



Department for
Energy Security
& Net Zero

HRA Methodology Approach

Fusion Energy National Policy Statement
(NPS) EN-8



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Preface

The Government is producing a new National Policy Statement (NPS) for fusion energy, EN-8. This is the Habitats Regulations Assessment (HRA) Methodology Report that precedes the production of EN-8. It sets out in detail the approach to the HRA considering the legal requirements, relevant case law and the consultation process.

The new NPS for fusion energy will be assessed without geographical information, until such time that the approach to siting new fusion deployment has been confirmed. Therefore, at this stage it will be assessed as a high-level strategic plan only. This Methodology Report will itself be subject to statutory consultation ahead of the production of the draft NPS. The actual HRA report, which will follow the HRA approach set out in this Methodology Report, will accompany the NPS EN-8 for fusion energy through the statutory consultation process.

This Habitats Regulations Assessment (HRA) Methodology Report informs the approach to the HRA of EN-8, the new National Policy Statement (NPS) for fusion energy. EN-8 covers the development of nationally significant infrastructure projects for fusion energy and sits within a suite of technology-specific NPSs under the overarching NPS for Energy, EN-1.

In England and Wales, under the Conservation of Habitats and Species Regulations 2017 (as amended)¹ and The Conservation of Offshore Marine Habitats and Species Regulations 2017 (as amended) (the 'Habitats Regulations'), an 'Appropriate Assessment' is required to be undertaken of proposed plans or projects which are not necessary for the management of Special Areas of Conservation (SAC) or Special Protection Areas (SPA), but which are likely to have a significant effect on one or more SAC or SPA either individually, or in combination with other plans or projects. Assessment is required where a plan or project may give rise to a significant effect upon an SAC or SPA. These Habitats Regulations sites were originally designated under the following European directives:

- Special Areas of Conservation (SACs)², originally designated under European Council Directive 92/43/EEC (referred to as the Habitats Directive); and,
- Special Protection Areas (SPAs), originally designated under the Conservation of Wild Birds Directive (Council Directive 2009/147/EC (which codifies Directive 79/409/EEC)) for rare, vulnerable, and regularly occurring migratory bird species and internationally important wetlands.

¹ Following the changes made to the Conservation of Habitats and Species Regulations 2017 (as amended) by the Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019, Special Areas of Conservation (SAC) and Special Protection Areas (SPA) in the UK no longer form part of the EU's Natura 2000 ecological network, but form part of the UK's national site network. In this document they are referred to as Habitats Sites (see also footnote 4 below).

² Includes candidate SACs (cSAC) and Sites of Community Importance (SCI). Following amendment of the Habitats Regulations, reference to a SCI includes reference to a site of national importance designated under any retained transposing legislation.

As a matter of Government policy³ this also includes:

- Listed or proposed Ramsar sites (wetland sites of international importance, as designated under the Ramsar Convention 1971);
- Potential SPAs (pSPA);
- Possible SACs (pSAC); and,
- Any site identified, or required, as compensatory measures for adverse effects on SACs, SPAs, pSPAs, pSACs and listed or proposed Ramsar sites.

Hereafter, all the above sites are referred to as Habitats Sites⁴.

This report outlines the methodology used in undertaking a strategic-level HRA for fusion energy NPS EN-8. In accordance with the Habitats Regulations, each National Policy Statement constitutes a 'plan', and therefore the methodology used aligns with that used for other 'plans'. It is important to note that this does not remove the requirement for detailed project-level HRAs to be undertaken at development consent stage. At present, the methodology outlined is for a non-locational NPS, i.e. no specific sites, allocations, or any spatial component. Therefore, the assessment will focus on the policy content within the document, with reference to the existing HRA for the overarching energy NPS (EN-1) where necessary.

The methodology outlines the three recognised stages of HRA and the requirements at each stage. The HRA will accompany NPS EN-8 through statutory consultation. A wider plan-level HRA will not negate the need for a project-level HRA for a specific site.

³ Ministry of Housing, Communities and Local Government (2021) National Planning Policy Framework (NPPF). Paragraph 181.

⁴ 'The term 'Habitats Sites' is used instead of 'European Sites' throughout this document. This is consistent with terminology in the National Planning Policy Framework. The term 'European Sites' only remains unchanged when present in a quote'.

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1.0 Introduction

1.1 The National Policy Statement for Fusion Energy

NPSs apply to infrastructure that is defined as a “Nationally Significant Infrastructure Project” in the Planning Act 2008. There are currently six NPSs relevant to energy and they set out Government policy for the delivery of major energy infrastructure. The new proposed fusion energy NPS EN-8 sits under an overarching NPS for Energy (EN-1), in conjunction with five other technology-specific NPSs. The intention is to increase the suite of six energy NPSs to eight with the addition of NPS EN-7 on nuclear power generation siting policy and NPS EN-8 on fusion energy policy as follows:

- Overarching NPS for Energy (EN-1);
- NPS for Natural Gas Generating Infrastructure (EN-2);
- NPS for Renewable Electricity Generation (EN-3);
- NPS for Gas Supply Infrastructure and Gas and Oil Pipelines (EN-4);
- NPS for Electricity Networks Infrastructure (EN-5); and,
- NPS for Nuclear Power Generation (EN-6).
- Proposed NPS for Nuclear Power Generation Siting Policy (EN-7)
- Proposed NPS for Fusion Energy (EN-8)

Together, the eight energy NPSs provide the framework for development consent decisions on applications for new energy infrastructure. NPS EN-1 to NPS EN-5⁵ have recently been updated and have completed the re-designation process. NPS EN-6 is currently being updated and NPS EN-7 is in the production process. This document covers the fusion energy NPS (EN-8), which taken together with EN-1, will provide the primary basis for decisions taken by the Planning Inspectorate on fusion power plant projects.

In 2022/23, the energy NPSs EN-1 to EN-5 were reviewed and revised. This revision was accompanied by Appraisal of Sustainability (AoS) and Habitats Regulations Assessment (HRA) reports to assess whether any changes made to the NPSs had implications under the respective legislation. The AoS and HRA were submitted alongside the NPSs for statutory consultation. This process was completed in January 2024 with NPSs EN-1 to EN-5 having been redesignated.

At this point of development of the fusion energy NPS, the Government does not propose to list specific sites and instead proposes to adopt a criteria-based approach similar to that of all other technology NPSs (EN-2 to EN-5).

⁵ [National Policy Statements for energy infrastructure - GOV.UK \(www.gov.uk\)](https://www.gov.uk/national-policy-statements-for-energy-infrastructure)

1.2 Purpose and background to this report

This report is the HRA methodology report and outlines the approach that will be taken when producing the HRA for the fusion energy NPS EN-8 and assessing the content under the Conservation of Habitats and Species Regulations 2017 (as amended) and The Conservation of Offshore Marine Habitats and Species Regulations 2017 (as amended), referred to as the 'Habitats Regulations'.

The duty to undertake the HRA relates to the fusion energy NPS being a strategic 'plan'. NPS EN-8 provides a strategic framework within which subsequent 'project' level assessment will be undertaken as required, as and when individual projects are proposed.

NPS EN-8 does not include any sites, locations, or other spatial proposals and, therefore, the HRA is an assessment of the policy content only. It is high-level and strategic in nature, and it does not constitute or take the place of a project HRA for any fusion energy infrastructure development that may fall under the NPS.

The function of the HRA report will be to highlight any potential risks to Habitats Sites through the policy approaches of the fusion energy NPS document itself and considers the applicability of in-combination effects.

This approach takes into account current guidance with respect to HRA. All relevant case law will be considered when developing the plan-level HRA.

Report Structure

The Preface sets the context of the report, and the Non-Technical Summary provides a summary of the process. The remainder of the report is structured as follows:

- Chapter 1 introduces NPS EN-8 for fusion energy and the purpose of this report;
- Chapter 2 sets out the Habitat Regulations Assessment approach, relevant law and policy and a process overview;
- Chapter 3 outlines the methodology for Stage 1 Screening, including the scoping of Habitats Sites for screening;
- Chapter 4 outlines the methodology for Stage 2 Appropriate Assessment, which includes the discussing of mitigation measures;
- Chapter 5 discusses the derogations; alternative solutions, Imperative Reasons of Overriding Public Interest (IROPI) case test and securing compensation; and,
- Chapter 6 discusses preparation of the NPS EN-8 HRA Report.

2.0 Habitats Regulations Assessment Approach

2.1 Relevant Law and Policy

Under the Habitats Regulations, an assessment is required where a plan or project may give rise to significant effects upon a Habitats Site. These sites include Special Areas of Conservation (SACs), originally designated under the Habitats Directive, and Special Protection Areas (SPAs), originally designated under the Conservation of Wild Birds Directive (Council Directive 2009/147/EC, which codifies Directive 79/409/EEC). The Marine and Coastal Access Act 2009, Part 5 on Nature Conservation through Marine Conservation Zones (MCZ) and Part 4 on licensing activities such as dredging will require appropriate assessment as habitats sites.

These sites now form part of the national site network and going forward, will include any SACs and SPAs newly designated by the UK.

The legislation relevant to the UK's national network of Habitats Sites comprises the Conservation of Habitats and Species Regulations 2017 (as amended) and the Conservation of Offshore Marine Habitats and Species Regulation 2017 (as amended), known together as the Habitats Regulations. In addition, it is a matter of UK Government policy⁶ that sites designated under the 1971 Ramsar Convention for their internationally important wetlands (Ramsar sites), both listed and proposed, are also considered in this process, and afforded the same protection as sites within the national site network, along with potential SPAs (pSPAs) and possible SACs (pSACs). Hereafter, all the above sites are referred to as Habitats Sites. Furthermore, sites identified, or required, as compensatory measures for adverse effects on Habitats Sites are also included.

Areas of land or sea outside of the boundary of a Habitats Site may be important ecologically in supporting the populations for which the Habitats Site has been designated or classified, such that they are 'functionally linked' and should be taken into account in a HRA⁷.

Regulation 63 (1) of the Habitats Regulations states:

“A competent authority, before deciding to undertake, or give any consent, permission, or other authorisation for, a plan or project which—

(a) is likely to have a significant effect on a European site or a European offshore marine site (either alone or in combination with other plans or projects), and

(b) is not directly connected with or necessary to the management of that site,

must make an appropriate assessment of the implications of the plan or project for that site in view of that site's conservation objectives”.

⁶ Ministry of Housing, Communities and Local Government (2021) National Planning Policy Framework (NPPF). Paragraph 181.

⁷ Tyldesley, D. and Chapman, C., (2013) The Habitats Regulations Assessment Handbook, June 2023 edition UK: DTA Publications Limited.

It is confirmed that the eight energy NPSs (NPS EN-1 → NPS EN-8) are not directly connected with or necessary to the management of any Habitats Sites. Therefore, there is a requirement for screening for likely significant effects and, if likely significant effects cannot be ruled out, appropriate assessment.

Regulation 64 (1) of the Habitats Regulations states that:

“If the competent authority is satisfied that, there being no alternative solutions, the plan or project must be carried out for imperative reasons of overriding public interest (which, subject to paragraph (2), may be of a social or economic nature), it may agree to the plan or project notwithstanding a negative assessment of the implications for the European site or the European offshore marine site (as the case may be)”.

Furthermore, Regulation 68 states:

“Where in accordance with regulation 64—

(a) a plan or project is agreed to, notwithstanding a negative assessment of the implications for a European site or a European offshore marine site, or

(b) a decision, or a consent, permission, or other authorisation, is affirmed on review, notwithstanding such an assessment,

the appropriate authority must secure that any necessary compensatory measures are taken to ensure that the overall coherence of Natura 2000 is protected”.

However, with reference to the Natura 2000 network (above), although the process is broadly the same, UK SACs and SPAs are no longer part of the Natura 2000 network, and it will be the coherence of the UK national site network that is maintained. The ‘appropriate authority’ will be the relevant Secretary of State or the Welsh Minister. This no longer includes the European Commission. These amendments are made to the Habitats Regulations by the Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019.

2.2 HRA Process Overview

The HRA process comprises three stages⁸:

- **Stage One: Screening** – the process that identifies the potential for likely effects upon a Habitats Site of a project or plan, either alone or in combination with other projects or plans and considers whether these effects are likely to be significant;
- **Stage Two: Appropriate assessment** – the consideration of the impact on the integrity of the Habitats Site of the project or plan, either alone or in combination with other projects or plans, in respect of the Habitats Site’s conservation objectives. Additionally, where adverse impacts are identified, an assessment of the potential mitigation of those impacts is undertaken and included when determining the scope for adverse effects on integrity of the Habitats Site;

⁸ <https://www.gov.uk/guidance/habitats-regulations-assessments-protecting-a-european-site#how-to-carry-out-an-hra>

- **Stage Three: Derogations** – consideration of whether proposals that would have an adverse effect on the integrity of a Habitats Site (after mitigation) qualify for an exemption.

The derogations at Stage Three have previously been described separately as Stage Three and Stage Four^{9 10 11}. However described, both require the meeting of three legal tests.

- There are no feasible alternative solutions that would be less damaging or avoid damage to the Habitats Site.
- The proposal needs to be carried out for Imperative Reasons of Overriding Public Interest (IROPI).
- The necessary compensatory measures can be secured.

The first test requires the assessment of alternative solutions, a process which examines alternative ways of achieving the objectives of the project or plan that might avoid or reduce adverse impacts on the integrity of the Habitats Site. It needs to be categorically demonstrated that there are no feasible alternatives to the project or plan to meet this test. If there is an alternative which is less harmful or avoids adverse effects, it should be employed, in which case the Appropriate Assessment is likely to require revision.

Where no alternative solutions exist and where adverse impacts remain, the proposal can only be taken forward if the second derogation test, establishing that there is an IROPI case for the plan or project, is met.

The third test is the identification of compensatory measures, ascertaining their effectiveness to fully offset the negative effects of the proposal and to maintain the coherence of the national site network and ensuring that they are certain and secured.

⁹ European Commission (2001) Assessment of plans and projects significantly affecting Natura 2000 sites – Methodological guidance on the provisions of Article 6(3) and (4) of the Habitats Directive 92/43/EEC.

¹⁰ Guidance on the use of Habitats Regulations Assessment - <https://www.gov.uk/guidance/appropriate-assessment>.

¹¹ Tyldesley, D. and Chapman, C., (2013) The Habitats Regulations Assessment Handbook, June 2023 edition UK: DTA Publications Limited.

3.0 HRA Screening

3.1 Scoping Habitats Sites for Screening

Prior to screening, it is necessary to identify all Habitats Sites that may be affected by the project or plan. The extent of the search is determined by the methodology and scope being used and will depend on the nature of the project or plan as to how far-reaching the impacts could be. The fusion energy NPS EN-8 is being assessed in the absence of spatial proposals or any nominated sites at this present time. Therefore, specific Habitats Sites have not been scoped in and as NPS EN-8 has national coverage, it must be assumed that any of the Habitats Sites within the UK could be affected.

In the UK there are presently 656 SACs, 286 SPAs and approximately 142 Ramsar sites designated across terrestrial and marine environments¹². This includes sites in Scotland and Northern Ireland, which although are unaffected by the NPS, conceivably effects from fusion energy projects in England and Wales could potentially affect Habitats Sites in these countries, i.e. transboundary effects. Table 1 overleaf sets out the number of designations in each country and those designations that straddle a boundary or are partially located offshore.

Using the 'source-pathway-receptor' approach and considering the potential far-reaching effects from energy infrastructure developments, such as fusion power stations, it is conceivable that mobile species from Habitats Sites in other countries may be affected. This is considered to potentially be the case for marine mammals, migratory fish, and birds, many of which travel long distances to utilise other habitats, move within their natural range or during migration. Therefore, they can potentially be affected outside the boundary of the Habitats Site of which they are a qualifying feature. For the purpose of this assessment, it is presumed that impacts on Habitats Sites outside the national site network do not need to be considered. In assessing impacts on the suite of Habitats Sites protecting UK habitats and species it is assumed, particularly within UK territorial waters, that potential impacts on mobile species will be adequately addressed.

¹² <https://jncc.gov.uk/>

Table 1 – Summary of Habitats Sites in the UK

	SAC	SCI	cSAC	SPA	Ramsar	Totals
England	242			82	68	392
England/ Scotland	3			1	1	5
England/ Wales	7			2	3	12
England/ Offshore	3			2		5
England/ Wales/ Offshore	1			1		2
Northern Ireland	57			16	20	93
Northern Ireland/ Offshore	1					1
Scotland	238	1		160		399
Scotland/ Offshore	2			3		5
Wales	85			17	50	152
Wales/ Offshore	2			1		3
UK Offshore Waters	15		1	1		17
Totals	656	1	1	286	142	1,086

Source: JNCC - SAC figures correct as of 20th April 2023; SPA figures correct as of 30th September 2022.

3.2 Approach to Stage 1 – Screening

The initial stage of screening is a simple assessment to ascertain whether a project, plan, or proposal:

- is directly connected with or necessary for the conservation management of a Habitats site; and,
- risks having a significant effect on a Habitats Site, either alone or in combination with other projects or plans.

It can be stated with confidence that the fusion energy NPS EN-8 is not directly connected with or necessary for the conservation management of any Habitats Site. This will be confirmed within the HRA reporting and is not discussed further in this Methodology Report.

Section 3.1 above sets out how for the purpose of assessing the NPS, Habitats Sites have been included in the scope for assessment. In addition to this the following components are also required:

- Describe the plan, including information about geographical coverage and timeframes, where relevant;
- Identify the potential effects on the Habitats Site alone and assess whether likely to be significant;
- Identify other plans or projects which, in combination, may have potential for significant effects on the Habitats Site.

At this stage, measures intended to avoid or reduce effects upon Habitats Sites are not taken account of during screening. These can only be considered at Stage 2 – Appropriate Assessment. This is consistent with case law.

Describe the Plan

This step will involve describing the content of the fusion energy NPS EN-8, highlighting where and how it may have capacity to give rise to impacts that could affect Habitats Sites.

Identify potential effects on the Habitats Sites alone

Having determined that the project or plan is not directly connected, or necessary for the management of a Habitats Site, it is necessary to undertake screening to determine whether the proposals are likely to have a Likely Significant Effect (LSE) on any Habitats Sites.

It is important to note that the burden of evidence is to show, on the basis of objective information, that the project or plan will have no LSE on a Habitats Site. If there may be an LSE, or there is uncertainty and an LSE cannot be ruled out, this would trigger the need for an appropriate assessment.

It is usual in assessing potential effects from other power plants to consider construction, operation, and decommissioning effects separately, where they are applicable. Although potential effects throughout construction and operation are different, given the strategic nature of this assessment, the high-level potential effects being considered will encompass all possible impacts from construction and operation. Therefore, they will not be dealt with separately within the assessment process. It is presumed that, on a worst-case scenario basis, the effects of decommissioning will be similar to those of construction and, therefore, also covered by the effects considered.

It is acknowledged that there may be specific effects linked to the deployment of fusion power plants that may not be identified until the project stage, due to the high-level nature of the assessment of the NPS. Where possible, potential specific effects will be flagged, but it is prudent to assume that detailed consideration of effects will only be made at project-level HRA for individually proposed developments. An example of this would be the radiological emissions from fusion power plant sites, which will be subject to strict regulation during operation and require a decommissioning strategy with all other relevant consents and permits granted prior to commencement of decommissioning.

The fusion energy NPS does not contain specific policies or objectives that could strictly be assessed in their own right. Moreover, it provides an overall framework and criteria for the identification and delivery of new fusion energy sites. The absence of policies or objectives that directly promote development and the lack of nominated sites associated with the current draft NPS EN-8, means there is no clear mechanism by which the NPS could have any impact on Habitats Sites.

In line with current best practice, it is now considered appropriate to undertake a targeted 'source-pathway-receptor' approach to identifying sites for screening. This allows for the movement of mobile/ migratory species such as birds, fish and marine mammals and their potential to interact with infrastructure/ individual sites to be taken into account. However, it is not possible to apply such an approach to this HRA as NPS EN-8 does not contain any spatial component or nominated sites to enable a detailed assessment. New fusion energy development and associated infrastructure, as facilitated by NPS EN-8, could occur anywhere within England and Wales, thereby potentially affecting any of the Habitats Sites across the UK.

The results of the screening can, however, be used to inform the scope of any future project-level HRA process by highlighting potential effect pathways.

The following general potential effects will be considered at the NPS level:

- Habitat loss and fragmentation (direct and indirect e.g. loss of functionally linked land);
- Changes to terrestrial (fresh) water quality;
- Changes to marine water quality;
- Changes to air quality;
- Changes to surface and groundwater hydrology;
- Changes in coastal processes;
- Changes to radiological emissions;
- Species disturbance (visual, terrestrial noise & vibration, marine noise & vibration);
- Physical interaction between species and project infrastructure; and,
- Introduction of Invasive Non-Native Species (INNS).

The specific actions and processes that may lead to the broad effects outlined above will be defined in the HRA of the fusion energy NPS EN-8 and the list refined as necessary as the assessment evolves.

The potential for LSEs will be assessed by virtue of Conservation Objectives. These are published by the relevant Statutory Nature Conservation Body (SNCB) for each Habitats Site and by meeting the objectives, the site will contribute to favourable conservation status (FCS) for that species or habitat type at a UK level¹³. Therefore, undermining the Conservation Objectives will result in an LSE on one or more qualifying features. Conservation Objectives broadly comprise the following targets:

- Maintain the extent and distribution of qualifying habitats and habitats of qualifying species;
- Maintain the structure and function (including typical species) of qualifying natural habitats;
- Maintain the structure and function of the habitats of qualifying species;

¹³ <https://www.gov.uk/guidance/duty-to-protect-protect-protect-and-restore-european-sites>

- Maintain the supporting processes on which qualifying natural habitats and the habitats of qualifying species rely;
- Maintain the populations of qualifying species; and,
- Maintain the distribution of qualifying species within the site.

The Conservation Objectives should be read in conjunction with the Supplementary Advice on Conservation Objectives, where this is available for a Habitats Site. The Supplementary Advice is published by the relevant SNCB and provides extra detail on how the attribute targets can be met. However, given the high-level nature of the assessment for the plan, Supplementary Advice is only really relevant to project-level assessments. There may also be case-specific advice given by the SNCB that must be considered, but again, this will only be relevant to project-level assessment.

Identify other plans or projects which may act in-combination to have likely significant effects on Habitats Sites

During screening, the potential for LSE on Habitats Sites needs to be considered 'alone' and 'in-combination'. Where an LSE alone is concluded, the consideration of potential in-combination effects with other plans and projects can be taken forward to appropriate assessment (this is discussed in Section 4.2 below). If, however, there is an effect, but it is not considered to have an LSE on a Habitats Site, i.e. the effect is minor and not significant, it is necessary to undertake an in-combination assessment at screening stage. The non-significant effect arising from NPS EN-8, may, in-combination with effects from another plan or project, then have an LSE on the Habitats Site.

The type of effect and the way in which they may combine to produce an effect on a Habitats Site will be considered and whether or not that combined effect is likely to be significant.

Effects may combine to increase the adverse effect on any qualifying feature in an additive or synergistic way. This could be through increasing the sensitivity or vulnerability of the qualifying feature, result in larger extent or increased intensity of an impact, or affect additional areas of a qualifying feature or its habitat. Effects on separate qualifying features are unlikely to combine to produce a more adverse effect.

Where it can be demonstrated that NPS EN-8 will have no impact, i.e. no appreciable effect, then there is no requirement to undertake an in-combination assessment. As there is nothing to combine with that might then result in a potential effect on a Habitats Site.

However, due to the strategic and high-level nature of NPS EN-8, it may not be possible to screen out Habitats Sites from appropriate assessment. Therefore, potential in-combination effects will be discussed at appropriate assessment stage. The approach is discussed further in Section 4.2 below.

Findings of Stage 1

The findings with respect to Stage 1 will be summarised and it will be confirmed whether or not the assessment of the fusion energy NPS should proceed to Stage 2, Appropriate Assessment.

4.0 Appropriate Assessment

4.1 Approach to Stage 2 – Appropriate Assessment

For Habitats Sites where LSE is predicted (alone or in-combination), or it cannot be concluded that there is no LSE on the basis of objective information, an appropriate assessment will be undertaken. That is to say, if the plan or project is likely to undermine the site's conservation objectives, the assessment of that risk being made in the light inter alia of the characteristics and specific environmental conditions of the site concerned by such a plan or project.

The appropriate assessment considers the implications of the plan or project for the Habitats Site in view of the site's conservation objectives, this would include consideration of the potential effect pathways identified during stage 1 screening. Depending on the qualifying features, the conservation objectives for SACs and SPAs typically cover the extent, distribution, structure, and function of qualifying natural habitats, supporting processes relied upon by habitats (and species) and the population and distribution of qualifying species. In conjunction with the Supplementary Advice on Conservation Objectives for a Habitats Site, the Conservation Objectives provide a framework for assessment and information on how qualifying features may be adversely affected. Ramsar sites do not have conservation objectives; however, as they usually overlay SACs and SPAs and often have the same or very similar qualifying features, the conservation objective for these sites will be applied by proxy.

4.2 Habitats Site Integrity

The integrity of a site is defined as “the coherence of the site's ecological structure and function, across its whole area, that enables it to sustain the habitat, complex of habitats and/or the populations of the species for which the site is, or will be, designated”¹⁴.

The appropriate assessment of the fusion energy NPS EN-8 includes an assessment of adverse effects to the extent possible on the basis of the precision of the plan. A precautionary approach will be taken to scoping Habitats Sites in or out of appropriate assessment during screening. This is necessary where there is an absence of a spatial component to the plan. It should be noted that for a non-locational plan, it is not possible to subsequently undertake a detailed assessment of potential for adverse effects on receptors.

The strategic-level appropriate assessment will, therefore, be based on the potential effects identified (refer to Section 3.2.14 above). It will highlight the risks to achieving high-level conservation objectives for Habitats Sites as a result of the potential facilitation of fusion energy development that may result from NPS EN-8.

This method is in line with two pieces of case law¹⁵, which clarified that an appropriate assessment of a plan does not have to provide a conclusive answer to all the questions

¹⁴ Natural England (2019) MPA Conservation Advice Glossary of Terms. Available here: https://designatedsites.naturalengland.org.uk/pdfs/MPA_CAGlossary_March2019.pdf.

¹⁵ Feeney versus Oxford City Council and the Secretary of State CLG (24th October 2011) Case No CO/3797/2011 and the Cairngorms Campaign and others versus the Cairngorms National Park Authority and others 2012 SOH153.

legitimately raised about the potential for significant adverse effect on the integrity of the designated site.

In the Opinion of Advocate General Kokott¹⁶ at paragraph 49 she noted that an assessment of plans cannot by definition take into account all effects because *“Many details are regularly not settled until the time of the final permission”* and *“[i]t would also hardly be proper to require a greater level of detail in preceding plans or the abolition of multi-stage planning and approval procedures so that the assessment of implications can be concentrated on one point in the procedure. Rather, adverse effects on areas of conservation must be assessed at every relevant stage of the procedure to the extent possible on the basis of the precision of the plan. This assessment is to be updated with increasing specificity in subsequent stages of the procedure”*.

4.3 In Combination Assessment

Where an in-combination assessment has been taken forward to Stage 2, through identification of LSE alone or in-combination, the potential for adverse effects on Habitats Site integrity as a result of the in-combination effect needs to be assessed. However, mitigation can now be taken into consideration. It must be noted that adverse effects can only be assessed at the relevant stage to the extent possible on the basis of the precision of the plan.

Given the nature of the fusion energy NPS EN-8, there is inevitably going to be a delay between the adoption of the NPS and any subsequent fusion technology development. It is not possible to know when (or indeed if) any subsequent project proposal will come forward and it is not therefore possible to predict what other plans and projects will be relevant to future project assessments.

No formal in-combination assessment will be undertaken, but the types of projects and plan, including other national-level plans that might be relevant to later project-level HRA will be identified. As fusion energy technology could be developed anywhere in England and Wales, plans with a national focus will need to be considered alongside those classed as regional or local. All new fusion energy development is likely to require a project-level HRA, within which in-combination effects will be assessed on a case-by-case basis and within a relevant and defined timeframe. The information gathered as part of the in-combination assessment for the HRA of the new fusion energy NPS EN-8 will provide a guide for starting a project-level in-combination assessment.

Planning Inspectorate (PINS) Advice Note Seventeen ‘Cumulative effects assessment relevant to nationally significant infrastructure projects’¹⁷, sets out the approach taken to cumulative effects assessment with respect to development consent orders for NSIPs. This takes a staged approach, which could be adopted for project-level in-combination assessments:

- Stage 1 – Establish the long-list – determine the zone of influence of environmental effects to provide a justifiable search area;
- Stage 2 – Establish the short-list – apply threshold criteria, e.g. temporal scope;

¹⁶ European Commission v UK (2005) ECR I-9017 Case C-6/04.

¹⁷ PINS Advice Note Seventeen: Cumulative effects assessment relevant to nationally significant infrastructure projects. Available here: <https://infrastructure.planninginspectorate.gov.uk/legislation-and-advice/advice-notes/advice-note-17/>.

- Stage 3 – Information gathering – undertaken for short-listed plans and projects, to include obtaining HRAs;
- Stage 4 – Assessment – interrogation of gathered information to determine whether there is potential for in-combination effects on a given Habitats Site.

It will be key to ensure that an in-combination assessment is appropriately focussed and proportionate, whilst reasonably identifying all risks of in-combination effects with other plans and projects.

4.4 Mitigation Measures

Mitigation and avoidance measures that could be applied at the project HRA level considered likely to be effective in minimising or eliminating potential adverse effects on Habitats Sites will be evaluated. Mitigation can only be considered in generic terms at this strategic level without project-level detail to determine specifically what is needed.

Mitigation can be incorporated into a plan through changes to the text, for example, to include commitments to arising development being subject to HRA (or similar assessment), where necessary, in accordance with the Habitats Regulations (or any subsequent replacement legislation). The scope for mitigation such as this, which is embedded within NPS EN-8, will be explored.

Therefore, the mitigation chapter of the HRA for the fusion energy NPS EN-8 will outline avoidance and mitigation measures considered appropriate for potential adverse effects on Habitats Sites. These measures will necessarily be of a broad scope and will draw on generic avoidance and mitigation measures for large infrastructure projects. It will additionally include suggestions for mitigating text that could be included in the text of the NPSs, where this proves to be feasible.

5.0 Derogations

5.1 Residual Adverse Effects

Should it be shown that even after mitigation there are residual adverse effects on site integrity, then a project will need to go through the derogations. These are a series of three tests that need to be met in order to allow the plan or project to proceed. Plans rarely pass Stage 2 due to the potential for amending the plan and writing in safeguards to ensure that the integrity of Habitats Sites is maintained. Although the derogations are more relevant to projects, the following sections set out the requirements for the three tests and how these might be applicable to the NPS. The three tests are:

- There are no feasible alternative solutions that would be less damaging or avoid damage to the Habitats Site;
- The proposal needs to be carried out for imperative reasons of Overriding Public Interest;
- The necessary compensation measures can be secured.

5.2 Approach to the Assessment of Alternative Solutions

Regulation 107(1) of the Habitats Regulations states that *“If the plan-making authority is satisfied that, there being no alternative solutions, the land use plan must be given effect for imperative reasons of overriding public interest...it they may give effect to the land use plan notwithstanding a negative assessment of the implications for the European Site or the European offshore marine site...”*

The purpose of the alternative solutions test is to determine whether there are any other feasible ways to deliver the overall objective of the plan [or project], which will be less damaging or avoid damage to the Habitats Site(s) in question. To allow a derogation it must be demonstrated that there is no alternative solution that would be less damaging before the assessment can move on to the next stage.

The requirement is for ‘alternative solutions’, not merely ‘alternatives’ to be considered. According to The Habitat Regulations Assessment Handbook¹⁸, there are four principal steps in establishing the presence or absence of alternative solutions:

- Step 1 – define the objectives or purpose of the plan and the problem it is causing that needs to be solved i.e. the harm that it would cause to the integrity of a Habitats Site;
- Step 2 – understand the need for the plan;
- Step 3 – are there financially, legally, and technically feasible alternative solutions;
- Step 4 – are there alternative solutions with a lesser effect on the integrity of the Habitats Site?

¹⁸ Tyldesley, D. and Chapman, C., (2013) The Habitats Regulations Assessment Handbook, March 2021 edition UK: DTA Publications Limited.

The objectives of the fusion energy NPS EN-8 will frame the alternative solutions that should be considered. In some cases, wide ranging alternatives may deliver the same overall objective, but generally the range of alternative options are curtailed by the boundary created by the objectives, e.g. alternative solutions for a new motorway would not normally include the assessment of other modes of transport¹⁵.

At this strategic stage it is not possible to define a specific ‘problem’ as risks to the integrity of the Habitats Sites will be identified at a high level and are largely precautionary. Alternatives will be considered during the project stage of any arising fusion energy technology development.

As a plan, the alternatives to the fusion energy NPS EN-8 that will be discussed in the HRA Report are based on presenting variations of the NPS, as identified by the Government and outlined in the AoS. The degree to which each variation will impact upon the integrity of Habitats Sites is discussed, including the ‘do nothing’ option, which would result in no NPS. The assessment of these ‘alternatives’ will help to determine if they are ‘feasible alternatives’. Alternatives need to be legally, financially, and technically feasible¹⁹. Ultimately, the consideration of alternatives will be undertaken “*to the extent possible on the basis of the precision of the plan*”²⁰.

5.3 Making an IROPI Case

Provided it can be demonstrated that there are no feasible alternative solutions (i.e. the first test has been met) and where adverse impacts remain upon a Habitats Site, the assessment will move on to the second test, which seeks to establish whether there are IROPI. This stage considers whether the plan or project is:

- **Imperative:** it must be essential (whether urgent or otherwise), weighed in the context of the other elements below, that the plan or project proceeds;
- **Overriding:** the interest served by the plan or project outweighs the harm (or risk of harm) to the integrity of the site as identified in the appropriate assessment. In this context, the European Commission guidance states that it is reasonable to assume that the interest can only be overriding if it is a ‘long-term interest’;
- **In the public interest:** a public benefit must be delivered rather than a solely private interest.

Also, at this stage it will need to be determined if any SAC priority habitats or species will be affected. This affects the types of reasons that could be considered by the competent authority. Otherwise, as outlined in Section 2.1.9, the opinion of the relevant Secretary of State or Welsh Ministers is required.

5.4 Securing Compensation

If the first two tests have been met and there are no feasible alternative solutions and there are IROPI, then compensatory measures need to be identified and secured. The measures need

¹⁹ Tyldesley, D. and Chapman, C., (2013) The Habitats Regulations Assessment Handbook, June 2023 edition
UK: DTA Publications Limited

²⁰ Refer para 49 of the Advocate General’s Opinion in Case C-6/04 EC v UK (2005).

to fully offset the damage which will or could be caused. This may include creation or re-creation of comparable habitats, which, if not already within the Habitats Site, will eventually be designated as a Habitats Site. It will be necessary to work with the relevant statutory nature conservation body to identify, design and secure suitable compensation measures. The compensatory measures themselves must not have a negative effect on the national site network of Habitats Sites as a whole.

The competent authority must have confidence that the compensation proposed will deliver the desired outcome and should consider the following:

- Is the proposed compensation technically feasible, based on sound scientific understanding?
- Is there a robust delivery and management plan in place for the duration?
- Where is the proposed compensation in relation to the affected site? Does this affect its efficacy?
- How much time is needed for the compensation to establish to the required quality?
- Is the methodology proposed reasonable or technically proven?
- Are the measures sustainable in the long-term? Will long-term management need to be secured?

The appropriate authority, i.e. the relevant Secretary of State or the Welsh Minister, must secure the necessary compensatory measures to ensure that the coherence of the national site network of Habitats Sites is protected. The mechanisms for guaranteeing compensation will be through the consenting process for individual projects.

The strategic and high-level nature of this fusion energy assessment means that generic rather than specific compensation will be outlined at this stage. Without defined impacts, it is not possible to determine what compensatory measures will be required and to what extent they need to be applied. Any compensation is therefore specific to each project and needs to be fully explored and designed at the project-level HRA.

6.0 Preparation of the NPS EN-8 HRA Reports

6.1 Approach to Report Preparation

This Methodology Report will precede the HRA Report and be taken through statutory consultation and a final version produced once all consultation responses have been addressed.

6.2 HRA Report Structure

The HRA report structure will be broadly as follows:

- Non-technical summary;
- Chapter 1 – Introduction - sets out the purpose and background to the fusion e NPS EN-8;
- Chapter 2 - The NPS for Fusion Energy - details the content of the new NPS;
- Chapter 3 – Habitats Regulations Assessment Process and Applications – discusses the underpinning legislation and methodology;
- Chapter 4 – Pre-Screening of NPS EN-8 – indicates which components of the NPS can be removed from the screening (to be decided on review of draft);
- Chapter 5 – HRA Screening Results;
- Chapter 6 – Strategic level Appropriate Assessment of the NPS;
- Chapter 7 – In-combination Assessment;
- Chapter 8 – Mitigation Measures;
- Chapter 9 – Discusses the derogations, including alternative solutions, making a case for Imperative Reasons of Overriding Public Interest (IROPI) and securing compensation; and,
- Chapter 10 – Conclusion.

This consultation is available from: www.gov.uk/government/consultations/fusion-energy-facilities-new-national-policy-statement-and-proposals-on-siting

If you need a version of this document in a more accessible format, please email alt.formats@energysecurity.gov.uk. Please tell us what format you need. It will help us if you say what assistive technology you use.