used to inform the ES, we would reiterate that the desk-based assessment undertaken by Jacobs in 2018 may not have been informed by the contents of the Colchester Historic Environment Record and that the data within the DBA will need to be updated to reflect additional data acquired since 2018.

Overall, we welcome the conclusion that impacts on archaeological remains, historic buildings and historic landscape types during construction have been scoped in for further assessment (para 7.4.5). We also support the conclusion that the impact on archaeological remains and historic buildings during the operation of the road are also scoped in for further assessment (para 7.4.10). We agree with the statement in para 7.5.2 that mitigation is likely to include a programme of archaeological investigation and recording prior to the commencement of construction. We welcome the acknowledgement in para 7.5.3 that there is the potential for enhancement of the historic environment and look forward to working with the applicant to ensure that opportunities are developed as appropriate.

We continue to support the necessary programme of archaeological evaluation, comprising geophysical survey and trial-trenching surveys, which will be used to inform the Environmental Statement (para. 7.7.3). Discussions are ongoing with the applicant's representatives as to the scale and scope of these evaluation works, and we will continue to work with the applicant in order to ensure that these provide a suitable assessment of the depth, character and extent of any heritage assets which may lie along the route so that suitable mitigation strategies can be developed and implemented.

Heritage (Above Ground):

The Council have reviewed the Cultural Heritage Chapter (No.7 p.56-66) concerning the potential impacts on above and below ground heritage assets (both designated, non-designated and as yet unknown) from the constructional and operational phases of the preferred route (Option 2). Apart from some v minor omissions (principally 7.3.2 Baseline evidence base needs to include Colchester HER, and table 7.1 omits grade II listed buildings – medium sensitivity?) The scope of the study appears otherwise sound and comprehensive based on Option 2. It is necessary for the ES to include an evaluation of the alternatives considered and the comparative impacts arising from these alternatives. In addition, the cumulative impacts arising from planned development needs to be factored in (although the rejection of the Colchester: Braintree Borders Garden community has removed this potential in the Colchester Borough area to a large extent).

The 1 km catchment area for designated heritage assets seems reasonable apart from a wider consideration of the potential impact upon assets of the greatest sensitivity (Scheduled Monuments, Grade I listed buildings and Registered Parks and Gardens)

where a greater catchment area should be considered where the wider landscape makes a significant contribution to their significance and design mitigation may be required/desirable?

Landscape:

Regarding the landscape content/aspect of the Environmental Scoping Report lodged on 29/10/20 (assessed within Colchester Borough only):

Several hedges on along the line of the proposed A12 widening route are protected under the Hedgerows Regulations 1997 and would appear to require removal in whole or part to allow for construction. Any hedge is classified as 'Important' under the Regulations would normally be retained fully intact and existing gaps utilised within these hedgerows for any proposed breach points. If not classified as 'Important', then sections of hedgerow could be removed to facilitate development. Note: hedgerow surveys to identify the Importance of hedges protected under the Regulations are carried out by the local planning authority. A clause needs to be added (at clause at 8.7.4) to acknowledge this constraint and how it is proposed to be addressed.

Regarding clause 8.7.5, comment on Appendix G2 and Fig 8.3 was submitted on 30/10/20, it read:

- Viewpoint 17 - consider relocating or adding viewpoint at junction of PRoW 145_5, 145_17 & 92_20, where there would be an open, panoramic, elevated view of the proposed development.
- Suggested additional viewpoint at junction of PRoW 128_22 and Easthorpe Road, where there would be open fairly panoramic views of the proposed development.
- Viewpoint 20 - looks fine, subject to the most exposed viewpoint being used once detail scaled-up.
- Viewpoint 21 - look for revised location along PRoW 128_18 where there would be actual views of the proposed development.
- Viewpoint 22 - looks fine, subject to the most exposed viewpoint being used once detail scaled-up.
- Suggested additional viewpoint from PRoW 144_18 looking north toward the proposed development, where there would be very open panoramic views.
- Viewpoint 23 - looks fine
- Viewpoint 24 - looks fine, subject to the most exposed viewpoint being used once detail scaled-up.

- Viewpoint 25 - consider relocating or adding viewpoint at the important field that forms the separation between Marks Tey and Copford



- (Map data ©2020 Google), as there are views of the A12 across this field from the enlarged field entrance and as maintaining the existing character of the field is important to maintaining the separation between the 2 settlements.
- Viewpoint 26 - looks fine

Noise/Vibration:

General comments:

The proposed bypass between junctions 24 and 25 will move the main flow of traffic away from densely populated areas at Marks Tey, some of which are subject to high ambient noise levels from the existing A12, which could potentially bring benefits.

The scoping of both construction phase and operational phase noise/vibration is welcomed.

Robust baseline surveys are essential, particularly where the proposed bypass and new junction is close to sensitive receptors.

Impact assessment should consider the likely significant effects of the proposal both without and with intervention measures added (i.e., mitigation, compensation). This enables consultees and decision makers to have a better understanding of the potential project effects and the relative importance of individual interventions thereby promoting a more robust assessment.

Likely significant impacts on individual isolated properties should be assessed and reported where necessary rather than aggregated.

Night working in close proximity to sensitive receptors should be avoided unless absolutely necessary.

Specific comments:

The study areas detailed in paras. 12.2.2 and 12.2.3 of 100m for construction vibration, 300m for construction noise and 600m for operational noise are noted, with scope to increase these distances if deemed necessary.

We are pleased that potential reduced traffic flows owing to COVID-19 restrictions will be taken into account when considering baseline surveys.

Impact on future sensitive receptors as mentioned in para. 12.3.11 should be included.

We welcome the source-pathway- receptor approach to mitigation. Low-noise surfaces should be used in the proximity of sensitive receptors.

Communication with residents as detailed in para. 12.5.2 is highly recommended.

A complaint management system (para. 12.5.3) is essential.

It should be ensured that baseline monitoring takes place at sensitive properties close to the proposed bypass between junctions 24 and 25 and the new junction at Marks Tey.

The Planning Inspectorate
Environmental Services
Central Operations
Temple Quay House
2 The Square
Bristol,
BS1 6PN

Please reply to: Gideon Whittingham

Email: development.control@enfield.gov.uk

My ref: 20/03528/OA

Date: 12 November 2020

Dear Sir/Madam

Town and Country Planning Act 1990

NO OBJECTIONS RAISED

Proposed work: Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme (Ref: TR010060-000007)
At: A12 Chelmsford To A120 Widening Scheme

Thank you for your notification of the above development which was registered in this office on 29th October 2020.


I have reviewed the information provided on your website and consider that the proposals would not have any strategic implications for this Borough.

Yours faithfully

Gideon Whittingham

IMPORTANT – Enfield residents should register for an online Enfield Connected account. Enfield Connected puts many Council services in one place, speeds up your payments and saves you time – to set up your account today go to www.enfield.gov.uk/connected

Sarah Cary
Executive Director Place
Enfield Council
Civic Centre, Silver Street
Enfield EN1 3XY
www.enfield.gov.uk

 If you need this document in another language or format contact the service using the details above.

Mr. Michael Breslaw - EIA Advisor
Environmental Services
The Planning Inspectorate

Our ref: AE/2020/125624/01-L01
Your ref: TR010060

Date: 26 November 2020

Via email only:
A12chelmsfordA120@planninginspectorate.gov.uk

Dear Mr. Breslaw

PLANNING ACT 2008 (AS AMENDED) AND THE INFRASTRUCTURE PLANNING (ENVIRONMENTAL IMPACT ASSESSMENT) REGULATIONS 2017 (THE EIA REGULATIONS) – REGULATIONS 10 AND 11 – SCOPING CONSULTATION

APPLICATION BY HIGHWAYS ENGLAND (THE APPLICANT) FOR AN ORDER GRANTING DEVELOPMENT CONSENT FOR THE A12 CHELMSFORD TO A120 WIDENING SCHEME (THE PROPOSED DEVELOPMENT)

Thank you for consulting us on the Environmental Scoping Report associated with this scheme (document reference: HE551497-JAC-EGN-SCHW-RP-LE-0001 | P02; dated 21/10/20). We have reviewed the submitted document and have the following comments to make:

Chapter 2: The Project

Table 2.2 includes in respect of 'An improved environment', a scheme specific objective to: "Reduce the impact of new infrastructure on the natural and built environment". Given that this proposal will involve replacement and upgrades to existing infrastructure which currently performs poorly in terms of protecting the water quality and ecological value of adjacent waterbodies; we would suggest that this objective should be to: 'Reduce the impact of new and existing infrastructure on the natural and built environment.'

Chapter 5: Environmental assessment methodology

Paragraph 5.4.3: We are pleased to note that an Environmental Management Plan (EMP) will be produced to manage environmental effects in construction and operation.

East Anglia area (East) - Icen House

Cobham Road, Ipswich, Suffolk, IP3 9JD

General Enquiries: 08708 506506 Fax: 01473 724205

Weekday Daytime calls cost 8p plus up to 6p per minute from BT Weekend Unlimited.

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Email: enquiries@environment-agency.gov.uk

Website: www.environment-agency.gov.uk

Chapter 9: Biodiversity

As highlighted towards the beginning of this chapter, the National Networks National Policy Statement (NNNPS) states that applicants should describe how a project plans to conserve and enhance biodiversity conservation interests. This is particularly relevant in respect of this proposal, as we have on-going concerns about the existing A12 infrastructure and its often negative impacts on the watercourses it crosses. Our comments on this chapter concern ecological interests associated with those watercourses, and so consequently there is some overlap with Chapter 14: Road drainage and the water environment.

Over many years it has been observed that Essex rivers which are crossed by the A12 trunk road have been badly affected by past engineering treatment which has left a lasting effect. Upstream of the A12 the rivers and watercourses are often in a much healthier state than the sections downstream indicating point source pollutions and other negative impacts. Previous engineering changes affect the ability of wildlife to pass up and downstream freely or the natural morphological function which affects flow or sediment transport. As an example of this, the current A12 crossing of the River Brain downstream of Witham has a concrete cill which holds up water and forms an unnatural and harmful barrier to flows and the ecological corridor. These site specific issues should be identified and resolved wherever possible.

There are also instances of apparent water quality declines at the crossings as a result of poor quality run-off. The invertebrate fauna downstream is less diverse than upstream and appears to be causing a progressive decline as the problems are not resolved. Many of the current crossings would not be permitted in the same form today and we wish to see the environmental issues recognised and mitigated for in this widening scheme.

Much of the widening of the A12 will have the potential to cause further ecological problems in terms of mammal passage for otter, water vole and in-channel passage for fish and eels. Longer or additional crossings can exacerbate the existing issues making protected species less likely to utilise the longer underpasses beneath the carriageways. During high flows, otter in particular will avoid difficult and dark traverses upstream and can become road casualties as a result. The A12 Colchester bypass is currently a particular otter death black spot.

Bridges and culverts also have known negative impact on rivers as wildlife corridors for invertebrates towards the bottom of the food chain. Dragonflies, mayflies and others are known to navigate by using the horizontal polarization of water reflected light. Bridges, especially long ones or low culverts prevent adult insects moving through darker crossings up and downstream.

In the light of the negative impacts of the existing A12, a full assessment and improvement of the current drainage system will be required to prevent deterioration under the Water Framework Directive; this is likely to include for example the provision of pollution interceptors and balancing ponds etc. Without this, the A12 and associated roads (especially the proposed de-trunked A12 sections) will risk causing failings under the Water Framework Directive.

Clear Span Bridges and well-designed wide culverts.

Multiple road crossings of watercourses can present a particular problem on what should naturally be rich habitats along important wildlife corridors.

There should be a preference for clear span bridges rather than culverts. At each crossing opportunities should be taken to better the existing arrangements by ensuring there is more natural bank retained and channel habitat restoration before crossings are built.

Long culverts are particularly problematic for otter passage. This issue can be designed out with wider, generous passage and clear span bridges wherever possible.

Design will need to respect the ecology and hydromorphology of the river corridor. We recommend that a geomorphologist is involved in the design process. We suggest that the applicant uses the new biodiversity river metric to ascertain impacts on watercourses and what mitigation and enhancement measures are required. This will quantify the impacts of the proposal and ensure that there is sufficient provision for biodiversity and habitat.

Attenuation pond design

These should be constructed to be wildlife friendly – shallow edges, wavy margins, and designed so that they always contain a small area of standing water. An adequate footprint should be allowed for at an early stage to incorporate these design features. There are also opportunities for these features to be managed into the future with wildlife in mind, for example by sowing native wild flower mix for pollinators around the margins.

Lighting

The proposed lighting of the new widened section will need careful assessment and design to prevent light pollution impacts on river and watercourse biodiversity.

SSSIs

SSSIs have been scoped out of the current assessment as there are none within 2km of the road. However, internationally designated sites further afield which are often designated for the same features have been scoped in. Where there is potential for impact on downstream rivers and associated habitat there will be a possible effect for further than 2km. Failing drainage systems or culverts can, as demonstrated by the existing road, cause a limiting effect on the habitat downstream by disconnecting the wildlife corridor and prevent the ecosystem working as a naturally functioning whole. We would therefore expect any SSSIs downstream with water connectivity to be scoped in for assessment.

Chapter 10: Geology and soils

We are generally satisfied that, for issues within our remit, the baseline conditions and relevant issues affecting land quality have been identified. The Environment Agency should be consulted regarding any land contamination risk assessments and remediation measures.

Paragraph 10.3.18: Historic landfills. It is important to note that the nature of the waste taken in by historical landfills is not known such that those recorded as taking inert waste may have accepted sources of contamination. Environment Agency records indicate that the historical Perry Road landfill to the south of Witham took hazardous waste.

Chapter 14: Road drainage and the water environment

Generally, in terms of **water resources** and **water quality**, we are satisfied with the information provided in the scoping report. We note the references to surface water and groundwater abstractions in proximity to the area of planned works and that more information will be sought in respect of groundwater abstractions in particular (both licensed and unlicensed).

As well as licensed surface water abstractions there could possibly also be de minimus surface water abstractions (<20m³/d). Identifying these is not straightforward. It is possible, given the nature of the scheme, that landowners would raise this with the developer, but this should be further considered.

The scoping report acknowledges the risks to the water environment from construction and operation and that mitigation measures will be identified and incorporated into the design and assessment.

We would however just highlight that there is no reference to any water resource requirements for the widening scheme, for compound facilities or construction processes. This possible requirement should be considered.

The preliminary WFD assessment in appendix K appears appropriate at this stage and looks to cover the areas required. It should highlight the two key objectives for WFD of no deterioration in waterbody status and the ultimate aim of improving all waterbodies to 'Good' status. General impacts identified currently appear to be negative, negligible or no change. There will also be the potential for positive impacts. The 2019 classification status is now available and should be used in the next stages of the assessment.

Considering **Groundwater** issues specifically; overall we can confirm we are satisfied that baseline conditions have been suitably characterised by desk study and will be supplemented by groundwater level and quality data. We can confirm that the scoping report has identified potential issues affecting groundwater flow and quality, along with appropriate methodologies for dewatering and piling risk assessments and outline mitigation measures. Please note our further comment below regarding the possible need for abstraction licences.

In respect of **flood risk**, the scoping document has adequately considered the relevant issues. It appears that the proposed flood risk assessment (FRA) will contain all the required information to assess the flood risk impacts of the temporary and permanent construction works.

We are encouraged that the proposed river crossings will be sited outside of the floodplain wherever possible, and where they need to be within the flood zones clear span bridge structures will be utilised wherever possible. We also agree with the proposals to provide flood compensation areas, upgrading of structures to improve conveyance, and improved defences to prevent increases in flood risk if structures are required to be located within the floodplain.

The FRA will include flood modelling of the watercourses to be affected by the works, and will show that the proposed works have been designed to prevent an increase in flood risk elsewhere. The FRA will take account of climate change over the lifetime of the development. For essential infrastructure this should currently be a

65% increase in flow. Please be aware that the fluvial climate change allowances are in the process of being updated, and the new allowances should be published early next year.

The FRA will ensure that the proposed works will not have an adverse effect on main river flood zones, and also on ordinary watercourses; both those large enough to have associated flood zones, and smaller watercourses. For the smaller watercourses, the FRA will consider the impacts on the associated flood outlines shown on the Flood Map for Surface Water, to ensure that overland flow paths and flood storage volumes are maintained throughout.

Finally in respect of flood risk, we would also just reiterate that an Environmental Permit for Flood Risk Activities may be required for works in, under, over, or within 8m of a fluvial main river, and from any flood defence structure or culvert. Application forms and further information can be found at: <https://www.gov.uk/guidance/flood-risk-activities-environmental-permits>. Anyone carrying out these activities without a permit where one is required, is breaking the law.

Some further comments on specific sections of this chapter are provided below:

Table 14.2. As highlighted above, the 2019 WFD classification status is now available and can be found on the catchment explorer. Below is a link to the Blackwater catchment (combined Essex) as an example.
<https://environment.data.gov.uk/catchment-planning/WaterBody/GB105037041160>
Specific pollutants, priority substances and hazardous priority substances need to be considered.

Paragraph 14.3.71 states: “Ponds and un-named watercourses are unlikely to be more than low importance. However, a precautionary approach has been taken and therefore a medium value has been assigned to all but geomorphology. Receptors and attribute importance will be reconfirmed at the next stage of assessment”. These smaller watercourses will form part of the wider WFD waterbodies (catchment maps can be provided). We would not expect to see lower levels of treatment being provided in these tributaries.

The River Chelmer, River Blackwater and Roman River are all used for drinking water abstraction. These rivers and associated upstream tributaries also need to be taken into account when considering value of the receptor.

Table 14.6. In terms of value to the owners, a domestic groundwater abstraction will be of very high value where it is the sole source of drinking water; risk assessments should reflect this.

Paragraph 14.5.2 states: “Controlled discharge to ground using infiltration techniques would be the preferred option (subject to the outcome of the ground investigation)”. Reference should be made to our groundwater protection guidance. Our approach to groundwater protection and position statements can be found at:
<https://www.gov.uk/government/publications/groundwater-protection-position-statements>

Paragraph 14.5.8 refers to the possible need for temporary dewatering. Dewatering operations may require an abstraction licence. The Environment Agency should be consulted early in the process to allow time for the licence determination process.

Paragraph 14.5.13 states that water quality mitigation will be identified through HEWRAT. Assumptions and limitations of using this method will need to be clearly identified. Reference should also be made to the Essex County Council SuDS Design Guide 2020 (and the SUDS guidance at <https://www.susdrain.org>) which provides guidance on water quality. It should be ensured that any opportunities to provide additional water quality treatment infrastructure beyond HEWRAT outputs are fully considered.

We trust that this advice is useful.

Yours sincerely



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Your ref: TR010060-000007

24 November 2020

Dear Mr Breslaw,

Planning Act 2008 (as amended) and The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017(the EIA Regulations) – Regulations 10 and 11

Application by Highways England (the Applicant) for an Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme (the Proposed Development)

Scoping consultation and notification of the Applicant's contact details and duty to make available information to the Applicant if requested

Thank you for your emailed letter dated 28th October 2020 providing details of the applicant's contact details and consultation by the Planning Inspectorate on the scoping opinion submission by the applicant.

The following is a corporate response from Essex County Council (ECC) to the consultation. The response begins with some general comments on the submission followed by more specific comments relating to different topic areas.

1. General Comments

A project of the scale of that proposed by the applicant clearly has the potential to have significant and long-lasting effects on Essex County and beyond. It is therefore extremely important that any decision maker has a comprehensive baseline from which to perform a robust assessment of likely significant effects of the proposal to inform its decision and if appropriate to determine the best ways to mitigate any unavoidable harm. This scoping opinion request consultation is therefore welcomed as an important step in ensuring that any environmental assessment of the proposed development is both comprehensive and robust.

The focus of the environmental assessment must be on specifics of the proposal and the details of the sites proposed for development, including the Associated Development.

As an organisation who has a major interest in the 'Proposed Scheme' given the potential wide reaching impacts of this scheme across Essex County, we are disappointed that we were given very little notice by the applicant that an Environmental Impact Assessment scoping report was going to be submitted to the Planning Inspectorate and given the chance to review and consider the documents prior to submission for example. This is particularly the case given the current Covid-19 Pandemic which the impact of this cannot be ignored. With the second wave now underway, the UK Covid-19 has affected the Councils' ability to comprehensively respond within the 28-day consultation period. We appreciate that this is a statutory consultation period and cannot be extended by PINS. We nevertheless trust that our representations are valuable and that PINS will continue to have the expertise required to respond comprehensively to the applicant's submission.

In relation to COVID-19, we wish to emphasise that the medium or long-term effects of Covid-19 are largely unknown at this time and we ask that the Environmental Statement (ES) considers the potential impacts of the virus across all environmental topics. Covid-19 'safe' development for example, may be different from similar development provided before the pandemic and could have different effects. Furthermore, it is acknowledged by the applicant that some of the site-based/survey work proposed as part of the scope may not be achievable, and traditional methods of public engagement may also be affected. We concur with the applicant that if this is the case, the applicant must work and have agreement with relevant consultees to agree a pragmatic way forward to identify viable and robust alternatives to the approach set out in this Environmental Scoping Report. We also ask that it should be clarified by the applicant if Covid-19 is expected to affect the proposed project timing of the scheme. We therefore caveat that in addition to comments we provide as part of this response, we may have further comments as the proposal develops and potentially adapts to ever changing circumstances relating to the impacts of COVID-19.

Overall, the Council acknowledges that the Scoping Report highlights clearly how the Proposed Scheme falls under the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the 'EIA Regulations'). Given the nature of the Proposed Scheme, there is potential for significant environmental effects if not mitigated against appropriately. In terms of the content of the Scoping Report to address these significant effects, the Council has several comments, observations and points of clarification covering a range of topic areas. These relate to but not limited to points on methodology, cumulative impacts of many large-scale developments proposed across Essex, policy considerations, and topic specific points which should be included/scoped within any ES.

Whilst the Council has made several comments on many of the topic-specific areas, there are some topic areas that do not fall directly within the remit of the Council to assess. The Council trusts that other statutory bodies and relevant Local Authorities will provide comments to PINS on such areas that fall within their statutory remits which will feed into a wider assessment of the scoping submission.

2. Team Specific Comments

2.1 Highways & Transportation

The A12 provides the main South West/North Essex route through Essex and beyond into Suffolk and connects large areas of the East of England to London and the M25. Any proposed scheme for the A12 therefore, cannot be underestimated given its importance as a strategic highway route through Essex.

In considering the Scoping Report submitted by the applicant from a Highway and Transportation perspective, there are several comments and points of clarification. One of the main points of clarification, which will be explored further in the table below in this section, is how will the A120 interlink with the Proposed Scheme for the A12. Previous documentation on proposals for the A120 and A12 have suggested varying schemes in relations to potential junction connections between the A120 and A12. Therefore, the Council wishes for more clarification on how the A120 and the Proposed Scheme for the A12 will interlink going forward.

The Council also wishes to emphasise that the applicant must consider other large scheme proposals including, but not limited to, the proposed Bradwell B Nuclear Power station, the Chelmsford North East Bypass, the Lower Thames Crossing, Junction 28 of the M25, and many large-scale residential developments proposed across Essex. All these schemes in combination with the Proposed Scheme are likely to have many significant cumulative impacts on many aspects including the highway network across the County. Such cumulative impacts on the highway network and other topics areas explored therefore need to be investigated as referenced by the Applicant in Chapter 16 of the Scoping Submission.

In terms of considering the impact of the Proposed Scheme on Public Rights of Way (PROWs) of which there are numerous that could be affected, unprecedented resource implication as a result of Covid-19 means that comprehensive comments cannot be provided at this time. However, cross-references should be made to Public Health and Landscape comments which emphasises that the applicant must consider the impact of the scheme on walking, cycling and horse riding (WCH) routes and the multi-functional benefits of such routes. Consideration should be given as to how active travel routes can be encouraged and any impacts of the Proposed Scheme on WCH routes can be mitigated and where possible enhanced, to provide a WCH legacy.

Given the number of Highway and Transportation implications of the Proposed Scheme, The Council welcomes further discussions and partnership working with the Applicant to ensure that these matters are fully addressed in any future submission.

Specific highway and transportation comments in relation to the scoping submission are provided in the table below:

Page	Ref.	Comment
6	2.3.8, bullet 2	Reference should also be made to the successful HIF Bid (£218m) in August 2019 as including not just the Chelmsford North East Bypass (CNEB), but also the new Beaulieu Railway Station scheme. Particularly given that the SELEP monies has been directly allocated towards the station, and not the CNEB. Main construction works for the station are anticipated in 2023, with the station opening in 2025/2026. The new Beaulieu railway station will provide access to the Great Eastern Main Line (GEML) and allow trains to be able to pass each other at the new station to make the whole line more reliable. It will relieve crowding at Chelmsford railway station and act as a transport interchange to encourage sustainable travel by bus, cycle, electric vehicles and on foot to strategic and local housing development.
6	2.3.8, bullet 2	The Council wishes to emphasise that it is essential that the proposed improvements to J19 of the A12 resulting from the CNEB are taken into account and are protected in the designs.

Page	Ref.	Comment
8	Insert 2.1	<p>The following is not referenced in the Scoping report, but was in the Highways England Preferred route brochure in relation to potential connection with a new A120 – ECC seeks clarification that this remains the case and will be considered moving forward.</p> <p><i>'We are considering whether we can remove junction 23, but with new access roads provided from Kelvedon to junction 22. The Government's Road Investment Strategy 2 (RIS2) stated that the A12 scheme will need to take into account the evolving proposals for the A120 Braintree to A12 improvements. We therefore may need to include scope for a potential future road link joining to the proposed improvements to the A120 road.'</i></p>
11	2.4.14	The impact of retaining the by-passed sections as dual carriageway and national speed limit requires more in-depth investigation to prevent it becoming unsuitable for WCH.
12	2.5.2	There may be significant impacts on the current route as a result of the proposed works and traffic may seek alternative routes on the surrounding local network in particular Main Road Boreham and rural routes to the south that are already being used to avoid congestion and incidents on the A12. Measures, therefore, may be required to make these routes unsuitable. Any increase in traffic on these rural routes will have a negative environmental impact it will also impact on local residents and communities.
14	2.5.14	Further information is required on this point to make informed comments on impact on the highway network if import of bulk material is required.
169	13.2.6	If the bypassed section of the A12 remains dual carriageway and national speed limit is kept, this could adversely impact on the need to create better facilities for WCH and could land lock some of these routes and activities between both routes. It is not clear how this would potentially fit with the Essex new Safer Greener Healthier agenda.
P3 & p176	Table 2.1 & 13.3.35	ECC acknowledges that the bus service along the A12 is referenced and the impact of the Proposed Scheme on the bus service needs to be fully investigated.
P190	13.4.32	The removal of at grade pedestrian crossings is welcomed. Areas where people do cross however, need to be identified to ensure adequate grade separated provision is made for these desire lines.

2.2 Economic Development & Skills

ECC acknowledges the potential economic opportunities that this Proposed Scheme could bring to our area, our residents and our businesses. This is highlighted in Table 2.2 of the scoping submission where one of the key objectives of the scheme is highlighted to be supporting by economic growth by for example reducing congestion related delay, improving journey time reliability, and delivering infrastructure that advances and supports emerging strategic plans for housing, business investment and development. However, it is the Council's view that the applicant has not sufficiently assessed and captured the socio-economic baseline for this development and has not scoped in detail around topic areas such as skills, education, workforce development or business engagement. As there is no specific chapter on Socio-economics, it is advised that to capture points highlighted above and in the

table below, a separate chapter or a more explicit reference to socio-economic impacts is made in any future ES.

As in mentioned above, a number of NSIP proposals and sites for future development are being considered at this time, all of which will compete for employment and skills. Any future submission should take into account the cumulative impact of such growth and the availability of a trained skilled workforce across a wide area to make the most of employment opportunities, particularly necessary post COVID, and secure delivery.

Specific responses in relation to economic growth and skills in the scoping submission are provided in the table below:

Page	Ref.	Comment
5	Table 2.2.	The RIS objective of 'supporting economic growth' makes no specific reference to any scoping (planned or undertaken) around skills, education, workforce development or business engagement. For instance, we would have expected this scoping exercise to have reviewed data that supports workforce recruitment, skills and employment plans for the projects and how that complements the respective Local Plans and strategies around economic growth.
27	4.1 and 4.2	The consultations undertaken to date, and those planned, make no reference to engagement with a key stakeholder of any NSIP i.e. training providers and business intermediaries. This means that the scoping exercise has not taken into account how local skills and education providers, including schools, colleges and universities, will play a part in the workforce planning and delivery of this project.
31	5	This section refers to the potential benefits including the facilitation of economic development and job creation etc. However, there does not appear to have been any scoping exercise done to assess the potential for job creation other than that in reference to new employment space. The project itself, as well as its supply chain, has job creation potential which should be scoped in the context of the benefit it could bring to the region.
39	Table 5.2	We would welcome a more explicit reference to the socio-economic / skills / education theme in the planned Environmental Statement. This should be a separate chapter or have a dedicated section within a chapter.
187	13.4.21	We welcome the potential opening up of opportunities for further businesses to locate to the area. However, it is not clear how this has been assessed /scoped and what interventions and incentives are in scope.

2.3 Public Health & Wellbeing

The current EIA Regulations identify the need to consider potential implications of a proposed development on human health. Furthermore, it is also recognised within the NPPF 2019 that "planning decisions should aim to achieve healthy, inclusive safe communities". It is noted that the

health impacts will be covered within the Environmental Statement (ES) and it is intended to form a dedicated Population and Health chapter within it. The inclusion of an integrated health impact assessment should also be considered as part of the EIA (at a proportionate level suitable for a scheme of this nature) so to ensure that the impacts that may arise on the wider determinants are assessed. Any HIA should include potential impacts on health inequalities and specific groups known to be more significantly impacted by development.

In developing health considerations as part of the ES, we have the following points:

- 1- The appropriate scientific and technical environmental teams should be engaged in the ES to support the key impacts arising from environmental hazards on human health.
- 2- Local emergency 'blue' light services should be engaged as part of discussions on emergency planning and safety for both road users and active travel users.
- 3- Issues around severance and mitigation should be considered as part of the assessment including those who are active travel users or who are reliant on existing routes get to local social infrastructure including places of work or for education.
- 4- The impact on active travel users including sensitive population groups should be considered including their safety and potential impacts on health arising from air quality are addressed as we are aware that those routes are used to access education or workplaces (as examples).
- 5- Impacts on sensitive receptors, populations and communities should be included.
- 6- All assessments should give consideration of the impact of physical harm as well as impacts on mental health (especially environmental noise impacts as an example).
- 7- The impacts on socio-economics should be considered to be included so we can understand the impacts on local employment and any potential opportunities arising that might support skills, training, apprenticeships or local employment and how the scheme will impact on local supply chains.
- 8- The cumulative impacts should include an assessment on populations and health.

ECC would also like to highlight that Essex is a pilot site that supports the Sport England Local Delivery Pilot and as such, we seek assurance that any proposal supports the promotion of active design principles so that opportunities to increase physical activity via active travel are maximised.

In addition to comments above, we also have some specific responses in relation to Public Health & Wellbeing in the scoping submission as provided in the table below:

Page	Ref.	Comment
	Table 2.3	The Preferred Scheme refers to Junction 20a and junction 20b (Hatfield Peverel North) both being closed and replaced by a new junction 21 (Witham South) to the east of Hatfield Peverel, with a local access road back to Hatfield Peverel to provide a two way connection between Hatfield Peverel, the new junction 21, and Witham. This would also have a dedicated WCH route. Section 13.3.28 acknowledges that current footways and routes are not continuous, and the volume and speed of traffic on the A12 can act as a disincentive to their use as there is limited physical segregation provided. They are also relatively narrow, unclear, inconsistently marked and poorly signed. We therefore welcome proposals outlined in Paragraph 2.4.8 and 13.4.24 which refers to the Proposed Scheme including improvements to facilities on routes away from the A12 to improve the suitability of these routes for WCH to use safely in preference to the A12.
	13.3.27	
	13.3.28	
	13.4.24	
	13.5.8	

Page	Ref.	Comment
		<p>Paragraph 13.5.8 goes onto further state:</p> <p><i>'Opportunities to create new WCH routes will be explored where important linkages between communities and facilities can be made. Furthermore, opportunities to improve the existing WCH infrastructure will be explored to improve the quality and capacity of cycling and pedestrian infrastructure which could contribute to improvements in health by promoting and encouraging healthier, more active lifestyles.'</i></p> <p>We ask that a dedicated walking, cycling and horseriding route between Hatfield Peverel, new junction 21 and Witham should be designed to enable a safe walking/cycling route for pupils in Hatfield Peverel to the new primary school at Lodge Farm. This is a potential requirement given the lack of capacity at schools in Hatfield Peverel. Any route should also be designed to be safe and as direct as possible, and to consider air quality impacts/mitigation. This would also benefit secondary age pupils being able to walk/cycle to the Maltings Academy, Witham from Hatfield Peverel and provide a necessary lasting legacy to WCH in association with the scheme.</p>
172	13.3.6/ Table 13.2	<p>Paragraph 13.3.6 acknowledges that Table 13.2 includes 'some' of the housing allocations/applications within the study area. Are the other sites identified elsewhere? Further consultation should be undertaken with the relevant local planning authorities with specific guidance as to what sites should/should not be included in this schedule with regards site threshold; stage of Local Plan preparation for allocated sites; and stage of planning application (outline/approved etc).</p>
173	13.3.14	<p>Reference should also be made to there being schools and nurseries in Hatfield Peverel and Rivenhall, namely Rivenhall C of E Primary School; Hatfield Peverel Infant School; St Andrews Junior School; Little Bears Nursery; Hatfield Peverel Nursery.</p>
174	13.3.18	<p>Reference should be made to the committed Beaulieu Central, which has planning permission and will contain 62,000m² of commercial space including a hotel and a 40,000m² business park. This will be located in close proximity to the new station. Reference is only currently made to Springfield Business Park.</p>
174	13.3.20	<p>The industrial area is known as Eastways Industrial Estate and should be inserted for clarification.</p>
177	13.3.39	<p>Reference is made to the new Beaulieu Railway Station being operational in 2022. This is incorrect and the main construction works for the new station are anticipated in 2023, with the station opening in 2025/2026.</p> <p>The new station will not simply serve the new Beaulieu Park development, as referenced, and should be amended to read:</p> <p><i>The new Beaulieu railway station will provide access to the Great Eastern Main Line (GEML) and allow trains to be able to pass each other at the new station to make the whole line more reliable. It will further relieve crowding at Chelmsford railway station and act as a transport interchange to encourage sustainable travel by bus, cycle, electric vehicles and on foot to strategic and local housing development</i></p>

Page	Ref.	Comment
183	Table 13.5	<p>Reference should be made to the committed Beaulieu Central, which has planning permission and will contain 62,000m² of commercial space including a hotel and a 40,000m² business park. This will be located in close proximity to the new station. Reference is only presently made to Springfield Business Park. Beaulieu Central should be treated as a very high receptor.</p> <p>Reference should also be made to Hatfield Peverel Primary school and The Maltings school, Witham given comments made to Table 2.3 and paragraphs 13.3.27, 13.3.28, 13.4.24 and 13.5.8 as above.</p>

2.4 Climate Change

From the Council's perspective, we acknowledge that the applicant has referred to the UK National Government commitment to reducing emissions by at least 100% of 1990 levels (net zero) by 2050. We would like to also highlight however, that ECC has inaugurated an independent, cross-party Essex Climate Change Commission of which findings will be published in the first half of next year. The applicant should have regard to this emerging advice within the ES as it is expected to impact on local policies and aspirations relevant to the Proposed Scheme. More information on this Commission and more specific responses in relation to climate change methodology are provided in the table below:

Page	Ref.	Comment
	Chapter 15	There are no objections to the scope proposed for Chapter 15, climate change and GHGs, or to the proposed methodology. We note the importance of the hierarchy of avoidance and prevention of emissions first and the importance of reducing the impact of the scheme to as close to net zero as possible should also be noted.
234	15.3.4	Currently CO ₂ emissions have been estimated for the purpose of the scoping report, but the Council would like clarification that all GHGs, not just CO ₂ , will be included in the EIA.
246	15.6	<p>Whilst the national net zero GHG target of 2050 and carbon budgets have been recognised, the climate commitments of ECC should also be recognised. ECC has a commitment to formulate a Climate Action Plan to reduce carbon emissions across the county of Essex. In addition, ECC has inaugurated an independent, cross-party Essex Climate Change Commission with the purpose of:</p> <ul style="list-style-type: none"> • Identifying ways in which ECC can mitigate the effects of climate change, improve air quality, reduce waste across Essex and increase the amount of green infrastructure and biodiversity in the County, explore transport modal shift, research energy generation and fully engage with communities around behavioural change. • Reducing the carbon footprint of both ECC and Essex as a whole – the Commission is expected to recommend an ambitious, but realistic target year, to have achieved net zero greenhouse gas emissions.

		The impact of the project on emissions within the county and potential impact on upcoming emissions reductions goals should also be noted.
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2.5 Minerals & Waste

Essex County Council (ECC) is the host Minerals and Waste Planning Authority in the two-tier administrative area of Essex. The [Essex Minerals Local Plan - Adopted July 2014](#) concerns the administrative area of Essex, and seeks to ensure a local supply of aggregates for the County is retained for as planned growth.

The [Essex and Southend on Sea Waste Local Plan - Adopted October 2017](#) concerns the administrative area of Essex and Southend on Sea. They are therefore a material planning consideration in relation to this scheme.

The Council considers that there are many Minerals and Waste considerations in relation to the Proposed Scheme. Such considerations include, for example, that significant areas of the Proposed Scheme and Eastern region fall within Mineral Safeguarding Areas and the Proposed Scheme would pass through a number of Mineral Consultation Areas (MCAs). Policy S8 of the Essex Minerals Local Plan is therefore particularly pertinent which seeks to ensure that existing and allocated mineral sites and infrastructure are protected from potentially sensitive or inappropriate neighbouring developments that may prejudice their continuing efficient operation.

Comments relating to specific sections of the scoping report are outlined in the below table. To address/clarify some of the comments in the table below, we welcome opportunities for discussions with the applicant given the significant minerals & waste implications of the Proposed Scheme. Please note that appendices 1-4 provide additional information in relation to Minerals and Waste considerations.

Page	Ref.	Comment
6	2.3.7	The paragraph refers to 'a large minerals proposal site identified by Essex County Council, with an active quarry at Colemans Farm, within the river valley at Rivenhall End.' It is not understood what is meant by a 'large minerals proposal site'. Assuming that this is not a phrase also describing Colemans Farm, it is further assumed that this is a reference to the fact that the proposed route lies within Mineral Safeguarding Areas (MSAs). Land within an MSA designation is not 'proposed' for extraction but does denote where mineral capable of being an economic resource is considered to be present, and where prior extraction should take place if practicable to avoid its sterilisation by non-mineral development.
15	2.5.18	The provisions set out in Paragraph 2.5.18 are welcomed. It is noted that the sustainable procurement provisions set out in Paragraph 2.5.17 should extend to the sourcing of minerals/aggregate for construction, as subsequently recognised through Paragraph 11.5.5.
22 & 130	3.2.18 & 11.2	Reference to the NNNPS's position regarding the implications of proposing non-mineral development on land safeguarded for minerals is noted. This states that 'where a proposed development has an impact on a Mineral Safeguarding Area (MSA), the Secretary of State should ensure

Page	Ref.	Comment
		<p>that the applicant has put forward appropriate mitigation measures to safeguard mineral resources'. The NNNPS further states that the NPPF is also likely to be an important and relevant consideration in decisions on nationally significant infrastructure projects, but only to the extent relevant to that project. This is highlighted to note that in relation to mineral resources, the NPPF states at Paragraph 203 that 'Since minerals are a finite natural resource, and can only be worked where they are found, best use needs to be made of them to secure their long-term conservation' and that 'When determining planning applications, great weight should be given to the benefits of mineral extraction, including to the economy'. These principles should be reflected in a Minerals Resource Assessment (see Appendix 2).</p> <p>As is appropriate, the Scoping Report notes that the various route options, including the Preferred, all present mineral safeguarding issues. Where it states in e.g. Table 3.3 in relation to route options that 'a mineral safeguarding area...would...be affected', it is noted that the area of land that would potentially be sterilised by the Preferred Option is significant.</p>
133	11.3.11	Paragraph 11.3.11 relates to the sourcing of aggregate materials required for the construction of the Proposed Scheme, noting that 'Some of these materials would originate off site, purchased as primary construction products, but it is likely that some would arise onsite, particularly from the use of borrow pits'. Sterilisation mitigation measures as required by national and local policy require that as much of the required aggregate as practical is prior extracted from land that would otherwise be sterilised by these proposals.
133	Table 11.3.14	The table presents information relating to Land-won aggregate sales, reserves and landbanks in the East of England and Essex, 2018. This information is not disputed. However, also of relevance when considering the impact of the Proposed Scheme on local aggregate supply is the anticipated annual take of the project versus recent annual sales of this mineral over an appropriate geographic area. The vast majority of that aggregate referred to as 'remaining reserves' is yet to be extracted and may not be programmed for extraction for many years. It is not therefore to be considered as necessarily available.
136	Table 11.2	The inclusion of a list of safeguarded minerals infrastructure in Table 11.2 and Figure 11.2 is welcomed. This list has been updated through Appendix 1 of this report. Amendments relate to the removal of facilities, or an updated application reference. There are no additional sites.
137, 138, 139, 140	11.3.36, Table 11.4, 11.3.47, 11.3.50	The comments in this Row relate to issues with respect to the way that the baseline for waste management, and in particular inert waste capacity, has been presented. The matters raised here do not amount to the Minerals and Waste Authority suggesting that there is a particular waste management issue at this stage but it is considered that these

Page	Ref.	Comment
		<p>issues will require further consideration when more detailed assessment is carried out into waste likely arising from the site.</p> <p>Paragraph 11.3.36 states that the Essex Authority Monitoring Report 2017 to 2018 confirms there were an additional 17 applications granted in Essex during this period for transfer facilities, inert waste recovery facilities, materials / energy recovery facilities and disposal (landfill) facilities. Whilst true, the same document reports that the high number of applications received for determination did not yield substantial additional capacity. A number of these 17 applications related to supporting development at existing sites rather than authorising increases in capacity at new sites or otherwise.</p> <p>Paragraph 11.3.39 describes the number of landfill sites and their planning status using information drawn from the ECC (2017) Minerals and Waste Development Framework Authority Monitoring Report (AMR) 2016 to 2017. This was not the latest report available at the time the Scoping Opinion was put together (as evidenced by the use of the next iteration of the AMR to inform other sections. The latest available AMR at the time of production of the Scoping Opinion reports on there being fewer facilities than the source used.</p> <p>Table 11.4 presents available landfill capacity based on the EA (2020) Waste Data Interrogator 2018, noting that Essex capacity for non-hazardous landfill totals 15Mm³. As also presented in the table, the total amount of inert landfill contributing to that figure is 3.2Mm³. Subsequent tables amalgamate this figure. Whilst it is recognised that non-hazardous landfill sites can accept inert material such as CD, the MWPA requests that future assessments are based on dedicated inert landfill capacity, particularly in Essex, in the first instance.</p> <p>Paragraph 11.3.47 notes that in relation to the recycling and recovery of construction and demolition waste, it is expected that whilst the actual waste facilities available may change over the course of constructing the Proposed Scheme, the overall capacity is likely to remain similar as the market responds. In this context, the statement is accepted, but it is not necessarily considered true for inert landfill capacity.</p> <p>Paragraph 11.3.50 states that the forecasts of future landfill capacity do not include any additional capacity that may open in the future in the region. This is noted as being an appropriate approach. Future forecasts should however include commentary regarding when sites, particularly inert are expected to close if this is within the lifetime of project construction. An assessment of disposal capacity over the lifetime of the construction should also consider the economics of inert disposal and whether counting all available capacity in the East of England is appropriate.</p>

Page	Ref.	Comment
139	Table 11.5	The inclusion of a list of safeguarded waste infrastructure in Table 11.5 and Figure 11.2 is welcomed. This list has been updated through Appendix 1 of this report. Amendments relate to the removal of facilities, or an updated application reference. There are no additions.
139	11.3.44	<p>As mentioned above, of relevance when considering the impact of the Proposed Scheme on local aggregate supply is the anticipated annual take of the project versus the annual sales of this mineral over an appropriate geographic area. The vast majority of that aggregate referred to as 'remaining reserves' is yet to be extracted and may not be programmed for extraction for many years. It is not therefore immediately available.</p> <p>Other assumptions are considered to be appropriate unless information is received to the contrary.</p>
142	Table 11.7	<p>The sensitivity of receptor assessments are questioned. The Scoping Report states that there are no issues of significance when considered through the provisions of DMRB LA 110. However, DMRB LA 110 Table 3.13 states that where a 'project sterilises ≥ 1 mineral safeguarding site' then the significance category is 'Large'. The vast majority of the route is through a mineral safeguarding site. As such, the sensitivity assessment for Row 2 should be 'Large'. The significance of impacts is also held within DMRB LA 110 Table 3.13 as being a function of the proportion of the recycled aggregate to be used that is recycled material, and the proportion of material required that can be recovered on-site to reduce primary mineral use. These proportions are currently unknown so it is considered that at best the related significance in Row 1 should also be noted as being 'Unknown' rather than 'N/A'.</p> <p>Based on Table 3.14 of DMRB LA 110, this means that the impact on material assets is to be graded as 'significant'.</p> <p>It is noted that Paragraph 11.6.1 states that the 'potential exists for significant effects on material assets and waste to occur from the depletion of natural resources, the sterilisation of mineral safeguarding sites and the use of landfill capacity' so it is not understood why this is assessed as 'N/A' in Table 11.7.</p>
144	Table 11.8	The proposal for construction impacts on minerals and waste assets to be scoped into the Environment Statement and operational impacts on the same to be scoped out, is supported.
147	11.5.6	The list of generic requirements for a Minerals Resource Assessment compliant with Minerals Local Plan Policy S8 (see Appendix 2) includes an assessment of local operator interest for material to be prior extracted from a non-mineral development site for sale to support other development projects in the vicinity. This could be considered to be an 'enhancement measure' akin to what is already set out in this paragraph.

Page	Ref.	Comment
148	Table 11.9	The conclusions set out through Table 11.9 are supported.
148	11.7	<p>The assessment methodology is noted and the recognised need for a Responsible Sourcing Plan and Site Waste Management Plan is welcomed.</p> <p>The Minerals and Waste Authority have a schedule of information requirements to include when carrying out impact assessments on its mineral resources and active, permitted and/or allocated minerals and waste infrastructure, in accordance with safeguarding policies S8 of the Minerals Local Plan 2014 and Policy 2 of the Essex and Southend-on-Sea Waste Local Plan 2017. These are included in Appendix 2, 3 and 4.</p> <p>As mentioned elsewhere, it is considered appropriate that assessments of mineral take and waste arising are presented annually and linked to the various phases of development which are set out in Section 2.5 of the Scoping Opinion.</p>
	2.5.14 11.3.25 Table 11.2	<p>As described at various points throughout the scoping consultation, the Proposed Scheme alignment is currently routed to go through the active quarry of Colemans Farm.</p> <p>The Council would wish to see more details on the interrelationship between the extant Colemans Farm (CF) development and the Proposed Scheme and how its relationship is proposed to be taken forward for forward planning purposes either to be accommodated within the DCO process or as separate planning applications secured via the site operator.</p> <p>There are many matters relating to the proposed road route through the quarry land such as:</p> <ul style="list-style-type: none"> - the implications and responsibilities for relocation of existing quarry infrastructure - use of that infrastructure by the road programme - use of the land for the envisaged road programmes main site compound - quarry access provision - implications for the quarry reserves of mineral - additional resource need for the road programme and how borrow pits could be used and processed through the CF infrastructure. <p>Furthermore, there are other questions such as timetabling of the Proposed Scheme and implications on the CF operational and time period commitments, the CF future aspirations to undertake advance extraction/infilling along the proposed road line, and need for additional infrastructure in the CF area for processing minerals. There may also be implications for any transport requirements of hauling mineral into the</p>

Page	Ref.	Comment
		<p>CF complex and its environmental impacts including delays to site restoration.</p> <p>The Council also wishes to highlights that CF restoration commitments are currently being secured through both the planning and legal obligations to achieving Priority Habitat. How the road programme is accommodating that commitment or providing compensatory habitat elsewhere and what the vehicle and commitment are to securing those long term aftercare management and maintenance measures should be clarified.</p>
General		<p>Policy S4 of the Essex Minerals Local Plan requires that all development proposals shall ensure that mineral waste is minimised and that minerals on development/ redevelopment sites are re-used and recycled. This is to ensure both a reduction in the need for primary minerals and the amount of construction, demolition, and excavation wastes going to landfill. It further requires the application of procurement policies which promote sustainable design and construction in the proposed development.</p> <p>To address these issues, the MWPA request that information is provided to address the following. This could be by way of inclusion in the previously mentioned Site Waste Management Plan as well as a Mineral Supply Audit.</p> <p>Mineral Issues</p> <ul style="list-style-type: none"> • Information on anticipate volumes of aggregates required (indicative total volume of aggregate and an indicative phasing if available) • Identify if a supply market for aggregate has been identified to support the delivery of this site, including borrow pits and material raised through prior extraction. • The transport of minerals material to and from the site will need also to be taken into account in relation to construction/waste management traffic. <p>Waste Issues</p> <ul style="list-style-type: none"> • How waste will be sustainably managed throughout the stages of site clearance, design, construction and operation. • Strategic forecasts in relation to expected waste arisings for site preparation and construction. • Management strategies for this waste, including volume arising across different waste streams and phasing, and final destination linked to existing capacity in plan/study area.

2.6 Flood Risk & Drainage

Essex County Council is the Lead Local Flood Authority (LLFA) for all the Districts in which the proposed A12 route would run through. Therefore, the proposed inclusion of a chapter on Road Drainage and the Water Environment within the ES is welcomed. Some areas of the Proposed Scheme fall in flood zone 3 with some areas also shown to be at risk of flooding from other forms including surface water and ground water flooding. Therefore, it is necessary that a site-specific detailed Flood Risk Assessment (FRA) is undertaken considering the risk of flooding from all sources and the measures taken to mitigate any potential impact. The reference to an FRA being prepared for this site, for example at paragraph 14.4.24 is welcomed.

As the LLFA, we would expect a detailed Surface Water Drainage Strategy including SUDS, water quality, and a SUDS adoption and maintenance plan to be submitted alongside the application for this project. In providing advice as the LLFA, ECC would look to ensure sustainable drainage proposals comply with the required standards as set out in the following documents:

- Non-statutory technical standards for sustainable drainage systems (Defra 2015);
- Essex County Council's adopted Sustainable Drainage Systems Design Guide 2020;
- The CIRIA SuDS Manual (C753);
- BS8582 Code of practice for surface water management for development sites.

Initial high-level discussions have taken place with the applicant to discuss the surface water drainage element of the site. Some concerns have been flagged up as part of these discussions including the use of the pollution risk assessment process suggested. This is primarily focused on the use of Highways England Water Risk Assessment Tool (HEWRAT) which is not considered to give suitable consideration to the potential long-term cumulative impact of development. While it is appreciated that the proposal can't account for development that we currently do not know about, it can use a methodology which focuses on mitigation of all pollution risk associated with the Proposed Scheme. We ask therefore, that a comparative assessment based on the CIRIA Simple Index Approach for water treatment is also investigated. We welcome opportunities for further discussions on the above and drainage scheme as a whole.

In relation to other forms of flood risk, we recognise that PINS will receive advice from other statutory bodies such as the Environment Agency and all comments relating to drainage and the water environment should be considered equally and holistically.

2.7 Historic Environment & Historic Buildings

The assessment of Cultural Heritage cannot be underestimated, with the proposed site and surrounding area known to be a rich area archaeologically with known sites of Prehistoric, Roman and Medieval in age. Furthermore, there is a high potential for the presence of unknown archaeological remains throughout the study area as well as a number of nationally important high value of buildings whose setting could be impacted by the Proposed Scheme.

The Council therefore, has a number of specific comments on the scoping submission from a Historic Environment and Historic Buildings Perspective and are outlined in the table below:

Page	Ref.	Comment
60	Table 7.1	The table fails to reflect the national and possible international significance for Palaeolithic archaeological remains within the proposed route and the presence of Pleistocene sediments of significant

Page	Ref.	Comment
		palaeoenvironmental potential. Historic England state: <i>"Because of their extreme scarcity and the global scope of research into human origins, the importance of sites with significant in situ Palaeolithic remains or any early human fossils cannot be overstated. Likewise for the Upper Palaeolithic "Any site of this period represented by more than stray finds should be considered nationally important"</i> .
63	7.5.2	Additional mitigation should include Aerial Photographic rectification to better inform evaluation by trial trenching
65	7.7.3	There is no mention of the geoarchaeological methodology
65	7.7.4	The geoarchaeological assessment will also need to be incorporated to inform the assessment of potential impacts on cultural heritage assets
57	7.2.2 7.2.3	<p>The proposed development of this site is likely to have an impact upon a number of heritage assets and their settings. In line with the advice in the National Planning Policy Framework (NPPF), it is expected that the EIA would contain a thorough assessment of the likely effects that the Proposed Scheme might have upon the significance of these assets. With regard to the proposals, the principal considerations are the indirect effects to heritage assets due to change within their settings.</p> <p>The Scoping Opinion Report states that a study area of 300m for designated and non-designated heritage assets and a study area of 1km for designated heritage assets would be used to identify the potential effects of the proposed development, which is considered appropriate.</p> <p>The EIA should also consider any effects to non-designated heritage assets, including locally listed buildings, within the development site or its setting. Colchester Borough Council maintains a Local List which should be consulted as part of the assessment process, as there is the potential for a number of locally listed buildings to be affected.</p> <p>It should be noted that there is the potential for additional heritage assets which may be affected to be identified through the assessment process.</p> <p>When assessing the indirect impact on heritage assets, the EIA should follow the three steps described in the Historic England Guidance document The Setting of Heritage Assets (HE 2017). These are as follows:</p> <ol style="list-style-type: none"> 1. Identify which heritage assets and their settings are affected; 2. Assess the degree to which these settings and views make a contribution to the significance of the heritage asset(s) or allow significance to be appreciated; 3. Assess the effects of the proposed development, whether beneficial or harmful, on the significance or on the ability to appreciate it.
58	7.3.2	Reference is made to the baseline having considered conservation areas from Braintree and Colchester, with no mention of Chelmsford administrative area. If this has been undertaken, and concludes there are no relevant conservation areas, then this should be stated.

Page	Ref.	Comment
59	7.3.12	Future baseline refers to CNEB and should also refer to the new Beaulieu Park station, which has planning permission, and hence committed. Reference to additional phases of Beaulieu Park and Channels residential development are referred to. The Chelmsford Local Plan was adopted in May 2020, and hence the additional growth of around 3,000 homes at North East Chelmsford should also be referenced, as it could change the baseline.
61	7.4.2	This section refers to the widening of the A12 with regards the offline sections of the route but does not reference the new junction locations as having a potential impact on heritage assets during their construction. This should be included/investigated.

2.8 Landscape

Given the scale of the Proposed Scheme which will impact on a number of districts across Essex County, there are many landscape considerations as identified by the applicant in the Scoping Report. These include but not limited to Ancient Woodlands, local and national landscape designations, sensitive heritage features, numerous conservation areas, PROWs and registered parks and gardens. The Council has a number specific comments on the scoping document including on the methodology, green infrastructure and arboricultural considerations. These are outlined in the table below:

Page	Ref.	Comment
71	8.3.14	Section 8.3.14 identifies that the A12 and some surrounding areas suffer from light pollution. It must be ensured that the impact on light pollution both during construction and when the Proposed Scheme is in full operational use are clearly investigated, assessed and where appropriate mitigated against.
77	8.5.2 With links to Chapter 9 Biodiversity	<p>Although the scoping report does not reference Green Infrastructure (GI), an EIA can help identify appropriate measures for avoiding or reducing significant adverse effects on the functionality of GI assets (trees, watercourses, PROW, hedges, open spaces etc). It can also assist in identifying measures for compensating/off-setting unavoidable significant adverse effects on GI assets to protect the overall integrity of the surrounding wider landscape GI network.</p> <p>It is recommended that a detailed landscaping and ecology/GI strategy should be prepared as part of the LVIA and where the assessment and the other supporting documents indicates potentially significant effects on landscape character (including existing trees), visual amenity, biodiversity net gain value and health and wellbeing of the community (i.e. access to open spaces, encouraging active travel and recreation and reduce air pollution etc.) that may require mitigation. We would recommend that this includes:</p> <ul style="list-style-type: none"> • How the design of GI to mitigate the effects of the development will be incorporated into the existing network of GI (including

Page	Ref.	Comment
		<p>public open space) which may be used by the local community for recreational purposes.</p> <ul style="list-style-type: none"> Clearly set out mitigation for any significant adverse effects on the existing GI network, woodlands, parks, nature designated sites, public rights of way and any other resources that are used as recreational facilities. Hard and soft landscape proposals together with vegetation retention to improve the character and quality of the landscape and how this will be managed and maintained. Opportunities for advanced planting in the early stages of construction should be sought, where practicable. The phased implementation of new GI of the development construction will allow for the GI to mature and it will provide further benefit of reducing/buffering the aesthetic impact from the construction work. The provision of multi-functional GI that can provide biodiversity net gain and create a potential green/wildlife corridor/bridges to allow for species migration and prevent fragmentation. By incorporating new and existing tree and vegetation planting, which will ensure that the visual impacts of the Proposed Scheme will be limited. Existing and new paths (PROW, Cycle and bridle ways) to be incorporated into the GI network, providing attractive recreation areas that link with the rights of way network. How retained trees and vegetation will be protected during construction through Construction Environmental Management Plan. Where exposed engineered structures are required, these will be designed and constructed to support the principles of a landscape-led approach and mitigate the impact on the existing green infrastructure. Will provide, within limits enhanced access, amenities and green infrastructure. During construction where land is being used as ecological and visual screening and to reinstate the character of the landscape afterwards.
1to5	Fig.8.3	The proposed 26no. receptor viewpoints are deemed appropriate. The viewpoints cover the extent of the Proposed Scheme alignment (within the 1km buffer) including some of the most sensitive areas of change.
78	8.7.2	All visualisations should be in accordance with the new Visualisation Representation Technical Guidance Note (09/19)
78	8.7.2	Guidelines for Landscape and Visual Impact Assessment, Third Edition (GLVIA3) (Landscape Institute and Institute of Environmental Management and Assessment, 2013) should be used alongside DMRB LA 10 rather than simply acknowledged as a part of the DMRB LA 10 document.

Page	Ref.	Comment
77	8.5.1	Seasonality should be a key consideration when reviewing and mitigating any enhancement measures along the route.
79	8.7.4	<p>It is clear that an expansive area will be impacted which has the potential to impact vegetation along the proposed route. Every effort should be made to retain any Category A and B trees which are highlighted within the survey, along with any high value veteran and ancient trees/woodlands.</p> <p>As stated within the Environmental assessment, an Arboricultural survey will need to be undertaken in line with BS5837:2012 initially, along with an arboricultural impact assessment (AIA) and tree constraints plan (TCP).</p> <p>At this stage, there is no detailed designs and construction methodology with regards to the scheme. Once designs and construction methodology has been confirmed, an arboricultural method statement will be necessary along with a tree protection plan (TPP). A tree removals plan should also be provided. All of which will need to be in line with BS5837:2012.</p> <p>It is also worth noting that it is too early to provide any arboricultural comments on whether the proposals are acceptable, these comments will be based off of the recommendations made as a result from the survey.</p>

2.9 Ecology

The Council considers that there is the potential for wide-reaching impacts on the ecology and biodiversity of the site and surrounding area given that there are a number of designated sites and habitats of ecological importance within the vicinity of the Proposed Scheme. Specific responses in relation to ecology and biodiversity are provided in the table below:

Page	Ref.	Comment
82 & 111	9.1.2 & 9.7	<p>Consideration must also be given to likely impacts on designated sites (international, national and local), Protected species and Priority habitats and species - not just significant ones. This can be done within the ES or as a separate document.</p> <p>Effective and robust measures, in line with the mitigation hierarchy, must be proposed which have a high degree of certainty for their deliverability in the long term. If there are residual impacts, these will need to be compensated or offset and appropriate enhancements included to ensure Biodiversity Net Gain from development.</p>
84	9.2.9	Priority species/ species of principal importance should also be explicitly listed in this paragraph.
99	9.3.2.5	As raised elsewhere in the Scoping Report, Colemans Farm Quarry is a 'flagship' biodiversity site for the Essex Minerals Local Plan 2014 and

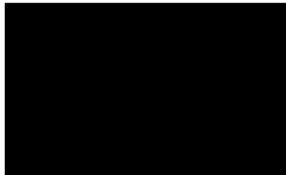
Page	Ref.	Comment
		supported by Supplementary Planning Guidance: Mineral Site Restoration for Biodiversity (June, 2016) . A comparable site of at least similar size and context (e.g. proximity to natural habitats) will need to be sought in order to provide at least an equivalent level of compensation and enhancement to that already permitted.
110	9.5.2	<p>The scheme should identify and pursue opportunities for securing measurable net gains for biodiversity, rather than aiming for no net loss. We recommend that a minimum of 10% Biodiversity Net Gain should be provided using Good Practice Principles for Development (https://cieem.net/wp-content/uploads/2019/02/Biodiversity-Net-Gain-Principles.pdf). These principles have been developed by the Construction Industry Research and Information Association (CIRIA), the Chartered Institute for Ecology and Environmental Management (CIEEM) and the Institute of Environmental Management and Assessment (IEMA).</p> <p>We also encourage the scheme to use the Defra Biodiversity Metric 2.0 (or later version if available) to help demonstrate that Biodiversity Net Gain is achieved. Notwithstanding the above, ecological functionality is important to underpin the assessments and the site’s design should ultimately be based upon the Good Practice Principles using professional judgement by a suitably competent ecologist. The Metric should also not be a reason to miss opportunities to benefit key species through biodiversity net gain where they are not directly accounted for within the Metric.</p> <p>We would encourage habitat restoration and habitat creation to include priority habitats and to reflect existing local habitats. This should include open habitats (as well as woodland and hedgerows) such as Lowland Meadows. This should include the road verges of the A12 where possible.</p> <p>Like for like habitat or better should be the aim and one habitat should not be replaced with another where possible.</p>
107	9.4.22	<p>We do not agree that Hazel Dormouse should be scoped out from any further consideration.</p> <p>The report scopes out Hazel Dormouse based on the fact that no evidence was identified during a nest tube survey and that the nearest record was 2km.</p> <p>However, we query the methodology undertaken, as the report specifies that a presence/absence survey was undertaken following Bright et al. 2006 (Dormouse Conservation Handbook), but no specific details on how the survey was carried out has been provided. In particular, we have concerns about the following statement: “The number of tubes will be appropriate for the habitats to be surveyed, with at least ten tubes in each sample area.” 10 tubes are unlikely to be sufficient sample size to</p>

Page	Ref.	Comment
		<p>identify presence/absence per habitat block (50 tubes per habitat section would be preferable).</p> <p>Furthermore, we have not found any details on the habitat assessment (Species diversity, structure, landscape connectivity etc.) to accompany the presence/likely absence survey. This would be necessary to allow us to have certainty that surveys have been carried out in appropriate locations to further justify likely absence.</p>
99	9.3.21	<p>We would not support applying the proposed deviation from the Bat Conservation Trust guidelines unless there is certainty of likely impacts on the bat populations at the local level, which would be necessary to support a European Protected Species Mitigation Licence needed for a project. There is a need for sufficient survey & assessment on bats & trees affected by a road scheme. It needs to be evidence led and it may therefore not be appropriate for this scheme.</p>

Conclusion

In light of the above, we recommend that the ES takes into account the comments provided and the applicant may find it beneficial to discuss topic-specific points with relevant teams here at Essex County Council. When a decision is made on the applicant's EIA Scoping Report, we ask that any opinion should be sent through to ECC upon publication.

Yours sincerely,



Andrew Cook
Director of Highways & Transportation

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Appendix 1 – Updated list of Safeguarded Minerals and Waste Infrastructure

Table 11.2 and Table 11.5 from the Scoping Report have been reproduced with an additional column showing updates

Amended Scoping Report Table 11.2: Schedule of minerals infrastructure and designations within the first study area

Site type	Site name	Planning application no	Update Required
MSAs	Sand and gravel	N/A	
	Brick clay	N/A	
MLP Allocations or Safeguarded Sites	Bulls Lodge Strategic Aggregate Recycling Site (existing)	MLP p186	Remove
	Bulls Lodge Quarry Coated Stone Plant	MLP p196	
	Land at Colemans Farm (allocated for extraction, now existing)	A46 MLP p170	
	Marks Tey Rail Siding (existing)	F3 MLP p180	
Minerals Infrastructure	Bulls Lodge Strategic Aggregate Recycling Site	ESS/25/08/CHL	Remove
	Bulls Lodge Quarry Coated Stone Plant	ESS/01/11/CHL	
	Bulls Lodge	CHL/1890/87	To be superseded by ESS/37/15/CHL, pending determination
	Bulls Lodge	CHL/1019/87	To be superseded by ESS/36/13/CHL, pending determination
	Bulls Lodge	ESS/28/14/CHL	In aftercare so remove
	Colemans Farm	ESS/39/14/BTE	Superseded by ESS/10/18/BTE
	Colemans Farm	ESS/35/17/BTE	
	Colemans Farm	ESS/11/20/BTE (pending determination)	New entry
	Marks Tey	ESS/26/08/COL	

Amended Scoping Report Table 11.5: Schedule of waste infrastructure and designations within the study area

Site type	Site name	Planning application no	Update
Waste management infrastructure	Boreham Recycling Centre	ESS/24/10/CHL/SO	
	Bulls Lodge Waste Transfer Station	ESS/44/19/CHL	Site Name should be updated to read 'Bulls Lodge Inert Recycling' and add planning reference 'ESS/44/17/CHL'
	Drovers Recycling Centre	ESS/42/11/CHL	
	Winsford Way Waste Transfer Station	ESS/65/12/CHL	
	Witham Recycling Centre	ESS/44/15/BTE	

Appendix 2 – Generic Schedule of Requirements for when an application for non-mineral development is proposed in land designated as a Mineral Safeguarding Area

Policy S8 of the Essex Minerals Local Plan requires that non-mineral developments which have a site area equating to 5ha or more of land within a Mineral Safeguarding Area must be accompanied by a Minerals Resource Assessment.

Please note that this generic schedule of requirements has been updated since previous correspondence.

MRA Section	Matters to Cover
<p>Site location, relevant boundaries, timescale for development</p>	<p>Application area in relation to MSA/MCA</p> <p>Description of development including layout & phasing</p> <p>Timescale for development</p> <p>Whether there is any previous relevant site history – this could include previous consideration of site or adjacent land in preparation of Minerals Local Plan, any previous mineral assessments and market appraisals, boreholes, site investigations, technical reports and applications to the Minerals Planning Authority for extraction.</p>
<p>Nature of the existing mineral resource</p>	<p>Type of mineral</p> <p>Existing mineral exploration data (e.g. previous boreholes in area)</p> <p>Results of further intrusive investigation if undertaken</p> <p>Extent of mineral – depth & variability</p> <p>Overburden – depth & variability, overburden:mineral ratio. To be expressed as both actual depths and ratio of overburden to deposit, as well as variation across the site.</p> <p>Mineral quality – including silt %/content and how processing may impact on quality. Consideration should give given to the extent to which the material available on site would meet the specifications for construction.</p> <p>An assessment of the amount of material that would be sterilised (whole site area) and could be extracted (following application of any required buffer zones).</p> <p>Estimated economic/market value of resource affected across whole site and that which could be extracted.</p>
<p>Constraints impacting on the practicality of mineral extraction (distinct from those that would arise from the primary</p>	<p>Ecology designations,</p> <p>Landscape character,</p> <p>Heritage designations,</p> <p>Proximity to existing dwellings,</p> <p>Highways infrastructure,</p> <p>Proximal waterbodies,</p>

<p>development)</p>	<p>Hydrology, Land stability, Restoration requirements, Effect on viability of non-minerals development including through delays and changes to landform and character, Utilities present etc. Constraints should be assessed in light of the fact that construction of the non-minerals development would be taking place e.g. landscape issues are to be presented in light of the final landscape likely to be permanent built development. It is held that mitigation methods employed as part of the construction of the non-minerals development may also facilitate prior extraction at that locality.</p>
<p>Potential opportunities for mineral extraction at location</p>	<p>Ability of site to incorporate temporary mineral processing plant, Proximity to existing mineral sites or processing plant, Context of site and mineral within wider mineral resource area, Proximity to viable transport links for mineral haulage, The potential for indigenous material to be used in the construction of the proposed development, thereby reducing/removing the need for import, Potential benefits through mineral restoration e.g. land reclamation, landscape enhancement, Any opportunities for incidental extraction as part of the development of the site such as foundations, footings, landscaping, sustainable drainage systems, Evidence or otherwise of interested operators/local market demand,</p>
<p>Conclusion (as relevant to the findings)</p>	<p>Whether prior extraction is environmentally feasible, Whether the site has the potential to be worked for mineral in the future, Whether prior extraction is practical at the site in the context of the non-mineral development, taking into account the estimated value of the mineral, restoration and the overall viability of the development. How the MRA has informed the proposed non-mineral development, If prior extraction is not practical, the justification for sterilising the mineral, If prior extraction is practical, how this will be phased as part of, or preceding, the non-mineral development,</p>

Borehole logs do not have to be commissioned specifically for an MRA where they already exist, but they must be indicative of the site as a whole, taken from within the application boundary and conform to industry standards.

To ensure that a comprehensive assessment is undertaken on a site, it is recommended that:

- a draft borehole location plan is agreed with the County Council as early as possible and preferably as part of pre-application;
- the borehole depths should be to the full extent of the mineral resource;
- borehole analysis must note the depth of the water table; and
- a non-stratified sampling technique is applied. An initial spacing of approximately 100m-150m centre to centre should be considered, with additional locations if required to determine the extent of deposits on site.

The MRA should be prepared using the [Pan-European Standard for Reporting of Exploration Results, Mineral Resources and Reserves \(PERC\) Standard](#), which was revised and published on 23 May 2013.

Appendix 3 - Generic Schedule of Requirements for when an application for non-mineral development is proposed in land designated as a Mineral Consultation Area

Policy S8 of the Essex Minerals Local Plan requires that non-mineral developments within a Minerals Consultation Area must be accompanied by an assessment into any potential impacts on the safeguarded infrastructure.

Please note that the generic schedule of requirements to be covered by such an assessment have been updated since previous correspondence.

Minerals Infrastructure Assessment Components	Information requirements & sources
Site location, boundaries and area	<ul style="list-style-type: none"> • Application site area in relation to safeguarded site(s), • Description of proposed development, • Timescale for proposed development,
Description of infrastructure potentially affected	<ul style="list-style-type: none"> • Type of safeguarded facility e.g. wharf, rail depot, concrete batching plant; asphalt plant; recycled aggregate site, • Type of material handled/processed/supplied, • Throughput/capacity.
Potential sensitivity of proposed development as a result of the operation of existing or allocated safeguarded infrastructure	<ul style="list-style-type: none"> • Distance of the development from the safeguarded site at its closest point, to include the safeguarded facility and any access routes, • The presence of any existing buildings or other features which naturally screen the proposed development from the safeguarded facility, • Evidence addressing the ability of vehicle traffic to access, operate within and vacate the safeguarded development in line with extant planning permission, • Impacts on the proposed development in relation to: <ul style="list-style-type: none"> ○ Noise ○ Dust ○ Odour ○ Traffic ○ Visual ○ Light
Potential impact of proposed development on the effective working of the safeguarded infrastructure/allocation	<ul style="list-style-type: none"> • Loss of capacity – none, partial or total, • Potential constraint on operation of facility – none or partial.
Mitigation measures to be included by the proposed development to reduce impact from existing or allocated safeguarded infrastructure	<ul style="list-style-type: none"> • External and internal design & orientation e.g. landscaping; living & sleeping areas facing away from facility, • Fabric and features e.g. acoustic screening & insulation; non-opening windows; active ventilation.
Conclusions	<ul style="list-style-type: none"> • How the MIIA informed the final layout of the proposed development. • Sensitivity of proposed development to effects of operation of safeguarded infrastructure/facility can be mitigated satisfactorily; or • If loss of site or capacity, or constraint on operation, evidence it is not required or can be re-located or provided elsewhere.

Appendix 4 - Generic Schedule of Requirements for when an application for non-waste development is proposed in land designated as a Waste Consultation Area

Policy 2 of the Essex and Southend-on-Sea Waste Local Plan requires that non-waste related development proposed within land designated as a Waste Consultation Area are shown to not have an adverse impact on the safeguarded infrastructure pertaining to the Waste Consultation Area. The Waste Planning Authority has designed a generic schedule of information requirements that should be addressed as relevant within the supporting evidence of any application which falls within a Waste Consultation Area. The detail to be provided should be in proportion to the nature of the proposed application.

Waste Infrastructure Assessment Components

Waste Infrastructure Assessment Components	Information requirements & sources
Site location, boundaries and area	<ul style="list-style-type: none"> • Application site area in relation to safeguarded site(s) • Description of proposed development • Timescale for proposed development
Description of infrastructure potentially affected	<ul style="list-style-type: none"> • Nature of relevant safeguarded facility • Type of material handled/processed/supplied • Throughput/capacity
Potential sensitivity of proposed development as a result of the operation of existing or allocated safeguarded infrastructure	<ul style="list-style-type: none"> • Distance of the development from the safeguarded site at its closest point, to include the safeguarded facility and any access routes. • The presence of any existing buildings or other features which naturally screen the proposed development from the safeguarded facility • Evidence addressing the ability of vehicle traffic to access, operate within and vacate the safeguarded development in line with extant planning permission. • Impacts on the proposed development in relation to: <ul style="list-style-type: none"> ○ Noise ○ Dust ○ Odour ○ Traffic ○ Visual ○ Light
Potential impact of proposed development on safeguarded infrastructure/ allocation	<ul style="list-style-type: none"> • Loss of capacity – none, partial or total • Potential constraint on operation of facility – none, partial or full
Measures to mitigate potential impacts of operation of infrastructure on proposed development	<ul style="list-style-type: none"> • External and internal design & orientation eg landscaping; living & sleeping areas facing away from facility. • Fabric and features eg acoustic screening & insulation; non-opening windows; active ventilation
Conclusions	<ul style="list-style-type: none"> • Sensitivity of proposed development to effects of operation of safeguarded infrastructure/facility can be mitigated satisfactorily; or

	<ul style="list-style-type: none">• If loss of site or capacity, or constraint on operation, evidence it is not required or can be re-located or provided elsewhere
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FEERING PARISH COUNCIL

Feering Community Centre, Coggeshall Road, Feering, Colchester, Essex. CO5 9QB

Telephone: [REDACTED]

Mobile: [REDACTED]

Email: clerk@feeringparishcouncil.gov.uk

The Planning Inspectorate
Environmental Services
Central Operations
Temple Quay House
2 The Square
Bristol
BS1 6PN

By Email: A12ChelmsfordA120@planninginspectorate.gov.uk

26 November 2020

Dear Sirs

Your Ref: TR010060-000007

Application by Highways England (the Applicant) for an Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme (the Proposed Development) – Scoping Consultation

On behalf of Feering Parish Council Planning Committee, please find below our comments on the above-mentioned consultation:

- Feering – We note that the maps do not name Feering and the report references Kelvedon (which is an adjoining parish). Please note that Feering is a separate parish and the A12 proposal and in particular the realignment works border the Parish and will directly impact Feering.
- Item 2.1 / Page 8 - The following is not referenced in the Scoping report, but was in the Highways England preferred route brochure in relation to a potential connection with a new A120 – Feering Parish Council seeks clarification that this remains the case and will it be considered moving forward.

We are considering whether we can remove junction 23, but with new access roads provided from Kelvedon to junction 22. The Government's Road Investment Strategy 2 (RIS2) stated that the A12 scheme will need to take into account the evolving proposals for the A120 Braintree to A12 improvements. We therefore may need to include scope for a potential future road link joining to the proposed improvements to the A120 road.

- Feering & Kelvedon Conservation Areas – it appears from the maps included that the conservation areas have not been updated to reflect the latest conservation area changes approved by Braintree District Council.
- Feering - As noted on the plans, there are specific sites that form part of the proposed strategic growth location (Braintree District Council - Policy LPP 22 Strategic Growth Location - Land at Feering). The master planning / design of these sites are unconfirmed however the LPP22 states the following and would seek assurance that the EIA scoping surveys include for these areas:

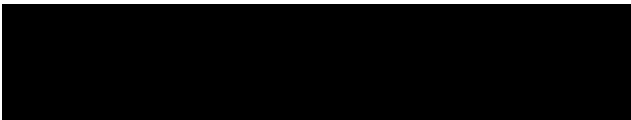


Public open space, and informal and formal recreation and Green Infrastructure on land to the east of the current A12 route and/or to the south east of the cricket ground, north of the railway line.

- Item 15.3.14 / Page 234 - Currently the CO2 emissions have been estimated for the purpose of the scoping report, but we would like clarification that all GHG's, not just CO2, will be included in the EIA.
- Light & noise pollution – As mentioned, Feering borders the A12 and we are concerned with any increase in light and/or noise pollution as a consequence of these proposals and would seek assurances that the scoping survey and subsequent proposals will include for landscape screening and acoustic measures to mitigate both noise and light pollution.
- Noise monitoring points (Page 352) – we note that there appears to be no locations indicated along the stretch of the A12 that borders Feering and we request additional monitoring is included as part of the EIA.

Please do not hesitate to contact me if you require any further information.

Yours faithfully



Lisa Collins
Clerk to Feering Parish Council



CEMHD Policy - Land Use Planning,
NSIP Consultations,
Building 1.2,
Redgrave Court,
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Bootle, Merseyside
L20 7HS.

HSE email: NSIP.applications@hse.gov.uk

FAO Michael Breslaw
The Planning Inspectorate
Temple Quay House
Temple Quay
Bristol
BS1 6PN
By email only

Dear Mr Breslaw,

11 November 2020

**A12 CHELMSFORD to A120 WIDENING SCHEME (the project)
PROPOSAL BY HIGHWAYS ENGLAND (the applicant)
INFRASTRUCTURE PLANNING (ENVIRONMENTAL IMPACT ASSESSMENT) REGULATIONS 2017 (as
amended) REGULATIONS 10 and 11**

Thank you for your letter of the 28 October 2020 regarding the information to be provided in an environmental statement relating to the above project. HSE does not comment on EIA Scoping Reports but the following information is likely to be useful to the applicant.

HSE's land use planning advice

Will the proposed development fall within any of HSE's consultation distances?

According to HSE's records there are no major accident hazard sites within the proposed DCO application boundary of the proposed A12 Chelmsford to A120 Widening scheme for this nationally significant infrastructure project.

This is based on the current configuration as illustrated in, for example, Inset 2.1: Overview of Proposed Scheme design of the A12 Chelmsford to A120 Widening scheme ENVIRONMENTAL SCOPING REPORT TR010060 dated 21/10/20

The pipelines are:

HSE Reference No.	TRANSCO Index No.	Pipeline Operator	Pipeline/Location Name
7558	1813	Cadent Gas Ltd	Springfield / Chelmsford (1TLD)
7568	1823	Cadent Gas Ltd	Little Braxted / Tye Green (1XOO)
7569	1824	Cadent Gas Ltd	Little Braxted / Langford (1XRO)
7571	1826	Cadent Gas Ltd	Langham / Daisy Green / Little Braxted (1SKO&1SLO)
7577	1831	Cadent Gas Ltd	Chalk End / Springfield (1SNO)
7578	1832	Cadent Gas Ltd	Little Braxted / Springfield (1SMO)
7558	1813	Cadent Gas Ltd	Springfield / Chelmsford (1TLD)

HSE's Land Use Planning advice would be dependent on the location of areas where people may be present. When we are consulted by the Applicant with further information under Section 42 of the Planning Act 2008, we can provide full advice

Hazardous Substance Consent

The presence of hazardous substances on, over or under land at or above set threshold quantities (Controlled Quantities) will probably require Hazardous Substances Consent (HSC) under the Planning (Hazardous Substances) Act 1990 as amended. The substances, alone or when aggregated with others for which HSC is required, and the associated Controlled Quantities, are set out in The Planning (Hazardous Substances) Regulations 2015 as amended.

HSC would be required to store or use any of the Named Hazardous Substances or Categories of Substances at or above the controlled quantities set out in Schedule 1 of these Regulations.

Further information on HSC should be sought from the relevant Hazardous Substances Authority.

Consideration of risk assessments

Regulation 5(4) of the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 requires the assessment of significant effects to include, where relevant, the expected significant effects arising from the proposed development's vulnerability to major accidents. HSE's role on NSIPs is summarised in the following Advice Note 11 Annex on the Planning Inspectorate's website - [Annex G – The Health and Safety Executive](#). This document includes consideration of risk assessments on page 3

Explosives sites

HSE has no comment to make as there are no licensed explosives sites in the vicinity.

Electrical Safety

No comment from a planning perspective.

During lockdown, please send any further communication on this project directly to the HSE's designated e-mail account for NSIP applications at nsip.applications@hse.gov.uk. We are currently unable to accept hard copies, as our offices are closed.

Yours sincerely,

████████

Monica Langton
CEMHD NSIP Consultation Team



Mr Michael Breslaw
EIA Advisor, Environmental Services
The Planning Inspectorate
Temple Quay House
2 The Square
Bristol
BS1 6PN

Direct Dial: 01223 582769

Our ref: PL00722882
Your ref: TR010060-000007

Date: 24 November 2020

A12chelmsfordA120@planninginspectorate.gov.uk

BY EMAIL

Dear Mr Breslaw

ENVIRONMENT IMPACT ASSESSMENT (EIA) SCOPING REPORT – OCTOBER 2020

HIGHWAYS ENGLAND

A12 Chelmsford to A120 Widening scheme

Thank you for your letter of 28th October with a formal request for a scoping opinion in relation to the above application. Historic England, as the government's lead advisor on the historic environment, would like to offer comments on this proposal, taking into consideration the information provided by the applicant: A12 Chelmsford to A120 Widening Scheme Environmental Scoping Report, TR010060.

The Proposed Development

The overall aim of the Proposed Scheme is to solve strategic traffic problems and congestion, and associated safety issues, along the strategic road network (SRN) between junctions 19 (Boreham) and 25 (Marks Tey) of the A12 between Chelmsford and Colchester.

Specifically, the Proposed Scheme involves widening the existing A12 to three lanes throughout in each direction. This would involve online widening in the main, with offline bypasses created between junctions 22 and 23 (Rivenhall End Bypass) and 24 and 25 (Kelvedon to Marks Tey). This would be accompanied by junction improvements (junctions 19 and 25), construction of new all movement junctions (junctions 21, 22, and 24), and removal of existing junctions (junctions 20a, 20b, and 23).

The ES for the DCO application will be undertaken with appropriate parameters using the Rochdale Envelope. The adoption of realistic worst-case scenario(s) will enable the Project's stakeholders and the Secretary of State to be confident that the environmental impacts of the Project would be no greater than those identified in the ES.

It is noted that the order limits include permanent land-take required for the Proposed Scheme (including environmental mitigation) and temporary land-take required for construction, including construction compounds, temporary works, statutory undertaker diversions, local road mitigation, material storage, haul routes, and potential borrow pit areas (Sections 2.4.3 and 2.6.1).

It is noted that the scheme design is an iterative process which considers the key potential significant effects on environmental receptors (2.4.17). The ongoing design development will continue to be influenced by the EIA process and Environmental mitigation can be incorporated within the highways design, where appropriate, to mitigate environmental effects from the Proposed Scheme (2.4.18).

Historic England Advice

The historic environment is a finite and non-renewable environmental resource which includes designated and non-designated heritage assets, conservation areas, historic landscapes and sites of historic and evidential interest. It is a rich and diverse part of England's cultural heritage and makes a valuable contribution to our cultural, social and economic life.

We confirm that historic environment represents a potentially significant issue in EIA terms, and confirm that the historic environment should be 'scoped in' to the assessment.

We note the Chapter 7 relating to Cultural Heritage that has been submitted in the Scoping Report. We agree that the scoping report has taken into consideration both designated and non-designated heritage assets and that the assessment methodologies are generally appropriate – and we offer the following specific comments below.

We have previously advised that a widened road is likely to have a lesser impact to the landscape setting of the area than the introduction of new lengths of road.

We welcome the review of Option 2 and the design refinements relating to the offline section between Junction 22 and Junction 23, following our concerns about the potential high degree of harm that would be caused to the Rivenhall Long Mortuary Enclosure scheduled monument (NHLE no. 1008980), as well as associated archaeological remains that contribute to the wider historic setting of the monument (3.2.18).

Our concerns remain, however, about the proposed route between Junction 24 (Feering) and Junction 25 (Marks Tey), expressed in our response of 27 March 2017. We have particular concerns regarding the impact of the proposed offline bypass to the significance of the Grade II listed buildings at Easthorpe Green Farm (Easthorpe Green Farmhouse and Flispies). It is likely that the proposed route would have an impact on the significance of these buildings, in terms of the changes to their settings and their relationships to the wider landscape. This will require detailed assessment and careful consideration in the ES, along with proposals for appropriate mitigation to offset any harm. Overall, a widened road is likely to have a lesser impact to the landscape setting of the area than the introduction of a new offline section of road.

Similar concerns are raised with regard to other designated assets north of Easthorpe Green including a Grade II* listed barn at Marks Tey Hall (itself a Grade II listed building). There are also a number of undesignated historic landscapes features in this section of the proposed route, including two historic greens (Easthorpe Green and Potts Green), which form the landscape setting of the listed buildings. These will also require close assessment in the ES.

In addition, the road in this section meets the junction of two Roman roads; the south-west to north-east A12 itself and a broadly east-west route. This second Roman road survives as a modern road east of the A12 as Easthorpe Road. The meeting point of two Roman roads should be expected to have a high degree of archaeological potential.

It is stated in Section 7.3.2 that a number of sources have been consulted so far, which includes the Desk-Based Assessment, including a specific Palaeolithic Desk-Based Assessment produced by Wenben-Smith (2020). We are pleased this work has been carried out and look forward to reviewing the reports.

In terms of below-ground heritage assets (Section 7.7), we welcome the investigations that are proposed to assess cultural heritage. The ES should provide a detailed archaeological baseline; only a detailed and comprehensive understanding of the archaeological resource will allow for impact to heritage to be properly mitigated. During the options appraisal, we advised that there is significant potential for further nationally important sites to be discovered along this section, which has not yet been the subject of detailed assessment.

We note the sources of information to inform the baseline for the study area (7.3.2). No results have been presented at this stage, with the exception of Figures 7.1 and 7.2 and a summary gazetteer of all assets (Appendix F). For the ES, this should also include the dataset from the Colchester Historic Environment Record, for that part of the proposed route within Colchester Borough.

We note that a preliminary assessment of the value of cultural heritage assets within the study area has been undertaken (7.3.14 and Figure 7.1). At this stage, no systematic archaeological investigation has been undertaken and, therefore, we believe it is difficult to accurately establish the value of the majority of below-ground archaeological remains along the proposed route. This will need to be reviewed for the ES based on the results of the survey work (geophysical survey, trial-trenching and Palaeolithic assessment).

We note that the proposed scheme has high potential for encountering Palaeolithic remains (7.3.7), and that a Palaeolithic desk-based assessment that has been prepared. Again, the nature and scope of specialist Palaeolithic survey and assessment should be devised through consultation with the archaeological advisors at Essex Place Services and Colchester Borough Council.

It should be noted that the existing records could also be used to develop an initial deposit model for the proposed scheme that could be enhanced following later geoarchaeological sampling. It is stated that there is the potential for Pleistocene and Holocene deposits of archaeological significance to be present along the route, which

in turn suggests that there is the potential for archaeological remains to be buried within the natural deposit sequence as well. This information may not be adequately represented in the Historic Environment Record, by shallow geophysics and field walking or even by shallow evaluation trenches. An effective method for identifying the potential depth and character of this archaeology would be to undertake a preliminary deposit model as part of the desk-based assessment. This should be prepared by a geoarchaeologist based on any available stratigraphic information, including archaeological and geotechnical data, to follow the route footprint. The deposit model will help to illustrate the depth, characteristics and potential of the deposits of archaeological interest and should inform any subsequent evaluation trenching, borehole sampling and/or geophysical survey. The deposit model will also help to guide elements of the proposed mitigation strategy, such as the choice of geophysical techniques that are utilised. For example, magnetometry has been applied so far, but techniques that investigate deeper deposits of archaeological interest should be considered as well, such as electromagnetic induction (EMI) or electrical resistivity (ERT).

It is noted that several chapters within the scoping report contain information that may also aid the assessment of the archaeological potential of the development area. For example, information about the superficial geology (Section 10.3.6) and the groundwater levels (Chapter 14). In particular, it is important to understand how changes to the groundwater levels, water quality or the movement of water through deposits (Section 14.4.8) may impact the historic environment. Additional works are planned to investigate the geology (Section 10.3.8) and hydrology/hydrogeology (Section 14.3.2 and 14.5.18) of the development area; we would therefore recommend that the value of this information to inform the assessment of the historic environment should be considered and discussed with the project archaeological team. This will allow any opportunities to be maximised where possible, and it will also hopefully reduce any duplication of effort. For example, any additional boreholes that are collected for ground investigation works, and the hydrological conceptual model (Section 14.5.4) will potentially add to the understanding of the historic environment, as well as the likely preservation conditions that may be present on the site.

We welcome the current and proposed programme of archaeological evaluation, comprising geophysical survey followed by a programme of archaeological trial-trenching. This should be undertaken across the DCO application area to ensure the nature, extent and survival of subsurface archaeological and geoarchaeological remains are established, and presented in the ES. This will enable an appropriate scheme of mitigation to be prepared. We note that a geophysical survey has been carried out (or is currently being conducted) along the proposed route (7.5.2 and 7.7.3), and we look forward to reviewing the report on this work.

The nature and scope of the archaeological evaluation should be devised through consultation with the archaeological advisors at Essex Place Services and Colchester Borough Council and we would be also pleased to provide advice. In our view, this will provide the Examining Authority with the appropriate level of information to determine the application, confident that the historic environment has been adequately assessed and that the proposed mitigation measures will be effective and proportionate to the significance of heritage assets. Considering the amount of evaluation fieldwork that is likely to be required, we think it is important that discussions about this fieldwork

commence at the earliest opportunity. We also advise that a timetable is agreed for each stage of the assessment process.

Some of the work associated with the Proposed Scheme may impact on the groundwater levels or movement of water through deposits, as well as the water quality (Section 7.4.2 and Chapter 14). For example, the excavation of borrow pits, the need for piling/foundations, compression of deposits through the construction of elements or the movement of vehicles, the reduction in recharge values, or the need to dewater areas during construction (Section 14.4.8). The impact that this work may have on the historic environment needs to be considered as any changes may affect preservation conditions within the area of the proposed scheme or in nearby deposits, which in turn may result in the damage and/or loss of archaeological remains. We would recommend that the Historic England document '*Preserving Archaeological Remains*' (2016) is referred to aid the discussions of the potential impacts to the historic environment as well as the approaches used to investigate them:

<https://historicengland.org.uk/images-books/publications/preserving-archaeological-remains/>. The Historic England document '*Piling and Archaeology*' (2019) should be also referred to as some of the elements of the development will involve piling: <https://historicengland.org.uk/images-books/publications/piling-and-archaeology/>

It is stated in Section 5.4.3 that an outline Environmental Management Plan (EMP) and a detailed Construction Environmental Management Plan (CEMP) will be produced. We look forward to reviewing these documents, and the detailed mitigation strategies developed for the historic environment.

We note the baseline landscape data produced (Chapter 8) and recommend the LVIA is supplemented with heritage specific viewpoints (photographs, photomontages and wirelines) that illustrate the ES and support the results of the heritage assessment. If these are to be presented in the landscape and visual chapter, the assessment needs to be clearly set out and cross-referenced with the heritage chapter.

We note the representative viewpoints proposed in Figure 8.3. In terms of the assessment of setting on designated heritage assets, we look forward to constructive engagement with the applicant, at an early stage, to agree the proposed key viewpoints for visualisations. The ZTV should be re-produced in relation to the designated heritage assets, and any significant historic elements, and used to inform the selection of potential viewpoints to assess the impact of the proposed development on the setting of heritage assets.

The setting of heritage assets is not just restricted to visual impacts and other factors should be considered, in particular noise, vibration, light, odour, traffic assessments, during construction and operation (7.4.12). Where relevant, the cultural heritage chapter should also be cross-referenced to other relevant chapters, and we advise that all supporting technical heritage information is included as appendices.

We note section 7.2.3 states, 'designated heritage assets data within a study area extending up to 1km from the provisional order limits in all directions have been collated...It is recognised that significant effects on the value of heritage assets arising from changes to setting are unlikely beyond 1km'.

The assessment should define a study area according to the sensitivity of the receiving environment and the potential impacts of the project (DMRB, Sustainability & Environment Appraisal, LA 106 Cultural heritage assessment, 3.5). The assertion that there will be no significant effects on the value of heritage assets beyond 1km needs to be evidence-based, and it should not be scoped out at this stage.

We would advise that the area of study for designated heritage assets is extended to 2km because the preliminary ZTV (Figure 8.3) shows that the zone of theoretical visibility would be considerably larger. Therefore, the road – particularly in terms of long views – has the potential to impact on designated heritage assets across a wider area. This larger study area will be consistent with 2km study area shown in Figures 8.1 and 8.3 of the scoping report.

In terms of the assessment of setting, we consider the analysis of setting (and the impact upon it) as a matter of qualitative and expert judgement which cannot be achieved solely by use of systematic matrices or scoring systems. Historic England, therefore, recommends these should be in an appendix and seen only as material to support a clearly expressed and non-technical narrative argument within the cultural heritage chapter. The EIA should use the ideas of benefit, harm and loss to set out ‘what matters and why’ in terms of the heritage assets’ significance and setting, together with the effects of the development upon them.

In addition, the appreciation of the value of the historic environment should not rely solely on an appreciation of the location of designated heritage assets but consider the interactions with the wider landscape.

We note that the effects on historic landscape types (HLT) during the operational phase have been scoped out of the assessment (Section 17.2.3 and Table 17.1). It is stated in the Report, ‘historic landscapes would only be sensitive to the potential for increases in the way in which sound and noise currently contribute to their heritage value. Using the criteria for the assessment of impacts set out in Appendix C, this would not be on a scale that would result in significant effects’.

We would advise that the proposed development could potentially have a harmful impact on the significance of historic landscapes, in terms of the impact of the views, lighting and noise on setting, and the way in which the historic landscape is experienced. This should, therefore, be included in the assessment (along with impact during construction), contra 7.4.10 and Table 7.2.

By following planning policy and guidance we would expect the project to be creative in how it might offer opportunities for the enhancement of heritage assets, and how the project might deliver public (heritage) benefit. The ES should aim to make clear public heritage benefits and outreach as part of planned mitigation.

We would advise the ES should put forward proposals for the use, display and interpretation of archaeological evidence that will be revealed by the development and to provide enhancement to heritage assets and secure wide heritage benefits as part of the scheme and we would be pleased to provide advice about potential heritage schemes.



Historic England

Yours sincerely,

Dr Jess Tipper MCifA FSA

Inspector of Ancient Monuments (Essex and Hertfordshire)

Email: Jess.Tipper@HistoricEngland.org.uk

From: [Plant Enquiries](#)
To: [A12cheilmsfordA120](#)
Subject: RE: TR010060 - Proposed A12 to A12 Widening Scheme - EIA Scoping Notification and Consultation
Date: 29 October 2020 09:12:48

Dear Sir/Madam,

Thank you for submitting your recent plant enquiry

Based on the information provided, I can confirm that Last Mile **does not** have any plant within the area(s) specified in your request

If you require further assistance with outstanding enquiries, please call 03300 587 443

Please ensure all plant enquiries are sent to plantenquiries@lastmile-uk.com

Regards

Michael Breslaw
The Planning Inspectorate
Planning Inspectorate
Temple Quay House
2 The Square, Temple Quay
Bristol
BS1 6PN

London Borough of Redbridge
Lynton House
255-259 High Rd,
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Civic Pride Enquiries and Complaints team

Please reply to:
Rogan Keown
Group Manager Transportation Strategy
02087083928
icw.information@redbridge.gov.uk
www.redbridge.gov.uk

Our ref: 10911709

Date: 11 November 2020

Dear Michael Breslaw

Environmental Information Regulations 2004

Thank you for your request for information received on 6 November 2020

Section 1 of the Freedom of Information Act 2000 provides two distinct but related rights of access to information which impose corresponding duties on public authorities. These are:

- The duty to inform the applicant whether or not information is held by the authority and, if so,
- The duty to communicate that information to the applicant.

Please see below a copy of your request and the information being released to you.

Request

TR010060 - Proposed A12 to A12 Widening Scheme - EIA Scoping Notification and Consultation

I confirm that LB Redbridge do not have any comments on the A12 Chelmsford to A120 Widening scheme Environmental Scoping Report.

Please quote the reference number 10911709 in any future communications.

If you are dissatisfied with the outcome or the handling of your request, you have the right to ask for an internal review. Internal review requests should be submitted within **20 working days** of the date of receipt of the response to your original email or letter and should be addressed to:

Information Officer, 7th Floor (front), Lynton House, High Road, Ilford, IG1 1NN or sent to icw.information@redbridge.gov.uk

If you are still dissatisfied with the Council's response after the internal review you have a right of appeal to the Information Commissioner at:

The Information Commissioner's Office
Wycliffe House
Water Lane
Wilmslow
Cheshire SK9 5AF.
Telephone: 01625 545 700
Website: www.ico.gov.uk

Although the London Borough of Redbridge has considered your request strictly in accordance with the Act, if any or all of the information provided is to be published or broadcast, we would like the opportunity to comment on the information provided, in so far as that publication or broadcast refers to, or in any way identifies, the London Borough of Redbridge before the information is published or broadcast. The London Borough of Redbridge's Press Office can be contacted on pressoffice@redbridge.gov.uk.

Yours faithfully

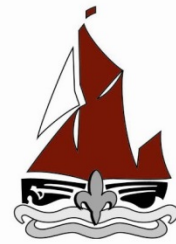
Rogan Keown
Group Manager Transportation Strategy

Date: 26 November 2020
Application Reference: 20/03144/PREAPP (our
reference) TR010060-000007 (your reference)

MALDON DISTRICT COUNCIL

Princes Road
Maldon
Essex CM9 5DL

www.maldon.gov.uk



The Planning Inspectorate
Environmental Services
Central Operations
Temple Quay House
2 The Square
Bristol
BS1 6PN



Enquiries to: Kathryn Mathews
Email: dc.planning@maldon.gov.uk

A12chelmsfordA120@planninginspectorate.gov.uk

Dear Sirs

Planning Act 2008 (as amended) and The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the EIA Regulations) – Regulations 10 and 11

Application by Highways England (the Applicant) for an Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme (the Proposed Development)

Scoping consultation and notification of the Applicant's contact details and duty to make available information to the Applicant if requested

Thank you for your consultation letter dated 28 October 2020, regarding the above.

The subject of the consultation is as follows:-

- Inform the Planning Inspectorate of the information Maldon District Council considers should be provided in the Environmental Statement; or
- Confirm that Maldon District Council do not have any comments.

Based on the contents of the Scoping Report submitted by Highways England and the advice obtained from the Council's Specialists – Environmental Health, I write to advise that Maldon District Council has the following comments to make on the content proposed for the Environmental Statement:

Air Quality

Paragraph 6.7.2: Any construction dust assessment should have regard to the IAQM guidance document: Assessment of dust from demolition and construction 2014

Paragraph 6.7.3: Any air quality assessment should have regard to the IAQM guidance document: Guidance on land-use planning and development control: Planning for air quality 2017

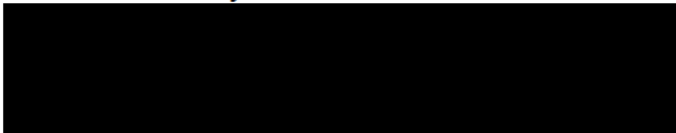
Noise and Vibration

Paragraph 12.3.12. Whilst DMRB may not provide a scale of values for sensitivity, that is no reason to not differentiate between the sensitivity of receptors. A hospital is inarguably more sensitive than a factory which in turn is different to a domestic dwelling. Maldon District Council expects for sensitivity to be differentiated with justification presented.

In paragraph 12.4.3 there is what appears to be a typographical error in the sentence “1. Does construction noise generated by the project have the potential to adversely affect any noise?” Clarification/correction is required.

The duty under Regulation 11(3) of the EIA Regulations to make available information in the possession of the Council which is considered relevant to the preparation of the ES, if so requested by the Applicant, is noted.

Yours faithfully



Michael Johnson
Lead Specialist - Development Management

From: [bull_andrew](#)
To: [A12chelmsfordA120](#)
Cc: [pol.cy_planning](#); [pring_stacy](#)
Subject: RE: TR010060 - Proposed A12 to A12 Widening Scheme - EIA Scoping Notification and Consultation
Date: 13 November 2020 08:40:30

Dear Sir / Madam

I am writing to confirm that Medway Council has no comments.

Kind regards
Andrew

Andrew Bull | Strategic Infrastructure Planner | Planning Service | Medway Council | **01634 331417** | Gun Wharf, Dock Road, Chatham, ME4 4TR

From: [Bron Curtis](#)
To: [A12chelmsfordA120](#)
Subject: Your ref TR010060-000007 Our ref DC/20/04868
Date: 04 November 2020 08:28:38
Attachments: [image001.png](#)

Good morning,

Thank you for consulting Babergh and Mid Suffolk District Councils on the EIA Scoping for the above proposed development.

I can confirm that the councils have no comment to make in respect of the content of the ES.

Kind regards,
Bron

Bron Curtis BA(Hons), MA, MRTPI
Principal Planning Officer, Strategic Projects and Delivery - Development Management **** Wednesdays and Thursdays only ****
Sustainable Communities
Mid Suffolk and Babergh District Councils - Working Together


Telephone: 07798522734

For general enquiries email: planningadmin@midsuffolk.gov.uk

Websites: www.babergh.gov.uk or www.midsuffolk.gov.uk

[Click Here](#) for the latest planning news and changes to the service coming up this year.



For our latest Coronavirus response please visit click the following link-
<https://www.midsuffolk.gov.uk/features/our-covid-19-response/>



Thank you for contacting us

We are working hard to keep services running safely to support and protect our residents, businesses, communities and staff through this period and beyond.

We will respond to your query as soon as possible. In the meantime, you can find the latest council information, including our response to Covid-19, on our website.



Emails sent to and from this organisation will be monitored in accordance with the law to ensure compliance with policies and to minimize any security risks. The information contained in this email or any of its attachments may be privileged or confidential and is intended for the exclusive use of the addressee. Any unauthorised use may be unlawful. If you receive this email by mistake, please advise the sender immediately by using the reply facility in your email software. Opinions, conclusions and other information in this email that do not relate to the official business of Babergh District Council and/or Mid Suffolk District Council shall be understood as neither given nor endorsed by Babergh District Council and/or Mid Suffolk District Council.

Babergh District Council and Mid Suffolk District Council (BMSDC) will be Data

Controllers of the information you are providing. As required by the Data Protection Act 2018 the information will be kept safe, secure, processed and only shared for those purposes or where it is allowed by law. In some circumstances however we may need to disclose your personal details to a third party so that they can provide a service you have requested, or fulfil a request for information. Any information about you that we pass to a third party will be held securely by that party, in accordance with the Data Protection Act 2018 and used only to provide the services or information you have requested. For more information on how we do this and your rights in regards to your personal information and how to access it, visit our website.



Ministry of Defence

Michael Breslaw
Planning Inspectorate
Environmental Services
Temple Quay House
2 The Square
Bristol, BS1 2PN

Defence Infrastructure Organisation

Safeguarding Department
Statutory & Offshore

Defence Infrastructure Organisation
Kingston Road
Sutton Coldfield
West Midlands
B75 7RL

Tel: 07970 171 309

E-mail: DIO-safeguarding-statutory@mod.gov.uk

www.mod.uk/DIO

Your Reference: TR010000-000007
Our reference:10049652

20 November 2020

Dear Mr Breslaw

MOD Safeguarding – East 2 WAM Network

Proposal: Road widening scheme

Location: From A12 Chelmsford to A120

**Grid References: E: 574102 – N: 208878 Chelmsford
E: 591822 – N: 223880 A120**

Thank you for consulting the Ministry of Defence (MOD) on the above proposed development which was received by this office on 29th October 2020.

Highways England is carrying out consultation on a proposed road widening scheme between the A12 Chelmsford and the A120 which would result in the widening, where necessary, of the A12 between Chelmsford (junction 19) and the A120 (junction 25) from two to three lanes in each direction, improvements to junction 19 and 25, the removal of junctions 20a, 20b and 23, the relocation of junctions 21, 22 and 24 to provide all movement junctions, and the creation of two bypasses.

Part of the route of the proposed improvements, specifically the section between Junction 19 and 20a (Hatfield Peverel South), passes through a statutory safeguarding area associated with the East 2 Wide Area Multilateration (WAM) network, part of the UK air traffic control system (approximate mid-point of A12 across East 2WAM to A120 is E:584203 – N:216841). Whilst it is appreciated that the works proposed for this section of the road consist of ancillary infrastructure improvements potentially signage and technology, there are concerns that the introduction of gantries or other structures might degrade the performance of the MOD technical asset. Once further details of the proposed scheme are available, the MOD request to be consulted again, so further assessments can be made.

In summary, at this stage the MOD wish to express concerns in response to this proposal and will provide further representations when additional information is available.

I trust this is clear, however if you do have any questions please do not hesitate to contact me.

Yours sincerely

A solid black rectangular box used to redact the signature of Debi Parker.

Debi Parker
Assistant Safeguarding Manager



Defence Infrastructure Organisation

EAST 2 - WAM NETWORK

BEDFORDSHIRE, CAMBRIDGESHIRE, ESSEX, GREATER LONDON, HERTFORDSHIRE, KENT, LINCOLNSHIRE, NORFOLK, NORTHAMPTONSHIRE, RUTLAND, SUFFOLK

PLAN T

TOWN AND COUNTRY PLANNING (SAFEGUARDED AERODROMES, TECHNICAL SITES AND MILITARY EXPLOSIVES STORAGE AREAS) DIRECTION 2002

MINISTRY OF DEFENCE (EAST 2 WAM NETWORK) TECHNICAL SITES DIRECTION 2020

1. The Secretary of State for Defence hereby certifies this map to be the safeguarding map referred to in the above mentioned Direction for the site known as East 2 WAM Network.

2. The Local Planning Authority are required to consult with the Ministry of Defence in accordance with the requirements of the said Direction in relation to any applications made to them for planning permission in respect of the following development within the safeguarding areas:

3. The appropriate office for the purpose of consultation is -

Defence Infrastructure Organisation, Safeguarding, Kingston Road, Sutton Coldfield, West Midlands, B75 7RL.

Authorised by the Secretary of State for Defence to sign in that behalf

24th day of February 2020



REFERENCE INFORMATION
M10 Boundary
Ordnance Datum Surface Outlines
Scale 1:205,000

IMPORTANT NOTE ABOUT SCALE
The scale also stated is accurate when reproduced at A1 size by Geopatial Services. Any other reproduction by conventional or electronic means is permitted from PDF. Any other scale of the map. Please check the dimensions of the grid to confirm any change in scale before taking measurements.

PRODUCTION REFERENCE
PLEASE ENSURE THAT THE MAP REFERENCE VERSION NUMBER ARE QUOTED IN ALL WRITTEN & VISUAL CORRESPONDENCE
Map Reference: 2076501 - East 2 WAM Network Plan T
Version Number:
Production Date: 20th January 2020
Checked By:
Drawn By:
Approved By: DIO/Essex/05/Safeguarding/1
Date: 20th January 2020
Date: 19th February 2020

GEOPIATIAL SERVICES
DATA ANALYTICS & INSIGHT
Defence Infrastructure Organisation
St George's House
Kingston Road
SUTTON COLDFIELD, B75 7RL
email: DIO Data-Geo-Svs@mod.uk

From: [Jefferies, Spencer](#)
To: [A12chelmsfordA120](#)
Subject: RE: EXT | TR010060 - Proposed A12 to A12 Widening Scheme - EIA Scoping Notification and Consultation
Date: 26 November 2020 16:29:13

To whom it may concern

This is a representation on behalf of National Grid Electricity Transmission plc (NGET) and National Grid Gas plc (NGG)
I can confirm that both NGET and NGG have apparatus in the vicinity of this proposed development. Therefore, please continue to consult with me in the future.

Kind Regards

Spencer Jefferies BSc AssocRTPI
Town Planner
Land Rights and Acquisitions, UK Land and Property
nationalgrid

+44 (0)7812651481
Spencer.jefferies@nationalgrid.com

National Grid House, (Floor C2), Warwick Technology Park, Gallows Hill, Warwick, CV34 6DA
nationalgrid.com | [Twitter](#) | [LinkedIn](#)

Please consider the environment before printing this email.

Advance notice of holiday:

Date: 25 November 2020
Our ref: 332147
Your ref: TR010060



Michael Breslaw
The Planning Inspectorate

BY EMAIL ONLY

Customer Services
Hornbeam House
Crewe Business Park
Electra Way
Crewe
Cheshire
CW1 6GJ

T 0300 060 3900

Dear Mr Breslaw

Environmental Impact Assessment Scoping consultation (Regulation 17 (3) (i) of the EIA Regulations 2017): A12 Chelmsford to A120 Widening Scheme

Thank you for seeking our advice on the scope of the Environmental Statement (ES) in your consultation which we received on 28 October 2020.

Natural England is a non-departmental public body. Our statutory purpose is to ensure that the natural environment is conserved, enhanced, and managed for the benefit of present and future generations, thereby contributing to sustainable development.

Case law¹ and guidance² has stressed the need for a full set of environmental information to be available for consideration prior to a decision being taken on whether or not to grant planning permission. Annex A to this letter provides Natural England's general advice on the scope of the Environmental Impact Assessment (EIA) for this development.

Natural England's pre-application Discretionary Advice Service (DAS)

Natural England has identified that this proposal may be suitable from benefitting from our pre-application advice service due to the proximity to designated sites of nature conservation, potential for green infrastructure gains and/or the potential for biodiversity enhancements. Through early engagement with Natural England customers will receive high-level customer service to support an efficient planning application process and achieve development which is more sustainable.

Through accessing our service customers will receive:

- Initial scoping advice on every case at no charge (unless already provided).
- The opportunity to access continued advice around our statutory conservation issues on a charged basis.
- Agreed timescales for responding to customer needs.
- An assigned local Natural England consultant for all pre-application advice.

The first step is for the applicant/consultant to fill out a simple '[Request Form](#)' and email it to consultations@naturalengland.org.uk so we can register interest and assign a local Natural England consultant.

If there are European Protected Species on site, Natural England offers a separate Pre-submission

¹ Harrison, J in *R. v. Cornwall County Council ex parte Hardy* (2001)

² *Note on Environmental Impact Assessment Directive for Local Planning Authorities* Office of the Deputy Prime Minister (April 2004) available from

<http://www.ebarchive.nationalarchives.gov.uk/+http://www.communities.gov.uk/planningandbuilding/planning/sustainability/environmental/environmentalimpactassessment/noteenvironmental/>

Screening Service (PPS) for planning proposals that will require a mitigation licence. More about this service can be found [here](#).

Please note that our pre-application advice is provided without prejudice to the consideration of any statutory consultation response or decision which may be made by Natural England in due course.

Should the proposal be amended in a way which significantly affects its impact on the natural environment then, in accordance with Section 4 of the Natural Environment and Rural Communities Act 2006, Natural England should be consulted again.

We would be happy to comment further should the need arise but if in the meantime you have any queries please do not hesitate to contact us. For any new consultations, or to provide further information on this consultation please send your correspondences to consultations@naturalengland.org.uk.

Yours sincerely

Camilla Davidge
Lead Advisor – Land Use Planning
West Anglia Area Team

Annex A – Advice related to EIA Scoping Requirements

1. General Principles

Schedule 4 of the Town & Country Planning (Environmental Impact Assessment) Regulations 2017, sets out the necessary information to assess impacts on the natural environment to be included in an ES, specifically:

- A description of the whole development – including physical characteristics and the full land use requirements of the site during construction and operational phases.
- Expected residues and emissions (water, air and soil pollution, noise, vibration, light, heat, radiation, etc.) resulting from the construction and operation of the proposed development.
- An assessment of alternatives and clear reasoning as to why the preferred option has been chosen, including a comparison of the environmental effects.
- A description of the relevant aspects of the current state of the environment (baseline scenario) and an outline of the likely evolution thereof without implementation of the development as far as natural changes from the baseline scenario can be assessed with reasonable effort on the basis of the availability of environmental information and scientific knowledge.
- A description of the aspects of the environment likely to be significantly affected by the development, including, in particular, population, fauna, flora, soil, water, air, climatic factors, material assets, including the architectural and archaeological heritage, landscape and the interrelationship between the above factors.
- A description of the likely significant effects of the development on the environment – this should cover direct effects but also any indirect, secondary, cumulative, transboundary, short, medium and long term, permanent and temporary, positive and negative effects. Effects should relate to the existence of the development, the use of natural resources and the emissions from pollutants. This should also include a description of the forecasting methods to predict the likely effects on the environment.
- A description of the measures envisaged to avoid, prevent, reduce and where possible offset any significant adverse effects on the environment and, where appropriate, of any proposed monitoring arrangements. This should include both the construction and operational phases.
- A description of the expected significant adverse effects of the development to the environment deriving from the vulnerability of the development to risks of major accidents and/or disasters that are relevant to the project concerned. Where appropriate, this description should include measures envisaged to prevent or mitigate the significant adverse effects of such events on the environment and details of the preparedness for and proposed response to such emergencies.
- A non-technical summary of the information.
- An indication of any difficulties (technical deficiencies or lack of know-how) encountered by the applicant in compiling the required information.

It will be important for any assessment to consider the potential cumulative effects of this proposal, including all supporting infrastructure, with other similar proposals and a thorough assessment of the 'in combination' effects of the proposed development with any existing developments and current applications. A full consideration of the implications of the whole scheme should be included in the ES. All supporting infrastructure should be included within the assessment.

2. Biodiversity and Geology

2.1 Ecological Aspects of an Environmental Statement

Natural England advises that the potential impact of the proposal upon features of nature conservation interest and opportunities for habitat creation/enhancement should be included within this assessment in accordance with appropriate guidance on such matters. Guidelines for Ecological Impact Assessment (EclA) have been developed by the Chartered Institute of Ecology and Environmental Management (CIEEM) and are available on their website.

EclA is the process of identifying, quantifying and evaluating the potential impacts of defined actions on ecosystems or their components. EclA may be carried out as part of the EIA process or to support other forms of environmental assessment or appraisal.

The National Planning Policy Framework sets out guidance in S.118 on how to take account of biodiversity interests in planning decisions and the framework that local authorities should provide to assist developers.

2.2 Internationally and Nationally Designated Sites

The ES should thoroughly assess the potential for the proposal to affect designated sites.

European sites (e.g. designated Special Areas of Conservation and Special Protection Areas) fall within the scope of the Conservation of Habitats and Species Regulations 2017. In addition paragraph 118 of the National Planning Policy Framework requires that potential Special Protection Areas, possible Special Areas of Conservation, listed or proposed Ramsar sites, and any site identified as being necessary to compensate for adverse impacts on classified, potential or possible SPAs, SACs and Ramsar sites be treated in the same way as classified sites.

Under Regulation 63 of the Conservation of Habitats and Species Regulations 2017 an appropriate assessment needs to be undertaken in respect of any plan or project which is (a) likely to have a significant effect on a European site (either alone or in combination with other plans or projects) and (b) not directly connected with or necessary to the management of the site.

Should a Likely Significant Effect on a European/Internationally designated site be identified or be uncertain, the competent authority (in this case the Local Planning Authority) may need to prepare an Appropriate Assessment, in addition to consideration of impacts through the EIA process.

Sites of Special Scientific Interest (SSSIs) and sites of European or international importance (Special Areas of Conservation, Special Protection Areas and Ramsar sites)

Natural England has recently published a set of mapped Impact Risk Zones (IRZs). The IRZs are a GIS tool developed by Natural England to make a rapid initial assessment of the potential risks posed by development proposals to: Sites of Special Scientific Interest (SSSIs), Special Areas of Conservation (SACs), Special Protection Areas (SPAs) and Ramsar sites. They define zones around each site which reflect the particular sensitivities of the features for which it is notified and indicate the types of development proposal which could potentially have adverse impacts.

This helpful GIS tool can be used by LPAs and developers to consider whether a proposed development is likely to affect a designated site. Further information and guidance on how to access and use the IRZs is available on the [Natural England website](#)

Marks Tey Brickpit SSSI is a geological site on the edge of the scheme, it is important that indirect (e.g. pollutant linkages) as well as direct impacts are considered (such as geological features of interest outside of the SSSI boundary). Information on SSSI's and their special interest features can be found at www.magic.gov. The Environmental Statement should include a full assessment of the direct and indirect effects of the development on the features of special interest within these sites and should identify such mitigation measures as may be required in order to avoid, minimise or reduce any adverse significant effects.

Natura 2000 network site conservation objectives are available on our internet site <http://publications.naturalengland.org.uk/category/6490068894089216>

Of main concern regarding European sites is the potential for air pollution and water pollution to indirectly impact the Essex Estuaries (and Colne and Blackwater estuaries) from both the works and for the increased traffic use following widening. You may find this document on road traffic emissions useful: <http://publications.naturalengland.org.uk/publication/4720542048845824>

We also suggest that the traffic modelling ensure that other notable European sites in the area (e.g. Epping Forest SAC) are checked to see if they may be affected, i.e. through identification of the 'Affected Road Network' ARN.

2.3 Regionally and Locally Important Sites

The EIA will need to consider any impacts upon local wildlife and geological sites. Local Sites are identified by the local wildlife trust, geoconservation group or a local forum established for the purposes of identifying and selecting local sites. They are of county importance for wildlife or geodiversity. The Environmental Statement should therefore include an assessment of the likely impacts on the wildlife and geodiversity interests of such sites. The assessment should include proposals for mitigation of any impacts and if appropriate, compensation measures. Contact the local wildlife trust, geoconservation group or local sites body in this area for further information.

2.4 Protected Species - Species protected by the Wildlife and Countryside Act 1981 (as amended) and by the Conservation of Habitats and Species Regulations 2017

The ES should assess the impact of all phases of the proposal on protected species (including, for example, great crested newts, reptiles, birds, water voles, badgers and bats). Natural England does not hold comprehensive information regarding the locations of species protected by law, but advises on the procedures and legislation relevant to such species. Records of protected species should be sought from appropriate local biological record centres, nature conservation organisations, groups and individuals; and consideration should be given to the wider context of the site for example in terms of habitat linkages and protected species populations in the wider area, to assist in the impact assessment.

The conservation of species protected by law is explained in Part IV and Annex A of Government Circular 06/2005 *Biodiversity and Geological Conservation: Statutory Obligations and their Impact within the Planning System*. The area likely to be affected by the proposal should be thoroughly surveyed by competent ecologists at appropriate times of year for relevant species and the survey results, impact assessments and appropriate accompanying mitigation strategies included as part of the ES.

In order to provide this information there may be a requirement for a survey at a particular time of year. Surveys should always be carried out in optimal survey time periods and to current guidance by suitably qualified and where necessary, licensed, consultants. Natural England has adopted [standing advice](#) for protected species which includes links to guidance on survey and mitigation.

2.5 Habitats and Species of Principal Importance

The ES should thoroughly assess the impact of the proposals on habitats and/or species listed as 'Habitats and Species of Principal Importance' within the England Biodiversity List, published under the requirements of S41 of the Natural Environment and Rural Communities (NERC) Act 2006. Section 40 of the NERC Act 2006 places a general duty on all public authorities, including local planning authorities, to conserve and enhance biodiversity. Further information on this duty is available here <https://www.gov.uk/guidance/biodiversity-duty-public-authority-duty-to-have-regard-to-conserving-biodiversity>.

Government Circular 06/2005 states that Biodiversity Action Plan (BAP) species and habitats, 'are capable of being a material consideration...in the making of planning decisions'. Natural England therefore advises that survey, impact assessment and mitigation proposals for Habitats and Species of Principal Importance should be included in the ES. Consideration should also be given to those species and habitats included in the relevant Local BAP.

Natural England advises that a habitat survey (equivalent to Phase 2) is carried out on the site, in order to identify any important habitats present. In addition, ornithological, botanical and invertebrate surveys should be carried out at appropriate times in the year, to establish whether any scarce or priority species are present. The Environmental Statement should include details of:

- Any historical data for the site affected by the proposal (e.g. from previous surveys);
- Additional surveys carried out as part of this proposal;
- The habitats and species present;
- The status of these habitats and species (e.g. whether priority species or habitat);
- The direct and indirect effects of the development upon those habitats and species;
- Full details of any mitigation or compensation that might be required.

The development should seek if possible to avoid adverse impact on sensitive areas for wildlife within the site, and if possible provide opportunities for overall wildlife gain.

The record centre for the relevant Local Authorities should be able to provide the relevant information on the location and type of priority habitat for the area under consideration.

2.6 Contacts for Local Records

Natural England does not hold local information on local sites, local landscape character and local or national biodiversity priority habitats and species. We recommend that you seek further information from the appropriate bodies (which may include the local records centre, the local wildlife trust, local geoconservation group or other recording society and a local landscape characterisation document).

We would direct you to the Essex Field club for environmental information for sound decision making: <http://www.essexfieldclub.org.uk/portal/p/Biological+Records+in+Essex+partnership>

3. Environmental Net Gain

We would encourage ambitions towards environmental net gain. Development provides opportunities to secure net gains for biodiversity and wider environmental gains, as outlined in the NPPF (paragraphs 8, 72, 102, 118, 170, 171, 174 and 175). We advise you to follow the mitigation hierarchy as set out in paragraph 175 of the NPPF and firstly consider what existing environmental features on and around the site can be retained or enhanced or what new features could be incorporated into the development proposal. Where onsite measures are not possible, you should consider off site measures.

You could also consider how the proposed development can contribute to the wider environment and help implement elements of any Landscape, Green Infrastructure or Biodiversity Strategy in place in your area. For example:

- Links to existing greenspace and/or opportunities to enhance and improve access.
- Identifying opportunities for new greenspace and managing existing (and new) public spaces to be more wildlife friendly (e.g. by sowing wild flower strips)
- Planting additional street trees.
- Identifying any improvements to the existing public right of way network or using the opportunity of new development to extend the network to create missing links.
- Restoring neglected environmental features (e.g. coppicing a prominent hedge that is in poor condition or clearing away an eyesore).

A recent meeting with the development team appeared to suggest that the project had a negative biodiversity net gain 'target'. NSIP schemes such as this present strategic important opportunities to positively contribute to the biodiversity of the area, which are likely to be felt for generations to come. Natural England expects this project to deliver net gain ambitions commensurate with the scale and nature of the project, and will be happy to work with you to maximise the opportunities arising.

4. Designated Landscapes and Landscape Character

Nationally Designated Landscapes

For development sites within/adjacent to nationally designated landscapes (National Park or Area of Outstanding Natural Beauty (AONB)) consideration should be given to the direct and indirect effects upon the designated landscape and in particular the effect upon its purpose for designation within the environmental impact assessment, as well as the content of any relevant management plan.

Landscape and visual impacts

Natural England would wish to see details of local landscape character areas mapped at a scale appropriate to the development site as well as any relevant management plans or strategies pertaining to the area. The EIA should include assessments of visual effects on the surrounding

area and landscape together with any physical effects of the development, such as changes in topography. The European Landscape Convention places a duty on Local Planning Authorities to consider the impacts of landscape when exercising their functions.

The EIA should include a full assessment of the potential impacts of the development on local landscape character using [landscape assessment methodologies](#). We encourage the use of Landscape Character Assessment (LCA), based on the good practice guidelines produced jointly by the Landscape Institute and Institute of Environmental Assessment in 2013. LCA provides a sound basis for guiding, informing and understanding the ability of any location to accommodate change and to make positive proposals for conserving, enhancing or regenerating character, as detailed proposals are developed.

Natural England supports the publication *Guidelines for Landscape and Visual Impact Assessment*, produced by the Landscape Institute and the Institute of Environmental Assessment and Management in 2013 (3rd edition). The methodology set out is almost universally used for landscape and visual impact assessment.

In order to foster high quality development that respects, maintains, or enhances, local landscape character and distinctiveness, Natural England encourages all new development to consider the character and distinctiveness of the area, with the siting and design of the proposed development reflecting local design characteristics and, wherever possible, using local materials. The Environmental Impact Assessment process should detail the measures to be taken to ensure the building design will be of a high standard, as well as detail of layout alternatives together with justification of the selected option in terms of landscape impact and benefit.

The assessment should also include the cumulative effect of the development with other relevant existing or proposed developments in the area. In this context Natural England advises that the cumulative impact assessment should include other proposals currently at Scoping stage. Due to the overlapping timescale of their progress through the planning system, cumulative impact of the proposed development with those proposals currently at Scoping stage would be likely to be a material consideration at the time of determination of the planning application.

The assessment should refer to the relevant [National Character Areas](#) which can be found on our website. Links for Landscape Character Assessment at a local level are also available on the same page.

Heritage Landscapes

You should consider whether there is land in the area affected by the development which qualifies for conditional exemption from capital taxes on the grounds of outstanding scenic, scientific or historic interest. An up-to-date list may be obtained at www.hmrc.gov.uk/heritage/lbsearch.htm.

5. Access and Recreation

Natural England encourages any proposal to incorporate measures to help encourage people to access the countryside for quiet enjoyment. Measures such as reinstating existing footpaths together with the creation of new footpaths and bridleways are to be encouraged. Links to other green networks and, where appropriate, urban fringe areas should also be explored to help promote the creation of wider green infrastructure. Relevant aspects of local authority green infrastructure strategies should be incorporated where appropriate.

Rights of Way, Access land, Coastal access and National Trails

The EIA should consider potential impacts on National Trails, access land, public open land, rights of way and coastal access routes in the vicinity of the development. The National Trails website www.nationaltrail.co.uk provides information including contact details for the National Trail Officer. Appropriate mitigation measures should be incorporated for any adverse impacts. We also recommend reference to the relevant Right of Way Improvement Plans (ROWIP) to identify public rights of way within or adjacent to the proposed site that should be maintained or enhanced.

6. Soil and Agricultural Land Quality

Impacts from the development should be considered in light of the Government's policy for the protection of the best and most versatile (BMV) agricultural land as set out in paragraph 112 of the NPPF. We also recommend that soils should be considered under a more general heading of sustainable use of land and the ecosystem services they provide as a natural resource in line with paragraph 109 of the NPPF.

Soil and Agricultural Land Quality

Soil is a finite resource that fulfils many important functions and services (ecosystem services) for society, for example as a growing medium for food, timber and other crops, as a store for carbon and water, as a reservoir of biodiversity and as a buffer against pollution. It is therefore important that the soil resources are protected and used sustainably.

The applicant should consider the following issues as part of the Environmental Statement:

1. The degree to which soils are going to be disturbed/harmed as part of this development and whether 'best and most versatile' agricultural land is involved.

This may require a detailed survey if one is not already available. For further information on the availability of existing agricultural land classification (ALC) information see www.magic.gov.uk. Natural England Technical Information Note 049 - [Agricultural Land Classification: protecting the best and most versatile agricultural land](#) also contains useful background information.

2. If required, an agricultural land classification and soil survey of the land should be undertaken. This should normally be at a detailed level, eg one auger boring per hectare, (or more detailed for a small site) supported by pits dug in each main soil type to confirm the physical characteristics of the full depth of the soil resource, ie 1.2 metres.
3. The Environmental Statement should provide details of how any adverse impacts on soils can be minimised. Further guidance is contained in the [Defra Construction Code of Practice for the Sustainable Use of Soil on Development Sites](#).

7. Air Quality

Air quality in the UK has improved over recent decades but air pollution remains a significant issue; for example over 97% of sensitive habitat area in England is predicted to exceed the critical loads for ecosystem protection from atmospheric nitrogen deposition ([England Biodiversity Strategy](#), Defra 2011). A priority action in the England Biodiversity Strategy is to reduce air pollution impacts on biodiversity. The planning system plays a key role in determining the location of developments which may give rise to pollution, either directly or from traffic generation, and hence planning decisions can have a significant impact on the quality of air, water and land. The assessment should take account of the risks of air pollution and how these can be managed or reduced. Further information on air pollution impacts and the sensitivity of different habitats/designated sites can be found on the Air Pollution Information System (www.apis.ac.uk). Further information on air pollution modelling and assessment can be found on the Environment Agency website.

8. Climate Change Adaptation

The [England Biodiversity Strategy](#) published by Defra establishes principles for the consideration of biodiversity and the effects of climate change. The ES should reflect these principles and identify how the development's effects on the natural environment will be influenced by climate change, and how ecological networks will be maintained. The NPPF requires that the planning system should contribute to the enhancement of the natural environment 'by establishing coherent ecological networks that are more resilient to current and future pressures' ([NPPF](#) Para 109), which should be demonstrated through the ES.

9. Cumulative and in-combination effects

A full consideration of the implications of the whole scheme should be included in the ES. All supporting infrastructure should be included within the assessment.

The ES should include an impact assessment to identify, describe and evaluate the effects that are likely to result from the project in combination with other projects and activities that are being, have been or will be carried out. The following types of projects should be included in such an assessment, (subject to available information):

- a. existing completed projects;
- b. approved but uncompleted projects;
- c. ongoing activities;
- d. plans or projects for which an application has been made and which are under consideration by the consenting authorities; and
- e. plans and projects which are reasonably foreseeable, i.e. projects for which an application has not yet been submitted, but which are likely to progress before completion of the development and for which sufficient information is available to assess the likelihood of cumulative and in-combination effects.

From: [Vicki Enston](#) on behalf of [ONR Land Use Planning](#)
To: [A12chelmstordA120](#)
Subject: RE: TR010060 - Proposed A12 to A12 Widening Scheme - EIA Scoping Notification and Consultation
Date: 06 November 2020 08:01:08
Attachments: [image003.png](#)

Good Morning

Thank you for your email dated 28th October 2020

This application is not within an ONR Land Use Planning consultation zone, therefore ONR have no comment to make

You can find information concerning our Land Use Planning consultation process here: (<http://www.onr.org.uk/land-use-planning.htm>)

Kind regards

Vicki

Vicki Enston
Regulatory Officer
Land Use Planning
Emergency Preparedness & Response
Office for Nuclear Regulation

T: 07786 557 304 | E: ONR-Land-use-planning@onr.gov.uk



The Office for Nuclear Regulation's mission is to provide efficient and effective regulation of the nuclear industry, holding it to account on behalf of the public.

Website: www.onr.org.uk **Twitter:** [@ONRpressoffice](https://twitter.com/ONRpressoffice)



Public Health
England

Environmental Hazards and
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Centre for Radiation, Chemical and
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Your Ref: TR010060-000007.

Our Ref: 55379

Mr Michael Breslaw
EIA Advisor
The Planning Inspectorate.
Temple Quay House
2 The Square
Bristol, BS1 6PN

26th November 2020

Dear Mr Breslaw,

**Nationally Significant Infrastructure Project.
A12 Chelmsford to A120 Widening Scheme. TR010060-000007.
Scoping Consultation Stage.**

Thank you for including Public Health England (PHE) in the scoping consultation phase of the above application. Advice offered by PHE is impartial and independent.

PHE exists to protect and improve the nation's health and wellbeing and reduce health inequalities; these two organisational aims are reflected in the way we review and respond to Nationally Significant Infrastructure Project (NSIP) applications.

The health of an individual or a population is the result of a complex interaction of a wide range of different determinants of health, from an individual's genetic make-up, to lifestyles and behaviours, and the communities, local economy, built and natural environments to global ecosystem trends. All developments will have some effect on the determinants of health, which in turn will influence the health and wellbeing of the general population, vulnerable groups and individual people. Although assessing impacts on health beyond direct effects from for example emissions to air or road traffic incidents is complex, there is a need to ensure a proportionate assessment focused on an application's significant effects.

Having considered the submitted scoping report we wish to make the following specific comments and recommendations:

Environmental Public Health

We understand that the promoter will wish to avoid unnecessary duplication and that many issues including air quality, emissions to water, waste, contaminated land etc. will be covered elsewhere in the Environmental Statement (ES). We believe the summation of relevant issues into a specific section of the report provides a focus which ensures that public health is given adequate consideration. The section should summarise key information, risk assessments, proposed mitigation measures, conclusions and residual impacts, relating to human health. Compliance with

the requirements of National Policy Statements and relevant guidance and standards should also be highlighted.

In terms of the level of detail to be included in an ES, we recognise that the differing nature of projects is such that their impacts will vary. The attached appendix summarises PHE's requirements and recommendations regarding the content of and methodology used in preparing the ES. Please note that where impacts relating to health and/or further assessments are scoped out, promoters should fully explain and justify this within the submitted documentation.

Recommendation

Our position is that pollutants associated with road traffic, particularly particulate matter and oxides of nitrogen are non-threshold; i.e., an exposed population is likely to be subject to potential harm at any level and that reducing public exposures of non-threshold pollutants (such as particulate matter and nitrogen dioxide) below air quality standards will have potential public health benefits. We support approaches which minimise or mitigate public exposure to non-threshold air pollutants, address inequalities (in exposure), maximise co-benefits (such as physical exercise). We encourage their consideration during development design, environmental and health impact assessment, and development consent.

Noise

As the application is for a highway development, we have included guidance on the effects of noise on public health and wellbeing in Appendix B.

Our guidance pertaining to noise is informed by the recommendations in the 2018 Environmental Noise Guidelines for the European Union published by the World Health Organization (WHO) and high-quality systematic reviews of the scientific evidence.

Human Health and Wellbeing

This section of PHE's scoping response, identifies the wider determinants of health and wellbeing we expect the ES to address, to demonstrate whether they are likely to give rise to significant effects. PHE has focused its approach on scoping determinants of health and wellbeing under four themes, which have been derived from an analysis of the wider determinants of health mentioned in the National Policy Statements. The four themes are:

- Access
- Traffic and Transport
- Socioeconomic
- Land Use

Having considered the submitted scoping report PHE wish to make the following specific comments and recommendations:

Methodology - Temporal scope and reporting

The proposed 4-year construction timeline results in the need for very clear reporting on the temporal impacts and effects on the local population. In this context "temporary" impacts can extend over long periods, but the scoping report does not comment on how the temporal scope will be defined.

Recommendation

The reporting within the PEIR should ensure a consistent, transparent and accurate approach to the reporting of temporary effects.

Population and human health

The scoping report does not identify any aspects to be scoped out of the assessment for population and human health. The list of wider determinants to be scoped into the ES, by the applicant, are very broad descriptions and each will contain an important range of potential impacts on health and wellbeing.

Should the applicant wish to scope out any of these determinants the PEIR must provide adequate justification in accordance with the Planning Inspectorate Advice Note 7 (Environmental Impact Assessment: Process, Preliminary Environmental Information and Environmental Statements).

Mental health

The scoping report accepts the broad definition of health proposed by the WHO and we welcome the specific reference to mental health. Mental well-being is fundamental to achieving a healthy, resilient and thriving population. It underpins healthy lifestyles, physical health, educational attainment, employment and productivity, relationships, community safety and cohesion and quality of life. A scheme of this scale and nature has impacts on the over-arching protective factors, which are:

- Enhancing control
- Increasing resilience and community assets
- Facilitating participation and promoting inclusion.

Recommendation

There should be parity between mental and physical health, and any assessment of health impact should include the appreciation of both. A systematic approach to the assessment of the effects on mental health, including suicide, is required.

The PEIR should reference the methodology used to complete assessments for the effects on mental health and wellbeing. The Mental Well-being Impact Assessment (MWIA), could be used as a methodology. The assessment should identify vulnerable populations and provide clear mitigation strategies that are adequately linked to any local services or assets

Vulnerable populations

An approach to the identification of vulnerable populations was not provided as part of the health baseline data. The impacts on health and wellbeing and health inequalities of the scheme may have particular effect on vulnerable or disadvantaged populations, including those that fall within the list of protected characteristics.

Recommendation

The assessments and findings of the ES and any Equalities Impact Assessment should be cross referenced between the two documents, particularly to ensure the comprehensive assessment of potential impacts for health and inequalities and where resulting mitigation measures are mutually supportive.

Baseline data should define and identify vulnerable populations which may be affected by the scheme. In addition to health data this should encompass deprivation, demographics and other socio-economic factors.

Physical activity and active travel / access to open space

The scoping report identifies how non-motorised user (NMU) will be impacted through the loss or change in formal Public Rights of Way (PRoW), open space and the existing road network. Active travel forms an important part in helping to promote healthy weight environments and as such it is important that any changes have a positive long-term impact where possible. Changes to NMU routes have the potential to impact on usage, create displacement to other routes and potentially lead to increased road traffic collisions.

We welcome the scheme's opportunity to enhance the existing infrastructure that supports active travel and physical activity. We expect the proposal to contribute to improved provision for active travel, physical activity and access to green space.

It is important to ensure that any impact on tranquillity in open spaces is considered.

Recommendations

The overall risk to NMU/WCH (walking cycling and horse-riders) and impact on active travel should be considered on a case-by-case basis, taking into account, the number and type of users and the effect that the temporary traffic management system will have on their journey and safety.

Any traffic counts and assessment should also, as far as reasonably practicable, identify informal routes used by NMU or potential routes used due to displacement.

The final ES should identify the temporary traffic management system design principles or standards that will be maintained with specific reference to NMU. This may be incorporated within the Code of Construction Practice.

The scheme should continue to identify any additional opportunities to contribute to improved infrastructure provision for active travel and physical activity. This is particularly relevant to the de-trunking stretches of the A12.

Yours sincerely

For and on behalf of Public Health England
nsipconsultations@phe.gov.uk

Please mark any correspondence for the attention of National Infrastructure Planning Administration.

Appendix A: PHE recommendations regarding the scoping document- Environmental Public Health, Electromagnetic Fields (EMF) and Health and Wellbeing aspects.

Introduction

The Planning Inspectorate's Advice Note 11: Working with Public Bodies covers many of the generic points of interaction relevant to the Planning Inspectorate and Public Health England (PHE). The purpose of this Annex is to help applicants understand the issues that PHE expect to see addressed by applicants preparing an Environmental Statement (ES) as part of their Nationally Significant Infrastructure Planning (NSIP) submission.

We have included a comprehensive outline of the type of issues we would expect to be considered as part of an NSIP which falls under the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the EIA Regulations). PHE encourages applicants to contact us as early in the process as possible if they wish to discuss or clarify any matters relating to chemical, poison, radiation or wider public health.

General Information on Public Health England

PHE was established on 1 April 2013 to bring together public health specialists from more than 70 organisations into a single public health service. We are an executive agency of the Department of Health and are a distinct delivery organisation with operational autonomy to advise and support government, local authorities and the National Health Service (NHS) in a professionally independent manner.

We operate from 8 local centres, plus an integrated region and centre for London, and 4 regions (North of England, South of England, Midlands and East of England, and London). We work closely with public health professionals in Wales, Scotland and Northern Ireland, and internationally.¹ We have specialist teams advising on specific issues such as the potential impacts of chemicals, air quality, ionising and non-ionising radiation and other factors which may have an impact on public health, as well as on broader issues such as the wider determinants of health, health improvement and health inequalities.

PHE's NSIP related roles and responsibilities and geographical extent

PHE is a statutory consultee in the NSIP process for any *applications likely to involve chemicals, poisons or radiation which could potentially cause harm to people and are likely to affect significantly public health.*² PHE will consider the potential significant effects (direct and indirect) of a proposed development on population and human health and the impacts from chemicals, radiation and environmental hazards.

Under certain circumstances PHE may provide comments on ionising radiation to/on behalf of the Scottish Parliament. If a proposer is submitting a planning application in Scotland which may require advice on radiation you are recommended to contact the appropriate Scottish Planning Authority for advice on how to proceed.

In the case of applications in Wales, PHE remains a statutory consultee but the regime applies to a more limited range of development types. For NSIP applications likely to affect land in Wales, an applicant should still consult PHE but, additionally will be required to consult the Welsh Ministers.

Role of Public Health England and NSIP with respect to Environmental Impact Assessments

PHE has a statutory role as a consultation body under the EIA Regulations. Where an applicant has requested a scoping opinion from the Planning Inspectorate³ in relation to a proposed NSIP, PHE will be consulted by the Planning Inspectorate about the scope, and level of detail, of the

¹ <https://www.gov.uk/government/organisations/public-health-england/about#priorities>

² The Infrastructure Planning (Interested Parties and Miscellaneous Prescribed Provisions) Regulations 2015

³ The scoping process is administered and undertaken by the Planning Inspectorate on behalf of the Secretary of State

information to be provided in the ES and will be under a duty to make information available to the applicant. PHE's standard recommendations in response to EIA scoping consultations are below.

PHE also encourages applicants to discuss with them the scope of the ES at an early stage to explore, for example, whether careful site selection or other design issues could minimise or eliminate public health impacts or to outline the requirement for, scope and methodology of any assessments related to public health.

PHE's recommendations to applicants regarding Environmental Impact Assessments General approach

Applicants are reminded that Section 5(2)(a) of the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 specifically includes a requirement that the EIA must identify, describe and assess in an appropriate manner, in light of each individual case, the direct and indirect significant effects of the proposed development on population and human health.

PHE is of the opinion that this requirement encompasses the wider determinants of public health, as well as chemicals, poisons and radiation. Further information on PHE's recommendations and requirements is included below.

It is the role of the applicant to prepare the ES. PHE provides advice relating to EIA within this document and during the NSIP consultation stages.

When preparing an ES the applicant should give consideration to best practice guidance such as the Government's Handbook for scoping projects: environmental impact assessment⁴, IEMA Guide to Delivering Quality Developments⁵, and Guidance: on Environmental Impact Assessment⁶

The Planning Inspectorate's Advice Note Seven: Environmental Impact Assessment: Process, Preliminary Environmental Information and Environmental Statements also provide guidance to applicants and other persons with interest in the EIA process as it relates to NSIPs. It is important that the submitted ES identifies and assesses the potential public health impacts of the activities at, and emissions from, the development.

PHE understands that there may be separate sections of the ES covering the assessment of impacts on air, land, water and so on, but expects an ES to include a specific section summarising potential impacts on population and health. This section should bring together and interpret the information from other assessments as necessary. The health and population impacts section should address the following steps.

1. Screening: Identify and significant effects.
 - a. Summarise the methodologies used to identify health impacts, assess significance and sources of information
 - b. Evaluate any reference standards used in carrying out the assessment and in evaluating health impacts (e.g., environmental quality standards)
 - c. Where the applicant proposes the 'scoping out' of any effects a clear rationale and justification should be provided along with any supporting evidence.

2. Baseline Survey:

⁴ <https://www.gov.uk/government/publications/handbook-for-scoping-projects-environmental-impact-assessment>

⁵ <https://www.iema.net/assets/newbuild/documents/Delivering%20Quality%20Development.pdf>

⁶ <https://www.gov.uk/guidance/environmental-impact-assessment#the-purpose-of-environmental-impact-assessment>

- a. Identify information needed and available, Evaluate quality and applicability of available information
 - b. Undertake assessment
3. Alternatives:
- a. Identify and evaluate any realistic alternative locations, routes, technology etc.
4. Design and assess possible mitigation
- a. Consider and propose suitable corrective actions should mitigation measures not perform as effectively predicted.
5. Impact Prediction: Quantify and Assess Impacts:
- a. Evaluate and assess the extent of any positive and negative effects of the development. Effects should be assessed in terms of likely health outcomes, including those relating to the wider determinants of health such as socio-economic outcomes, in addition to health outcomes resulting from exposure to environmental hazards. Mental health effects should be included and given equivalent weighting to physical effects.
 - b. Clearly identify any omissions, uncertainties and dependencies (e.g., air quality assessments being dependant on the accuracy of traffic predictions)
 - c. Evaluate short-term impacts associated with the construction and development phase
 - d. Evaluate long-term impacts associated with the operation of the development
 - e. Evaluate any impacts associated with decommissioning
 - f. Evaluate any potential cumulative impacts as a result of the development, currently approved developments which have yet to be constructed, and proposed developments which do not currently have development consent
6. Monitoring and Audit (not a statutory requirement)
- a. Identify key modelling predictions and mitigation impacts and consider implementing monitoring and audit to assess their accuracy / effectiveness.

Any assessments undertaken to inform the ES should be proportionate to the potential impacts of the proposal, therefore we accept that, in some circumstances particular assessments may not be relevant to an application, or that an assessment may be adequately completed using a qualitative rather than quantitative methodology. In cases where this decision is made, the applicant should fully explain and justify their rationale in the submitted documentation.

Consideration of alternatives (including alternative sites, choice of process, and the phasing of construction) is widely regarded as good practice. Ideally, the EIA process should start at the stage of site selection, so that the environmental merits of practicable alternatives can be properly considered. Where this is undertaken, the main alternatives considered should be outlined in the ES⁷.

Human and environmental receptors

The applicant should clearly identify the development's location and the location and distance from the development of off-site human receptors that may be affected by emissions from, or activities at, the development. Off-site human receptors may include people living in residential premises; people working in commercial, and industrial premises and people using transport infrastructure (such as roads and railways), recreational areas, and publicly-accessible land.

Identify and consider impacts on residential areas and sensitive receptors (such as schools, nursing homes and healthcare facilities, as well as other vulnerable population groups such as those who are young, older, with disabilities or long-term conditions, or on low incomes) in the area(s) which

⁷ DCLG guidance, 1999 <http://www.communities.gov.uk/documents/planningandbuilding/pdf/155958.pdf>

may be affected by emissions, this should include consideration of any new receptors arising from future development

Consideration should also be given to environmental receptors such as the surrounding land, watercourses, surface and groundwater, and drinking water supplies such as wells, boreholes and water abstraction points.

Impacts arising from construction and decommissioning

Any assessment of impacts arising from emissions or activities due to construction and decommissioning should consider potential impacts on all receptors and describe monitoring and mitigation during these phases. Construction and decommissioning will be associated with vehicle movements and cumulative impacts should be accounted for.

We would expect the applicant to follow best practice guidance during all phases from construction to decommissioning to ensure appropriate measures are in place to mitigate any potential negative impact on health from emissions (point source, fugitive and traffic-related) and activities. An effective Construction Environmental Management Plan (CEMP) (and Decommissioning Environmental Management Plan (DEMP)) will help provide reassurance that activities are well managed. The applicant should ensure that there are robust mechanisms in place to respond to any complaints made during construction, operation, and decommissioning of the facility.

Emissions to air and water

Significant impacts are unlikely to arise from industrial installations which employ Best Available Techniques (BAT) and which meet regulatory requirements concerning emission limits and design parameters. However, PHE has a number of comments regarding the assessment of emissions from any type of development in order that the ES provides a comprehensive assessment of potential impacts.

When considering a baseline (of existing environmental quality) and in the assessment and future monitoring of impacts these should:

- include appropriate screening assessments and detailed dispersion modelling where this is screened as necessary
- encompass the combined impacts of all pollutants which may be emitted by the development with all pollutants arising from associated development and transport, considered in a single holistic assessment (ie, of overall impacts)
- include Chemical Abstract Service (CAS) numbers alongside chemical names, where referenced in the ES
- consider the construction, operational, and decommissioning phases
- consider the typical operational emissions and emissions from start-up, shut-down, abnormal operation and accidents when assessing potential impacts and include an assessment of worst-case impacts
- fully account for fugitive emissions
- include appropriate estimates of background levels
 - when assessing the human health risk of a chemical emitted from a facility or operation, background exposure to the chemical from other sources should be taken into account
- identify cumulative and incremental impacts (ie, assess cumulative impacts from multiple sources), including those arising from associated development, other existing and proposed development in the local area, and new vehicle movements associated with the proposed development; associated transport emissions should include consideration of non-road impacts (ie, rail, sea, and air)
- include consideration of local authority, Environment Agency, Natural Resources Wales, Defra national network, and any other local site-specific sources of monitoring data
- compare predicted environmental concentrations to the applicable standard or guideline value for the affected medium. Where available, the most recent UK standards for the appropriate

media (ie, air, water, and/or soil) and health-based guideline values should be used when quantifying the risk to human health from chemical pollutants

- where UK standards or guideline values are not available, use those recommended by the European Union or World Health Organization:
 - If no standard or guideline value exists, the predicted exposure to humans should be estimated and compared to an appropriate health-based value (eg, a Tolerable Daily Intake or equivalent)
 - This should consider all applicable routes of exposure (eg, include consideration of aspects such as the deposition of chemicals emitted to air and their uptake via ingestion)
- when quantitatively assessing the health risk of genotoxic and carcinogenic chemical pollutants, PHE does not favour the use of mathematical models to extrapolate from high dose levels used in animal carcinogenicity studies to well below the observed region of a dose-response relationship. When only animal data are available, we recommend that the 'Margin of Exposure' (MOE) approach¹ is used
- identify and consider impacts on residential areas and sensitive receptors (such as schools, nursing homes and healthcare facilities) in the area(s) which may be affected by emissions. This should include consideration of any new receptors arising from future development

Whilst screening of impacts using qualitative methodologies is common practice (eg, for impacts arising from fugitive emissions such as dust), where it is possible to undertake a quantitative assessment of impacts then this should be undertaken.

PHE's view is that the applicant should appraise and describe the measures that will be used to control both point source and fugitive emissions and demonstrate that standards, guideline values or health-based values will not be exceeded due to emissions from the installation, as described above. This should include consideration of any emitted pollutants for which there are no set emission limits. When assessing the potential impact of a proposed installation on environmental quality, predicted environmental concentrations should be compared to the permitted concentrations in the affected media; this should include both standards for short and long-term exposure. Further to assessments of compliance with limit values, for non-threshold pollutants (ie, those that have no threshold below which health effects do not occur) the **benefits** of development options which reduce population exposure should be evaluated.

Additional points specific to emissions to air

When considering baseline conditions (of existing air quality) and the assessment and future monitoring of impacts, these should include:

- consideration of impacts on existing areas of poor air quality e.g. existing or proposed local authority Air Quality Management Areas (AQMAs)
- modelling using appropriate meteorological data (i.e. come from the nearest suitable meteorological station and include a range of years and worst-case conditions)
- modelling taking into account local topography, congestion and acceleration
- evaluation of the public health **benefits** of development options which reduce air pollution – even below limit values – as pollutants such as nitrogen dioxide and particulate matter show no threshold below which health effects do not occur

Additional points specific to emissions to water

When considering baseline conditions (of existing water quality) and the assessment and future monitoring of impacts, these should:

- include assessment of potential impacts on human health and not focus solely on ecological impacts
- identify and consider all routes by which emissions may lead to population exposure (e.g., surface watercourses, recreational waters, sewers, geological routes etc.)
- assess the potential off-site effects of emissions to groundwater (eg, on aquifers used for drinking water) and surface water (used for drinking water abstraction) in terms of the potential for population exposure

- include consideration of potential impacts on recreational users (eg, from fishing, canoeing etc.) alongside assessment of potential exposure via drinking water

Land quality

We would expect the applicant to provide details of any hazardous contamination present on site (including ground gas) as part of a site condition report.

Emissions to and from the ground should be considered in terms of the previous history of the site and the potential of the site, once operational, to give rise to issues. Public health impacts associated with ground contamination and/or the migration of material off-site should be assessed⁸ and the potential impact on nearby receptors and control and mitigation measures should be outlined.

Relevant areas outlined in the Government's Good Practice Guide for EIA include:

- effects associated with ground contamination that may already exist
- effects associated with the potential for polluting substances that are used (during construction / operation) to cause new ground contamination issues on a site, for example introducing / changing the source of contamination
- impacts associated with re-use of soils and waste soils, for example, re-use of site-sourced materials on-site or offsite, disposal of site-sourced materials offsite, importation of materials to the site, etc.

Waste

The applicant should demonstrate compliance with the waste hierarchy (e.g. with respect to re-use, recycling or recovery and disposal).

For wastes arising from the development the ES should assess:

- the implications and wider environmental and public health impacts of different waste disposal options
- disposal route(s) and transport method(s) and how potential impacts on public health will be mitigated

If the development includes wastes delivered to the installation:

- Consider issues associated with waste delivery and acceptance procedures (including delivery of prohibited wastes) and should assess potential off-site impacts and describe their mitigation

Other aspects

Within the ES, PHE would expect to see information about how the applicant would respond to accidents with potential off-site emissions (e.g., flooding or fires, spills, leaks or releases off-site). Assessment of accidents should: identify all potential hazards in relation to construction, operation and decommissioning; include an assessment of the risks posed; and identify risk management measures and contingency actions that will be employed in the event of an accident in order to mitigate off-site effects.

PHE would expect the applicant to consider the COMAH Regulations (Control of Major Accident Hazards) and the Major Accident Off-Site Emergency Plan (Management of Waste from Extractive Industries) (England and Wales) Regulations: both in terms of their applicability to the development itself, and the development's potential to impact on, or be impacted by, any nearby installations themselves subject to these Regulations.

There is evidence that, in some cases, perception of risk may have a greater impact on health than the hazard itself. A 2009 report⁹, jointly published by Liverpool John Moores University and the Health Protection Agency (HPA), examined health risk perception and environmental problems

⁸ Following the approach outlined in the section above dealing with emissions to air and water i.e. comparing predicted environmental concentrations to the applicable standard or guideline value for the affected medium (such as Soil Guideline Values)

⁹ Available from: <http://www.cph.org.uk/wp-content/uploads/2012/08/health-risk-perception-and-environmental-problems--summary-report.pdf>

using a number of case studies. As a point to consider, the report suggested: “*Estimation of community anxiety and stress should be included as part of every risk or impact assessment of proposed plans that involve a potential environmental hazard. This is true even when the physical health risks may be negligible.*” PHE supports the inclusion of this information within ES’ as good practice.

Electromagnetic fields (EMF)

This advice relates to electrical installations such as substations and connecting underground cables or overhead lines. PHE advice on the health effects of power frequency electric and magnetic fields is available on the Gov.UK website.¹⁰

There is a potential health impact associated with the electric and magnetic fields around substations, overhead power lines and underground cables. The field strengths tend to reduce with distance from such equipment.

The following information provides a framework for considering the health impact associated with the electric and magnetic fields produced by the proposed development, including the direct and indirect effects of the electric and magnetic fields as indicated above.

Policy Measures for the Electricity Industry

A voluntary code of practice is published which sets out key principles for complying with the ICNIRP guidelines.¹¹

Companion codes of practice dealing with optimum phasing of high voltage power lines and aspects of the guidelines that relate to indirect effects are also available.^{12,13}

Exposure Guidelines

PHE recommends the adoption in the UK of the EMF exposure guidelines published by the International Commission on Non-ionizing Radiation Protection (ICNIRP). Formal advice to this effect, based on an accompanying comprehensive review of the scientific evidence, was published in 2004 by the National Radiological Protection Board (NRPB), one of PHE’s predecessor organisations¹⁴

Updates to the ICNIRP guidelines for static fields have been issued in 2009 and for low frequency fields in 2010. However, Government policy is that the ICNIRP guidelines are implemented as expressed in the 1999 EU Council Recommendation on limiting exposure of the general public (1999/519/EC):¹⁵

Static magnetic fields

For static magnetic fields, the ICNIRP guidelines published in 2009 recommend that acute exposure of the general public should not exceed 400 mT (millitesla), for any part of the body, although the previously recommended value of 40 mT is the value used in the Council Recommendation. However, because of potential indirect adverse effects, ICNIRP recognises that practical policies need to be implemented to prevent inadvertent harmful exposure of people with implanted electronic medical devices and implants containing

¹⁰ <https://www.gov.uk/government/collections/electromagnetic-fields#low-frequency-electric-and-magnetic-fields>

¹¹ https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/37447/1256-code-practice-emf-public-exp-guidelines.pdf

¹² https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/48309/1255-code-practice-optimum-phasing-power-lines.pdf

¹³ https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/224766/powerlines_vcop_microshocks.pdf

¹⁴

<http://webarchive.nationalarchives.gov.uk/20140629102627/http://www.hpa.org.uk/Publications/Radiation/NPRBArchive/DocumentsOfTheNRPB/Absd1502/>

¹⁵ http://webarchive.nationalarchives.gov.uk/+www.dh.gov.uk/en/PublicHealth/Healthprotection/DH_4089500

ferromagnetic materials, and injuries due to flying ferromagnetic objects, and these considerations can lead to much lower restrictions, such as 0.5 mT.

Power frequency electric and magnetic fields

At 50 Hz, the known direct effects include those of induced currents in the body on the central nervous system (CNS) and indirect effects include the risk of painful spark discharge on contact with metal objects exposed to electric fields. The ICNIRP guidelines published in 1998 give reference levels for public exposure to 50 Hz electric and magnetic fields, and these are respectively 5 kV m⁻¹ (kilovolts per metre) and 100 µT (microtesla). The reference level for magnetic fields changes to 200 µT in the revised (ICNIRP 2010) guidelines because of new basic restrictions based on induced electric fields inside the body, rather than induced current density. If people are not exposed to field strengths above these levels, direct effects on the CNS should be avoided and indirect effects such as the risk of painful spark discharge will be small. The reference levels are not in themselves limits but provide guidance for assessing compliance with underlying basic restrictions and reducing the risk of indirect effects.

Long term effects

There is concern about the possible effects of long-term exposure to electromagnetic fields, including possible carcinogenic effects at levels much lower than those given in the ICNIRP guidelines. In the NRPB advice issued in 2004, it was concluded that the studies that suggest health effects, including those concerning childhood leukaemia, could not be used to derive quantitative guidance on restricting exposure. However, the results of these studies represented uncertainty in the underlying evidence base, and taken together with people's concerns, provided a basis for providing an additional recommendation for Government to consider the need for further precautionary measures, particularly with respect to the exposure of children to power frequency magnetic fields.

The Stakeholder Advisory Group on ELF EMFs (SAGE)

The Stakeholders Advisory Group on ELF EMF's (SAGE) was set up to explore the implications for a precautionary approach to extremely low frequency electric and magnetic fields (ELF EMFs), and to make practical recommendations to Government:¹⁶

Relevant here is SAGE's 2007 First Interim Assessment, which makes several recommendations concerning high voltage power lines. Government supported the implementation of low cost options such as optimal phasing to reduce exposure; however it did not support the option of creating corridors around power lines in which development would be restricted on health grounds, which was considered to be a disproportionate measure given the evidence base on the potential long term health risks arising from exposure. The Government response to SAGE's First Interim Assessment is available on the national archive website.¹⁷

The Government also supported calls for providing more information on power frequency electric and magnetic fields, which is available on the PHE web pages.

Ionising radiation

Particular considerations apply when an application involves the possibility of exposure to ionising radiation. In such cases it is important that the basic principles of radiation protection recommended by the International Commission on Radiological Protection¹⁸ (ICRP) are followed. PHE provides advice on the application of these recommendations in the UK. The ICRP recommendations are implemented in the Euratom Basic Safety Standards¹⁹ (BSS) and these form the basis for UK

¹⁶ <http://www.emfs.info/policy/sage/>

¹⁷

http://webarchive.nationalarchives.gov.uk/20130107105354/http://www.dh.gov.uk/en/Publicationsandstatistics/Publications/PublicationsPolicyAndGuidance/DH_107124

¹⁸ These recommendations are given in publications of the ICRP notably publications 90 and 103 see the website at <http://www.icrp.org/>

¹⁹ Council Directive 96/29/EURATOM laying down basic safety standards for the protection of the health of workers and the general public against the dangers arising from ionising radiation.

legislation, including the Ionising Radiation Regulations 1999, the Radioactive Substances Act 1993, and the Environmental Permitting Regulations 2016.

As part of the EIA process PHE expects applicants to carry out the necessary radiological impact assessments to demonstrate compliance with UK legislation and the principles of radiation protection. This should be set out clearly in a separate section or report and should not require any further analysis by PHE. In particular, the important principles of justification, optimisation and radiation dose limitation should be addressed. In addition compliance with the Euratom BSS and UK legislation should be clear.

When considering the radiological impact of routine discharges of radionuclides to the environment PHE would, as part of the EIA process, expect to see a full radiation dose assessment considering both individual and collective (population) doses for the public and, where necessary, workers. For individual doses, consideration should be given to those members of the public who are likely to receive the highest exposures (referred to as the representative person, which is equivalent to the previous term, critical group).

Different age groups should be considered as appropriate and should normally include adults, 1 year old and 10 year old children. In particular situations doses to the fetus should also be calculated²⁰.

The estimated doses to the representative person should be compared to the appropriate radiation dose criteria (dose constraints and dose limits), taking account of other releases of radionuclides from nearby locations as appropriate. Collective doses should also be considered for the UK, European and world populations where appropriate.

The methods for assessing individual and collective radiation doses should follow the guidance given in 'Principles for the Assessment of Prospective Public Doses arising from Authorised Discharges of Radioactive Waste to the Environment August 2012'²¹

It is important that the methods used in any radiological dose assessment are clear and that key parameter values and assumptions are given (for example, the location of the representative persons, habit data and models used in the assessment).

Any radiological impact assessment, undertaken as part of the EIA, should also consider the possibility of short-term planned releases and the potential for accidental releases of radionuclides to the environment. This can be done by referring to compliance with the Ionising Radiation Regulations and other relevant legislation and guidance.

The radiological impact of any solid waste storage and disposal should also be addressed in the assessment to ensure that this complies with UK practice and legislation; information should be provided on the category of waste involved (e.g. very low level waste, VLLW). It is also important that the radiological impact associated with the decommissioning of the site is addressed.

Of relevance here is PHE advice on radiological criteria and assessments for land-based solid waste disposal facilities²². PHE advises that assessments of radiological impact during the operational phase should be performed in the same way as for any site authorised to discharge radioactive waste. PHE also advises that assessments of radiological impact during the post

²⁰ HPA (2008) Guidance on the application of dose coefficients for the embryo, fetus and breastfed infant in dose assessments for members of the public. Doc HPA, RCE-5, 1-78, available at

<https://www.gov.uk/government/publications/embryo-fetus-and-breastfed-infant-application-of-dose-coefficients>

²¹ The Environment Agency (EA), Scottish Environment Protection Agency (SEPA), Northern Ireland Environment Agency, Health Protection Agency and the Food Standards Agency (FSA).

Principles for the Assessment of Prospective Public Doses arising from Authorised Discharges of Radioactive Waste to the Environment August 2012.

https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/296390/geho1202bklh-e-e.pdf

²² HPA RCE-8, Radiological Protection Objectives for the Land-based Disposal of Solid Radioactive Wastes, February 2009

operational phase of the facility should consider long timescales (possibly in excess of 10,000 years) that are appropriate to the long-lived nature of the radionuclides in the waste, some of which may have half-lives of millions of years.

The radiological assessment should consider exposure of members of hypothetical representative groups for a number of scenarios including the expected migration of radionuclides from the facility, and inadvertent intrusion into the facility once institutional control has ceased.

For scenarios where the probability of occurrence can be estimated, both doses and health risks should be presented, where the health risk is the product of the probability that the scenario occurs, the dose if the scenario occurs and the health risk corresponding to unit dose.

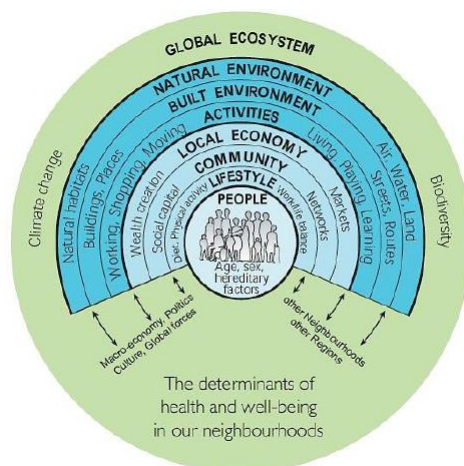
For inadvertent intrusion, the dose if the intrusion occurs should be presented. It is recommended that the post-closure phase be considered as a series of timescales, with the approach changing from more quantitative to more qualitative as times further in the future are considered.

The level of detail and sophistication in the modelling should also reflect the level of hazard presented by the waste. The uncertainty due to the long timescales means that the concept of collective dose has very limited use, although estimates of collective dose from the 'expected' migration scenario can be used to compare the relatively early impacts from some disposal options if required.

Wider Determinants of Health

World Health Organization (WHO's) defines health as "a state of complete physical, mental and social well-being and not merely an absence of disease or infirmity" (WHO, 1948).

The health of an individual or a population is the result of a complex interaction of a wide range of different determinants of health, from an individual's genetic make-up, to lifestyles and behaviours, and the communities, local economy, built and natural environments to global ecosystem trends. All developments will have some effect on the determinants of health, which in turn will influence the health and wellbeing of the general population, vulnerable groups and individual people.



Barton and Grant²³

PHE recognises that evaluating an NSIP's impacts on health through the wider determinants is more complex than assessing a project's direct impacts against clearly defined regulatory protections (e.g. protected species). However, this does not mean that their assessment should be side-lined; with the 2017 EIA Regulations clarifying that the likely significant effects of a development proposal on human health must be assessed.

²³ Barton H, Grant M. A health map for the local human habitat. The Journal of the Royal Society for the Promotion of Health 2006; 126(6): 252-3.

We accept that the relevance of these topics and associated impacts will vary depending on the nature of the proposed development and in order to assist applicants PHE has focused its approach on scoping determinants of health and wellbeing under four themes, which have been derived from an analysis of the wider determinants of health mentioned in the National Policy Statements. PHE has developed a list of 21 determinants of health and wellbeing under four broad themes, which have been derived from an analysis of the wider determinants of health mentioned in the National Policy Statements (NPS). If the applicant proposes to scope any areas out of the assessment, they should provide clear reasoning and justification.

The four themes are:

- Access
- Traffic and Transport
- Socioeconomic
- Land Use

Methodology

PHE will expect assessments to set out the methodology used to assess each determinant included in the scope of the assessment. In some instances, the methodologies described may be established and refer to existing standards and/or guidance. In other instances, there may be no pre-defined methodology, which can often be the case for the wider determinants of health; as such there should be an application of a logical impact assessment method that:

- identifies effected populations vulnerable to impacts from the relevant determinant
- establishes the current baseline situation
- identifies the NSIP's potential direct and indirect impacts on each population
- if impacts are identified, evaluates whether the potential impact is significant in relation to the affected population
- identifies appropriate mitigation to minimise impacts or the subsequent effects on health
- identifies opportunities to achieve benefits from the scheme
- identifies appropriate monitoring programmes

Currently there is no standard methodology for assessing the population and human health effects of infrastructure projects, but a number of guides exist, including:

- Institute of Environmental Management and Assessment, 2017: Health in Environmental Assessment, a primer for a proportionate approach;
- NHS London Healthy Urban Development Unit (HUDU), 2015. Healthy Urban Planning Checklist and Rapid Health Impact Assessment Tool;
- Wales Health Impact Assessment Unit, 2012: HIA a practical guide;
- National Mental Wellbeing Impact Assessment Development Unit 2011: Mental Wellbeing Impact Assessment Toolkit;

Determining significant effects

Neither the EIA regulations nor the National Policy Statements provide a definition of what constitutes a 'significant' effect, and so PHE have derived a list of factors which it will take into consideration in the assessment of significance of effects, as outlined below. these list of factors should be read in conjunction with guidance from the above guides.

1. Sensitivity:

Is the population exposed to the NSIP at particular risk from effects on this determinant due to pre-existing vulnerabilities or inequalities (for example, are there high numbers in the local population of people who are young, older, with disabilities or long-term conditions, or on a low income)? Will the NSIP widen existing inequalities or introduce new inequalities in relation to this determinant?

2. Magnitude:

How likely is the impact on this determinant to occur? If likely, will the impact affect a large number of people / Will the impact affect a large geographic extent? Will the effects be frequent or continuous? Will the effects be temporary or permanent and irreversible?

3. Cumulative effects:

Will the NSIP's impacts on this determinant combine with effects from other existing or proposed NSIPs or large-scale developments in the area, resulting in an overall cumulative effect different to that of the project alone?

What are the cumulative effects of the impacts of the scheme on communities or populations. Individual impacts individually may not be significant but in combination may produce an overall significant effect.

4. Importance:

Is there evidence for the NSIP's effect on this determinant on health? Is the impact on this determinant important in the context of national, regional or local policy?

5. Acceptability:

What is the local community's level of acceptance of the NSIP in relation to this determinant? Do the local community have confidence that the applicants will promote positive health impacts and mitigate against negative health effects?

6. Opportunity for mitigation:

If this determinant is included in the scope for the EIA is there an opportunity to enhance any positive health impacts and/or mitigate any negative health impacts?

Scoping

The scoping report may determine that some of the wider determinants considered under human and population health can be scoped out of the EIA. If that, should be the case, detailed rationale and supporting evidence for any such exclusions must be provided. PHE will expect an assessment to have considered all of the determinants listed in Table1 of Appendix 1 as a minimum.

Vulnerable groups

Certain parts of the population may experience disproportionate negative health effects as a result of a development. Vulnerable populations can be identified through research literature, local population health data or from the identification of pre-existing health conditions that increase vulnerability.

The on health and wellbeing and health inequalities of the scheme will have particular effect on vulnerable or disadvantaged populations, including those that fall within the list of protected characteristics. Some protected groups are more likely to have elevated vulnerability associated with social and economic disadvantages. Consideration should be given to language or lifestyles that influence how certain populations are affected by impacts of the proposal, for example non-English speakers may face barriers to accessing information about the works or expressing their concerns.

Equality Impact Assessments (EqIA) are used to identify disproportionate effects on Protected Groups (defined by the Equality Act, 2010), including health effects. The assessments and findings of the Environmental Statement and the EqIA should be cross reference between the two documents, particularly to ensure the assessment of potential impacts for health and inequalities and that resulting mitigation measures are mutually supportive.

The Wales Health Impact Assessment Support Unit (WHIASU), provides a suggested list of vulnerable groups

Age related groups

- Children and young people
- Older people

Income related groups

- People on low income
- Economically inactive

- Unemployed/workless
- People who are unable to work due to ill health

Groups who suffer discrimination or other social disadvantage

- People with physical or learning disabilities/difficulties
- Refugee groups
- People seeking asylum
- Travellers
- Single parent families
- Lesbian and gay and transgender people
- Black and minority ethnic groups
- Religious groups

Geographical groups

- People living in areas known to exhibit poor economic and/or health indicators
- People living in isolated/over-populated areas
- People unable to access services and facilities

Mental health

PHE supports the use of the broad definition of health proposed by the World Health Organisation (WHO). Mental well-being is fundamental to achieving a healthy, resilient and thriving population. It underpins healthy lifestyles, physical health, educational attainment, employment and productivity, relationships, community safety and cohesion and quality of life. NSIP schemes can be of such scale and nature that will impact on the over-arching protective factors, which are:

- Enhancing control
- Increasing resilience and community assets
- Facilitating participation and promoting inclusion.

There should be parity between mental and physical health, and any assessment of health impact should include the appreciation of both. A systematic approach to the assessment of the impacts on mental health, including suicide, is required. The **Mental Well-being Impact Assessment (MWIA)** could be used as a methodology. The assessment should identify vulnerable populations and provide clear mitigation strategies that are adequately linked to any local services or assets

Perceptions about the proposed scheme may increase the risk of anxiety or health effects by perceived effects. “Estimation of community anxiety and stress should be included as part of every risk or impact assessment of proposed plans that involve a potential environmental hazard.

Evidence base and baseline data

An assessment should be evidence based, using published literature to identify determinants and likely health effects. The strength of evidence identifying health effects can vary, but where the evidence for an association is weak it should not automatically be discounted.

There will be a range of publicly available health data including:

- National datasets such as those from the Office of National Statistics,
- Public Health England (PHE), including the fingertips data sets,
- Non-governmental organisations,
- Local public health reports, such as the Joint Strategic Needs Assessment, Health and Wellbeing Strategies;
- Consultation with local authorities, including local authority public health teams;
- Information received through public consultations

Mitigation

If the assessment has identified that significant negative effects are likely to occur with respect to the wider determinants of health, the assessment should include a description of planned mitigation measures the applicant will implement to avoid or prevent effects on the population.

Mitigation and/or monitoring proposals should be logical, feasible and have a clear governance and accountability framework indicating who will be responsible for implementation and how this will be secured during the construction and/or operation of the NSIP.

Positive benefits from the scheme

The scale of many NSIP developments will generate the potential for positive impacts on health and wellbeing; however, delivering such positive health outcomes often requires specific enabling or enhancement measures. For example, the construction of a new road network to access an NSIP site may provide an opportunity to improve the active transport infrastructure for the local community. PHE expects developments to consider and report on the opportunity and feasibility of positive impacts. These may be stand alone or be considered as part of the mitigation measures.

Monitoring

PHE expects an assessment to include consideration of the need for monitoring. It may be appropriate to undertake monitoring where:

- Critical assumptions have been made
- There is uncertainty about whether negative impacts are likely to occur as it may be appropriate to include planned monitoring measures to track whether impacts do occur.
- There is uncertainty about the potential success of mitigation measures
- It is necessary to track the nature of the impact and provide useful and timely feedback that would allow action to be taken should negative impacts occur

Appendix 1

Table 1 – Wider determinants of health and wellbeing

Health and wellbeing themes			
Access	Traffic and Transport	Socioeconomic	Land Use
Wider determinants of health and wellbeing			
<p>Access to :</p> <ul style="list-style-type: none"> • local public and key services and facilities. • Good quality affordable housing. • Healthy affordable food. • The natural environment. • The natural environment within the urban environment. • Leisure, recreation and physical activities within the urban and natural environments. 	<ul style="list-style-type: none"> • Accessibility. • Access to/by public transport. • Opportunities for access by cycling and walking. • Links between communities. • Community severance. • Connections to jobs. • Connections to services, facilities and leisure opportunities. 	<ul style="list-style-type: none"> • Employment opportunities, including training opportunities. • Local business activity. • Regeneration. • Tourism and leisure industries. • Community/social cohesions and access to social networks. • Community engagement. 	<ul style="list-style-type: none"> • Land use in urban and/or /rural settings. • Quality of Urban and natural environments

1) **Access**

a. Access to local, public and key services and facilities

Access to local facilities can increase mobility and social participation. Body mass index is significantly associated with access to facilities, including factors such as the mix and density of facilities in the area. The distance to facilities has no or only a small effect on walking and other physical activities. Access to recreational facilities can increase physical activity, especially walking for recreation, reduce body weight, reduce the risk of high blood pressure, and reduce the number of vehicle trips, the distances travelled and greenhouse gas emissions.

Local services include health and social care, education, employment, and leisure and recreation. Local facilities include community centres, shops, banks/credit unions and Post Offices. Services and facilities can be operated by the public, private and/or voluntary sectors. Access to services and facilities is important to both physical and mental health and wellbeing. Access is affected by factors such as availability,

proximity to people's place of residence, existence of transport services or active travel infrastructure to the location of services and facilities, and the quality of services and facilities.

The construction or operation of an NSIP can affect access adversely: it may increase demand and therefore reduce availability for the existing community; during construction, physical accessibility may be reduced due to increased traffic and/or the blockage of or changes to certain travel routes. It is also possible that some local services and facilities are lost due to the land-take needed for the NSIP.

Conversely if new routes are built or new services or facilities provided the NSIP may increase access. NSIPs relating to utilities such as energy and water can maintain, secure or increase access to those utilities, and thereby support health and wellbeing.

b. Access to good-quality affordable housing

Housing refurbishment can lead to an improvement in general health and reduce health inequalities. Housing improvements may also benefit mental health. The provision of diverse forms and types of housing is associated with increased physical activity. The provision of affordable housing is strongly associated with improved safety perceptions in the neighbourhood, particularly among people from low-income groups. For vulnerable groups, the provision of affordable housing can lead to improvements in social, behavioural and health related outcomes. For some people with long term conditions, the provision of secure and affordable housing can increase engagement with healthcare services, which can lead to improved health-related outcomes. The provision of secure and affordable housing can also reduce engagement in risky health-related behaviours. For people who are homeless, the provision of affordable housing increases engagement with healthcare services, improves quality of life and increases employment, and contributes to improving mental health.

Access to housing meets a basic human need, although housing of itself is not necessarily sufficient to support health and wellbeing: it is also important that the housing is of good quality and affordable. Factors affecting the quality of housing include energy efficiency (eg effective heating, insulation), sanitation and hygiene (eg toilet and bathroom), indoor air quality including ventilation and the presence of damp and/or mould, resilience to climate change, and overcrowding. The affordability of housing is important because for many people, especially people on a low income, housing will be the largest monthly expense; if the cost of housing is high, people may not be able to meet other needs such as the need for heating in winter or food. Some proposals for NSIPs include the provision of housing, which could be beneficial for the health and wellbeing of the local population. It is also possible that some housing will be subject to a compulsory purchase order due to the land-take needed for an NSIP.

c. Access to affordable healthy food

Access to healthy food is related to the provision of public and active transport infrastructure and the location and proximity of outlets selling healthier food such as fruit and vegetables. For the general population, increased access to healthy, affordable food through a variety of outlets (shops, supermarkets, farmers' markets and community gardens) is associated with improved dietary behaviours, including attitudes towards healthy eating and food purchasing behaviour, and improved adult weight. Increased access to unhealthier food retail outlets is associated with increased weight in the general population and increased obesity and unhealthy eating behaviours among children living in low-income areas. Urban agriculture can improve attitudes towards healthier food and increase fruit and vegetable consumption.

Factors affecting access to healthy affordable food include whether it is readily available from local shops, supermarkets, markets or delivery schemes and/or there are opportunities to grow food in local allotments or community gardens. People in environments where there is a high proportion of fast food outlets may not have easy access to healthy affordable food.

d. Access to the natural environment

Availability of and access to safe open green space is associated with increased physical activity across a variety of behaviours, social connectedness, childhood development, reduced risk of overweight and obesity and improved physical and mental health outcomes. While the quantity of green space in a neighbourhood helps to promote physical activity and is beneficial to physical health, eg lower rates of mortality from cardiovascular disease and respiratory disease in men, the availability of green environments is likely to contribute more to mental health than to physical health: the prevalence of some disease clusters, particularly anxiety and depression, is lower in living environments which have more green space within a 1-km radius.

The proximity, size, type, quality, distribution, density and context of green space are also important factors. Quality of green space may be a better predictor of health than quantity, and any type of green space in a neighbourhood does not necessarily act as a venue for, or will encourage, physical activity. 'Walkable' green environments are important for better health, and streetscape greenery is as strongly related to self-reported health as green areas. Residents in deprived areas are more likely to perceive access to green space as difficult, to report poorer safety, to visit the green space less frequently and to have lower levels of physical activity. The benefits to health and wellbeing of blue space include lower psychological distress.

The natural environment includes the landscape, waterscape and seascape. Factors affecting access include the proximity of the natural environment to people's place of residence, the existence of public transport services or active travel infrastructure to the natural environment, the quality of the natural environment and feelings of safety in the natural environment. The construction of an NSIP may be an opportunity to provide green and/or blue infrastructure in the local area. It is also possible that green or blue infrastructure will be lost due to the land-take needed for the NSIP.

e. Access to the natural environment within the urban environment

Public open spaces are key elements of the built environment. Ecosystem services through the provision of green infrastructure are as important as other types of urban infrastructure, supporting physical, psychological and social health, although the quality and accessibility of green space affects its use, C19, ethnicity and perceptions of safety. Safe parks may be particularly important for promoting physical activity among urban adolescents. Proximity to urban green space and an increased proportion of green space are associated with decreased treatment of anxiety/mood disorders, the benefits deriving from both participation in usable green space near to home and observable green space in the neighbourhood. Urban agriculture may increase opportunities for physical activity and social connections.

A view of 'greenery' or of the sea moderates the annoyance response to noise. Water is associated with positive perceptive experiences in urban environments, with benefits for health such as enhanced contemplation, emotional bonding, participation and physical activity. Increasing biodiversity in urban environments, however, may promote the introduction of vector or host organisms for infectious pathogens, eg green connectivity may potentiate the role of rats and ticks in the spread of disease, and bodies of water may provide habitats for mosquitoes. Owing to economic growth,

population size and urban and industrial expansion in the EU, to maintain ecosystem services at 2010 levels, for every additional percentage increase in the proportion of 'artificial' land, there needs to be a 2.2% increase in green infrastructure.

The natural environment within the urban environment includes the provision of green space and blue space in towns and cities. Factors involved in access include the proximity of the green and/or blue space to people's place of residence, the existence of transport services or active travel infrastructure to the green and/or blue space, the quality of the green and/or blue space and feelings of safety when using the green and/or blue space. The construction of an NSIP may be an opportunity to provide green and/or blue infrastructure in the local urban environment. It is also possible that green or blue infrastructure in the urban environment will be lost due to the land-take needed for the NSIP.

- f. Access to leisure, recreation and physical activity opportunities within the urban and natural environments.

Access to recreational opportunities, facilities and services is associated with risk factors for long-term disease; it can increase physical activity, especially walking for recreation, reduce body mass index and overweight and obesity, reduce the risk of high blood pressure, and reduce the number of vehicle trips, the distances travelled and greenhouse gas emissions. It can also enhance social connectedness. Children tend to play on light-traffic streets, whereas outdoor activities are less common on high-traffic streets. A perception of air pollution can be a barrier to participating in outdoor physical activity. There is a positive association between urban agriculture and increased opportunities for physical activity and social connectivity. Gardening in an allotment setting can result in many positive physical and mental health-related outcomes. Exercising in the natural environment can have a positive effect on mental wellbeing when compared with exercising indoors.

Leisure and recreation opportunities include opportunities that are both formal, such as belonging to a sports club, and informal, such as walking in the local park or wood. Physical activity opportunities include routine activity as part of daily life, such as walking or cycling to work, and activity as part of leisure or recreation, such as playing football. The construction of an NSIP may enhance the opportunities available for leisure and recreation and physical activity through the provision of new or improved travel routes, community infrastructure and/or green or blue space. Conversely, construction may reduce access through the disruption of travel routes to leisure, recreation and physical activity opportunities.

2) **Traffic and Transport**

- a. Accessibility

Walkability, regional accessibility, pavements and bike facilities are positively associated with physical activity and negatively related to body weight and high blood pressure, and reduce the number of vehicle trips, the distances travelled and greenhouse gas emissions. Body mass index is associated with street network accessibility and slope variability.

Accessibility in relation to transport and travel has several aspects including whether potential users can gain physical access to the infrastructure and access to the services the infrastructure provides. The design and operation of transport infrastructure and the associated services should take account of the travel needs of all potential users including people with limited mobility. People whose specific needs should be considered include pregnant women, older people, children and young

people and people with a disability. Other aspects of transport infrastructure affecting accessibility include safety and affordability, both of which will affect people's ability to travel to places of employment and/or key local services and facilities and/or access their social networks.

b. Access to / by public transport

Provision of high-quality public transport is associated with higher levels of active travel among children and among people commuting to work, with a decrease in the use of private cars. Combining public transport with other forms of active travel can improve cardiovascular fitness. Innovative or new public transport interventions may need to be marketed and promoted differently to different groups of transport users, eg by emphasising novelty to car users while ensuring that the new system is seen by existing users as coherently integrated with existing services.

Transport facilitates access to other services, facilities and amenities important to health and wellbeing. Public transport is any transport open to members of the public including bus, rail and taxi services operated by the public, private or community sectors. For people who do not have access to private transport, access to public transport is important as the main agency of travel especially for journeys >1 mile. Access to public transport is not sufficient, however, and access by public transport needs to be taken into account: public transport services should link places where people live with the destinations they need or want to visit such as places of employment, education and healthcare, shops, banks and leisure facilities. Other aspects of access to public transport include affordability, safety, frequency and reliability of services.

c. Opportunities for / access by cycling & walking

Walking and cycling infrastructure can enhance street connectivity, helping to reduce perceptions of long-distance trips and providing alternative routes for active travel. Prioritising pedestrians and cyclists through changes in physical infrastructure can have positive behavioural and health outcomes, such as physical activity, mobility and cardiovascular outcomes. The provision and proximity of active transport infrastructure is also related to other long-term disease risk factors, such as access to healthy food, social connectedness and air quality. The perception of air pollution, however, appears to be a barrier to participating in active travel.

Perceived or objective danger may also have an adverse effect on cycling and walking, both of which activities decrease with increasing traffic volume and speed, and cycling for leisure decreases as local traffic density increases. Health gains from active travel policies outweigh the adverse effects of road traffic incidents. New infrastructure to promote cycling, walking and the use of public transport can increase the time spent cycling on the commute to work, and the overall time spent commuting among the least-active people. Active travel to work or school can be associated with body mass index and weight, and may reduce cardiovascular risk factors and improve cardiovascular outcomes. The distance of services from cycle paths can have an adverse effect on cycling behaviour, whereas mixed land use, higher densities and reduced distances to non-residential destinations promote transportation walking.

d. Links between communities

Social connectedness can be enhanced by the provision of public and active transport infrastructure and the location of employment, amenities, facilities and services.

e. Community severance

In neighbourhoods with high volumes of traffic, the likelihood of people knowing and trusting neighbours is reduced.

f. Connections to jobs

The location of employment opportunities and the provision of public and active transportation infrastructure are associated with risk factors for long-term disease such as physical activity. Good pedestrian and cycling infrastructure can promote commuting physical activity. Improved transport infrastructure has the potential to shift the population distribution of physical activity in relation to commuting, although a prerequisite may be a supportive social environment. Mixed land use, higher densities and reduced distances to non-residential destinations promote transportation walking.

The ease of access to employment, shops and services including the provision of public and active transport are important considerations and schemes should take any opportunity to improve infrastructure to promote cycling, walking and the use of public transport

g. Connections to services, facilities and leisure opportunities

Mixed land use, higher densities and reduced distances to non-residential destinations promote transportation walking. Access to recreational opportunities and the location of shops and services are associated with risk factors for long-term disease such as physical activity, access to healthy food and social connectedness. Increased distance of services from cycle paths can have an adverse effect on cycling behaviour.

3) **Socio Economic**

a. Employment opportunities including training opportunities

Employment is generally good for physical and mental health and well-being, and worklessness is associated with poorer physical and mental health and well-being. Work can be therapeutic and can reverse the adverse health effects of unemployment for healthy people of working age, many disabled people, most people with common health problems and social security beneficiaries. Account must be taken of the nature and quality of work and its social context and jobs should be safe and accommodating. Overall, the beneficial effects of work outweigh the risks of work and are greater than the harmful effects of long-term unemployment or prolonged sickness absence. Employment has a protective effect on depression and general mental health.

Transitions from unemployment to paid employment can reduce the risk of distress and improve mental health, whereas transitions into unemployment are psychologically distressing and detrimental to mental health. The mental health benefits of becoming employed are also dependent on the psychosocial quality of the job, including level of control, demands, complexity, job insecurity and level of pay: transition from unemployment to a high-quality job is good for mental health, whereas transition from unemployment to a low-quality job is worse for mental health than being unemployed. For people receiving social benefits, entry into paid employment can improve quality of life and self-rated health (physical, mental, social) within a short time-frame. For people receiving disability benefits, transition into employment can improve mental and physical health. For people with mental health needs, entry into employment reduces the use of mental health services.

For vocational rehabilitation of people with severe mental illness (SMI), Supported Employment is more effective than Pre-vocational Training in helping clients obtain

competitive employment; moreover, clients in Supported Employment earn more and work more hours per month than those in Pre-vocational Training.

b. Local Business Activity

It is important to demonstrate how a proposed development will contribute to ensuring the vitality of town centres. Schemes should consider the impact on local employment, promote beneficial competition within and between town centres, and create attractive, diverse places where people want to live, visit and work

In rural areas the applicant should assess the impact of the proposals on a prosperous rural economy, demonstrate how they will support the sustainable growth and expansion of all types of business and enterprise in rural areas, promoting the development and diversification of agricultural and other land based rural businesses.

c. Regeneration

Following rebuilding and housing improvements in deprived neighbourhoods, better housing conditions are associated with better health behaviours; allowing people to remain in their neighbourhood during demolition and rebuilding is more likely to stimulate life-changing improvements in health behaviour than in people who are relocated. The partial demolition of neighbourhoods does not appear to affect residents' physical or mental health. Mega-events, such as the Olympic Games, often promoted on the basis of their potential legacy for regeneration, appear to have only a short-term impact on mental health.

d. Tourism and Leisure Industries

The applicant should assess the impact of the proposed development on retail, leisure, commercial, office, tourism, cultural, community and residential development needed in town centres. In rural locations assessment and evaluation of potential impacts on sustainable rural tourism and leisure developments that benefit businesses in rural areas, communities and visitors should be undertaken.

e. Community / social cohesion and access to social networks

The location of employment, shops and services, provision of public and active transport infrastructure and access to open space and recreational opportunities are associated with social connectedness. Access to local amenities can increase social participation. Neighbourhoods that are more walkable can increase social capital. Urban agriculture can increase opportunities for social connectivity. Infrastructure developments, however, can affect the quality of life of communities living in the vicinity, mediated by substantial community change, including feelings of threat and anxiety, which can lead to psychosocial stress and intra-community conflict.

f. Community engagement

Public participation can improve environmental impact assessments, thereby increasing the total welfare of different interest groups in the community. Infrastructure development may be more acceptable to communities if it involves substantial public participation.

4) **Land Use**

a. Land use in urban and / or rural settings

Land-use mix including infrastructure:

Land use affects health not only by shaping the built environment, but also through the balance of various types of infrastructure including transport. Vulnerable groups in the population are disproportionately affected by decisions about land use, transport and the built environment. Land use and transport policies can result in negative health impacts due to low physical activity levels, sedentary behaviours, road traffic incidents, social isolation, air pollution, noise and heat. Mixed land use can increase both active travel and physical activity. Transportation walking is related to land-use mix, density and distance to non-residential destinations; recreational walking is related to density and mixed use. Using modelling, if land-use density and diversity are increased, there is a shift from motorised transport to cycling, walking and the use of public transport with consequent health gain from a reduction in long-term conditions including diabetes, cardiovascular disease and respiratory disease.

Proximity to infrastructure:

Energy resource activities relating to oil, gas and coal production and nuclear power can have a range of negative effects on children and young people. Residing in proximity to motorway infrastructure can reduce physical activity. For residents in proximity to rail infrastructure, annoyance is mediated by concern about damage to their property and future levels of vibration. Rural communities have concerns about competing with unconventional gas mining for land and water for both the local population and their livestock."

b. Quality of urban and natural environments

Long-term conditions such as cardiovascular disease, diabetes, obesity, asthma and depression can be moderated by the built environment. People in neighbourhoods characterised by high 'walkability' walk more than people in neighbourhoods with low 'walkability' irrespective of the land-use mix. In neighbourhoods associated with high 'walkability' there is an increase in physical activity and social capital, a reduction in overweight and blood pressure, and fewer reports of depression and of alcohol abuse. The presence of walkable land uses, rather than their equal mixture, relates to a healthy weight. Transportation walking is at its highest levels in neighbourhoods where the land-use mix includes residential, retail, office, health, welfare and community, and entertainment, culture and recreation land uses; recreational walking is at its highest levels when the land-use mix includes public open space, sporting infrastructure and primary and rural land uses. Reduced levels of pollution and street connectivity increase participation in physical activity.

Good-quality street lighting and traffic calming can increase pedestrian activity, while traffic calming reduces the risk of pedestrian injury. 20-mph zones and limits are effective at reducing the incidence of road traffic incidents and injuries, while good-quality street lighting may prevent them. Public open spaces within neighbourhoods encourage physical activity, although the physical activity is dependent on different aspects of open space, such as proximity, size and quality. Improving the quality of urban green spaces and parks can increase visitation and physical activity levels.

Living in a neighbourhood overlooking public areas can improve mental health, and residential greenness can reduce the risk of cardiovascular mortality. Crime and safety issues in a neighbourhood affect both health status and mental health. Despite the complexity of the relationship, the presence of green space has a positive effect on crime, and general environmental improvements may reduce the fear of crime. Trees can have a cooling effect on the environment – an urban park is cooler than a non-green site. Linking road infrastructure planning and green infrastructure planning can produce improved outcomes for both, including meeting local communities' landscape sustainability objectives.

Appendix B: PHE recommendations regarding the scoping document- Noise and Public Health Guiding principles

Public Health England's mission is to protect and improve the nation's health and wellbeing and reduce health inequalities. Environmental noise can cause stress and disturb sleep, which over the long term can lead to a number of adverse health outcomes [1, 2].

The Noise Policy Statement for England (NPSE) [3] sets out the government's overall policy on noise. Its aims are to:

- avoid significant adverse impacts on health and quality of life;
- mitigate and minimise adverse impacts on health and quality of life; and
- contribute to the improvement of health and quality of life.

These aims should be applied within a broader context of sustainable development, where noise is considered alongside other economic, social and environmental factors. PHE expects such factors may include [4]:

- Ensuring healthy lives and promoting well-being for all at all ages;
- promoting sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all;
- building resilient infrastructure, promoting inclusive and sustainable industrialisation and fostering innovation;
- reducing inequality; and
- making cities and human settlements inclusive, safe, resilient and sustainable.

PHE's consideration of the effects of health and quality and life attributable to noise is guided by the recommendations in the 2018 Environmental Noise Guidelines for the European Region [1] published by the World Health Organization, and informed by high quality systematic reviews of the scientific evidence [2, 5, 6]. The scientific evidence on noise and health is rapidly developing, and PHE's recommendations are also informed by relevant studies that are judged to be scientifically robust and consistent with the overall body of evidence.

In line with its mission, PHE believes that Nationally Significant Infrastructure Projects (NSIP) should not only limit significant adverse effects, but also explore opportunities to improve the health and quality of life of local communities and reduce inequalities.

PHE also recognises the developing body of evidence showing that areas of tranquillity offer opportunities for health benefits through psychological restoration. NSIP applications need to demonstrate that they have given due consideration to the protection of the existing sound environment in these areas.

Significance of Impacts

Determining significance of impacts is an essential element of an Environmental Impact Assessment, and therefore significance needs to be clearly defined at the earliest opportunity by the Applicant. PHE recommends that the definition of significance is discussed and agreed with relevant stakeholders, including local authority environmental health and public health teams and local community representatives, through a documented consultation process. PHE recommends that any disagreement amongst stakeholders on the methodology for defining significance is acknowledged in the planning application documentation and could inform additional sensitivity analyses.

For noise exposure, PHE expects assessments of significance to be closely linked to the associated impacts on health and quality of life, and not on noise exposure per se (in line with the NPSE). The latest revision of the Design Manual for Roads and Bridges (DMRB) Table 3.49 LA111 [7] includes proposed values for the Lowest Observable Adverse Effect Level (LOAEL) and Significant Observable Adverse Effect Level (SOAEL)²⁴ for operational noise, and these values are likely to

²⁴ As defined in the Noise Policy Statement for England [3] and the Planning Practice Guidance [14].

inform judgements on significance of impact. Whilst DMRB does not explicitly reference the underpinning evidence that informed these numbers, the night time LOAEL and SOAEL of 40 dB L_{night} (outside, free-field) and 55 dB L_{night} (outside, free-field) respectively, correspond to the guideline value and interim target proposed in the WHO Night Noise Guidelines (2009) [8]. The Night Noise Guidelines emphasized that the interim target was “not a health-based limit value by itself. Vulnerable groups cannot be protected at this level”.

The daytime SOAEL of 68 dB $L_{A10,18\text{hr}}$ (façade) appears to be derived from the relative noise level in the Noise Insulation Regulations (NIR) [9], which is linked to the provision of enhanced noise insulation for new highway infrastructure. The NIR does not explicitly refer to the underpinning evidence on which the relevant noise level is based, and there is a lack of good quality evidence linking noise exposure expressed in the L_{A10} metric to health effects. Therefore, it is helpful to convert these levels to L_{den} and $L_{\text{Aeq},16\text{hr}}$ metrics, which are more widely used in the noise and health literature. Assuming motorway traffic, a level of 68 dB $L_{A10,18\text{hr}}$ (façade) is approximately equivalent to²⁵ free-field outdoor levels of 69dB L_{den} (or²⁶ 64 $L_{\text{Aeq},16\text{hr}}$). The corresponding internal noise levels are²⁷ approximately 54dB $L_{\text{Aeq},16\text{hr}}$ (open windows), 48dB $L_{\text{Aeq},16\text{hr}}$ (tilted windows) and 36dB $L_{\text{Aeq},16\text{hr}}$ (closed windows).

For construction noise the latest revision of the DMRB makes reference to Section E3.2 and Table E.1 in Annex E (informative) of BS 5228-1:2009+A1:2014 [10] for the definition of SOAELs. Table E.1 of BS 5228-1:2009+A1:2014 provides examples of threshold values in three categories, based on existing ambient values. Threshold values are higher when ambient noise levels are higher. Daytime (07:00-19:00, weekdays) thresholds can be traced back to principles promoted by the Wilson Committee in 1963 [11]: “Noise from construction and demolition sites should not exceed the level at which conversation in the nearest building would be difficult with the windows shut.” The Wilson committee also recommended that “Noisy work likely to cause annoyance locally should not be permitted between 22.00 hours and 07.00 hours.” BS 5228 states that these principles have been expanded over time to include a suite of noise levels covering the whole day/week period taking into account the varying sensitivities through these periods.

With reference to the noise exposure hierarchy table in the Planning Practice Guidance (Noise) [14], PHE is not aware of good quality scientific evidence that links specific noise levels to behavioural/attitudinal changes in the general population. Reactions to noise at an individual level are strongly confounded by personal, situational and environmental non-acoustic factors [16, 17], and large inter-personal variations are observed in the reaction of a population to a particular noise level [18-21]. For these reasons PHE is not able to provide evidence-based general recommendations for SOAELs that are able to achieve the aims and objectives of the Noise Policy Statement for England and the Planning Practice Guidance on noise. DMRB allows for project specific LOAELs and SOAELs to be defined if necessary, and PHE recommends that for each scheme the Applicant gives careful consideration of the following:

- i. The existing noise exposure of affected communities – in particular, consideration of any designated Noise Important Areas identified in proximity to the scheme;
- ii. The size of the population affected – for example an effect may be deemed significant if a large number of people are exposed to a relatively small noise change;
- iii. The relative change in number and type of vehicle pass-bys;
- iv. Changes in the temporal distribution of noise during day/evening/night, or between weekdays and weekends;
- v. Soundscape and tranquillity, in particular the value that communities put on the lack of environmental noise in their area, or conversely, on the lack of public areas within walking distance that are relatively free from environmental noise;

²⁵ Using equation 4.16 from [22], assuming free-field levels; $L_{A10,18\text{hr}}$ (free-field) = $L_{A10,18\text{hr}}$ (façade) – 2.5dB(A) as per CRTN [13].

²⁶ Using conversion factors in para. 2.2.13 Transport Analysis Guidance (TAG) Unit A3 [15]

²⁷ Using external – internal level differences reported by Locher et al. (2018) [12], based on measurements at 102 dwellings in Switzerland in 2016.

- vi. Opportunities for respite (predictable periods of relief from noise), either spatially or temporally;
- vii. Cumulative exposure to other environmental risk factors, including other sources of noise and air pollution,
- viii. Local health needs, sensitivities and objectives.

The WHO Environmental Noise Guidelines (2018) do not define LOAELs for environmental noise sources, partly because the scientific evidence suggests that there is no clear threshold where adverse impacts on health and quality of life cease to occur in the general population. Based on the systematic reviews that informed the 2018 WHO Environmental Noise Guidelines [2], the daytime operational noise LOAEL quoted in DMRB is equivalent to approximately 8% of the population Highly Annoyed²⁸, and the night time LOAEL is equivalent to approximately 2% of the population Highly Sleep Disturbed²⁹. Therefore, the impact assessment should acknowledge that adverse health effects will occur beyond the assessment threshold (LOAEL). PHE recommends that the Applicant explains what its chosen SOAELs for a specific scheme mean in population health terms in a similar fashion.

PHE does not believe that the current scientific evidence supports the modification of SOAELs and UAELs based on the existing noise insulation specification of residential dwellings, and in particular whether enhanced sound insulation avoids significant adverse effects on health and quality of life. See also sections on *Mitigation* and *Step Changes in Noise Exposure*.

Health Outcomes

PHE encourages the applicant to present noise exposure data in terms of the L_{den} metric (in addition to L_{eq} and L_{10}), to facilitate interpretation by a broad range of stakeholders. This is because most recent scientific evidence on the health effects of environmental noise is presented in terms of L_{den} [1, 5, 6]. PHE believes that quantifying the health impacts associated with noise exposure and presenting them in health-based metrics allows decision makers to make more informed decisions.

For transportation sources, PHE recommends the quantification of health outcomes using the methodology agreed by the Interdepartmental Group on Costs and Benefits - Noise subgroup [IGCB(N) [23] (currently under review)), and more recent systematic reviews [1, 5, 6]. PHE believes there is sufficient evidence to quantify the following health outcomes: long-term annoyance, sleep disturbance, ischaemic heart disease (IHD), and potentially stroke³⁰ and diabetes³¹. Effects can be expressed in terms of number of people affected, number of disease cases, and Disability Adjusted Life Years (DALYs). THE IGCB(N) guidance can also be used to translate these effects into monetary terms.

Some health outcomes, namely annoyance and self-reported sleep disturbance, can be influenced by the local context and situation. In these cases, it would be preferable to use exposure-response functions (ERFs) derived in a local context. However, PHE is not aware of any ERFs for road traffic being available for a UK context from data gathered in the last two decades. Therefore, in PHE's view the ERFs presented in the WHO-commissioned systematic reviews offer a good foundation for appraisal of the health effects associated with road traffic noise [2]. For annoyance, the average curve derived excluding Alpine and Asian studies may be considered more transferable to a UK

²⁸ 55 dB $L_{A10,18hr}$ (façade) is approximately equal to 57 dB L_{den} (free-field), assuming motorway traffic [13, 22]. Applying the exposure-response function presented in Guski et al., 2017 [19] for road traffic noise and annoyance (excluding Alpine and Asian studies), approximately 8% of a population is highly annoyed at 57 dB L_{den} .

²⁹ Applying the exposure-response function presented in Basner et al., 2018 [20] for road traffic noise and sleep disturbance gives the result that approximately 2% of a population is highly sleep disturbed at 40 dB L_{night} .

³⁰ A literature review commissioned by Defra [6] identified nine longitudinal studies on road traffic noise and incidence of stroke, and eight longitudinal studies on road traffic noise and stroke mortality.

³¹ A literature review commissioned by Defra [6] identified four longitudinal studies on road traffic noise and incidence of diabetes.

context. For metabolic outcomes, no ERF was published in the WHO ENG 2018. A recent meta-analysis of five cohort studies of road traffic noise and incidence of diabetes was reported by Vienneau in 2019 [24].

Where schemes have the potential to impact a large number of people, PHE expects the Applicant to carry out literature scoping reviews to ensure that the most robust and up-to-date scientific evidence is being used to quantify adverse effects attributable to the Scheme.

PHE expects to see a clear outline of the steps taken to arrive at the final judgement of significance based on these health outcomes, including a description of local circumstances and modifiers anticipated, and how reasonably foreseeable changes in these circumstances will be dealt with during the assessment process.

Identification and Consideration of Receptors

The identification of noise sensitive receptors in proximity to the proposed scheme - or route options - is essential in providing a full assessment of potential impacts. Examples of noise sensitive receptors include but are not limited to:

- i. Noise Important Areas
- ii. Residential areas
- iii. Schools, hospitals and care homes
- iv. Community green and blue spaces and areas valued for their tranquillity, such as local and national parks
- v. Public Rights of Way (PRoWs)

Noise Important Areas (NIAs) are areas with the highest levels of noise exposure at a national level and as such require very careful consideration in terms of protection from increased noise levels as well as opportunities for noise mitigation that can lead to an improvement in health and quality of life. DMRB requires a list of noise mitigation measures that the project will deliver in Noise Important Areas. PHE supports this requirement - new development should offer an opportunity to reduce the health burden of existing transport infrastructure, particularly for those worst affected. PHE would encourage this approach to extend beyond NIAs, in line with the third aim of NPSE [3].

Baseline Sound Environment

The greater the understanding of the baseline sound environment, the greater the potential for the assessment to reflect the nature and scale of potential impacts, adverse or beneficial, associated with the Scheme. PHE recommends that traditional averaged noise levels are supplemented by a qualitative characterisation of the sound environment, including any particularly valued characteristics (for example, tranquillity) and the types of sources contributing to it [25].

PHE recommends that baseline noise surveys are carried out to provide a reliable depiction of local diurnal noise variations for both weekdays and weekends, in a variety of locations, including the difference between day (07:00-19:00), evening (19:00-23:00) and night-time (23:00-07:00) periods. This is particularly important if there are areas within the scheme assessment boundary with atypical traffic day/evening/night distributions. Achieving these aims is likely to require long-term noise monitoring in multiple locations for a period greater than seven days. This information should be used to test the robustness of any conversions between noise metrics (e.g. converting from $L_{A10,18hr}$ to $L_{Aeq,2300-0700}$ and L_{den}).

PHE suggests that a variety of metrics can be used to describe the sound environment with and without the scheme – for example, levels averaged over finer time periods, background noise levels expressed as percentiles, and number of event metrics (e.g. N65 day, N60 night) – and that, where possible, this suite of metrics is used to inform judgements of significance. There is emerging evidence that intermittency metrics can have an additional predictive value over traditional long-term time-averaged metrics for road traffic noise [27].

Mitigation

PHE expects decisions regarding noise mitigation measures to be underpinned by good quality evidence, in particular whether mitigation measures are proven to reduce adverse impacts on health and quality of life. For interventions where evidence is weak or lacking, PHE expects a proposed strategy for monitoring and evaluating their effectiveness during construction and operation, to ensure the effectiveness of said measures.

With regards to road traffic noise, low-noise road surfaces, acoustic barriers, traffic management and noise insulation schemes can all be considered. Priority should be given to reducing noise at source, and noise insulation schemes should be considered as a last resort. PHE expects any proposed noise insulation schemes to take a holistic approach which achieves a healthy indoor environment, taking into consideration noise, ventilation, overheating risk, indoor air quality and occupants' preference to open windows. There is, at present, insufficient good quality evidence as to whether insulation schemes are effective at reducing long-term annoyance and self-reported sleep disturbance [28], and initiatives to evaluate the effectiveness of noise insulation to improve health outcomes are strongly encouraged.

PHE notes the suggestion in DMRB methodology that post-construction noise monitoring cannot provide a reliable gauge for reference against predicted impacts of operational noise. The issues highlighted in DMRB relate to noise exposure, and not to health outcomes. PHE suggests that monitoring of health and quality of life can be considered pre and post operational phases, to ascertain whether mitigation measures are having the desired effect for local communities.

PHE expects consideration of potential adverse effects due to noise and vibration during construction and recommends that a full and detailed Construction Environmental Management Plan (CEMP) is developed and implemented by the Applicant and/or the contractor responsible for construction. PHE recommends that the CEMP includes a detailed programme of construction which highlights the times and durations of particularly noisy works, the measures taken to reduce noise at source, the strategy for actively communicating this information to local communities, and procedures for responding effectively to any specific issues arising.

There is a paucity of scientific evidence on the health effects attributable to construction noise associated with large infrastructure projects [5, 6] where construction activities may last for a relatively long period of time. PHE recommends that the Applicant considers emerging evidence as it becomes available and reviews its assessment of impacts as appropriate.

Green Spaces and Private Amenity Areas

PHE expects proposals to take into consideration the evidence which suggests that quiet areas can have both a direct beneficial health effect and can also help restore or compensate for the adverse health effects of noise in the residential environment [29-31]. Research from the Netherlands suggests that people living in noisy areas appear to have a greater need for areas offering quiet than individuals who are not exposed to noise at home [29]. Control of noise at source is the most effective mitigation for protecting outdoor spaces; noise insulation schemes do not protect external amenity spaces (such as private gardens and balconies or community recreation facilities and green spaces) from increased noise exposure.

PHE expects consideration to be given to the importance of existing green spaces as well as opportunities to create new tranquil spaces which are easily accessible to those communities exposed to increased noise from the scheme. These spaces should be of a high design quality and have a sustainable long-term management strategy in place.

Step-changes in Noise Exposure and the Change-effect

The Applicant should take into consideration the "change-Effect", i.e. the potential for a real or anticipated step-change in noise exposure to result in attitudinal responses that are greater or lower than that which would be expected in a steady state scenario [28, 32]. Where a perception of change is considered likely, PHE recommends that the change-effect is taken into account in the assessment for the opening year of the proposed development. For longer term assessments, the effects of population mobility need to be taken into consideration.

Community Engagement and Consultation Feedback

PHE recommends that public consultations carried out during the planning application process clearly identify the predicted changes to the sound environment during construction and operation of the Scheme, the predicted health effects on neighbouring communities, proposed noise mitigation strategies and any proposed measures for monitoring that such mitigation measures will achieve their desired outcomes.

PHE encourages the Applicant to use effective ways of communicating any changes in the acoustic environment generated by the scheme to local communities. For example, immersive and suitably calibrated audio-visual demonstrations can help make noise and visual changes more intuitive to understand and accessible to a wider demographic. If the proposed scheme will have an impact over a relatively large geographical area, the Applicant should consider community-specific fact-sheets and/or impact maps, which are easily accessible to all individuals both in hard copy and online. If online, search functionality can potentially be included, for example, by postcode.

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How to contact PHE

If you wish to contact us regarding an existing or potential NSIP application, please email: nsipconsultations@phe.gov.uk

From: [Keith Taylor](#)
To: [A12chelmsfordA120](#)
Subject: A12 CHELMSFORD TO A120 WIDENING SCHEME - SCOPING CONSULTATION
Date: 06 November 2020 10:27:23

Dear Sir/Madam,

YOUR REFERENCE TRO10060-000007

Rivenhall Parish Council would request that the Planning Inspectorate should require the following information be included in the Environmental Statement which is important in the parish of Rivenhall:

1. The impacts of construction and the finished, operational road with respect to noise, air quality and artificial light on those isolated properties that are retained close to the route and that Rivenhall End should enjoy clear benefits in terms of all these criteria compared to the current situation.
2. The impacts of construction and the operational road in respect of traffic noise, air quality and artificial light on the landscape and habitats of the River Blackwater and its valley and the Rivenhall Brook.
3. Impacts on public rights of way and the need to reconnect/reprovide PRow not properly accommodated by the 1960s/1970s A12 construction.
4. The need to overall limit to a minimum street lighting (other than at junctions) and to use the best environmental designs.
5. The need to include substantial landscape planting along the new route to reduce visual impacts and noise to local residents and as seen from PRow, and to offset increased carbon dioxide emissions from traffic.
6. The need to consider the relationship between the remaining de-trunked section of the A12 through Rivenhall End and the new A12 route including the crucial issue of HGVs being routed away from Rivenhall End village and overall traffic flows in the parish. It is not currently clear what the net impacts will be given the potential reduction in junctions being proposed by the applicant.
7. The need to support modal shift via integrated planning, alongside Essex County Council, of bus routes and bus stops along the route corridor including using the de-trunked sections.
8. The need to support modal shift by the provision of a segregated cycleway along the whole route corridor using the de-trunked sections and also new cycleway sections that avoid sending cyclists through local town and village centres. There should also be safe links to local railways stations along the route including Witham and Kelvedon.

Kind regards,
Keith Taylor - Clerk to Rivenhall Parish Council.

A12 Chelmsford to A120 Widening Scheme – proposed DCO application by Highways England

Royal Mail Group Limited comments on information to be provided in applicant's Environmental Statement

Introduction

We write with reference to the email from PINs Royal Mail dated 28 October 2020 inviting Royal Mail to send its comments on the scope of Highways England's Environmental Statement.

Royal Mail's consultants BNP Paribas Real Estate have reviewed the applicant's Scoping Report dated 21 October 2020.

Statutory and Operational Information about Royal Mail

Under section 35 of the Postal Services Act 2011 (the "Act"), Royal Mail has been designated by Ofcom as a provider of the Universal Postal Service. Royal Mail is the only such provider in the United Kingdom.

The Act provides that Ofcom's primary regulatory duty is to secure the provision of the Universal Postal Service. Ofcom discharges this duty by imposing regulatory conditions on Royal Mail, requiring it to provide the Universal Postal Service.

In respect of its postal services functions, section 29 of the Act provides that Ofcom's primary regulatory duty is to secure the provision of the Universal Postal Service. Ofcom discharges this duty by imposing regulatory conditions on Royal Mail, requiring it to provide the Universal Postal Service.

Under sections, 30 and 31 of the Act (read with sections 32 and 33) there is a set of minimum standards for Universal Service Providers, which Ofcom must secure. The conditions imposed by Ofcom reflect those standards. There is, in effect, a statutory obligation on Royal Mail to provide at least one collection from letterboxes and post offices six days a week and one delivery of letters to all 29 million homes and businesses in the UK six days a week (five days a week for parcels). Royal Mail must also provide a range of "end to end" services meeting users' needs, e.g. First Class, Second Class, Special Delivery by 1 pm, International and Redirections services.

Royal Mail is under some of the highest specification performance obligations for quality of service in Europe. Its performance of the Universal Service Provider obligations is in the public interest and should not be affected detrimentally by any statutorily authorised project.

The Government imposes financial penalties on Royal Mail if its Universal Service Obligation service delivery targets are not met. These penalties relate to time targets for:

- collections,
- clearance through plant, and
- delivery.

Royal Mail's postal sorting and delivery operations rely heavily on road communications. Royal Mail's ability to provide efficient mail collection, sorting and delivery to the public is sensitive to changes in the capacity of the highway network.

Royal Mail is a major road user nationally. Disruption to the highway network and traffic delays can have direct consequences on Royal Mail's operations, its ability to meet the Universal Service Obligation and comply with the regulatory regime for postal services thereby presenting a significant risk to Royal Mail's business.

Potential impacts of the scheme on Royal Mail

Royal Mail has fifteen operational facilities within 12 miles of the proposed DCO boundary as listed below with estimated distances from the scheme in miles:

1	MARKS TEY VEHICLE PARKING	45 LONDON ROAD, MARKS TEY	CO6 1EB	0.0
2	CHELMSFORD MAIL CENTRE / ROAD TRANSPORT WORKSHOP	WINSFORD WAY	CM2 5AA	0.2
3	NORTH ESSEX PARCEL FORCE DEPOT	3 SHEEPCOTES	CM2 5AE	0.2
4	WITHAM DELIVERY OFFICE	NEWLAND STREET	CM8 2AH	0.8
5	KELVEDON VEHICLE PARKING	VICTORIAN HOUSE, 75 HIGH STREET	CO5 9AE	0.8
6	CHELMSFORD DELIVERY OFFICE	MONTROSE ROAD	CM2 6ZZ	1.5
7	TIPTREE DELIVERY OFFICE	1A CHURCH ROAD	CO5 0LD	1.8
8	COLCHESTER VEHICLE PARKING	13 MOORSIDE	CO1 2TJ	3.3
9	MALDON DELIVERY OFFICE	1 RIVERSIDE IND ESTATE	CM9 4LD	5.3
10	COLCHESTER DELIVERY OFFICE	MOORSIDE	CO1 2GB	6.5
11	WIVENHOE SUB UNIT DELIVERY OFFICE	77 HIGH STREET	CO7 9AB	6.5
12	BRAINTREE DELIVERY OFFICE	LAKES ROAD	CM7 3SR	7
13	SOUTH WOODHAM FERRERS DELIVERY OFFICE	10 SQUIRE STREET	CM3 5YA	10
14	WEST MERSEA SUB UNIT DELIVERY OFFICE	3 RUSHMERE CLOSE	CO5 8QQ	11.1
15	HALSTEAD VEHICLE PARKING	CHAPEL STREET	CO9 2LS	11.4

Royal Mail uses a vehicle park at the rear of the Bungalow Dinner 45 London Road, Marks Tey (Premier Store) which lies within the proposed red line DCO boundary:



Chelmsford Mail Centre / Road Transport Workshop and North Essex Parcel Force Depots are both circa 0.2 miles from the DCO boundary. These are large operational facilities that are of regional importance to Royal Mail's business and are reliant on access to and from this section of the A12.

As indicated above, there are a significant number of other operational Royal Mail facilities in close proximity to the affected section of the A12, all of which will use services along this route.

This section of the A12 is of very high strategic importance to Royal Mail's operations. National, regional and local mail distribution services use it, including services to Ipswich and Norwich.

Royal Mail's Operational planners have indicated that any delays on this stretch of the A12 during the construction of Highways England's widening scheme will mainly affect services to the CO, CM and IP Postcode areas and the Delivery Offices within them.

Royal Mail is aware of the current congestion issues on this section of the A12. Royal Mail Operational Managers have indicated that advance information will be required from Highways England on the extent and timing of further delays to journey times during construction. Highways England's proposed A12 widening works may necessitate Royal Mail having to change Chelmsford Mail Centre's work plan and the start time of the Delivery Office staff in order to work around any delays. Royal Mail may also need to look at how guaranteed delivery services can be achieved during the A12 widening construction phase.

The timing of the construction works for these A12 improvements relative to that for Highways England's M25 J27 works will need careful consideration, any overlap between the two schemes would potentially be highly disruptive to Royal Mail services between London and the Eastern region.

Once complete, Highways England's proposed widening of this section of the A12 will undoubtedly improve traffic conditions on it and the surrounding highway network, so Royal Mail does not wish to prevent it from going ahead. However, in view of the high operational importance of this route to Royal Mail's business as outlined above, it wishes to protect of its future ability to provide an efficient mail sorting and delivery service to the public in accordance with its statutory obligations which may potentially be adversely affected by the construction of this proposed improvement scheme.

Royal Mail's comments on scope of Environmental Statement

1. Royal Mail requests that the Transportation section and the Transport Assessment within Highways England's ES includes information on the needs of major road users (including Royal Mail). The ES should acknowledge the requirement to ensure that major road users are not disrupted though full advance consultation at the appropriate stages in the DCO and development processes.
2. Royal Mail requests that it is fully pre-consulted (at least one month in advance) by Highways England and its contractors on any proposed road closures / diversions/ alternative access arrangements, hours of working and the content of the Construction Traffic Management Plan. The ES should acknowledge the need for this consultation with Royal Mail and other relevant major road users.

Royal Mail is able to supply the applicant with information on its road usage / trips if required.

Should PINS or Highways England have any queries in relation to the above then in the first instance please contact -

Denise Stephenson (holly.trotman@royalmail.com) of Royal Mail's Legal Services Team or Dan Parry-Jones (daniel.parry-jones@realestate.bnpparibas) of BNP Paribas Real Estate.

Southend-on-Sea Borough Council

Deputy Chief Executive,

Executive Director (Growth and Housing) : Andrew Lewis

 Civic Centre, Victoria Avenue, Southend-on-Sea, Essex SS2 6ER

 01702 215000

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The Planning Inspectorate
Environmental Services
Central Operations
Temple Quay House
2 The Square
Bristol
BS1 6PN

Our ref: 20/01829/NBC
Your ref: TR010060-000007
Date: 24 November 2020
Enquiries: Spyridon Mouratidis
Telephone: 01702 215069 & 07917200412
Email: spyrosmouratidis@southend.gov.uk

Dear Sir/Madam,

Town & Country Planning Act 1990 (as amended)

Site address: Junction 19 To Junction 25 At Marks Tey of A12 Chelmsford Essex
Proposal: Planning Inspectorate Scoping opinion: Application by Highways England for an Order granting Development Consent for the A12 Chelmsford to A120 Widening Scheme

Thank you for your consultation request which was received on 28th October 2020 and has been allocated the case reference 20/01829/NBC.

We understand that the Applicant has asked the Planning Inspectorate on behalf of the Secretary of State (SoS) for its opinion (a Scoping Opinion) as to the information to be provided in an Environmental Statement (ES) relating to the Proposal. We have reviewed the document accompanying the request titled 'Environmental Scoping Report' and the site plan.

The Planning team at Southend-on-Sea Borough Council consulted with other departments of the Council, including its Highways team. We consider that the information the Applicant intends to submit would be proportionate to the project and sufficient to allow the assessment of the ES. No further comments are submitted for the scoping opinion request. Please inform us in the normal way for any future requests or applications in relation to this project.

Yours faithfully,

Spyros Mouratidis
Senior Planner

T: 01702 215069 & 07917200412

E: spyrosmouratidis@southend.gov.uk

Your Ref: TR010060-000007
Our Ref: SCC/CON/4432/20
Date: 26 November 2020
Enquiries to: Ruby Shepperson
Tel: 01473 265063
Email: Ruby.Shepperson@suffolk.gov.uk



The Planning Inspectorate
Environmental Services
Central Operations
Temple Quay House
2 The Square
Bristol
BS1 6PN

By e-mail only:
A12chelmsfordA120@planninginspectorate.gov.uk

Dear Sir/Madam,

Environmental Impact Assessment (EIA) Scoping Opinion for the A12 Chelmsford to A120 Widening Scheme

Thank you for the opportunity to comment on the scoping of the EIA for the above proposal. I am responding on behalf of Suffolk County Council to your email communication of 28/10/2020 regarding the above. Where separate responses have been submitted by individual teams of the County Council they have been summarised in this letter.

Highways & Traffic –

The two main concerns raised by the Local Highway Authority (LHA) relate to paragraphs 5.3.2. and 5.3.3.

Paragraph 5.3.2. sets out that “a traffic model was built at PCF Stage 2 which was used to understand the likely impacts on the road network (including on air quality and noise) and to inform the options appraisal. A new traffic model is being built for PCF Stage 3, the output of which will feed into the EIA. Updated traffic modelling outputs from the new model were not available at the time of writing this Environmental Scoping Report.”

Further information is sought on the scope of the transport study area covered by the transport model and details of the assessment being undertaken. Suffolk County Council would like to understand to what degree the impacts of increasing capacity on the A12 would have on wider strategic transport movements, most notably on the A131 through communities and on the A12 to the north (this includes the Copdock interchange and a number of A12 junctions that have short merges such as those that

serve East Bergholt and Capel St Mary). Further information is also sought on whether an assessment of 'induced demand' is proposed to be undertaken and what the potential implications on the wider strategic transport network are.

Paragraph 5.3.3. sets out that it is assumed that "the existing A12 would remain open during construction. Traffic management would be required for works along the online sections." Further understanding is sought as to whether an assessment of driver delay on the A12 is proposed as part of the assessment of construction of the scheme given the potential impacts.

Consideration should be given to the origin of the workforce and materials for construction of the proposed scheme. It is assumed that workforce will travel to/from the scheme via the regional road network and that materials will mainly use the strategic road network, with associated impacts in the wider area that should be understood, including on local roads. Further information is sought on these changes in traffic flows. Further to these impacts, there is a number of other large scale construction projects (particularly NSIPs) in Suffolk that are currently in the planning process and that may impact on the availability and draw of workforce and materials, as well as impacting on route choice and potential operation. As East Anglia One North, East Anglia Two and Sizewell C (SZC) have all been submitted to the examining authority, consideration should be given to the inclusion of construction traffic associated with these schemes within the development assessment, again, as this may impact on origins of workforce and route choice, as well as understanding the potential cumulative impacts given that the current programmes of each projects could coincide. Consideration should also be given to the project's potential to disrupt deliveries and the programmes of the aforementioned NSIPs and how this can be managed.

Given the potential for a number of transport impacts associated with the scheme, as well as cumulative impacts, further information is sought on the potential impact of construction traffic on the local road network (particularly the A131) and depending on the extent of the impacts the need for assessment of associated transport impacts including severance, pedestrian delay, fear and intimidation, amenity, noise and air quality.

The below provides a summary of further information that is sought by the LHA to understand impacts:

- The origin and potential environmental impacts of traffic associated with the construction workforce, especially on the local Suffolk road network.
- The origin and potential environmental impacts of construction freight traffic on wider road network, including A12/A14 Copdock junction as well as A12 junctions to the north of the scheme.
- The cumulative impact of construction traffic in combination with other largescale construction schemes.
- The potential traffic and associated environmental impacts of the scheme on rerouting wider strategic traffic.

- The potential traffic and associated environmental impacts of induced demand.

Economic Development –

The main concern raised by economic development is the absence of reference to or assessment of socio-economic effects which need to be considered within the EIA.

Other considerations raised by Economic Development that resonate with the LHA include, the presence of other largescale construction schemes. The construction period for the widening scheme is expected to be 2023 to 2027, during this time period we are expecting significant activity on a number of other NSIPs that will put pressure on available labour.

SZC will be in its Civil construction phase and ScottishPower Renewables will also be undertaking its three-year onshore construction phase. These projects alone have the potential to draw in all available local civils construction labour leading to negative displacement effects in our local labour market. With the additional pressure of another local NSIP providing a draw on an already pressured labour market this could be further exasperated.

This proposed scheme could also have a significant cumulative impact on the SZC transport modelling assumptions. If labour in the South of the county is expected to be drawn as employment at SZC and modelled as such if another scheme, such as this, is delivered it will significantly change these assumptions and we may see more labour being drawn from more North and/or West of the county.

Economic Development does also offer more positive feedback, acknowledging that the scheme has the opportunity to provide legacy employment/opportunity for the region, creating a workforce and talent pools of people that can take up the opportunities that SZC and other projects present. Dependant on timing, this project can either support a lead into major projects or help with re-brokering of workers and companies as projects demobilise.

With the above being considered, we would expect to see socio-economic effects scoped into any EIA.

I respectfully suggest that the above concerns should be considered in the EIA for the A12 Chelmsford to A120 Widening Scheme.

Yours sincerely,

Ruby Shepperson
Planning Officer
Growth, Highways, and Infrastructure Directorate

From: [Matthew Lang](#)
To: [A12chelmsfordA120](#)
Subject: TR010060-000007 - Widening of A12
Date: 12 November 2020 09:50:40

Dear Sir/Madam,

Thank you for consulting us on this proposal.

I can confirm that Tendring District Council have no comments to make on the content of the scoping report provided.

Kind Regards

Matthew Lang BSc (Hons)
Planning Officer
Planning Department
Tendring District Council
Council Offices, Thorpe Road, Weeley, Essex, CO16 9AJ
e-mail: mlang@tendringdc.gov.uk
tel: 01255 686134
web: www.tendringdc.gov.uk
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From: [Blake, Hannah](#)
To: [A12chelmstordA120](#)
Subject: FW: HB FW: TR010060 - Proposed A12 to A12 Widening Scheme - EIA Scoping Notification and Consultation
Date: 30 October 2020 16:46:23
Attachments: [Letter to stat.cons_Scoping & Reg 11 Notification.docx](#)

Good Afternoon,

The attached changes do not fall within our district.

Regards,

Hannah Blake
Technical Support (Planning)
Systems & Technical Support
Direct dial: 01284 757617
Email: hannah.blake@westsuffolk.gov.uk
www.westsuffolk.gov.uk
West Suffolk Council
#TeamWestSuffolk

West Suffolk Council is playing its part to support our communities and businesses during the COVID-19 outbreak. Prioritising this work may mean other services are impacted or you may get a slower response than normal.

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From: [Assistant Clerk](#)
To: [A12chelmsfordA120](#)
Subject: Your Ref - TR010060-000007 A12 Chelmsford to A120 Widening Scheme
Date: 24 November 2020 16:07:37
Attachments: [image001.png](#)
[image002.png](#)

Good afternoon,

I refer to your letter of 28th October 2020 regarding the A12 Chelmsford to A120 Widening Scheme application.

Members of Witham Town Council's Environment Committee would like to pass on their concerns regarding increased pollution and noise that could result from the proposed improvements. Please can this be noted as part of your consultation.

Kind Regards,



Hayley Andrews

Assistant Town Clerk

Witham Town Council | Town Hall | 61 Newland Street | Witham | Essex
| CM8 2FE

☎01376 520627 | Monday – Thursday 9am – 5pm

assistantclerk@witham.gov.uk |

www.witham.gov.uk



**Are you going to be alone at home on Christmas Day
or know someone else who will be?**

Witham Town Council have partnered with Home Alone on Christmas Day to deliver home cooked Christmas dinners to the socially isolated this Christmas. For more information please contact Susan on 07395 150669 or email xmas@455.org.uk