

Sustainable Communities

Habitats Regulation Assessment: Site Allocations

Screening Report March 2010

Technical Report

Draft Submission

HABITATS REGULATION ASSESSMENT: SITE ALLOCATIONS DEVELOPMENT PLAN DOCUMENT

1. Introduction

1.1. Central Bedfordshire Council (CBC) is currently preparing the Site Allocations Development Plan Document (DPD) as part of the Local Development Framework (North). When adopted, the document will allocate the sites for new development in Central Bedfordshire (the part of the area which was formerly Mid Bedfordshire) over the period to 2026.

1.2. The Core Strategy and Development Management Policies DPD which provides the overall framework for future development was adopted in November 2009. Enfusion was commissioned in August 2005 to carry out Sustainability Appraisal (incorporating Strategic Environmental Assessment [SEA]) of the Local Development Framework, and in May 2008, was further commissioned to undertake the related Habitats Regulations Assessment (HRA) screening of the Core Strategy and Development Management Policies DPD.

1.3. Habitats Regulations Assessment is also commonly referred to as Appropriate Assessment (AA) although the requirement for AA is first determined by an initial 'screening' stage undertaken as part of the HRA.

2. Requirement for Habitats Regulations Assessment

2.1. The European Directive (92/43/EEC) on the Conservation of Natural Habitats and Wild Flora and Fauna (the Habitats Directive) protects habitats and species of European nature conservation importance. The Habitats Directive establishes a network of internationally important sites designated for their ecological status. These are referred to as Natura 2000 sites or European Sites, and comprise Special Areas of Conservation (SACs) and Special Protection Areas (SPAs).

2.2. Articles 6 (3) and 6 (4) of the Habitats Directive require AA to be undertaken on proposed plans or projects which are not necessary for the management of the site but which are likely to have a significant effect on one or more Natura 2000 sites either individually, or in combination with other plans and projects.¹ In 2007, this requirement was transposed into UK law in Part IVA of the Habitats Regulations (The Conservation (Natural Habitats, & c.)(Amendment) (England and Wales) Regulations 2007). These regulations require the application of AA to all land use plans. Government guidance also requires that Ramsar sites (which support internationally important wetland

¹ Determining whether an effect is 'significant' is undertaken in relation to the designated interest features and conservation objectives of the Natura 2000 sites. If an impact on any conservation objective is assessed as being adverse then it should be treated as significant and where information is limited the precautionary principle applies.

habitats and are listed under the Convention on Wetlands of International Importance [Ramsar Convention]) are included within HRA/AA.

2.3. The purpose of AA is to assess the impacts of a land-use plan, in combination with the effects of other plans and projects, against the conservation objectives of a European Site and to ascertain whether it would adversely affect the integrity² of that site. Where significant negative effects are identified, alternative options should be examined to avoid any potential damaging effects. The scope of the AA is dependent on the location, size and significance of the proposed plan or project and is first determined by screening.

3. Guidance for Habitats Regulations Assessment

3.1. Draft guidance for AA 'Planning for the Protection of European Sites: Appropriate Assessment', has been produced by the Department for Communities and Local Government (DCLG, August 2006). The final guidance has not yet been produced. A partnership of consultants³ has also prepared guidance (Appropriate Assessment of Plans, August 2007) to assist planning bodies in complying with the Habitats Directive and draft guidance for the Assessment of Sub-Regional Strategies under the provisions of the Habitats Regulations has been developed by English Nature (August 2006). Most recently the Royal Society for the Protection of Birds (RSPB) produced guidance on HRA to support the planning community.⁴

3.2. The application of HRA to Local Development Documents is an emerging field and in the absence of official Government guidance the approach applied for the Core Strategy & Development Management Policies and the Site Allocations DPD were based on the best available guidance and emergent practice. The method applied considers HRA in three main stages - outlined in Table 1. This report addresses the first screening stage [1] of the HRA.

² Integrity is described as the sites' coherence, ecological structure and function across the whole area that enables it to sustain the habitat, complex of habitats and/or levels of populations of species for which it was classified, (ODPM, 2005).

³ Scott Wilson, Levett-Therivel Sustainability Consultants, Treweek Environmental Consultants and Land Use Consultants.

⁴ Dodd AM, Cleary BE, Dawkins JS, Byron HJ, Palframan LJ & Williams GM (2007) The Appropriate Assessment of Spatial plans: a guide to why, when and how to do it. RSPB, Sandy.

Table 1 Habitats Regulations Assessment: Key Stages	
Stage 1	
Screening	<ul style="list-style-type: none"> ▪ Identify international sites in and around the plan/strategy area ▪ Examine conservation objectives (if available) ▪ Analyse the policy/plan and its key components ▪ Identify potential effects on Natura 2000 sites ▪ Examine other plans and programmes that could contribute to 'in combination' effects
	<ul style="list-style-type: none"> ▪ <i>If no effects likely – report that no significant effect.</i> ▪ <i>If effects are judged likely or uncertainty exists – the precautionary principle applies proceed to stage 2</i>
Stage 2	
Appropriate Assessment	<ul style="list-style-type: none"> ▪ Collate information on sites and evaluate impact in light of conservation objectives ▪ Consider how plan 'in combination' with other plans and programmes will interact when implemented (the Appropriate Assessment) ▪ Consider how effect on integrity of site could be avoided by changes to plan and the consideration of alternatives ▪ Develop mitigation measures (including timescale and mechanisms)
	<ul style="list-style-type: none"> ▪ <i>Report outcomes of AA and develop monitoring strategies</i> ▪ <i>If effects remain following the consideration of alternatives and development of mitigations proceed to stage 3</i>
Stage 3	
Assessment where no alternatives and adverse impacts remain	<ul style="list-style-type: none"> ▪ Identify 'imperative reasons of overriding public interest' (IROPI) ▪ Identify/ develop potential compensatory measures
	<i>Difficult test to pass, requirements are onerous and untested to date</i>

4. Consultation

4.1. The Habitats Regulations require the plan making/competent authority to consult the appropriate nature conservation statutory body (Natural England (NE)). NE (Four Counties Team, based at Cambridge) were contacted prior to the Core Strategy HA Screening for their views and input to the LDF screening process, including the scope of the HRA Screening. As a result of their input, the original list of European sites to be considered was expanded to include 1 further SAC and 3 further Ramsar sites: the Fenlands SAC, which includes the Woodwalton Fen, Wicken Fen and Chippenham Fen Ramsar sites.

4.2. Natural England also provided advice relating to key potential issues for the European sites when considering development plans. In the case of the Fenlands SAC and Ramsar sites, Portholme SAC and the Ouse Washes SAC/SPA/Ramsar sites, key issues were considered to be changes to the water environment caused by abstractions and discharge consents. For the non-water related sites, the Chilterns Beechwoods and Eversden and Wimpole Woods, the key potential issues related to increased recreational impacts and access. These concerns have been taken on board throughout the preparation of the HRA.

4.3. The Habitats Regulations leaves consultation with other bodies and the public to the discretion of the plan making authority. Where possible, guidance recommends that this consultation be undertaken alongside the consultation for the plan. This Screening Report is being published prior to the submission of the Site Allocations DPD and a copy will also be sent to the Environment Agency for consideration and comment.

5. Purpose and Scope of Report

5.1. When considering the scope of this Screening Assessment it is important to consider the advice in paragraph 2.3 of the DCLG Guidance. It states:

“The comprehensiveness of the assessment work undertaken should be proportionate to the geographical scope of the option and the nature and extent of any effects identified. The assessment should be confined to the effects on the internationally important habitats and species for which the site is classified. An AA need not be done in any more detail, or using more resources, than is useful for its purpose. It would be inappropriate and impracticable to assess the effects in the degree of detail that would normally be required for the Environmental Impact Assessment (EIA) of a project.”

5.2. The Site Allocations Development Plan Document (DPD) is the second DPD produced as part of the Local Development Framework (North). The main purpose of this DPD is to identify future sites for development in the area that will implement the Spatial Vision, Strategic Objectives and policies in the Local Development Framework Core Strategy. The Core Strategy and Development Management Policies DPD establishes the following principles which are relevant to the scope of this HRA Screening Report for the Site Allocations DPD:

- The broad locations for development to 2026 (refer to Policy CS1 of the Core Strategy);
- The amount of new housing and commercial development to 2026 (refer to Policy CS5 of the Core Strategy);
- The areas important for employment and business uses (refer to Policy CS10 of the Core Strategy).
- That all planning applications should be assessed for their impact on biodiversity (Policy DM15 of the Development Management Policies)

5.3. The Habitat Regulations Assessment of the Site Allocations DPD will therefore rely extensively on the extensive work that went into the production of the Habitats Screening of the Core Strategy. The key finding of the Appropriate Assessment Screening Reports for the Core Strategy, was that the Core Strategy would not give rise to any significant direct or indirect adverse impacts on the Natura 2000 sites within a 5km radius of Central Bedfordshire (North).

5.4. The scope of this Screening Report will therefore concentrate on whether any of the specific proposals in the Site Allocations DPD will give rise to any additional significant direct and indirect impacts on the Natura 2000 sites, which had not been identified through the assessment of the Core Strategy.

6. Method

6.1. In accordance with the official guidance and current practice, conducting the screening stage of the HRA for Site Allocations DPD used the method outlined below. This approach combines both a **plan** and a **site** focus.

- The **plan** focus first screens out those elements of the plan unlikely to affect European site integrity and then considers the impacts of the remaining elements on European sites, including the potential for 'in-combination' impacts.
- The **site** focus considers the environmental conditions of the site and the factors required to maintain site integrity, and looks at the potential impacts the plan may have.

6.2. HRA experience to date has indicated that maintaining a site based approach as core to the HRA/AA method more closely reflects the intent of the Habitats Directive. This means that subsequent avoidance and mitigation measures (developed if/as required during the AA stage 2) seek to focus on the conditions necessary to maintain site integrity (e.g. avoiding specific types of development/ activity at or near sensitive areas).

6.3. The key tasks employed for the HRA Screening are set out in the following table.

Table 2

HRA Screening Stage: Key Tasks

<p>Task 1</p> <p>Identification of Natura 2000 sites & characterisation</p>	<ul style="list-style-type: none"> • Identification of European sites both within the CBC boundary, within 15 km of the boundary and/or within the potential influence of the plan.⁵ • Information was obtained for each European site, based on publicly available information and consultation with Natural England where appropriate.⁶ • This included information relating to the sites' qualifying features; conservation objectives (where available) vulnerabilities/ sensitivities and geographical boundaries.
<p>Task 2</p> <p>Strategy review, policy screening and identification of likely impacts</p>	<ul style="list-style-type: none"> • Screening of the Policies and the identification of likely impacts (including a review of the strategy to determine likely impacts).
<p>Task 3</p> <p>Consideration of other plans and programmes</p>	<ul style="list-style-type: none"> • Consideration, where appropriate, of other plans and programmes that may have in-combination effects
<p>Task 4</p> <p>Screening Assessment</p>	<ul style="list-style-type: none"> • Summary of screening outcomes and recommendations.

6.4. As part of this screening process consideration was also given to related HRA work and Sustainability Appraisal (SA)/ Strategic Environmental Assessment (SEA) work being undertaken for CBC, in neighbouring councils and in the wider area. In particular, this included the HRA of the Draft Revision to the Regional Spatial Strategy for the East of England.

⁵ Buffer zone distance based on extant guidance, (English Nature, 2006).

⁶ www.jncc.gov.uk, www.natural-england.org.uk.

7. Screening

Task 1: Identification of Natura 2000 sites & characterisation

7.1. There are no Natura 2000 sites within the CBC boundary. However, plans and programmes have spatial implications that can extend beyond the intended plan area boundaries. In particular, it is also recognised that distance in itself is not a definitive guide to the likelihood or severity of an impact as factors such as the prevailing wind direction, river flow direction, and groundwater flow direction will all have a bearing on the relative distance at which an impact can occur. This means that a plan directing development some distance away from a European site could still have effects on the site and, therefore, needs to be considered as part of the screening process.

7.2. Taking into account the potential for transboundary impacts the screening has identified two European sites within a 15km buffer of the CBC administrative boundary and six water dependent European sites downstream from the CBC boundary, and therefore potentially within the influence of the plan. (Table 3). For detailed descriptions, see Appendix 1 of the Core Strategy and Development Management Policies Habitats Screening Assessment (Nov 2008).

Table 3	Designation
European Sites within a 15 km buffer zone & downstream	
Chiltern Beechwoods	SAC
Eversden and Wimpole Woods	SAC
Portholme SAC	SAC
Ouse Washes	SPA/ Ramsar/ SAC
Fenland	SAC
Chippenham Fen	Ramsar
Wicken Fen	Ramsar
Woodwalton Fen	Ramsar

Task 2: Strategy Review, Policy Screening and Identification of Likely Impacts

7.3. Given that the role of the Site Allocations DPD is to specifically implement the Spatial Vision, Strategic Objectives and policies in the adopted Core Strategy it is difficult to separate the impacts of the two DPDs. For example, the Core Strategy identifies the number of houses that need to be built in the CBC (North) area and broad locations for them. The Site Allocations DPD allocates sufficient housing sites to meet the housing allocation, in locations consistent with those stipulated within the Core Strategy. Moreover, the Site Allocations DPD only contains policies that list

the site allocations and the proposed use. It makes it clear that all planning applications relating to the site allocation will need to comply with the policies of the Core Strategy. The strategic implications of the Site Allocations DPD on Natura 2000 sites outside of the area are therefore considered to be consistent with the Core Strategy.

7.4. To ensure that there are no likely significant adverse effects on the integrity of the sites referred to above, all site allocation proposals will have to comply with Core Strategy Policy CS18:Biodiversity and Geological Conservation and all planning applications will have to comply with both CS18 and Development Management Policy DM 15:Biodiversity. These policies ensure that any proposed development where it cannot be demonstrated that no adverse effects on the integrity of a site of international importance to nature conservation will occur, will not be permitted.

Site Allocations DPD: Screening of Policies

7.5. Some 470 sites were submitted by developers and landowners for consideration for allocation. Screening of all the sites put forward for consideration took place to determine the most suitable housing and mixed use sites for development. Criteria were developed to look at many factors in a 3 stage process, the results of which are set out in the Site Allocations Technical Document. The first stage excluded sites which would have adversely affected sites of national biodiversity importance in accordance with policies within the Core Strategy and Development Management Policies DPD.

7.6. The sites selected for the Site Allocations DPD are listed below. The document also designates Key Employment Sites and Important Open Space. These latter two categories will not have any impact on habitats as they consist of existing sites, with no new significant development.

Table 4 Policy Number (HA=housing, EA=employment, TC=town centre MA=mixed use RA=recreation)	Site Name
HA1	Land at Potton Road, Biggleswade
HA2	Former London Road Council Offices, Biggleswade
EA1	Land East of Stratton Park, Biggleswade
TC1	Town Centre, Biggleswade
MA1	Land west of Station Road/New Road, Sandy
HA3	Former Meller Beauty Site, Sunderland Road, Sandy
EA2	Land North of Beamish Close, Sandy
HA4	Land west of Abbey Lane, Ampthill
HA5	Land North of Church Street, Ampthill
EA3	Land at Doolittle Mill (Phase 2), Ampthill
EA4	Land at Doolittle Mill (Phase1) Ampthill
MA2	Land at Steppingley Road and Froghall Road, Flitwick
TC2	Town Centre, Flitwick
RA1	Flitwick Football Centre, Ampthill Road, Flitwick
MA3	Land South of Wixams
HA6	Land at former hostel site, Houghton Conquest
HA7	Land rear of Central Garage, Cranfield
HA8	Land at High Street/Lodge Road, Cranfield
EA5	Land west of University Way and Wharley End, Cranfield
MA4	Land at Moreteyne farm, Marston Moretaine

Table 4 Policy Number (HA=housing, EA=employment, TC=town centre MA=mixed use RA=recreation)	Site Name
HA9	Land East of Sutton Mill Road, Potton
MA5	Land East of Biggleswade Road, Potton
HA10	Land at Stanford Road, Shefford
HA11	Land at Shawmer Farm, Shefford
HA12	Land at Arlesey Road, Stotfold
MA7	Land at former pig development Unti, Hitchin Road, Stotfold
HA13	Land at Roker Park, The Green, Stotfold
HA14	Land at Roecroft School Site, Stotfold
MA8	Land at Chase Farm and Land west and north-east of High Street, Arlesey
MA9	Cranfield University Campus, Silsoe
HA15	Land off Barford Road, Blunham
EA6	Land between A421 and Marston Gate Distribution Park, Brogborough
HA16	Land at New Road, Clifton
HA17	Land adj to Castle Hill Court, Clophill
HA18	Land rear of 122-124 High Street, Clophill
HA19	Land off Boot Lane Dunton
HA20	Sandy Road, Everton
HA21	The Heath, Everton
HA22	Land rear of The Wrestlers Public House, High Street, Langford
HA23	Land off Church Street, Langford

Table 4	
Policy Number (HA=housing, EA=employment, TC=town centre MA=mixed use RA=recreation)	Site Name
HA24	Land at Moor Lane, Maulden
EA7	Land adjacent to 29 Clophill Road, Maulden
HA25	Land rear of High Street, Meppershall
HA26	Land rear of The Guinea Pig Public House, Bedford Road, Moggerhanger
HA27	Land at High Street, Shillington
HA28	Land Rear of Station Road and Bedford Road, Lower Stondon
HA29	Peckworth Industrial Estate, Bedford Road, Lower Stondon
EA8	Land at Quest Pit, Ampthill Road, Houghton Conquest

Identification of Likely Impacts

7.7. The Strategy Review, consultation with Natural England and Screening of policies identified a number of impacts that have the potential to result in significant effects on Natura 2000 sites. These impacts can be broadly characterised against the following ‘pathways of impact’:

- Recreational Impacts
- Air quality
- Water Resources and Water Quality
- Changes to the flooding regime

7.8. These impacts are considered in more detail in the screening assessment tables in Appendix 1.

Task 3: Consideration of other plans and programmes

7.9. It is a requirement of Article 6(3) of the Habitats Directive that HRA examines the potential for plans and programmes to have a significant effect either individually or ‘in combination’ with other plans and programmes (PPs). Undertaking an assessment of other PPs requires a pragmatic approach

(given the extensive range of PPs underway in the region). For this screening consideration of other PPs has focused on those likely to lead to significant infrastructure/ development changes with related impacts.

7.10. The PPs considered at this stage are set out in Appendix 2 Core Strategy and Development Management Policies Habitats Screening Assessment (Nov 2008).

Task 4: Screening Assessment of the Site Allocations

7.11. In line with the screening requirements of the Habitats Regulations, an assessment was undertaken to determine the potential significant effects of the Site Allocations on the integrity of the Natura 2000 sites that lie within the potential influence of the plan.

8. Screening Assessment Summary

8.1. The issues raised in relation to identified impact pathways and their potential effects at the SAC sites (as assessed through the screening process) are summarised below.

- **Recreational Impacts** have the potential to increase as a result of the proposed development within the boundary. This issue was considered in relation to 2 of the sites: the Chilterns Beechwoods and Eversden and Wimpole Woods SACs, as the remaining sites are a considerable distance from the boundary and unlikely to be used for recreation by the population of CBC. Even for these 2 sites, any increased recreational use of the sites is considered to be minimal, given the distance from the main centres of population in CBC. Research indicates that most of the population will travel 5km or less for recreational activities (refer Appendix 2 of the Core Strategy and Development Management Policies Habitats Screening Assessment (Nov 2008)). In addition to this, the Green Infrastructure Strategy for Bedfordshire and Luton identifies a range of alternative strategic green spaces that are more readily accessible to the CBC population. It is therefore considered unlikely that the Site Allocation policies will result in significant increases in the levels of recreation at Chiltern Beechwoods Eversden and Wimpole Woods SACs.
- **Air quality.** Atmospheric pollution has the potential to increase as a result of increased development. The Chilterns Beechwoods SAC is vulnerable to the effects of air pollution, however, based on Natural England advice to Runnymede Borough Council on traffic-related air pollution⁷ and the HRA of the SE Plan⁸, it is

⁷ English Nature (16 May 2006) letter to Runnymede Borough Council, 'Conservation (Natural Habitats &c.) Regulations 1994, Runnymede Borough Council Local Development Framework'.

⁸ Levett-Therivel (2006) Appropriate Assessment of the Draft South East Plan. Final Report.

generally felt that air pollution only needs to be considered at a site if a road carrying a significant proportion of new traffic related to the plan runs within 200 meters of a European site. Beyond this distance air pollution impacts that may arise from traffic fall to background levels. Ashridge Commons and Woods SSSI is the closest section of the SAC to CBC and is not within 200m of any major roads. In addition, the policies proposed in the Site Allocations DPD will help to mitigate or offset increases in air pollution through measures such as ensuring high levels of sustainable design for new buildings and a wide range of sustainable transport choices. Taking this into account increased air pollution as a result of the site allocations will not have significant effects alone or in-combination on the Chilterns Beechwoods SAC.

- **Water Resources and water quality.** Further pressure will be placed on water resources as a result of increased development in the region, and this was considered in the HRA undertaken for the Revised changes to the East of England Plan. This was identified as a potential issue for water dependent SACs downstream of the CBC boundaries (Portholme SAC, Ouse Washes SAC and the Fenlands) and in relation to new development outlined in policies CS 5, 6 and 9. However, under the Habitats Regulations the Environment Agency has a duty to assess the effects of existing abstraction licences and any new applications to make sure they are not impacting on internationally important nature conservation sites. Water efficiency is also tested by the EA before a new license is granted.
- Policies within the Core Strategy and Development Management Policies DPD will also help to mitigate or offset increases in abstraction through measures such as ensuring high levels of sustainable design, which require high levels of water efficiency.
- Anglian Water Services are also working with local authorities and the EA on water cycle studies for major new developments. These will identify issues that need to be addressed to ensure that water supplies are provided in a timely manner without affecting existing customers, that wastewater can be collected, treated and returned to the environment without adverse effects.
- Taking this into account along with the requirement to carry out HRA against new abstraction licenses it is assessed that the sites allocated in the Site Allocations DPD will not have a significant effect on water resources or quality on these sites.

- **Increased runoff causing flooding:** Increased growth in the area may lead to pressure through increasing effluent discharge into the River Ouse, thereby leading to flooding of the Portholme SAC, to which the SACs plant community is particularly vulnerable. This was highlighted in the East of England RSS, however, with the application of the supporting text to policy WAT2 in the RSS (water resource and infrastructure development) the Appropriate Assessment concludes there will be no effect on the integrity of Portholme SAC. Water cycle studies being undertaken by Anglian Water will also ensure that wastewater can be collected, treated and returned to the environment without adverse effects and that surface water is managed to control flooding.

3.14 The main screening is set out in the tables at Appendix 1 and the results of the assessment are summarised in Table 5 below.

Table 5 HRA Screening Table Summary			
European Sites	Designation	AA required alone?	AA required in combination?
		× No ✓ Yes ? Uncertain	× No ✓ Yes ? Uncertain
Chiltern Beechwoods	SAC	×	×
Eversden and Wimpole Woods	SAC	×	×
Portholme SAC	SAC	×	×
Ouse Washes	SPA/ Ramsar/ SAC	×	×
Fenland	SAC	×	×
Chippenham Fen	Ramsar	×	×
Wicken Fen	Ramsar	×	×
Woodwalton Fen	Ramsar	×	×

9. Conclusions

9.1. This HRA screening process has considered the potential significant effect arising from the policies within the Site Allocations DPD. The site allocations have been considered against the provisions of the Core Strategy and development will be assessed against both Core Strategy and Development Management Policies at planning application stage. Therefore any specific development proposals will need to be in line with the Core Strategy and Development Management Policies DPD and will need to satisfy Central Bedfordshire Council and Natural England that there will be no likely

significant effects from the development on the internationally important sites or that any significant effects can be effectively mitigated or compensated.

9.2. Importantly, the amount, type and location of development that is allocated through the Site Allocations DPD is consistent with that established in the Core Strategy and the East of England Plan. The impacts associated with the Site Allocations DPD are not considered significantly different to those identified through the Appropriate Assessment Screening Reports of the Core Strategy and Development Management Policies DPD (adopted Nov 2009).

9.3. The screening assessment showed that the policies in implementation will not have a significant effect on Natura sites. Through focusing the majority of larger scale development in and adjacent to existing urban centres, away from Natura sites, and ensuring appropriate policies are put in place for the provision of green infrastructure, the impacts on the two closest SACS, Chiltern Beechwoods and Eversden and Wimpole Woods is considered minimal.

9.4. Potential impacts on the remaining sites due to pressures on water resources and quality or increased flooding have been considered alongside the findings of the HRA work undertaken for the East of England RSS, and given the regulatory environment, which requires the Environment Agency to assess the effects of existing abstraction licences and any new applications to make sure they are not impacting on internationally important nature conservation sites. Additionally the Core Strategy has policy measures that ensure the protection of environmental quality and that reduce the likelihood of adverse effects, including a policy on sustainable drainage systems.

9.5. The Habitats Directive requires the consideration of in-combination effects from other plans and projects, and potential effects of relevant plans and projects have been considered through the assessment. However the possibility of in-combination effects is significantly reduced where the plan alone is not implicated.

9.6. Accordingly it is assessed that **the Central Bedfordshire (North) Site Allocations DPD will not have significant effects on the Natura sites considered, either alone or in-combination. Therefore no further Appropriate Assessment is considered necessary.**

Appendix 1 Habitat Regulations Assessment Screening

Screening of European Sites outside Central Bedfordshire boundaries

The Chilterns Beechwoods SAC is a series of sites of which the closest to CBC lies approximately 5.5 km to the south east of Luton adjacent to the A41. The site represents a very extensive tract of *Asperulo-Fagetum* beech forests in the centre of the habitat's UK range. The woodland is an important part of a grassland-scrub-woodland mosaic. A distinctive feature in the woodland flora is the occurrence of the rare coral root *Cardamine bulbifera*.

Site Allocations	No sites have been allocated in the nearest parishes of Battlesden, Milton Bryan, Tingreth, Westoning or Harlington.
Screening assessment	<p>Chiltern Beechwoods SAC is approximately 11.8 km from the CBC boundary and is vulnerable to the effects of air pollution, disturbance, inappropriate management and loss of woodland. The increase in population proposed by the Core Strategy, and the location of new development (refer policy CS 1), are the key factors that have the potential to lead to negative effects through air pollution and disturbance.</p> <p><u>Air pollution:</u> According to APIS⁹, critical loads for acid and nitrogen deposition are already exceeded at the site. Existing advice relating to the effects of traffic-related pollution on designated habitats^{10,11}, provides that air pollution impacts at a site are most significant if a road carrying a significant proportion of new traffic [related to the plan] runs within 200 meters of a European site. Beyond this distance air pollution impacts that may arise from traffic fall to background levels. Ashridge Commons and Woods SSSI is the closest section of the SAC to CBC and is not within 200m of any major roads.</p> <p>Of the 9 SSSI units that comprise to form the Chilterns Beechwoods SAC 5 units are assessed to be in a 'favourable' condition and the other 4 are considered to be in an 'unfavourable recovering' condition. A key aspect of the Core Strategy reinforced by the Site Allocations DPD, which allocates employment and mixed use sites, is to reduce the levels of out-commuting which will help to mitigate or off-set any associated increases in emissions as a result of proposed development. Considering that the conditions of the various sites that comprise to form the Chilterns</p>

⁹ Air Pollution Information Systems. Available online: <http://www.apis.ac.uk/>

¹⁰ English Nature (16 May 2006) letter to Runnymede Borough Council, 'Conservation (Natural Habitats &c.) Regulations 1994, Runnymede Borough Council Local Development Framework'.

¹¹ Levett-Therivel (2006) Appropriate Assessment of the Draft South East Plan. Final Report.

Beechwoods SAC range from 'favourable' to 'unfavourable recovering' even with critical loads for acid and nitrogen deposition currently being exceeded, it is highly unlikely that development proposed within the Core Strategy and Site Allocations DPD will have a significant adverse effect on the site in terms of air quality.

Disturbance: Due to the distance of (11.2 km) the SAC from the district boundaries there will be no direct disturbance as a result of the plan, however there is some potential for increased recreation at the site due to an increased population. Additional recreational pressures depend on a number of factors including demographics, access to sites, the distance people are prepared to travel for recreational activities and access to alternative recreation sites. Research undertaken for the Thames Basin Heaths SPA indicated that 85 percent of visitors travel 5km or less for recreational activities; this is supported by a 2005 English Nature Study that suggests 5km as a cut-off distance for recreational use as a result of new development.¹² The Green Infrastructure Strategy for Bedfordshire and Luton identifies a range of alternative strategic green spaces that are more readily accessible to the CBC population than the SAC. It is therefore considered unlikely that the Site Allocations DPD will result in significant increases in the levels of recreation at Chiltern Beechwoods SAC.

Therefore the screening assessment has determined that **the Site Allocations DPD will not have significant effects, either alone or in-combination on Chiltern Beechwoods SAC.**

Eversden and Wimpole Woods lie approximately 0.67km to the East of the A1198. The site comprises a mixture of ancient coppice woodland (Eversden Wood) and high forest woods likely to be of more recent origin (Wimpole Woods). A colony of barbastelle bats *Barbastella barbastellus* is associated with the trees in Wimpole Woods. These trees are used as a summer maternity roost where the female bats gather to give birth and rear their young. Most of the roost sites are within tree crevices. The bats also use the site as a foraging area. Some of the woodland is also used as a flight path when bats forage outside the site.

Site Allocations	No sites allocated in Wrestlingworh & Cockayne Hatley parish. Biggleswade (373 houses, 15ha employment) is approximately 14.2 km from the SAC Dunton (15 dwellings) is approximately 11.7 km from the SAC Everton (15 dwellings) is approximately 13 km from the SAC Potton (240 dwellings, 1ha employment) is approximately 11 km from the SAC
Screening	Eversden and Wimpole Woods SAC is approximately 6.3km from the CBC boundary and is vulnerable to the effects of

¹² East of England RSS- Appropriate Assessment RPS- October 2007.

assessment recreation, habitat fragmentation and disturbance. It was considered that the increased population growth at CBC provided potential to increase recreational disturbance at the site.

JNCC information on the site states that the current use of the wood, including public access/ recreation, is considered compatible with the barbastelle interest and should not affect the barbastelle population or their roosts. Wimpole Woods are owned and managed by the National Trust and their management is aimed at maintaining, and where possible, enhancing the barbastelle population. Eversden Wood is privately-owned and the current management is considered compatible with the use of this wood as a foraging area/flight path by barbastelles.

The Site Allocations DPD will not lead to habitat fragmentation and direct disturbance of the European site due to the sites being some distance from the CBC boundary. Recreational impacts are likely to be minimal, considering a 5km cut-off distance for recreational use as a result of new development. The private management of the site also restricts hours and type of recreation.

The HRA of the South Cambridgeshire District Council LDF Core Strategy¹³ concluded that there are no likely significant effects on the conservation objectives of the site either alone or in-combination. This conclusion was also reached in the HRA Screening of the Hertfordshire Waste Development Plan Documents¹⁴ and the HRA of the Huntingdonshire LDF Core Strategy¹⁵, and the Appropriate Assessment of the East of England RSS, which considers the likely in-combination effects on European sites. Taking these factors into account along with the distance of the site from Central Bedfordshire and the Favourable condition of the site, it is assessed that **the Site Allocations DPD will not have significant effects, either alone or in-combination on Eversden and Wimpole Woods SAC.**

Portholme SAC is situated to the south of Huntingdon adjacent to the A14. This large site represents lowland hay meadows in eastern England. It is the largest surviving traditionally-managed meadow in the UK, with an area of 104 ha of alluvial flood meadow (7% of the total UK resource). There has been a long history of favourable management and very little of the site has suffered from agricultural improvement, and so it demonstrates good conservation of structure and function. It supports a small population of fritillary *Fritillaria meleagris*.

Site Allocations No sites have been allocated in Tempsford parish.
 Everton (15 dwellings) is approximately 19.7 km from the SAC

¹³ South Cambridgeshire District Council HRA of the LDF Core Strategy January 2007.

¹⁴ Levett-Therivel & Treweek Environmental Consultants (January 2007) AA Screening for the Hertfordshire Waste Development Plan Documents: Draft Report for Consultation.

¹⁵ Scott Wilson (June 2008) Habitats Regulations Assessment of the Huntingdonshire LDF Core Strategy.

	Blunham (36 dwellings) is approximately 21 km from the SAC
Screening assessment	<p>Portholme SAC is approximately 15.8 km from the CBC boundary and its vulnerabilities relate to the effects of grazing, scrub encroachment, changes in the hydrological regime, eutrophication and atmospheric pollution. The Appropriate Assessment undertaken for the East of England RSS specifies that increased runoff causing flooding is also a potential effect. Of these effects, it is only changes in the hydrological regime, eutrophication and increased runoff causing flooding that could be considered possible effects related to the Site Allocations DPD, as the distance of the site from the CBC boundary precludes other factors.</p> <p><u>Hydrological regime:</u> According to the JNCC the site has had a long history of favourable management and, therefore, demonstrates good conservation of structure and function. Under the Habitats Regulations the Environment Agency are required to assess the effects of existing abstraction licences and any new applications to make sure they are not impacting on internationally important nature conservation sites. The EA has also produced a Water Level Management Plan which aims to maintain the current water level management regime in the long term.</p> <p>The HRA of the Draft Revision to the Regional Spatial Strategy for the East of England concludes that the RSS will have no effect on the integrity of Portholme SAC as a result of changes made to the supporting text to policy WAT2 (water resource and infrastructure development), which seeks to phase new development so that it does not exceed capacity/ environmental limits of infrastructure. The Central Bedfordshire (North) LDF Documents must have regard to the RSS and this policy. The Development Management Policies contain a policy that relates to water efficiency and Sustainable Urban Drainage Systems, Policy (DM2) and this will further ensure that developments incorporate measures to minimise water use.</p> <p>In consultation with the EA, NE and conservation groups Anglian Water Services¹⁶ is planning to abstract and treat additional water from Rutland Water reservoir to meet growth in the west of the area. As part of this work, new shallow wetlands will be created adjacent to the reservoir to ensure that the internationally recognised wildlife is not affected when water levels fluctuate in the main body of the reservoir.</p> <p><u>Eutrophication attributable</u> to increased run off is a potential effect from increased development upstream of the SAC (eutrophication caused by atmospheric pollution is ruled out due to the distance of the site from the CBC boundary, whilst agricultural production, another source, will not be a product of the plan). Again, the CBC Development Management policy on Sustainable Drainage systems (DM2) would help to prevent any such effects, as will the production of water cycle studies for major new developments, being undertaken by Anglian Water Services working with local authorities and the EA.</p> <p><u>Increased runoff causing flooding:</u> Increased growth in the area may lead to pressure through increasing effluent</p>

¹⁶ Anglian Water Services (April 2008) Draft Water Resources Management Plan, Summary Report.

discharge into the River Ouse, thereby leading to flooding of the Portholme SAC, to which the SACs plant community is particularly vulnerable. This was highlighted in the East of England RSS, however again, with the application of the supporting text to policy WAT2 (water resource and infrastructure development) the Appropriate Assessment concludes there will be no effect on the integrity of Portholme SAC. The water cycle studies being undertaken by Anglian Water will also ensure that wastewater can be collected, treated and returned to the environment without adverse effects and that surface water is managed to control flooding.¹⁷

Taking this into account along with the strict regulations surrounding new licenses for abstraction and the subsequent HRA carried out alongside each existing and new license, it is assessed that changes in future abstraction levels and to the flooding regime that potentially result from the implementation of **the CBC Site Allocations DPD will not have significant effects on water levels and water quality, either alone or in-combination on the Portholme SAC.**

Fenland SAC is comprised of 3 SSSI that are also designated as Ramsar sites. The individual sites within Fenland SAC each hold large areas of calcareous fens, with a long and well-documented history of regular management. There is a full range from species-poor Cladium-dominated fen to species-rich fen with a lower proportion of Cladium and containing such species as black bog-rush *Schoenus nigricans*, tormentil *Potentilla erecta* and meadow thistle *Cirsium dissectum*. There are good transitions to purple moor-grass *Molinia caerulea* and rush pastures, all set within a mosaic of reedbeds and wet pastures. Fenland contains, particularly at Chippenham Fen, one of the most extensive examples of the tall herb-rich *Molinia caerulea* – *Cirsium dissectum* fen-meadow. It is important for the conservation of the geographical and ecological range of the habitat type, as this type of fen-meadow is rare and ecologically distinctive in East Anglia. The fenland grasslands are dependent upon traditional management practices of cutting and grazing by livestock. In recent decades scrub and woodland have spread at the expense of fen vegetation.

Chippenham Fen Ramsar site is a spring-fed calcareous basin mire with a long history of management, which is partly reflected in the diversity of present-day vegetation. The invertebrate fauna is very rich, partly due to its transitional position between Fenland and Breckland. The species list is very long, including many rare and scarce invertebrates characteristic of ancient fenland sites in Britain. The site also supports diverse vegetation types, rare and scarce plants.

Wicken Fen Ramsar site contains one of the most outstanding remnants of the East Anglian peat fens. The area is

¹⁷ In 2006/07 Anglian Water Services achieved 97.3 per cent compliance of treated wastewater discharges against consent standards (up from 96.0 per cent in the previous year. Anglian Water Services (2007) Community and Environment Report.

one of the few which has not been drained. Traditional management has created a mosaic of habitats from open water to sedge and litter fields. The site supports one species of British Red Data Book plant, fen violet *Viola persicifolia*, which survives at only two other sites in Britain. It also contains eight nationally scarce plants and 121 British Red Data Book invertebrates.

Woodwalton Fen Ramsar site is within an area that is one of the remaining parts of East Anglia which has not been drained. The fen is near natural and has developed where peat-digging took place in the 19th century. The site has several types of open fen and swamp communities. The site supports two species of British Red Data Book plants, fen violet, *Viola persicifolia* and fen wood-rush *Luzula pallidula*. Woodwalton also supports a large number of wetland invertebrates including 20 British Red Data Book species. Aquatic beetles, flies and moths are particularly well represented.

Site Allocations	All sites in excess of 25 km away from SAC
Screening assessment	<p>Fenland SAC and Ramsar sites are in 3 different locations, Woodwalton Fen Ramsar is situated in Huntingdonshire, Wicken Fen and Chippenham Fen Ramsar sites can be found within East Cambridgeshire. The sites are vulnerable to the effects of inappropriate grazing/ cutting regime, changes in the hydrological regime (water levels and quality) and atmospheric pollution. Due to the considerable distance of the sites from the CBC boundary (the closest being over 25km away), changes to the hydrological regime are considered to be the only potential effect of the plan.</p> <p><u>Changes to the hydrological regime:</u> Under the Habitats Regulations the Environment Agency are required to assess the effects of existing abstraction licences and any new applications to make sure they are not impacting on internationally important nature conservation sites. The quality of water released from wastewater treatment works is also closely monitored and regulated by the Environment Agency. In consultation with the EA, NE and conservation groups Anglian Water Services¹⁸ is planning to abstract and treat additional water from Rutland Water reservoir to meet growth in the west of the area. As part of this work, new shallow wetlands will be created adjacent to the reservoir to ensure that the internationally recognised wildlife is not affected when water levels fluctuate in the main body of the reservoir. Anglian Water Services are also working with local authorities and the EA on water cycle studies for major new developments. These will identify issues that need to be addressed to ensure that water supplies are provided in a timely manner without affecting existing customers, that wastewater can be collected, treated and returned to the environment without adverse effects and that surface water is managed to control flooding. In 2006/07 Anglian Water Services achieved 97.3 per cent compliance of treated wastewater discharges against consent standards (up from 96.0 per cent in the previous year)¹⁹.</p> <p>The HRA of the Draft Revision to the Regional Spatial Strategy for the East of England concludes that the RSS will have no effect on the integrity of Woodwalton Fen, Wicken Fen and Chippenham Fen Ramsar sites, which are all</p>

¹⁸ Anglian Water Services (April 2008) Draft Water Resources Management Plan, Summary Report.

¹⁹ Anglian Water Services (2007) Community and Environment Report

components of the Fenland SAC. At this time specific potential in-combination impacts cannot be explored in absence of specific development locations in all areas that may influence the site. However, given the strict regulations surrounding new licenses for abstraction and the subsequent HRA carried out alongside each existing and new license, it is assessed that changes in future abstraction levels that result from the implementation of **the Site Allocations DPD will not have significant effects on water levels and water quality, either alone or in-combination on the Fenlands SAC or Ramsar sites.**

The Ouse Washes are located in eastern England on one of the major tributary rivers of The Wash. It is an extensive area of seasonally flooding wet grassland lying between the Old and New Bedford Rivers, and acts as a floodwater storage system during winter months. The cycle of winter storage of floodwaters from the river and traditional summer grazing by cattle, as well as hay production, have given rise to a mosaic of rough grassland and wet pasture, with a diverse and rich ditch fauna and flora. The washlands support both breeding and wintering waterbirds. In summer, there are important breeding numbers of several wader species, as well as Spotted Crake *Porzana porzana*. In winter, the site holds very large numbers of swans, ducks and waders. During severe winter weather elsewhere, the Ouse Washes can attract waterbirds from other areas due to its relatively mild climate (compared with continental Europe) and abundant food resources. In winter, some wildfowl, especially swans, feed on surrounding agricultural land. The Ouse Washes also supports spined loach *Cobitis taenia* populations within the River Ouse catchment. The Counter Drain, with its clear water and abundant macrophytes, is particularly important, and a healthy population of spined loach is known to occur.

Site Allocations	All sites are in excess of 25km away from SAC
Screening assessment	<p>Ouse Washes SAC/ SPA/ Ramsar is approximately 27 km from the CBC boundary and its vulnerabilities relate to the effects of grazing, scrub encroachment, changes in the hydrological regime, eutrophication and atmospheric pollution. Due to the considerable distance of the site from the CBC boundary, changes to the hydrological regime and eutrophication are considered to be the only potential effect of the plan.</p> <p>Changes to the hydrological regime: The need to ensure there is sufficient water for the Old and New Bedford Rivers is addressed through the Water Level Management Plan agreed by the Environment Agency and partner organisations. Under the Habitats Regulations the Environment Agency are required to assess the effects of existing abstraction licences and any new applications to make sure they are not impacting on internationally important nature conservation sites. The Habitats Directive review of consents has been progressed to confirm that there is no significant risk to The Wash and the Ouse and Nene Washes. Following an extensive study to secure the use of Rutland Water to increase</p>

the output from the reservoir a package of habitat creation works has been agreed that will protect the integrity of the reservoir as an SPA against drawdown during a period of drought²⁰. In consultation with the EA, NE and conservation groups Anglian Water Services²¹ is planning to abstract and treat additional water from Rutland Water reservoir to meet growth in the west of the area. As part of this work, new shallow wetlands will be created adjacent to the reservoir to ensure that the internationally recognised wildlife is not affected when water levels fluctuate in the main body of the reservoir. Anglian Water Services are also working with local authorities and the EA on water cycle studies for major new developments. These will identify issues that need to be addressed to ensure that water supplies are provided in a timely manner without affecting existing customers, that wastewater can be collected, treated and returned to the environment without adverse effects and that surface water is managed to control flooding. In 2006/07 Anglian Water Services achieved 97.3 per cent compliance of treated wastewater discharges against consent standards (up from 96.0 per cent in the previous year)²².

The HRA of the Draft Revision to the Regional Spatial Strategy for the East of England concludes that the RSS will have no effect on the integrity of the Ouse Washes SAC/ SPA/ Ramsar as a result of changes made to the supporting text to policy WAT2 (water resource and infrastructure development), which seeks to phase new development so that it does not exceed capacity/ environmental limits of infrastructure. The Central Bedfordshire District Council LDF Documents must have regard to the RSS and this policy. The Core Strategy and Development Management Policies contain a policy that relates to water efficiency and Sustainable Urban Drainage Systems, Policy DM2 will ensure that developments incorporate measures to minimise water use. Taking all these factors into account it is considered that **the Site Allocations DPD will not have significant effects on water levels and water quality, either alone or in combination on the Ouse Washes SAC/SPA and Ramsar site.**

²⁰ Anglian Water Services (April 2008) Draft Water Resources Management Plan.

²¹ Anglian Water Services (April 2008) Draft Water Resources Management Plan, Summary Report.

²² Anglian Water Services (2007) Community and Environment Report.