

Task 1 Appropriate Assessment of the Joint Core Strategy for Broadland, Norwich and South Norfolk

Volume II: Screening Matrix

Regulation 48 of the Conservation (Natural Habitats & c) Regulations 1994

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List of Contents		Page
Summary		S-1
Chapters and Appendices		
1	Policies in the Joint Core Strategy	1-1
	1.1 Aim and Objectives of the Screening Matrix	1-1
	1.2 Policies Covered in the Screen Matrix	1-1
2	Task 1 Screening Matrix –Summary	2-1
Appendix A	Task 1 Screening Matrix	A-1
Table 1.1: Policies in the Joint Core Strategy		1-2
Table 2.1: Summary of Task1 Likely Significant Effects on Designated Sites		2-1
Table A.1: Policy 4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes		A-2
Table A.2: Policy 5 Locations for Major and Development in the Norwich Policy Area		A-28
Table A.3: Policy 6 - Main Towns		A-53
Table A.4: Policy 7 - Key Services		A-75
Table 2.5: Policy 16 - Strategic Access and Transportation		A-95

Guide to the Use of Volume II and III

The use of this screening matrix should be undertaken in connection with the designated maps, the description of the designated sites and the sensitivities of the features of each of the sites (see Volume III).

Screening Matrix

All of the screening matrix tables are colour coded in accordance with the likely significant effects, using the following codes:

NLSE	No Likely Significant Effect(s)
LSE	Likely Significant Effect(s) – A likely significant effect on the site’s conservation objectives requiring modification of the JCS policy or undertake Task 2 Appropriate Assessment.
U	Uncertain - cannot determine if NLSE or LSE (see above) so <u>may</u> require modification of the JCS policy or undertake Task 2 Appropriate Assessment.

Designated Site Maps

The designated site maps have been produced to provide a guideline to the potential direct and localised indirect zone of potential impact on the individual designated sites. This is done by creating zones around each designated site which are presented in each map (Volume III) using the following colour codes:

Zone	Description
Red	Constituted by the designated site area. Any development within these boundaries has the potential to have a significant direct effect. Task 2 Appropriate Assessment must be undertaken for any works within this area.
Orange	Area between the designated site boundary and 2 km away from the designated site. Any development within these boundaries can potentially result in significant effects (direct or indirect) depending on the reasons for its designation, vulnerability of the site and scale of the proposed development. Unless the contrary is specified in the screening matrix, it may lead to a Task 2 Appropriate Assessment.
Green	Area confined between the boundaries of the orange zone and 1 km away from it. Any development within these boundaries may potentially result in indirect impacts. However these impacts are unlikely to be significant, unless otherwise specified in the matrix. Depending on the reasons for its designation, vulnerability of the site and scale of the proposed development it may not lead to a Task 2 Appropriate Assessment.

Exceptions to this methodology are:

Paston Great Barn SAC – designated due to the presence of the barbastelle bats, the orange zone was delimited as being 10 km away from the SAC boundary and the green buffer as 5 km away from the orange boundary.

River Wensum – orange zone is delimited by the river catchment.

1 Policies in the Joint Core Strategy

1.1 Aim and Objectives of the Screening Matrix

The overall aim of the screening matrix is to review the specific policies of the JCS and assess the likelihood of the policy, once implemented, affecting the integrity of the designated sites and the conservation status of qualifying features. The screening matrix acts as a process by which the effect of the policies on the conservation status and objectives are linked to the sensitivity of the feature to disturbance.

The objectives of this screening matrix are to:

- Identify those policies which will not have any likely significant effect on the designated sites within the ZoI of the JCS;
- Identify those policies which could have a likely significant effect and therefore require a Task 2 Appropriate Assessment, and;
- Identify where there is insufficient information or uncertainty in being able to assess whether or not a likely significant effect could occur. In this case and in accordance with the 'precautionary principle' a Task 2 Appropriate Assessment is normally recommended.

1.2 Policies Covered in the Screen Matrix

Policies in the JCS are listed in Table 1.1. Not all the policies have been included in the screening matrix because the activities or outcomes from some of the policies will not result in any actions which are likely to have any significant effects on designated sites within the ZoI of the JCS.

Those policies which are not been assessed as part of this Task 1 Appropriate Assessment because the policy will not impact on designated sites are:

- Policies 1, 2 and 12: Policies which address the outline of the spatial strategy. Likely effects from these policies will be assessed in more detailed were information on the scale of the proposed developments is provided.
- Policies 10, 11, 13 and 17: Policies that aim at protect the environment and from which no negative effects are likely.
- Policies 10 & 11: These policies explain the strategy for development in the countryside and in areas next to the Broads. In the countryside housing will be allocated for specific needs. At The Broads the policy states that particular regard will be applied to maintain and enhance the economy, environmental quality of The Broads. No significant impacts are anticipated either alone or in-combination.
- Policy 18: This policy provides details on the approach to be taken forward to developed different themes (including health, education, culture and leisure) across the whole JCS area. No significant impacts are anticipated either alone or in-combination.

- Policy 19: Details how the strategy will be implemented and explains the monitoring process. No impacts will result from this Policy.

Those policies have been assessed as part of this Task 1 Appropriate Assessment but are not regarded to have any likely significant effect and therefore not considered further in this Task 1 AA, these are:

- Policy 3: details developments proposed for the Norwich city centre. These were already the object of an AA. No likely significant effects were considered.
- Policies 8 & 9: these two policies provide details for development in service villages and other villages. The scale of the proposed developments is minor compared to what is proposed for the JCS. No significant impacts are anticipated either alone or in-combination.
- Policy 14: this policy explains the strategy for housing delivery, to provide appropriate housing mix, affordable housing. It also makes provisions for gypsies and travellers pitches however no details on locations is given and individual sites are small (up to 12 pitches) and therefore unlikely to result in significant impacts to any Natura 2000 sites.
- Policy 15: This policy explains the strategy for the economy. The local economy will be developed in locations consistent with the spatial hierarchy. Impacts resulting from this policy will be the same to impacts described for the spatial policies.

Those policies included in this Task 1 AA screening matrix are colour coded in table 1.1 below.

Table 1.1: Policies in the Joint Core Strategy

Policies considered under the Joint Core Strategy	
Policies for places	
1	Settlement Hierarchy
2	Strategy for growth in the Norwich Policy Area (NPA)
3	Norwich City Centre
4	Remainder of the Norwich Area including fringe parishes
5	Locations for major change and developments in the Norwich Policy Area
6	Main Towns
7	Key Services Centres
8	Service Villages
9	Other Villages
10	The Countryside
11	The Broads*
12	The Hierarchy of Centres
Area wide policies	
13	Reducing environmental impact*
14	Housing delivery
15	The Economy
16	Strategic access and transportation
17	Environmental assets*
18	Communities and culture*
19	Implementation and monitoring

Key:

*	Potential environmental benefit through the implementation of this policy
Orange	Policy assessed as part of the Task 1 AA
Green	Policy assessed by this Task 1 and no likely significant effects
Yellow	Policy with no activities which involve direct mechanisms which could lead to a significant effect.

2 Task 1 Screening Matrix –Summary

The full Task 1 screening matrix for each of the policies highlighted in table 1.1 can be viewed in Tables A.1 to A7 in Appendix A. A summary of the results is presented in Table 2.1. In this table the final result of the Task 1 screening process is presented for each designated site against each Policy.

Table 2.1: Summary of Task1 Likely Significant Effects on Designated Sites

Policy	Place policies												Area wide policies						
	P1	P2	P3	P4	P5	P6	P7	P8	P9	P10	P11	P12	P13	P14	P15	P16	P17	P18	P19
Benacre to Easton Barents SPA	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Breckland SPA	NLSE	NLSE	NLSE	U	U	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE
Breydon Water SPA	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE
Broadland SPA	NLSE	NLSE	NLSE	LSE	LSE	NLSE	LSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE
North Norfolk Coast SPA	NLSE	NLSE	NLSE	U	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Great Yarmouth North Denes SPA	NLSE	NLSE	NLSE	U	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Minsmere – Walberswick SPA	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
The Wash SPA	NLSE	NLSE	NLSE	U	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE

Policy	Place policies												Area wide policies						
	P1	P2	P3	P4	P5	P6	P7	P8	P9	P10	P11	P12	P13	P14	P15	P16	P17	P18	P19
Benacre to East Barents Lagoons SAC	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Breckland SAC	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE
North Norfolk SAC	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Norfolk Valley Fens SAC	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Paston Great Barn SAC	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Overstrand Cliffs SAC	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
River Wensum SAC	NLSE	NLSE	NLSE	LSE	LSE	NLSE	LSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
The Broads SAC	NLSE	NLSE	NLSE	LSE	LSE	NLSE	LSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
The Wash and North Norfolk Coast	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Waveney & Little Ouse Valley Fens SAC	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Winterton – Horsey Dunes SAC	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Breydon Water Ramsar	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE

Policy	Place policies												Area wide policies						
	P1	P2	P3	P4	P5	P6	P7	P8	P9	P10	P11	P12	P13	P14	P15	P16	P17	P18	P19
Broadland Ramsar	NLSE	NLSE	NLSE	LSE	LSE	NLSE	LSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	LSE	NLSE	NLSE	NLSE
Minsmere – Walberswick Ramsar	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
North Norfolk Coast Ramsar	NLSE	NLSE	NLSE	U	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
Redgrave & South Lopham Fens Ramsar	NLSE	NLSE	NLSE	NLSE	NLSE	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE
The Wash Ramsar	NLSE	NLSE	NLSE	U	U	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE	NLSE

Appendix A Task 1 Screening Matrix

CODE:	
NLSE	No Likely Significant Effect(s)
LSE	Likely Significant Effect(s) – A likely significant effect on the site’s conservation objectives requiring modification of the policy or undertake Task 2 Appropriate Assessment.
U	Uncertain - cannot determine if NLSE or LSE (see above) so <u>may</u> require modification of the JCS policy and actions

Note: The designated site’s conservation objectives are includede in Volume III section 1.

Table A.1: Policy 4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Benacre to Easton Bavents SPA	Bittern <i>Botaurus stellaris</i>	Due to the distance between the SPA and the proposed developments (more than 20 km), the vulnerability of the site being attributed to natural processes (Volume III, section 1.1), coupled with the low sensitivity of the bird species (Volume III, section 3.2), no direct impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
Breckland SPA	Stone-curlew <i>Burhinus aedionemus</i>	No developments are proposed within the SPA zones. As such, no direct impacts are expected due to the proposed developments in the Norwich urban area. However, the SPA is vulnerable to recreational activities (Volume III, section 1.2), and the species are sensitive to noise disturbance (Volume III, section 3.2), impacts on this designated site due to potential increase in tourism pressure are unclear at this stage.	NLSE	Uncertain
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	Uncertain
	Woodlark <i>Lullula arborea</i>		NLSE	Uncertain
Breydon Water SPA condition	Bewick's swan <i>Cygnus columbianus bewickii</i>	No direct impacts are expected due to the proposed developments in the Norwich urban area. The key vulnerability of the site being loss of habitats and poor water management (Volume III, section 1.3) which would not be effected by the Policy. The	NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Golden plover <i>Pluvialis apricaria</i>	species are not particularly sensitive to related in-combination effects.	NLSE	NLSE
	Ruff <i>Philomachus pugnase</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Broadland SPA	Bewick’s swan <i>Cygnus columbianus bewickii</i>	Habitats in this SPA are highly sensitive to water abstraction, discharge impacts and disturbance effects (see Volume III, section 1.4).	LSE	LSE
	Whooper swan <i>Cygnus cygnus</i>	In some areas, namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle, are proposed to be highly developed with up to 10,000 dwellings.	LSE	LSE
	Bittern <i>Botaurus stellaris</i>	Areas of this designated site are located within the orange zone (orange buffer, see maps in Volume III). As such impacts from disturbance may be significant in areas of the SPA.	LSE	LSE
	Marsh harrier <i>Circus aeruginosus</i>	Impacts from increased tourism pressure may also result specially in units of the SPA located close to it (specifically the Yare Broads and Marshes SSSI located within 1 km from Thorpe St Andrew).	LSE	LSE
	Hen harrier <i>Circus cyganeus</i>		LSE	LSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>However, these issues are being addressed under the Broads Authority Plan, and therefore any direct and indirect effects are uncertain depending on the effectiveness of the Plan and impacts from this policy.</p> <p>In-combination impacts may result from the overall proposed developments under this strategy, leading to increased water abstraction and potential increase in discharges in the rivers catchment basins that feed the Broads SPA.</p> <p>Climate change may exacerbate these impacts and also influence tourism pressure in the Broads</p>		
North Norfolk Coast SPA	Bittern <i>Botaurus stellaris</i>	Due to the distance between the SPA and the proposed developments (more than 20 km) no direct impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	Uncertain
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	Uncertain
	Avocet <i>Recurvirostra avosetta</i>	Disturbance to the bird community is uncertain due to in-combination with Kyng's Lynn & West Norfolk Borough Councils proposed growth.	NLSE	Uncertain
	Little tern <i>Sternula albifrons</i>		NLSE	Uncertain

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>		NLSE	Uncertain
Great Yarmouth North Denes SPA	Little tern <i>Sternula albifrons</i>	<p>Due to the distance between the SPA and the proposed developments (more than 20 km) no direct impacts are anticipated that could affect the conservation objectives of the SPA and its features. However given the major scale of the developments proposed in the East areas of Norwich and the vulnerability of the site (Volume III, section 1.6) and the sensitivity of the species (Volume III, section 3.2), it is reasonable to expect an increase in tourism pressure and potential disturbance.</p> <p>Uncertain in-combination effects due to increased tourism pressure, climate change (and consequent coastal squeeze) and developments proposed under the Great Yarmouth LDF.</p>	NLSE	Uncertain
Minsmere – Walberswick SPA	Bittern <i>Botaurus stellaris</i>	Due to the distance between the SPA and the proposed developments (more than 20 km), and the site is being actively managed and its long-term conservation objectives are being addressed in the Shoreline Management Plan, no impacts are	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Hen harrier <i>Circus cyganeus</i>	anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
The Wash SPA	Bewick's swan <i>Cygnus columbianus bewickii</i>	Due to the distance between the SPA and the proposed developments (more than 20 km), that the site is being actively managed through Wash Estuary Management Plan and the JCS would not contribute to any coastal squeeze issues in this area, no direct or indirect impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	Uncertain
	Bar-tailed godwit <i>Limosa lapponica</i>		NLSE	Uncertain
	Little tern <i>Sternula albifrons</i>		NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>	Disturbance to the bird community is uncertain due to in-combination with Kyng's Lynn & West Norfolk Borough Councils proposed growth.	NLSE	Uncertain
Benacre to East Barents Lagoons SAC	Coastal lagoons	This designated site is particularly sensitive to coastal squeeze and erosion issues (Volume III,	NLSE	NLSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		section 1.9) Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts due to the location of the SAC.		
Breckland SAC	Inland dunes with open <i>Corynephorus</i> and <i>Agrostis</i> grasslands	Proposed developments in suburban areas of Norwich City do not impose direct impacts on the habitats for which the SAC is designated. The SAC is vulnerable to recreational activities and related disturbance (Volume III, section 1.10). However, these should be managed through its conservation management plan. It is possible that growth in the Norwich would increase number of visitors, but unlikely to be sufficient significant to be unmanageable and then have an impact on habitats.	NLSE	NLSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation		NLSE	NLSE
	European dry heaths		NLSE	NLSE
	Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco-Brometalia</i>)		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> .		NLSE	NLSE
	Great crested newts <i>Triturus cristatus</i>	Great crested newts are particularly sensitive to habitat loss or fragmentation. These are not expected to occur due to the implementation of this	NLSE	NLSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		policy.		
North Norfolk Coast SAC	Coastal lagoons Perennial vegetation of stony banks Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Embryonic shifting dunes Shifting dunes along the shoreline with <i>Ammophila arenaria</i> (‘white dunes’) Fixed dunes with herbaceous vegetation (‘grey dunes’) Humid dune slacks	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance from P4 developments) it is unlikely that significant impacts to the habitats will occur. There could be additional tourism and recreational activities, with people visiting the SAC. However, with the site being managed under the AONB Management Plan and unlikely significant increase in tourists should be managed and therefore no significant impacts likely.	NLSE	NLSE
	Petalwort <i>Petalophyllum ralfsii</i> ; Otter <i>Lutra lutra</i>		NLSE	NLSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Norfolk Valley Fens SAC	Alkaline fens	<p>Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats.</p> <p>There may be an increase in visitor’s numbers. However this is not considered significant, in particular because the key vulnerability of the site is reduction in the water table and associated ground water abstraction (Volume II, section 1.12), this policy 4 is unlikely to have a significant effect.</p>	NLSE	NSLE
	Northern Atlantic wet heath with <i>Erica tetralix</i>		NLSE	NLSE
	European dry heaths		NLSE	NLSE
	Semi-natural dry grassland and scrubland facies: on calcareous substrates		NLSE	NLSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		NLSE	NLSE
	Calcareous fen with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	NLSE
	Narrow-mouthed whorl snail <i>Vertigo angustior</i>		NLSE	NLSE
	Desmoulin’s whorl snail		NLSE	NLSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Vertigo moulinsiana</i>			
Overstrand Cliffs SAC	Vegetated sea cliffs of the Atlantic and Baltic coasts	Proposed developments in suburban areas of Norwich City are unlikely to impose any impacts on this type of habitats (see Volume III, section 1.13)	NLSE	NLSE
Paston Great Barn SAC	Barbastelles <i>Barbastella barbastellus</i>	This species is very sensitive to disturbance and changes in food availability. It typically forages 5-6 km from their roosts and has been recorded to travel up to 18 km. Due to the rarity of the species in the UK and the precautionary approach, a ZoI of 10 km is used. However, Norwich City Centre distance from the SAC is more than 20 km and therefore no Likely Significant Effects are anticipated.	NLSE	NLSE
River Wensum SAC	Water course of plain to montane levels with the <i>Ranunculion fluitantis</i> and <i>Callitricho-Batrachion</i> vegetation	Most of the developments proposed for Norwich suburban areas are located downstream the River Wensum SAC boundary. However developments proposed in Costessey, Drayton and Taverham (see Figure A.11) may have the potential to impact the SAC designated features such as the <i>Ranunculion</i> communities. This habitat is sensitive to physical modification and changes in water quality which may arise through habitat modification (see Volume III, section 2.27). If developments are	Uncertain	LSE/Uncertain

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>proposed close to the river margins, increased run-off from increased traffic may have negative effects to the water quality.</p> <p>In-combination impacts may result from the overall developments scale which might intensify water abstraction and/or discharges into the river. Climate change may intensify these effects.</p> <p>However under the WFD driver the draft RBMP for the Anglian River Basin District proposes to achieve good ecological status in all water bodies of the Anglian District. New discharges will have to comply with this objective. Any negative impacts may also be compensated by the River Wensum Restoration Plan.</p>		
	White-clawed crayfish <i>Austropotamobius pallipes</i>	<p>Suspended sediments in the water are detrimental to white-clawed crayfish as it may clog the gills and lead to long term damage. Increased run-off due to potential changes in river bank and/or increased traffic might lead to alterations in the river bed substrate and make the river unsuitable for this species (see Volume III, section 3.4), in areas close to the proposed developments.</p> <p>Changes to water quality may also occur due to an</p>	Uncertain	LSE/Uncertain

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>increased discharges and abstraction.</p> <p>In-combination impacts may result from the overall developments scale which might intensify water abstraction and/or discharges into the river. Climate change may intensify these effects.</p> <p>However under the WFD driver the draft RBMP for the Anglian River Basin District proposes to achieve good ecological status in all water bodies of the Anglian District. New discharges will have to comply with this objective.</p>		
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	Likely significant effects may occur if developments lead to suitable habitat loss and long-term changes in the hydrological conditions along the Wensum.	Uncertain	LSE
	Brook lamprey <i>Lampetra planeri</i>	<p>Brook lamprey is sensitive to poor water quality from different sources. This could affect nursery as well as spawning places. Poor water conditions may also act as a barrier to migration, if prevents the lamprey to use sections of the river.</p> <p>Therefore any significant changes in a section of a river where adult brook lamprey may occur, or pass through, could potentially have a negative effect on the population. However, the impact from this</p>	Uncertain	LSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>policy alone is unlikely to be significant, although in-combination effects could occur from the overall developments scale which might intensify water abstraction and/or discharges into the river. Climate change may intensify these effects.</p> <p>Further studies on brook lamprey migration patterns within the River Wensum may be necessary to anticipate any potential future impacts.</p> <p>However, under the WFD driver the draft RBMP for the Anglian River Basin District proposes to achieve good ecological status in all water bodies of the Anglian District. New discharges will have to comply with this objective.</p>		
	Bullhead <i>Cottus gobio</i>	<p>Bullhead is sensitive to habitat modification including siltation of the river bed and removal of riparian trees. Developments in some of the proposed areas have the potential to affect riparian habitats if located in close vicinity to the River Wensum SAC. In addition increased siltation may occur as a consequence to increased traffic and road runoff.</p> <p>Possible in-combination effects as described for lamprey.</p>	Uncertain	LSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
The Broads SAC	Hard oligo-mesotrophic water with benthic vegetation of <i>Chara</i> spp.	These habitats are highly sensitive to water abstraction, tourism and recreational pressures (see Volume III section 1.16).	LSE	LSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation	Impacts may result if an increase in water abstraction results from an increase in population numbers and water demand in Norwich and Norwich suburban areas. This may affect the designated site and designated features if significant changes in the water table levels occur.	LSE	LSE
	Transition mires and quaking bogs		LSE	LSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>	In some areas, namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle, are proposed to be highly developed with up to 10,000 dwellings. Impacts from increased tourism pressure may result specially in units of the SAC located very close to it (specifically the Yare Broads and Marshes SSSI located within 1 km from Thorpe St Andrew).	LSE	LSE
	Alkaline fens		LSE	LSE
	Alluvial forests with <i>Alnus aglutinosa</i> and <i>Fraxinus excelsior</i>		LSE	LSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils	In-combination impacts may result from the overall proposed developments under this strategy, leading to increased water abstraction and potential increase in discharges in the rivers catchment basins that feed the Broads SPA. Climate change may exacerbate these impacts and	LSE	LSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		also influence tourism pressure in the Broads		
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	There is the potential for Likely Significant Effects from the proposed development if the habitat suitable for this species is affected through hydrological changes. Although no direct impacts are anticipated, any changes in the hydrological conditions could have an indirect significant impact.	Uncertain	LSE
	Otter <i>Lutra lutra</i>	Otters may be negatively affected by changes in water quality that affect the fish community and abundance. But unlikely to be significantly affected by this Policy alone unless there is a direct impact on the Broads.	LSE	LSE
	Fen orchid <i>Liparis loeselii</i>	There is the potential for Likely Significant Effects from the proposed development if there are significant changes in the hydrological conditions on the site.	Uncertain	LSE
The Wash and North Norfolk Coast SAC	Sandbanks which are slightly covered by sea water all the time Mudflats and sandflats not covered by seawater at low tide	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance) it is unlikely that significant impacts to the habitats and species will occur.	NLSE	NLSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Large shallow inlets and bays Reefs <i>Salicornia</i> and other annuals colonising mud and sand Atlantic salt meadows (<i>Glauco-Puccinellietalia maritimae</i>) Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Coastal lagoons			
	Common seal <i>Phoca vitulina</i>		NLSE	NLSE
	Otter <i>Lutra lutra</i>		NLSE	NLSE
Waveney & Little Ouse Valley Fens SAC	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils	Due to the location of the SAC more than 30 km south to the proposed development sites. It is unlikely that P4 will affect significantly the designated site. The site is vulnerable to hydrological disruption, but this is unlikely given the distance and any in-combination effects compensated by the restoration project (see Volume	NLSE	NLSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>		NLSE	NLSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	III, section 1.18).	NLSE	NLSE
Winterton – Horsey Dunes SAC	Atlantic decalcified fixed dunes <i>(Calluno –Ulicetea)</i>	Due to the location of the SAC more than 30 km south to the proposed development sites. It is unlikely that P4 will impose direct impacts to the designated. However due to the scale of the developments it is reasonable to expect an increase in tourism pressure in the designated site. This may have a negative effect in the dune habitats due to disturbance. Likely significant effects are uncertain as it is uncertain the estimation of an increase in number of visitors to the SAC. In-combination impacts due to overall scale of the proposed development in this strategy and proposed developments in the Great Yarmouth LDF. In addition future pressure from climate change may also aggravate tourism pressure and also result in coastal squeeze with potential habitat loss making this site more vulnerable to other impacts.	NLSE	Uncertain
	Humid dune slacks		NLSE	Uncertain
	Embryonic shifting dunes		NLSE	Uncertain
	Shifting dunes along the shoreline with <i>Ammophila Arenaria</i> (white dunes)		NLSE	Uncertain
Breydon Water Ramsar	CRITERION 5			
	Waterfowl assemblage	Direct and indirect impacts are unlikely to result to habitats that support these species.	NLSE	NLSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		The species are not particularly sensitive to in-combination impacts.		
	CRITERION 6			
	Bewick’s swan <i>Cygrus columbianus bewickii</i>	Direct and indirect impacts are unlikely to result to habitats that support these species.	NLSE	NLSE
	Lapwing <i>Vanellus vanellus</i>	Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF, although these species are relative in-sensitive to disturbance.	NLSE	NLSE
Broadland Ramsar	CRITERION 5			
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>	This habitat is highly sensitive to water abstraction. Impacts may result if an increase in water abstraction results from an increase in population numbers and water demand in Norwich and Norwich suburban areas. This may affect the designated site and designated features if significant changes in the water table levels occur.	LSE	LSE
	Alkaline fens		LSE	LSE
	Alkaline fens		In some areas, namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle, are proposed to be highly developed with up to 10,000	LSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>dwelling. Impacts from increased tourism pressure may result specially in units of the Ramsar located very close to it (specifically the Yare Broads and Marshes SSSI located within 1 km from Thorpe St Andrew).</p> <p>Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF.</p> <p>Climate change may also result in higher water pressure especially for the most sensitive habitats as the fens aggravating any potential impacts from increased water abstraction.</p>		
	<p>Desmoulin’s whorl snail <i>Vertigo moulinsiana</i></p>	<p>There is the potential for Likely Significant Effects from the proposed development if the habitat suitable for this species is affected</p> <p>Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF</p>	LSE	LSE
	<p>Otter <i>Lutra lutra</i></p>	<p>Otters may be negatively affected by changes in water quality that affect the fish community and abundance. But unlikely to be significantly affected by this Policy alone unless there is a direct impact</p>	NLSE	LSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		on the Broads. Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF		
	Fen orchid <i>Liparis loeselli</i>	There is the potential for Likely Significant Effects from the proposed development if there are significant changes in the hydrological conditions on the site. Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF	Uncertain	LSE
	CRITERION 6			
	Bewick’s swan <i>Cygnus columbianus bewickii</i>	Significant direct and indirect impacts are unlikely to occur, but potential for in-combination impacts. Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF	NLSE	LSE
	Wigeon <i>Anas penelope</i>		NLSE	LSE
	Gadwall <i>Anas atrepera strepera</i>		NSLE	LSE
	Shoveler <i>Anas clypeata</i>		NSLE	LSE
Minsmere – Walberswick	CRITERION 1			

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Ramsar	Mosaic of marine, freshwater, marshland, with the largest continuous stand of reedbeds and transitional grazing marsh ditch plants	Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. No likely significant effects are anticipated.	NLSE	NLSE
	CRITERION 2			
	Support nine nationally scarce vascular plant species and at least 26 red data book invertebrates including the mollusc <i>Vertigo angustior</i> .	Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. No likely significant effects are anticipated.	NLSE	NLSE
	An important assemblage of rare breeding birds associated with marshland and reedbeds.	Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. No likely significant effects are anticipated.	NLSE	NLSE
North Norfolk Coast Ramsar	CRITERION 1			
	Long expanse of undeveloped coastal habitat. It is a good example of marshland coast, saltmarshes, shingle banks and sand dunes.	Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. It is likely that number of visitors increase however this is not considered to be significant. No likely significant effects are	NLSE	Uncertain

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Brackish water lagoons and freshwater grazing marsh and reed beds.	<p>anticipated.</p> <p>Due to potential in-combination effects from the JCS developments proposed in other plans such as the Breckland LDF.</p> <p>In-combination impacts may also arise from climate change and potential coastal squeeze which together with pressure from increase tourism may compromise the conservation objectives.</p>	NLSE	Uncertain
	CRITERION 2			
	Supports at least three Red data book and nine nationally scarce vascular plants, one red Data Book lichens and 38 Red Data Book invertebrates.	<p>Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. It is likely that number of visitors increase however this is not considered to be significant. No likely significant effects are anticipated.</p> <p>Due to potential in-combination effects from the JCS developments proposed in other plans such as the Breckland LDF.</p> <p>In-combination impacts may also result from climate change and potential coastal squeeze which together with pressure from increase tourism may</p>	NLSE	Uncertain

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		compromise the conservation objectives.		
	CRITERION 5			
	Waterfowl assemblages of international importance.	<p>Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. It is likely that number of visitors increase however this is not considered to be significant. No Likely significant effects are anticipated.</p> <p>Potential in-combination due to effects from the JCS developments proposed in other plans such as the Breckland LDF.</p> <p>In-combination impacts may also arise from climate change and potential coastal squeeze which together with pressure from increase tourism may compromise the conservation objectives for this site.</p>	NLSE	Uncertain
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i>	Proposed developments in suburban areas of Norwich City are unlikely to impose direct impacts on this type of habitats. It is likely that number of visitors increase however this is not considered to be significant. No Likely significant effects are	NLSE	Uncertain
	Brent goose		NLSE	Uncertain

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Branta bernicla bernicla</i>	anticipated.		
	Wigeon <i>Anas penelope</i>	Due to in-combination effects from the JCS developments proposed in other plans such as the Breckland LDF.	NLSE	Uncertain
	Pintail <i>Anas acuta</i>	In-combination impacts may also result from climate change and potential coastal squeeze which together with pressure from increase tourism may compromise the conservation objectives for this site.	NLSE	Uncertain
	Knot <i>Calidris canutus islandica</i>		NLSE	Uncertain
	Little tern <i>Sternula albifrons</i>		NLSE	Uncertain
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>		NLSE	Uncertain
Redgrave & South Lopham Fens Ramsar	CRITERION 1			
	Extensive example of spring-fed lowland base rich valley and mires lacking fragmentation.	Due to the location of the Ramsar more than 30 km south to the proposed development sites it is unlikely that P4 will affect significantly the designated site.	NLSE	NLSE

Policy	P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	CRITERION 2			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> .	Due to the location of the Ramsar more than 30 km south to the proposed development sites. It is unlikely that P4 will affect significantly the designated site.	NLSE	NLSE
	CRITERION 3			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> , important for maintaining the biological diversity of the region.	Due to the location of the Ramsar more than 30 km south to the proposed development sites. It is unlikely that P4 will affect significantly the designated site.	NLSE	NLSE
The Wash Ramsar	CRITERION 5			
	Waterfowl assemblages of international importance.	Impacts are unlikely to be significant due to the location of this Ramsar in relation to the proposed locations for development. The key vulnerability for the site is coastal squeeze and off-shore activities (see Volume III, section 1.17 and 1.25), neither of these would be exacerbated by the Policy.	NLSE	Uncertain

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		to in-combination with Kyng’s Lynn & West Norfolk Borough Councils proposed growth.		
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i>	Impacts are unlikely to be significant due to the location of this Ramsar in relation to the proposed locations for development. The key vulnerability for the site is coastal squeeze and off-shore activities (see Volume III, section 1.17 and 1.25), neither of these would be excuberrated by the Policy.	NLSE	NLSE
	Brent goose <i>Branta bernicla bernicla</i>		NLSE	NLSE
	Wigeon <i>Anas Penelope</i>		NLSE	NLSE
	Pintail <i>Anas acuta</i>		NLSE	NLSE
	Knot <i>Calidris canutus islandica</i>		NLSE	NLSE
	Oystercatcher <i>Haematopus ostralegus</i>		NLSE	NLSE
	Grey plover <i>Pluvialis squatarola</i>		NLSE	NLSE

Policy	<u>P4 – The Remainder of the Norwich Urban Area, including the Fringe Parishes</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Sanderling <i>Calidris alba</i>		NLSE	NLSE
	Dunlin <i>Calidris alpina</i>		NLSE	NLSE
	Curlew <i>Numenius arquata</i>		NLSE	NLSE
	Bar-tailed godwit <i>Limosa lapponica</i>		NLSE	NLSE
	Redshank <i>Tringa totanus</i>		NLSE	NLSE
	Turnstone <i>Arenaria interpres</i>		NLSE	NLSE

Table A.2: Policy 5 Locations for Major and Development in the Norwich Policy Area

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Benacre to Easton Bavents SPA	Bittern <i>Botaurus stellaris</i>	Due to the distance between the SPA and the proposed developments (more than 20 km), the vulnerability of the site being attributed to natural processes (Volume III, section 1.1), coupled with the low sensitivity of the bird species (Volume III, section 3.2), no direct impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
Breckland SPA	Stone-curlew <i>Burhinus aedionemus</i>	No developments are proposed within the SPA buffer zones. As such, no direct impacts are expected due to the proposed developments in the Norwich urban area. However, the SPA is vulnerable to recreational activities (Volume III, section 1.2), and the species are sensitive to noise disturbance (Volume III, section 3.2), impacts on this designated site due to potential increase in tourism pressure are unclear at this stage.	NLSE	Uncertain
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	Uncertain
	Woodlark <i>Lullula arborea</i>		NLSE	Uncertain
Breydon Water SPA	Bewick's swan <i>Cygnus columbianus bewickii</i>	No direct impacts are expected due to the proposed developments in the Norwich NPA area as no developments are proposed in the zones around the site (see maps in Volume III). Indirect impacts could result from increased abstraction in the	NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Golden plover <i>Pluvialis apricaria</i>	catchment. However Breydon Water is located downstream The Broads which can potentially act as a buffer. As a result impacts are not considered significant.	NLSE	NLSE
	Ruff <i>Philomachus pugnase</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Broadland SPA	Bewick's swan <i>Cygnus columbianus bewickii</i>	Highly sensitive to water abstraction, discharge impacts and disturbance effects (see Volume III, section 1.4).	LSE	LSE
	Whooper swan <i>Cygnus cygnus</i>	Impacts may result if an increase in water abstraction results from an increase in population numbers and water demand in Norwich and Norwich suburban areas.	LSE	LSE
	Bittern <i>Botaurus stellaris</i>	In some areas, namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle, are proposed to be highly developed with up to 10,000 dwellings.	LSE	LSE
	Marsh harrier <i>Circus aeruginosus</i>	Areas of this designated site are located within the orange zone (see maps in Volume III). As such impacts from disturbance may be significant in areas of the SPA.	LSE	LSE
	Hen harrier <i>Circus cyaneus</i>		LSE	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>Impacts from increased tourism pressure may also result specially in units of the SPA located close to it (specifically the Yare Broads and Marshes SSSI located within 1 km from Thorpe St Andrew).</p> <p>However, these issues are being addressed under the Broads Authority Plan, and therefore any direct and indirect effects are uncertain depending on the effectiveness of the Plan and impacts from this policy.</p> <p>In-combination impacts may result from the overall proposed developments under this strategy, leading to increased water abstraction and potential increase in discharges in the rivers catchment basins that feed the Broads SPA.</p> <p>Climate change may exacerbate these impacts and also influence tourism pressure in the Broads</p>		
North Norfolk Coast SPA	Bittern <i>Botaurus stellaris</i>	This SPA is vulnerable to coastal squeeze issues, coastal erosion and tourism pressure (see Volume III, section 1.5), and these species are particularly sensitive to disturbance.	NLSE	Uncertain
	Marsh harrier <i>Circus aeruginosus</i>	The JCS Policy 5 is highly unlikely to have any significant impact on the site alone, but there is the	NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Avocet <i>Recurvirostra avosetta</i>	potential for in-combination impacts associated with increased tourism. Impacts from increased number of visitors due to the overall scale of developments proposed within the NPA (21,000 dwellings) may result. Tourism pressure is likely to increase with climate change and exacerbate impacts from visitors. Some of these issues would be addressed within the AONB Management Plan, but the potential impacts and effects on the SPA are uncertain at this stage.	NLSE	Uncertain
	Little tern <i>Sternula albifrons</i>		NLSE	Uncertain
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>		NLSE	Uncertain
Great Yarmouth North Denes SPA	Little tern <i>Sternula albifrons</i>	No direct impacts are anticipated due to the implementation of this policy as no developments are proposed within the zones around the site (see maps in Volume III). Indirect impacts may arise from an increase in tourism (the site is vulnerable and the species sensitive to disturbance), and the species due to the major scale of developments propose under this policy. This impact is not considered to be significant from the implementation of this policy alone. Due to increased tourism pressure, climate change	NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		and consequent coastal squeeze and developments proposed under the Great Yarmouth LDF there could be in-combination effects.		
Minsmere – Walberswick SPA	Bittern <i>Botaurus stellaris</i>	Due to the location between the SPA and the proposed developments (more than 20 km) no direct significant impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Hen harrier <i>Circus cyganeus</i>		NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
The Wash SPA	Bewick’s swan <i>Cygnus columbianus bewickii</i>	Due to the location between the SPA and the proposed developments (more than 20 km) no direct significant impacts are anticipated that could affect the conservation objectives of the SPA and	NLSE	Uncertain
	Bar-tailed godwit		NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Limosa lapponica</i>	its features.		
	Little tern <i>Sternula albifrons</i>	Disturbance to the bird community is uncertain due to in-combination with Kyng's Lynn & West Norfolk Borough Councils proposed growth.	NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>		NLSE	Uncertain
Benacre to East Barents Lagoons SAC	Coastal lagoons		This designated site is particularly sensitive to coastal squeeze and erosion issues (Volume III, section 1.9). Proposed developments under Policy 5 would not impose any impacts on the site due to the location of the SAC.	NLSE
Breckland SAC	Inland dunes with open <i>Corynephorus</i> and <i>Agrostis</i> grasslands	Proposed developments in the locations: Wymondham, Hetherset, Cringleford, Long Stratton and Easton/Costessey are unlikely to impose direct impacts on this designated site and habitats. However, the scale of the developments proposed, specifically to Wymondham, Hetherset, Cringleford and Easton/Costessey (5,400 dwellings) is considerable. Due to the location of the SAC it is reasonable to expect an increase in visitors to the Breckland SAC which if not controlled might affect this habitat. However	NLSE	Uncertain
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation		NLSE	NLSE
	European dry heaths		NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco-Brometalia</i>)	impacts from the implementation of this policy alone are not considered significant.	NLSE	Uncertain
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> .	In-combination effects could occur due to the scale of the overall developments proposed under the JCS together with developments proposed under the Breckland LDF visitor's number in Breckland might increase to significant levels. The outcome would depend on how visitor numbers are managed on the site.	NLSE	Uncertain
	Great crested newts <i>Triturus cristatus</i>	Great crested newts are particularly sensitive to habitat loss or fragmentation. These are not expected to occur due to the implementation of this policy.	NLSE	NLSE
North Norfolk Coast SAC	Coastal lagoons	This habitat is not sensitive to the developments proposed due to distance between the proposed locations for developments and the SAC.	NLSE	NLSE
	Perennial vegetation of stony banks	Likely impacts are not considered significant.	NLSE	NLSE
	Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Embryonic shifting dunes	The dune habitats that are feature of this SAC are highly sensitive to tourism pressure. Impacts from increased number of visitors due to the overall scale of developments proposed within the NPA (21,000 dwellings) may result from in-combination effects, including climate change, coastal erosion and	NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Shifting dunes along the shoreline with <i>Ammophila arenaria</i> (‘white dunes’) Fixed dunes with herbaceous vegetation (‘grey dunes’) Humid dune slacks	increased tourism.		
	Petalwort <i>Petalophyllum ralfsii</i>	Due to the location of this SAC in relation to the development area proposed in this policy (more than 20 km distance) it is unlikely that significant impacts to the species for which the site is designated will occur.	NLSE	NLSE
	Otter <i>Lutra lutra</i>		NLSE	NLSE
Norfolk Valley Fens SAC	Alkaline fens	The scale of the developments proposed, specifically to Wymondham, Hetherset, Cringleford and Easton/Costessey (5,400 dwellings) is considerable and none of these developments fall within the zones around this SAC.	NLSE	NLSE
	Northern Atlantic wet heath with <i>Erica tetralix</i>		NLSE	NLSE
	European dry heaths		NLSE	NLSE
	Semi-natural dry grassland and scrubland facies: on calcareous substrates	As such no likely significant effects are anticipated. There may be an increase in visitor’s numbers. However this is not considered significant, in particular because the key vulnerability of the site is reduction in the water table and associated	NLSE	NLSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt		NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	laden soils	ground water abstraction (Volume II, section 1.12), thus policy 5 is unlikely to have a significant effect		
	Calcareous fen with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>	Any in-combination effects are also unlikely, the main vulnerability to the site being reductions in water table and reduction in spring flows (Volume III, section 1.12).	NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	NLSE
	Narrow-mouthed whorl snail <i>Vertigo angustior</i>		NLSE	NLSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Overstrand Cliffs SAC	Vegetated sea cliffs of the Atlantic and Baltic coasts	Proposed developments in Norwich Policy Area are unlikely to impose impacts on this SAC. The key vulnerabilities are related to coastal protection measures and local developments. No Likely significant effects are anticipated.	NLSE	NLSE
Paston Great Barn SAC	Barbastelles <i>Barbastella barbastellus</i>	This species is very sensitive to disturbance and changes in food availability. It typically forages 5-6 km from their roosts and has been recorded to travel up to 18 km (see Volume III, section 1.14). Due to the rarity of the species in the UK and taking the precautionary approach and propose a	NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		buffer area of 10 km within which any development is understood to have likely significant effects. However, the proposed areas for development are more than 20km away from the SAC and therefore No Likely Significant Effects are anticipated.		
River Wensum SAC	Water course of plain to montane levels with the <i>Ranunculion fluitantis</i> and <i>Callitricho-Batrachion</i> vegetation	Most of the developments proposed for Norwich Policy Area are located outside the catchment area of the River Wensum SAC. However, proposed developments at Easton and Costessey (which fall within the orange zone), may potentially impact on the SAC designated features such as the <i>Ranunculion</i> communities. This habitat is sensitive to physical modification and changes in water quality which may arise through habitat modification if developments are proposed close to the river margins, increased run-off from traffic intensification may also affect water quality. Direct impacts are unlikely, especially when consider the objectives of the River Wensum Restoration Plan, but there could be potential in-combination effects. Changes to water quality may also occur due to an increased discharges and abstraction.	Uncertain	LSE
	White-clawed crayfish <i>Austropotamobius pallipes</i>	Suspended sediments in the water are detrimental to White-clawed crayfish as it may clog the gills	Uncertain	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>and lead to long term damage. Increased run-off due to potential changes in river bank and/or increased traffic might lead to alterations in the river bed substrate and make the river unsuitable for this species, in areas close to the proposed developments.</p> <p>Potential in-combination effects resulting from other plans and projects, climate change issues.</p> <p>Changes to water quality may also occur due to an increased discharges and abstraction.</p>		
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	Likely significant effects are only likely to occur if hydrological conditions are significantly affected by developments within the area, which may then lead to suitable habitat loss or deterioration in the quality of the habitats. Potential in-combination impact, but will depend on how the objectives and outcomes from the River Wensum Restoration Plan.	NLSE	Uncertain
	Brook lamprey <i>Lampetra planeri</i>	Brook lamprey is sensitive to poor water quality from different sources. This could affect nursery as well as spawning places. Poor water conditions may also act as a barrier to migration, if prevents the lamprey to use sections of the river (see	NLSE	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>Volume III, section 3.3).</p> <p>Therefore any significant changes in a section of a river where adult brook lamprey may occur, or pass through, could potentially have a negative effect on the population, although direct and indirect impacts are unlikely to be significant</p> <p>It is possible that lampreys are not moving up and down the river in the AAP area and significant changes in the water quality would not impact lamprey populations. Further studies on brook lamprey migration patterns within the River Wensum may be necessary to anticipate any potential future impacts.</p>		
	Bullhead <i>Cottus gobio</i>	<p>Bullhead is sensitive to habitat modification including siltation of the river bed and removal of riparian trees. Developments in some of the proposed areas have the potential to affect riparian habitats if located in close vicinity to the River Wensum SAC. In addition increased siltation may occur as a consequence to increased traffic and road runoff. Therefore there is the potential for Likely Significant Effects but only as in-combination impacts as direct and indirect effects are unlikely.</p>	NLSE	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
The Broads SAC	Hard oligo-mesotrophic water with benthic vegetation of <i>Chara</i> spp.	These habitats are highly sensitive to water abstraction and increase in nutrients concentration (see Volume III, section 2.10). Impacts may result if an increase in water abstraction results from an increase in population numbers and water demand in Norwich and Norwich suburban areas. This may affect the designated site and designated features if significant changes in the water table levels occur.	LSE	LSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation		LSE	LSE
	Transition mires and quaking bogs	In-combination effects are likely to occur due to the scale of the overall developments proposed under the JCS. In addition to this, developments proposed under the Great Yarmouth LDF might exacerbate water demand and water abstraction. Future pressure imposed by climate change may contribute to lower water levels in the SAC and indirect impacts to these habitats.	LSE	LSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>		LSE	LSE
	Alkaline fens		LSE	LSE
	Alluvial forests with <i>Alnus aglutinosa</i> and <i>Fraxinus excelsior</i>		LSE	LSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		LSE	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>	There is the potential for Likely Significant Effects from the proposed development if the habitat suitable for this species is affected through hydrological changes.	LSE	LSE
	Otter <i>Lutra lutra</i>	Otters may be negatively affected by changes in water quality that affect the fish community and abundance. But unlikely to be significantly affected by this Policy alone unless there is a direct impact on the Broads. Water quality may be affected though increased abstraction and decreased flows in main rivers, such as the River Yare and the Rives Wensum, as well as from increased discharges due to increased population numbers in Norwich Policy Area.	NLSE	Uncertain
	Fen orchid <i>Liparis loeselii</i>	There is the potential for Likely Significant Effects from the proposed development if there are significant changes in the hydrological conditions on the site resulting from in-combination effects.	NLSE	Uncertain
The Wash and North Norfolk Coast SAC	Sandbanks which are slightly covered by sea water all the time Mudflats and sandflats not covered by seawater at low tide	Due to the location of this SAC in relation to the development area proposed in this policy (more than 20 km distance) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Large shallow inlets and bays Reefs <i>Salicornia</i> and other annuals colonising mud and sand Atlantic salt meadows (<i>Glaucopuccinellietalia maritimae</i>) Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Coastal lagoons			
	Common seal <i>Phoca vitulina</i> Otter <i>Lutra lutra</i>	Due to the location of this SAC in relation to the development area proposed in this policy (more than 20 km distance) it is unlikely that significant impacts to the species will occur.	NLSE	NLSE
Waveney & Little Ouse Valley Fens SAC	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils	Due to the location of the SAC more than 20 km south to the proposed development sites, it is unlikely that P5 will affect significantly the designated site conservation objectives.	NLSE	NLSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the		NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Caricion davalliana</i>			
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Winterton – Horsey Dunes SAC	Atlantic decalcified fixed dunes <i>(Calluno –Ulicetea)</i>	Due to the location of the SAC more than 30 km south to the proposed development sites. It is unlikely that P5 will affect significantly the designated site conservation objectives.	NLSE	NLSE
	Humid dune slacks		NLSE	NLSE
	Embryonic shifting dunes		NLSE	NLSE
	Shifting dunes along the shoreline with <i>Ammophila Arenaria</i> (white dunes)		NLSE	NLSE
Breydon Water Ramsar	CRITERION 5			
	Waterfowl assemblage	No direct impacts are expected due to the proposed developments in the Norwich NPA area as no developments are proposed in the zone around the site (see map in Volume III). Indirect impacts could result from increased abstraction in the catchment. However as Breydon Water is located downstream The Broads which can potentially act as a buffer. As a result impacts are not considered significant. Cumulative impacts may result due to increase in	NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		tourism pressure, climate change and proposed developments under the Great Yarmouth LDF, although these species are relative in-sensitive to disturbance.		
	CRITERION 6			
	Bewick's swan <i>Cygrus columbianus bewickii</i>	Direct and indirect impacts are unlikely to result to habitats that support these species.	NLSE	Uncertain
	Lapwing <i>Vanellus vanellus</i>		NLSE	Uncertain
Broadland Ramsar	CRITERION 5			
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davalliana</i>	This habitat is highly sensitive to water abstraction. Impacts may result if an increase in water abstraction results from an increase in population numbers and water demand in Norwich and Norwich suburban areas (see Volume III). This may affect the designated site and designated features if significant changes in the water table levels occur. Cumulative impacts may result due to increase in	LSE	LSE
	Alkaline fens		LSE	LSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		LSE	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		tourism pressure, climate change and proposed developments under the Great Yarmouth LDF. Climate change may also result in higher water pressure especially for the most sensitive habitats as the fens aggravating any potential impacts from increased water abstraction.		
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	There is the potential for Likely Significant Effects from the proposed development if the habitat suitable for this species is affected Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF	LSE	LSE
	Otter <i>Lutra lutra</i>	Otters may be negatively affected by changes in water quality that affect the fish community and abundance. But unlikely to be significantly affected by this Policy alone unless there is a direct impact on the Broads. Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF	NLSE	LSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Fen orchid <i>Liparis loeselli</i>	There is the potential for Likely Significant Effects from the proposed development if there are significant changes in the hydrological conditions on the site resulting from in-combination effects.	NLSE	Uncertain
	CRITERION 6			
	Bewick's swan <i>Cygrus columbianus bewickii</i>	Significant direct and indirect impacts are unlikely to occur, but potential for in-combination impacts. Cumulative impacts may result due to increase in tourism pressure, climate change and proposed developments under the Great Yarmouth LDF	NLSE	LSE
	Wigeon <i>Anas penelope</i>		NLSE	LSE
	Gadwall <i>Anas atrepera strepera</i>		NLSE	LSE
	Shoveler <i>Anas clypeata</i>		NLSE	LSE
Minsmere – Walberswick Ramsar	CRITERION 1			
	Mosaic of marine, freshwater, marshland, with the largest continuous stand of reedbeds and transitional grazing marsh ditch plants	Due to the location of the Ramsar in relation to the proposed developments it is unlikely that negative impacts will arise from the implementation of P5.	NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	CRITERION 2			
	Support nine nationally scarce vascular plant species and at least 26 red data book invertebrates including the mollusc <i>Vertigo angustior</i> .	Due to the location of the Ramsar in relation to the proposed developments it is unlikely that negative impacts will arise from the implementation of P5.	NLSE	NLSE
	An important assemblage of rare breeding birds associated with marshland and reedbeds.		NLSE	NLSE
North Norfolk Coast Ramsar	CRITERION 1			
	Long expanse of undeveloped coastal habitat. It is a good example of marshland coast, saltmarshes, shingle banks and sand dunes.	Due to the location of the Ramsar in relation to the proposed developments it is unlikely that negative impacts will arise from the implementation of P5. Due to scale of the proposed developments in all the NPA and rural areas and increased tourism pressure, disturbance and climate change potential in-combination impacts.	NLSE	Uncertain
	Brackish water lagoons and freshwater grazing marsh and reed beds.		NLSE	Uncertain.
	CRITERION 2			
	Supports at least three Red data	Due to the location of the Ramsar in relation to the	NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	book and nine nationally scarce vascular plants, one red Data Book lichens and 38 Red Data Book invertebrates.	proposed developments it is unlikely that negative impacts will arise from the implementation of P5. However, relatively uncertainty regarding in-combination effects.		
	CRITERION 5			
	Waterfowl assemblages of international importance.	Due to the location of the Ramsar in relation to the proposed developments it is unlikely that negative impacts will arise from the implementation of P5. Due to scale of the proposed developments in all the NPA and rural areas and increased tourism pressure, disturbance and climate change	NLSE	Uncertain
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i>	Due to the location of the Ramsar in relation to the proposed developments it is unlikely that negative impacts will arise from the implementation of P5. Uncertain due to scale of the proposed developments in all the NPA and rural areas and increased tourism pressure, disturbance and climate	NLSE	Uncertain
	Brent goose <i>Branta bernicla bernicla</i>		NLSE	Uncertain
	Wigeon <i>Anas penelope</i>		NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Pintail <i>Anas acuta</i>	change.	NLSE	Uncertain
	Knot <i>Calidris canutus islandica</i>		NLSE	Uncertain
	Little tern <i>Sternula albifrons</i>		NLSE	Uncertain
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>		NLSE	Uncertain
Redgrave & South Lopham Fens Ramsar	CRITERION 1			
	Extensive example of spring-fed lowland base rich valley and mires lacking fragmentation.	Due to the location of the Ramsar more than 20 km south to the proposed development sites, it is unlikely that P5 will affect significantly the designated site conservation objectives.	NLSE	NLSE
	CRITERION 2			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes</i>	Due to the location of the Ramsar more than 20 km south to the proposed development sites. It is unlikely that P5 will affect significantly the	NLSE	NLSE

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>plantarius</i> .	designated site conservation objectives.		
	CRITERION 3			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> , important for maintaining the biological diversity of the region.	Due to the location of the Ramsar more than 20 km south to the proposed development sites. It is unlikely that P5 will affect significantly the designated site conservation objectives.	NLSE	NLSE
The Wash Ramsar	CRITERION 5			
	Waterfowl assemblages of international importance.	Due to the location of the Ramsar more than 40 km south to the proposed development sites, it is unlikely that P5 will affect significantly the designated site conservation objectives. Disturbance to the bird community is uncertain due to in-combination with Kyng's Lynn & West Norfolk Borough Councils proposed growth.	NLSE	Uncertain
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i>	Due to the location of the Ramsar more than 20 km south to the proposed development sites, it is	NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Brent goose <i>Branta bernicla bernicla</i>	unlikely that P5 will affect significantly the designated site conservation objectives.	NLSE	Uncertain
	Wigeon <i>Anas Penelope</i>	Disturbance to the bird community is uncertain due to in-combination with Kyng's Lynn & West Norfolk Borough Councils proposed growth.	NLSE	Uncertain
	Pintail <i>Anas acuta</i>		NLSE	Uncertain
	Knot <i>Calidris canutus islandica</i>		NLSE	Uncertain
	Oystercatcher <i>Haematopus ostralegus</i>		NLSE	Uncertain
	Grey plover <i>Pluvialis squatarola</i>		NLSE	Uncertain
	Sanderling <i>Calidris alba</i>		NLSE	Uncertain
	Dunlin <i>Calidris alpina</i>		NLSE	Uncertain

Policy	<u>Policy 5 Locations for Major and Development in the Norwich Policy Area</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Curlew <i>Numenius arquata</i>		NLSE	Uncertain
	Bar-tailed godwit <i>Limosa lapponica</i>		NLSE	Uncertain
	Redshank <i>Tringa totanus</i>		NLSE	Uncertain
	Turnstone <i>Arenaria interpres</i>		NLSE	Uncertain

Table A.3: Policy 6 - Main Towns

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Benacre to Easton Bavents SPA	Bittern <i>Botaurus stellaris</i>	The vulnerability of the site is attributed to natural processes (Volume III, section 1.1), with the low sensitivity of the bird species (Volume III, section 3.2). P6 proposes smaller scale developments at major towns as Diss, Harleston and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SPA to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
Breckland SPA	Stone-curlew <i>Burhinus aedionemus</i>	P6 proposes smaller scale developments at major towns as Diss, Harleston and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SPA to the proposed developments (more than 10 km) it is unlikely	NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
	Woodlark <i>Lullula arborea</i>		NLSE	Uncertain

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>that significant negative impacts alone will result from the implementation of P6.</p> <p>Increase in the developments at Wymondham and any future developments along the A11 (see Policy 16), could result in an increase in tourism and recreational activities in the area of this designated site. The site and its qualifying features are known to be vulnerable and sensitive to tourism and recreational activities (see Volume III, section 1.2 and 3.2), however, at this stage it cannot be determined whether these increases would be significant.</p>		
Breydon Water SPA	Bewick's swan <i>Cygnus columbianus bewickii</i>	No direct impacts are expected due to the proposed developments in the Norwich urban area. The key vulnerability of the site being loss of habitats and poor water management (Volume 111, section 1.3) which would not be effected by the Policy. The species are not particularly sensitive to related in-combination effects.	NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Golden plover <i>Pluvialis apricaria</i>		NLSE	NLSE
	Ruff <i>Philomachus pugnase</i>		NLSE	NLSE
	Common tern		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Sterna hirundo</i>			
Broadland SPA	Bewick's swan (Bernick swan) <i>Cygnus columbianus bewickii</i>	Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Whooper swan <i>Cygnus cygnus</i>		NLSE	NLSE
	Bittern <i>Botaurus stellaris</i>		NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Hen harrier <i>Circus cyaneus</i>		NLSE	NLSE
North Norfolk Coast SPA	Bittern <i>Botaurus stellaris</i>	Developments under this policy are proposed south and south west to Norwich. No likely significant effects are anticipated. There may be slight increases in the population visiting the north Norfolk coast, but these are regarded as being insignificant under this policy	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Great Yarmouth North Denes SPA	Little tern <i>Sternula albifrons</i>	No direct impacts are anticipated due to the implementation of this policy as no developments are proposed within the buffer zones (see Volume III). Indirect impacts may arise from an increase in tourism (the site is vulnerable and the species sensitive to disturbance), and the species due to the major scale of developments propose under this policy. This impact is not considered to be significant from the implementation of this policy alone owing to the small scale and location of the proposed developments away from the SPA.	NLSE	NLSE
Minsmere – Walberswick SPA	Bittern <i>Botaurus stellaris</i>	Due to the small scale and location of the proposed developments away from the SPA no impacts direct or indirect are anticipated.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>	There may be slight increases in tourism to the eastern coast, but these numbers are regarded as being insignificant.	NLSE	NLSE
	Hen harrier		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Circus cyganeus</i>			
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
The Wash SPA	Bewick's swan <i>Cygnus columbianus bewickii</i> Bar-tailed godwit <i>Limosa lapponica</i> Little tern <i>Sternula albifrons</i> Common tern <i>Sterna hirundo</i>	Due to the small scale and location of the proposed developments away from the SPA no impacts direct or indirect are anticipated.	NLSE	NLSE
Benacre to East Barents Lagoons SAC	Coastal lagoons	This designated site is particularly sensitive to coastal squeeze and erosion issues (Volume III, section 1.9). Proposed developments under Policy 6 would	NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		not impose any impacts on the site due to the location of the SAC and distance to the development areas.		
Breckland SAC	Inland dunes with open <i>Corynephorus</i> and <i>Agrostis</i> grasslands	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments it is unlikely that significant negative direct impacts would result from the implementation of P6.	NLSE	NLSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation		NLSE	NLSE
	European dry heaths		NLSE	NLSE
	Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco-Brometalia</i>)		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> .		NLSE	NLSE
	Great crested newts <i>Triturus cristatus</i>		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
North Norfolk Coast SAC	Coastal lagoons Perennial vegetation of stony banks Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Embryonic shifting dunes Shifting dunes along the shoreline with <i>Ammophila arenaria</i> (‘white dunes’) Fixed dunes with herbaceous vegetation (‘grey dunes’) Humid dune slacks	Developments under this policy are proposed south and south west to Norwich and therefore owing to the distance from these policy sites and the designated site no likely significant effects are anticipated. Any increase in tourism to these sites from these areas is not likely to be significant.	NLSE	NLSE
	Petalwort <i>Petalophyllum ralfsii</i>			NLSE
	Otter <i>Lutra lutra</i>		NLSE	NLSE
	Norfolk Valley Fens SAC		Alkaline fens	This SAC includes several small units scattered through Norfolk mostly west of Norwich. The

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		main towns proposed for development are located at Diss, Harleston and Wymondham, generally away from the SAC. Due to the small scale of the proposed developments at Diss and Harleston no likely significant impacts are anticipated from these developments. Impacts from developments at Wymondham alone are not considered significant. The smaller scale developments proposed (300 dwellings at Diss and 200-300 more at Harleston) are therefore unlikely to cause significant impacts and to this designated. The exception will be Wymondham which could impose some disturbance to Swangey Fen (part of NVF SAC) located just off the A11. These fens are vulnerable to reductions in water table and reduction in surface water flows (see Volume III, section 1.12). Impacts from the proposed developments at Wymondham were also assessed under P5.		
	Northern Atlantic wet heath with <i>Erica tetralix</i>		NLSE	Uncertain
	European dry heaths		NLSE	Uncertain
	Semi-natural dry grassland and scrubland facies: on calcareous substrates		NLSE	Uncertain
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		NLSE	Uncertain
	Calcareous fen with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>		NLSE	Uncertain
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	Uncertain
	Narrow-mouthed whorl snail		NLSE	Uncertain

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Vertigo angustior</i>			
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	Uncertain
Overstrand Cliffs SAC	Vegetated sea cliffs of the Atlantic and Baltic coasts	P6 proposes smaller scale developments at major towns as Diss, Harleston and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments (more than 40 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
Paston Great Barn SAC	Barbastelles <i>Barbastella barbastellus</i>	P6 proposes smaller scale developments at major towns as Diss, Harleston and Wymondham (impacts from the proposed at Wymondham were assessed under P5). Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
River Wensum SAC	Water course of plain to	P6 proposes smaller scale developments at	NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	montane levels with the <i>Ranunculion fluitantis</i> and <i>Callitricho-Batrachion</i> vegetation	major towns as Diss, Harlseton and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development and the fact that these locations are outside the River Wensum catchment it is unlikely that significant negative impacts will result from the implementation of P6.		
	White-clawed crayfish <i>Austropotamobius pallipes</i>		NLSE	NLSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
	Brook lamprey <i>Lampetra planeri</i>		NLSE	NLSE
	Bullhead <i>Cottus gobio</i>		NLSE	NLSE
The Broads SAC	Hard oligo-mesotrophic water with benthic vegetation of <i>Chara</i> spp.	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham). Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation		NLSE	NLSE
	Transition mires and quaking bogs		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>	Impacts from Wymondham proposed development were assessed under P5. It is considered that impacts from development at Wymondham alone will not significantly impact the SAC.	NLSE	NLSE
	Alkaline fens		NLSE	NLSE
	Alluvial forests with <i>Alnus aglutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	NLSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		NLSE	NLSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
	Otter <i>Lutra lutra</i>		NLSE	NLSE
	Fen orchid <i>Liparis loeselii</i>		NLSE	NLSE
The Wash and North Norfolk Coast SAC	Sandbanks which are slightly covered by sea water all the time Mudflats and sandflats not covered by seawater at low tide	Due to the location of this SAC in relation to the development area proposed in this policy (more than 20 km distance) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Large shallow inlets and bays Reefs <i>Salicornia</i> and other annuals colonising mud and sand Atlantic salt meadows (<i>Glaucopuccinellietalia maritimae</i>) Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Coastal lagoons			
	Common seal <i>Phoca vitulina</i> Otter <i>Lutra lutra</i>		NLSE	NLSE
Waveney & Little Ouse Valley Fens SAC	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils	The designated SAC and its features are particularly sensitive to water abstraction (see Volume III, section 1.18). The SAC condition has improved in the past years to favourable recovering. Due to the small scale of the proposed developments under P6 potential	NLSE	NLSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Caricion davalliana</i>	impacts are not considered significant.		
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Winterton – Horsey Dunes SAC	Atlantic decalcified fixed dunes (<i>Calluno –Ulicetea</i>)	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development and the distance from the SAC to the proposed developments it is unlikely that significant negative impacts will result form the implementation of P6.	NLSE	NLSE
	Humid dune slacks		NLSE	NLSE
	Embryonic shifting dunes		NLSE	NLSE
	Shifting dunes along the shoreline with <i>Ammophila Arenaria</i> (white dunes)		NLSE	NLSE
Breydon Water Ramsar	CRITERION 5			
	Waterfowl assemblage	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result form the implementation of P6.	NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	CRITERION 6			
	Bewick's swan <i>Cygrus columbianus bewickii</i>	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham (impacts for Wymondham were assessed under P5). Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Lapwing <i>Vanellus vanellus</i>		NLSE	NLSE
Broadland Ramsar	CRITERION 5			
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham). Given the low scale of the proposed development, the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Alkaline fens		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	NLSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>	Impacts from Wymondham proposed development were assessed under P5. It is considered that impacts from development at	NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Otter <i>Lutra lutra</i>	Wymondham alone will not significantly impact the Ramsar.	NLSE	NLSE
	Fen orchid <i>Liparis loeselli</i>		NLSE	NLSE
	CRITERION 6			
	Bewick's swan <i>Cygrus columbianus bewickii</i>	P6 proposes smaller scale developments at major towns as Diss, Harlseton and Wymondham). Given the low scale of the proposed development, the distance from the SAC to the proposed developments (more than 10 km) and the relative intolerance of these species to direct disturbance, it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Wigeon <i>Anas penelope</i>		NLSE	NLSE
	Gadwall <i>Anas strepera strepera</i>		NLSE	NLSE
	Shoveler <i>Anas clypeata</i>		NLSE	NLSE
Minsmere – Walberswick Ramsar	CRITERION 1			
	Mosaic of marine, freshwater, marshland, with the largest continuous stand of reedbeds and transitional grazing marsh ditch plants	Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE

Policy	Policy 6 Main Towns			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	CRITERION 2			
	Support nine nationally scarce vascular plant species and at least 26 red data book invertebrates including the mollusc <i>Vertigo angustior</i> .	Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	An important assemblage of rare breeding birds associated with marshland and reedbeds.		NLSE	NLSE
North Norfolk Coast Ramsar	CRITERION 1			
	Long expanse of undeveloped coastal habitat. It is a good example of marshland coast, saltmarshes, shingle banks and sand dunes.	Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Brackish water lagoons and freshwater grazing marsh and reed beds.		NLSE	NLSE
	CRITERION 2			
	Supports at least three Red data	Given the low scale of the proposed	NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	book and nine nationally scarce vascular plants, one red Data Book lichens and 38 Red Data Book invertebrates.	development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.		
	CRITERION 5			
	Waterfowl assemblages of international importance.	Given the low scale of the proposed development (300 dwellings at Diss and 200-300 more at Harleston) and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	CRITERION 6			

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Pink-footed goose <i>Anser brachyrhynchus</i> Brent goose <i>Branta bernicla bernicla</i> Wigeon <i>Anas penelope</i> Pintail <i>Anas acuta</i> Knot <i>Calidris canutus islandica</i> Little tern <i>Sternula albifrons</i> Sandwich tern <i>Sterna sandvicensis</i> Common tern <i>Sterna hirundo</i>	Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 10 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
Redgrave & South Lopham Fens Ramsar	CRITERION 1			
	Extensive example of spring-	No direct impacts are anticipated as no	Uncertain	Uncertain

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	fed lowland base rich valley and mires lacking fragmentation.	<p>developments are proposed within the zones for the Ramsar. This site has suffered from water abstraction and diffuse pollution issues in the past (see Volume III, section 1.24). The site is currently in unfavourable condition but recovering due to the implementation of a restoration plan. Under this plan abstraction activities were moved from the designated site which allowed for the stabilization of water levels.</p> <p>This designated site is less than 5 km from the proposed development areas under this policy 6. The potential effect of developments in this area on the integrity of the site and status of the habitats from water abstraction are uncertain, although current operations do not appear to be having a significant impact.</p>		
	CRITERION 2			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> .	No direct impacts are anticipated as no developments are proposed within the zones around the Ramsar. However, this site has suffered from water abstraction in the past. The site is currently in unfavourable condition but recovering due to the implementation of a	NLSE	Uncertain

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		restoration plan. Impacts from water abstraction are uncertain.		
	CRITERION 3			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> , important for maintaining the biological diversity of the region.	<p>This species is highly dependent on permanent water and suitable surface water levels (see Volume III, section 3.4). It is very sensitive to changes in hydrology and deterioration of water quality. Therefore it is likely that in the event that a proposed development lead to increased water abstraction from the River Waveney that this species negatively affected</p> <p>Increase in traffic levels in the A1066 might also lead to water quality decrease through road run-off; however these are difficult to predict due to the smaller scale of the development and uncertainty in its location.</p>	Uncertain	Uncertain
The Wash Ramsar	CRITERION 5			
	Waterfowl assemblages of international importance.	Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 40 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE

Policy	Policy 6 Main Towns			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i>	Given the low scale of the proposed development and the distance from the SAC to the proposed developments (more than 40 km) it is unlikely that significant negative impacts will result from the implementation of P6.	NLSE	NLSE
	Brent goose <i>Branta bernicla bernicla</i>		NLSE	NLSE
	Wigeon <i>Anas Penelope</i>		NLSE	NLSE
	Pintail <i>Anas acuta</i>		NLSE	NLSE
	Knot <i>Calidris canutus islandica</i>		NLSE	NLSE
	Oystercatcher <i>Haematopus ostralegus</i>		NLSE	NLSE
	Grey plover <i>Pluvialis squatarola</i>		NLSE	NLSE
	Sanderling		NLSE	NLSE

Policy	<u>Policy 6 Main Towns</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Calidris alba</i>			
	Dunlin		NLSE	NLSE
	<i>Calidris alpina</i>			
	Curlew		NLSE	NLSE
	<i>Numenius arquata</i>			
	Bar-tailed godwit		NLSE	NLSE
	<i>Limosa lapponica</i>			
	Redshank		NLSE	NLSE
<i>Tringa totanus</i>				
Turnstone	NLSE	NLSE		
<i>Arenaria interpres</i>				

Table A.4: Policy 7 - Key Services

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Benacre to Easton Bavents SPA	Bittern <i>Botaurus stellaris</i>	Due to the small scale of the development proposed and distance from the site no significant impacts are anticipated.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
Breckland SPA	Stone-curlew <i>Burhinus aedionemus</i>	Due to the small scale of the development proposed and distance from the site no significant impacts are anticipated.	NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
	Woodlark <i>Lullula arborea</i>		NLSE	NLSE
Breydon Water SPA	Bewick's swan <i>Cygnus columbianus bewickii</i>	The policy proposes a number of locations for developments of various scales. At Lodon/Chedgave up to 200 dwellings are proposed, no significant impacts of the bird species are anticipated owing to the relatively tolerance of the species and no direct impacts.	NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Golden plover		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Pluvialis apricaria</i>			
	Ruff <i>Philomachus pugnase</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Broadland SPA	Bewick's swan <i>Cygnus columbianus bewickii</i>	Significant impacts could arise from developments that are proposed in areas located within the orange/red zone such as developments proposed at Loddon/ Chedgrave, Acle and Brundall. Impacts may result mostly from disturbance depending on the location of the developments in relation to the site. However, in accordance with Policy 17 these developments should not directly impact on a designated site, although indirect impacts are uncertain depending on the final locations and related infrastructure.	Uncertain	LSE
	Whooper swan <i>Cygnus cygnus</i>		Uncertain	LSE
	Bittern <i>Botaurus stellaris</i>		Uncertain	LSE
	Marsh harrier <i>Circus aeruginosus</i>		Uncertain	LSE
	Hen harrier <i>Circus cyganeus</i>		Uncertain	LSE
North Norfolk Coast SPA	Bittern <i>Botaurus stellaris</i>	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features fro which it was classified.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Great Yarmouth North Denes SPA	Little tern <i>Sternula albifrons</i>	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE
Minsmere – Walberswick SPA	Bittern <i>Botaurus stellaris</i>	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Hen harrier <i>Circus cyganeus</i>		NLSE	NLSE
	Avocet		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Recurvirostra avosetta</i>			
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
Benacre to East Barents Lagoons SAC	Coastal lagoons	A number of small scale developments (up to 200 dwellings) are proposed throughout the NPA and rural area. The closest location to the SAC will be Loddon/ Chedgrave. However due to the small scale of the development it is unlikely that the SAC conservation objectives are affected.	NLSE	NLSE
Breckland SAC	Inland dunes with open <i>Corynephorus</i> and <i>Agrostis</i> grasslands	The developments proposed in policy P7 are mostly located in areas where impacts to this designated site are unlikely. The closest location to the SAC will be Hethersett (assessed under P5) no significant impacts to the SAC is anticipated as the development is outside the zones (see maps in Volume III).	NLSE	NLSE See Policy 16 for potential in-combination impacts due to the potential increase in traffic on the A11.
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	European dry heaths		NLSE	NLSE
	Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco-Brometalia</i>)		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> .		NLSE	NLSE
	Great crested newts <i>Triturus cristatus</i>		NLSE	NLSE
North Norfolk Coast SAC	Coastal lagoons Perennial vegetation of stony banks Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Embryonic shifting dunes Shifting dunes along the shoreline with <i>Ammophila arenaria</i> (‘white dunes’)	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the habitats for which it was classified.	NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Fixed dunes with herbaceous vegetation (`grey dunes`) Humid dune slacks			
	Petalwort <i>Petalophyllum ralfsii</i> Otter <i>Lutra lutra</i>		NLSE	NLSE
Norfolk Valley Fens SAC	Alkaline fens	The developments proposed in policy P7 are mostly located in areas where impacts to this designated site are unlikely. The closest location to the SAC will be Hethersett (assessed under P5) no significant impacts to the SAC is anticipated as the development is outside the zones.	NLSE	NLSE
	Northern Atlantic wet heath with <i>Erica tetralix</i>		NLSE	NLSE
	European dry heaths		NLSE	NLSE
	Semi-natural dry grassland and scrubland facies: on calcareous substrates		NLSE	NLSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		NLSE	NLSE
	Calcareous fen with <i>Cladium mariscus</i> and species of the		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Caricion davalliana</i>			
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	NLSE
	Narrow-mouthed whorl snail <i>Vertigo angustior</i>		NLSE	NLSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Overstrand Cliffs SAC	Vegetated sea cliffs of the Atlantic and Baltic coasts	The developments proposed in policy P7 are located in areas where impacts to this designated site are unlikely.	NLSE	NLSE
Paston Great Barn SAC	Barbastelles <i>Barbastella barbastellus</i>	<p>This species is very sensitive to disturbance and changes in food availability. It typically forages 5-6 km from their roosts and has been recorded to travel up to 18 km. Due to the rarity of the species in the UK and taking the precautionary approach and propose a buffer area of 10 km within which any development is understood to have likely significant effects.</p> <p>However, the closest proposed location for development under this policy is Wroxham distant for Paston Barn approximately 16 km</p>	NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		and therefore No Likely Significant Effects are anticipated.		
River Wensum SAC	Water course of plain to montane levels with the <i>Ranunculus fluitantis</i> and <i>Callitriche-Batrachion</i> vegetation	The proposed developments will be between 100 and 200 dwellings. Although the scale of the developments is moderate. Impacts might be significant depending on its location within the catchment, any potential hydrological connectivity and associated water abstractions/discharges. Impacts most likely to be significant will be increase in sediments and discharges. Therefore direct and indirect impacts alone are uncertain. However, with a number of other plans and developments infringing onto the River Wensum, and given its high vulnerability to impacts (see Volume III, section 1.15) in-combination effects have the potential to be significant.	NLSE	LSE
	White-clawed crayfish <i>Austropotamobius pallipes</i>		Uncertain	LSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		Uncertain	LSE
	Brook lamprey <i>Lampetra planeri</i>		Uncertain	LSE
	Bullhead <i>Cottus gobio</i>		Uncertain	LSE
The Broads SAC	Hard oligo-mesotrophic water with benthic vegetation of <i>Chara</i> spp.	A number of small scale developments (up to 200 dwellings) are proposed throughout the NPA and rural area. Some have the potential to impact on this SAC and features. The closest location to the SAC will be Loddon/ Chedgrave, Acle and Brundall. While	Uncertain	LSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or		NLSE	LSE

Policy	Policy 7 Key Services			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Hydrocharition</i> type vegetation	developments in Brundall are of very small scale (up to 50 houses) at the other two locations these might go up to 200 houses. All fall within the orange zone for The Broads. Impacts to this habitat may arise from disturbance and increase in discharges. Due to the small scale of the developments water abstraction from the developments alone impacts are uncertain. However, impacts may be significant when considering all the development proposed under the JCS and other developments in the Broads area.		
	Transition mires and quaking bogs		Uncertain	LSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davalliana</i>		Uncertain	LSE
	Alkaline fens		Uncertain	LSE
	Alluvial forests with <i>Alnus aglutinosa</i> and <i>Fraxinus excelsior</i>		Uncertain	LSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		Uncertain	LSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		Uncertain	LSE
	Otter <i>Lutra lutra</i>		It is not considered that developments of this scale will impose significant impacts to this species in the Broads. Although some uncertainty regarding in-combination effects as would depend on the magnitude of the potential	NLSE
	Fen orchid <i>Liparis loeselii</i>	NLSE		Uncertain

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		impacts.		
The Wash and North Norfolk Coast SAC	Sandbanks which are slightly covered by sea water all the time Mudflats and sandflats not covered by seawater at low tide Large shallow inlets and bays Reefs <i>Salicornia</i> and other annuals colonising mud and sand Atlantic salt meadows (<i>Glaucopuccinellietalia maritimae</i>) Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Coastal lagoons	Due to the location of this SAC in relation to the proposed developments (more than 20 km distance) and small areas being affected it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE
	Common seal <i>Phoca vitulina</i>		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Otter <i>Lutra lutra</i>			
Waveney & Little Ouse Valley Fens SAC	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils	Due to the proposed location for developments outside the zones for this SAC significant impacts are not anticipated.	NLSE	NLSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davalliana</i>		NLSE	NLSE
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Winterton – Horsey Dunes SAC	Atlantic decalcified fixed dunes <i>(Calluno –Ulicetea)</i>	Due to the proposed location for developments outside the zones for this SAC significant impacts are not anticipated.	NLSE	NLSE
	Humid dune slacks		NLSE	NLSE
	Embryonic shifting dunes		NLSE	NLSE
	Shifting dunes along the shoreline with <i>Ammophila Arenaria</i> (white dunes)		NLSE	NLSE
Breydon Water Ramsar	CRITERION 5			

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Waterfowl assemblage	The developments proposed in policy P7 are mostly located in areas where impacts to this designated site are unlikely. The closest location to the SAC will be Hethersett (assessed under P5) no significant impacts to the Ramsar is anticipated as the development is outside the zones.	NLSE	NLSE
	CRITERION 6			
	Bewick's swan <i>Cygrus columbianus bewickii</i>	The developments proposed in policy P7 are mostly located in areas where impacts to this designated site are unlikely. The closest location to the Ramsar will be Hethersett (assessed under P5) no significant impacts to the SAC is anticipated as the development is outside the zones.	NLSE	NLSE
	Lapwing <i>Vanellus vanellus</i>		NLSE	NLSE
Broadland Ramsar	CRITERION 5			
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>	A number of small scale developments (up to 200 dwellings) are proposed throughout the NPA and rural area. Some have the potential to impact on this Ramsar and feature The closest location to the Ramsar will be Loddon/Chedgrave, Acle and Brundall. While developments in Brundall are of very small	Uncertain	LSE
	Alkaline fens		Uncertain	LSE
	Alluvial forests with <i>Alnus</i>		Uncertain	LSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>glutinosa</i> and <i>Fraxinus excelsior</i>	<p>scale (up to 50 houses) at the other two locations these might go up to 200 houses. All fall within the orange buffer zone for The Broads. Impacts to this habitat may arise from disturbance, and increase in discharges. Due to the small scale of the developments water abstraction from the developments alone is not considered to be significant.</p> <p>However, in accordance with Policy 17 these developments should not directly impact on a designated site, although indirect impacts are uncertain depending on the final locations and related infrastructure.</p>		
	Desmoulin's whorl snail <i>Vertigo moulinsiana</i>	Potential impacts may occur if habitats suitable for this species are affected.	Uncertain	LSE
	Otter <i>Lutra lutra</i>	It is not considered that developments of this scale will impose significant impacts to this species in the Broads. Although some uncertainty regarding in-combination effects as would depend on the magnitude of the potential impacts.	NLSE	Uncertain
	Fen orchid <i>Liparis loeselli</i>		NLSE	Uncertain
	CRITERION 6			

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Bewick’s swan <i>Cygrus columbianus bewickii</i> Wigeon <i>Anas penelope</i> Gadwall <i>Anas atrepera strepera</i> Shoveler <i>Anas clypeata</i>	Likely significant impacts may arise from developments that are proposed in areas located within the orange zone such as developments proposed at Loddon/ Chedgrave, Acle and Brundall. Impacts may result mostly from disturbance depending on the location of the developments in relation to the Ramsar. However, in accordance with Policy 17 these developments should not directly impact on a designated site, although indirect impacts are uncertain depending on the final locations and related infrastructure.	Uncertain	LSE
Minsmere – Walberswick Ramsar	CRITERION 1			
	Mosaic of marine, freshwater, marshland, with the largest continuous stand of reedbeds and transitional grazing marsh ditch plants	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features fro which it was classified.	NLSE	NLSE
	CRITERION 2			
	Support nine nationally scarce vascular plant species and at least 26 red data book	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site	NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	invertebrates including the mollusc <i>Vertigo angustior</i> .	and the features fro which it was classified.		
	An important assemblage of rare breeding birds associated with marshland and reedbeds.		NLSE	NLSE
North Norfolk Coast Ramsar	CRITERION 1			
	Long expanse of undeveloped coastal habitat. It is a good example of marshland coast, saltmarshes, shingle banks and sand dunes.	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE
	Brackish water lagoons and freshwater grazing marsh and reed beds.		NLSE	NLSE
	CRITERION 2			
	Supports at least three Red data book and nine nationally scarce vascular plants, one red Data Book lichens and 38 Red Data Book invertebrates.	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	CRITERION 5			
	Waterfowl assemblages of international importance.	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features fro which it was classified.	NLSE	NLSE
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i> Brent goose <i>Branta bernicla bernicla</i> Wigeon <i>Anas penelope</i> Pintail <i>Anas acuta</i> Knot <i>Calidris canutus islandica</i> Little tern <i>Sternula albifrons</i> Sandwich tern	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Sterna sandvicensis</i> Common tern <i>Sterna hirundo</i>			
Redgrave & South Lopham Fens Ramsar	CRITERION 1			
	Extensive example of spring-fed lowland base rich valley and mires lacking fragmentation.	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE
	CRITERION 2			

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> .	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE
	CRITERION 3			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> , important for maintaining the biological diversity of the region.	Due to the small scale of the development proposed and distance from the Ramsar no significant impacts are anticipated for this site and the features for which it was classified.	NLSE	NLSE
The Wash Ramsar	CRITERION 5			
	Waterfowl assemblages of international importance.	Impacts are unlikely to be significant due to the location of this Ramsar in relation to the proposed locations for development. The key vulnerability for the site is coastal squeeze and off-shore activities (see Volume III, section 1.17 and 1.25), neither of these would be excubated by the Policy.		
	CRITERION 6			
	Pink-footed goose	Impacts are unlikely to be significant due to the	NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Anser brachyrhynchus</i>	location of this Ramsar in relation to the proposed locations for development. The key vulnerability for the site is coastal squeeze and off-shore activities (see Volume III, section 1.17 and 1.25), neither of these would be excubated by the Policy.		
	Brent goose <i>Branta bernicla bernicla</i>		NLSE	NLSE
	Wigeon <i>Anas Penelope</i>		NLSE	NLSE
	Pintail <i>Anas acuta</i>		NLSE	NLSE
	Knot <i>Calidris canutus islandica</i>		NLSE	NLSE
	Oystercatcher <i>Haematopus ostralegus</i>		NLSE	NLSE
	Grey plover <i>Pluvialis squatarola</i>		NLSE	NLSE
	Sanderling <i>Calidris alba</i>		NLSE	NLSE
	Dunlin		NLSE	NLSE

Policy	<u>Policy 7 Key Services</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Calidris alpina</i>			
	Curlew		NLSE	NLSE
	<i>Numenius arquata</i>			
	Bar-tailed godwit		NLSE	NLSE
	<i>Limosa lapponica</i>			
	Redshank		NLSE	NLSE
	<i>Tringa totanus</i>			
Turnstone	NLSE	NLSE		
<i>Arenaria interpres</i>				

Table 2.5: Policy 16 - Strategic Access and Transportation

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Benacre to Easton Bavents SPA	Bittern <i>Botaurus stellaris</i>	Due to the proposed routes for improvement location (more than 20 km), the vulnerability of the site being attributed to natural processes (Volume III, section 1.1), coupled with the low sensitivity of the bird species (Volume III, section 3.2), no direct impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
Breckland SPA	Stone-curlew <i>Burhinus aedionemus</i>	Improvements to the A11 are proposed as this route is considered as one of the key routes to the JCS area. An AA for this project is currently being done by the Highways Agency. Any direct impacts from the development of the A11 will be analysed under that AA. For this reason only indirect and in-combination impacts will be considered under this assessment. The A11 crosses all the buffer zones of the SPA. Due to the potential impact on traffic levels to and from the developments proposed in Norwich and that species are sensitive to noise disturbance (Volume III, section 3.2), impacts on this designated site due to potential increase in traffic on the A11 are unclear at this stage as no data on potential increase in traffic is available.	NLSE	Uncertain
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	Uncertain
	Woodlark <i>Lullula arborea</i>		NLSE	Uncertain

Policy	P16 – Strategic access and transportation			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Breydon Water SPA	Bewick’s swan <i>Cygnus columbianus bewickii</i>	The A47 crosses the SPA buffer zones and in areas just outside Great Yarmouth passes within short distance of the reservoir. No direct impacts are expected due to the proposed improvements as this road already exists. The key vulnerability of the site being loss of habitats and poor water management (Volume 111, section 1.3) which would not be effected by the Policy. Potential in-combination impacts might result from increased traffic to and from Great Yarmouth and species being sensitive to disturbance. The significance of these impacts is uncertain.	NLSE	Uncertain
	Avocet <i>Recurvirostra avosetta</i>		NLSE	Uncertain
	Golden plover <i>Pluvialis apricaria</i>		NLSE	Uncertain
	Ruff <i>Philomachus pugnase</i>		NLSE	Uncertain
	Common tern <i>Sterna hirundo</i>		NLSE	Uncertain
Broadland SPA	Bewick’s swan <i>Cygnus columbianus bewickii</i>	Highly sensitive to water abstraction, discharge impacts and disturbance effects (see Volume III, section 1.4).	Uncertain	LSE
	Whooper swan <i>Cygnus cygnus</i>		Uncertain	LSE
	Bittern <i>Botaurus stellaris</i>	Impacts may result if traffic increase due to developments proposed in some areas, namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle (proposed to be highly developed with up to 10,000 dwellings).	Uncertain	LSE
	Marsh harrier <i>Circus aeruginosus</i>		Uncertain	LSE
		Stretches of the A47 are located within the buffer		

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Hen harrier <i>Circus cyganeus</i>	zone (orange buffer, see maps in Volume III). As such impacts from disturbance may be significant in some areas of the SPA. However, it is considered that impacts are unlikely to be significant from the implementation of this policy alone. In-combination impacts may result from the overall proposed developments under this strategy and proposed developments in Great Yarmouth LDF.	Uncertain	LSE
North Norfolk Coast SPA	Bittern <i>Botaurus stellaris</i>	Due to the distance between the SPA and the proposed improvements (more than 20 km) no direct impacts are anticipated that could affect the conservation objectives of the SPA and its features.	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Great Yarmouth North Denes SPA	Little tern <i>Sternula albifrons</i>	Due to the fact that the A47 only crosses the green buffer zone of the SPA no direct impacts are anticipated that could affect its conservation objectives and features. Disturbance from potential increase in traffic levels is unlikely as this species is sensitive to local disturbance. (Volume III, section 3.2).	NLSE	NLSE
Minsmere – Walberswick SPA	Bittern <i>Botaurus stellaris</i>	De proposed improvements to access routes to and from Norwich do not affect any areas that are within the buffer zone for this SPA, as such no direct an in-combination impacts are anticipated that could affect the conservation objectives of the SPA and its features	NLSE	NLSE
	Marsh harrier <i>Circus aeruginosus</i>		NLSE	NLSE
	Hen harrier <i>Circus cyganeus</i>		NLSE	NLSE
	Avocet <i>Recurvirostra avosetta</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Nightjar <i>Caprimulgus europaeus</i>		NLSE	NLSE
The Wash SPA	Bewick’s swan	Due to the distance between the SPA and the	NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Cygnus columbianus bewickii</i>	proposed improvements to access routes (more than 20 km), that the site is being actively managed through Wash Estuary Management Plan and the JCS would not contribute to any coastal squeeze issues in this area, no direct or indirect impacts are anticipated that could affect the conservation objectives of the SPA and its features.		
	Bar-tailed godwit <i>Limosa lapponica</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Benacre to East Barents Lagoons SAC <u>Site Conservation objective:</u>	Coastal lagoons	This habitat is particularly sensitive to increase in nutrient concentrations and pollution, habitat loss and erosion. Due to the proposed routes for improvement location (more than 20 km) it is unlikely impacts may result from the implementation of this policy.	NLSE	NLSE
Breckland SAC	Inland dunes with open <i>Corynephorus</i> and <i>Agrostis</i> grasslands	It is not expected that proposed improvements to the A11 will lead to habitat loss.	NLSE	NLSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation	The SAC is vulnerable to atmospheric pollution (Volume III, section 1.10). However, there is no evidence that any potential increase in traffic in the A11 will be significant and has the potential to	NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	European dry heaths	impact the SAC features compromising the conservation objectives. Therefore no likely significant impacts are anticipated.	NLSE	NLSE
	Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco-Brometalia</i>)		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> .		NLSE	NLSE
	Great crested newts <i>Triturus cristatus</i>	Great crested newts are particularly sensitive to habitat loss or fragmentation. These are not expected to occur due to the implementation of this policy.	NLSE	NLSE
North Norfolk Coast SAC	Coastal lagoons Perennial vegetation of stony banks Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Embryonic shifting dunes Shifting dunes along the shoreline with <i>Ammophila</i>	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance from the proposed routes for improvements) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>arenaria</i> (white dunes) Fixed dunes with herbaceous vegetation (grey dunes) Humid dune slacks			
	Petalwort <i>Petalophyllum ralfsii</i> ; Otter <i>Lutra lutra</i>		NLSE	NLSE
Norfolk Valley Fens SAC	Alkaline fens	The SAC is vulnerable to changes in the water levels and lack of management practices (Volume II, section 1.12). Improvements to major routes as the A11 are unlikely to affect the site conservation objectives.	NLSE	NSLE
	Northern Atlantic wet heath with <i>Erica tetralix</i>		NLSE	NLSE
	European dry heaths		NLSE	NLSE
	Semi-natural dry grassland and scrubland facies: on calcareous substrates		NLSE	NLSE
	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils		NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Calcareous fen with <i>Cladium mariscus</i> and species of the <i>Caricion davalliana</i>		NLSE	NLSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	NLSE
	Narrow-mouthed whorl snail <i>Vertigo angustior</i>		NLSE	NLSE
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Overstrand Cliffs SAC	Vegetated sea cliffs of the Atlantic and Baltic coasts	Proposed route improvements are unlikely to impose any impacts on this type of habitats (see Volume III, section 1.13).	NLSE	NLSE
Paston Great Barn SAC	Barbastelles <i>Barbastella barbastellus</i>	This species is very sensitive to disturbance and changes in food availability. It typically forages 5-6 km from their roosts and has been recorded to travel up to 18 km. Due to the rarity of the species in the UK and the precautionary approach, a ZoI of 10 km is used. However, main routes that are planned to suffer improvements are well outside the buffer zone for this SAC. No likely significant	NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		effects are anticipated.		
River Wensum SAC	Water course of plain to montane levels with the <i>Ranunculion fluitantis</i> and <i>Callitricho-Batrachion</i> vegetation	The SAC is highly vulnerable to physical alterations to the channel, likely to occur due to road improvements. However, of the proposed improvements, only the NNDR will pass very close to the river channel (app. 300 m, Volume I, section 2.5). The AA undertaken for this road concluded that no likely impacts will occur to the SAC.	NLSE	LSE
	White-clawed crayfish <i>Austropotamobius pallipes</i>		NLSE	LSE
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	The A11 and A47 are not within the SAC buffer zone and as such no likely significant effects are anticipated.	NLSE	LSE
	Brook lamprey <i>Lampetra planeri</i>		NLSE	LSE
	Bullhead <i>Cottus gobio</i>	In combination impacts might result from road improvements and other developments proposed in the area namely the ones proposed in policies 4 and 5.	NLSE	LSE
The Broads SAC	Hard oligo-mesotrophic water with benthic vegetation of <i>Chara</i> spp.	These habitats are highly sensitive to water abstraction, tourism and recreational pressures. The site is not particularly vulnerable to disturbance.	NLSE	LSE
	Natural eutrophic lakes with <i>Magnopotamion</i> or <i>Hydrocharition</i> type vegetation	Stretches of the A47 are within the buffer zone for this site (see Figure A.3, Volume III).	NLSE	LSE
	Transition mires and quaking	Impacts may result if traffic increase due to developments proposed in some areas, namely the	NLSE	LSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	bogs	Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle (proposed to be highly developed with up to 10,000 dwellings).		
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>		NLSE	LSE
	Alkaline fens	Stretches of the A47 are located within the buffer zone (orange buffer, see maps in Volume III). As such impacts from disturbance may be significant in areas of the SAC. However, it is considered that impacts are unlikely to be significant from the implementation of this policy alone.	NLSE	LSE
	Alluvial forests with <i>Alnus aglutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	LSE
	Molinia meadows on calcareous, peaty or clayey-silt laden soils		NLSE	LSE
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	In-combination impacts may result from the overall proposed developments under this strategy and proposed developments in Great Yarmouth LDF.	NLSE	NLSE
	Otter <i>Lutra lutra</i>	It is unlikely that changes in hydrology patterns are will occur from the implementation of this policy. No likely significant effects are anticipated.	NLSE	NLSE
	Fen orchid	It is not considered that developments of this scale will impose significant impacts to this species in the Broads. Although some uncertainty regarding in-combination effects as would depend on the magnitude of the potential impacts.	NLSE	NLSE
Fen orchid	No likely significant effects are anticipated that	NLSE	NLSE	

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	<i>Liparis loeselii</i>	might affect this species.		
The Wash and North Norfolk Coast SAC	Sandbanks which are slightly covered by sea water all the time Mudflats and sandflats not covered by seawater at low tide Large shallow inlets and bays Reefs <i>Salicornia</i> and other annuals colonising mud and sand Atlantic salt meadows (<i>Glaucopuccinellietalia maritimae</i>) Mediterranean and thermo-Atlantic halophilous scrubs (<i>Sarcocornetea fruticosi</i>) Coastal lagoons	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE
	Common seal <i>Phoca vitulina</i> Otter <i>Lutra lutra</i>		NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Waveney & Little Ouse Valley Fens SAC	<i>Molinia</i> meadows on calcareous, peaty or clayey-silt laden soils	Due to the location of the SAC more than 30 km south to the proposed routes for improvements, it is unlikely that this policy will affect significantly the designated site. The site is vulnerable to hydrological disruption, but this is unlikely given the distance (see Volume III, section 1.18).	NLSE	NLSE
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davallianae</i>		NLSE	NLSE
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>		NLSE	NLSE
Winterton – Horsey Dunes SAC	Atlantic decalcified fixed dunes (<i>Calluno –Ulicetea</i>)	Due to the location of the SAC more than 30 km south to the proposed development sites. It is unlikely that this policy will impose direct impacts to the designated site.	NLSE	NLSE
	Humid dune slacks		NLSE	NLSE
	Embryonic shifting dunes		NLSE	NLSE
	Shifting dunes along the shoreline with <i>Ammophila Arenaria</i> (white dunes)		NLSE	NLSE
Breydon Water Ramsar	CRITERION 5			
	Waterfowl assemblage	The A47 crosses the SPA buffer zones and in areas just outside Great Yarmouth passes within short distance of the reservoir. No direct impacts are	NLSE	Uncertain

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
		<p>expected due to the proposed improvements as this road already exists. The key vulnerability of the site being loss of habitats and poor water management (Volume 111, section 1.3) which would not be effected by the Policy. Potential in-combination impacts might result from increased traffic to and from Great Yarmouth and species being sensitive to disturbance. The significance of these impacts is uncertain.</p>		
	CRITERION 6			
	Bewick’s swan <i>Cygrus columbianus bewickii</i>	<p>The A47 crosses the SPA buffer zones and in areas just outside Great Yarmouth passes within short distance of the reservoir. No direct impacts are expected due to the proposed improvements as this road already exists. The key vulnerability of the site being loss of habitats and poor water management (Volume 111, section 1.3) which would not be effected by the Policy. Potential in-combination impacts might result from increased traffic to and from Great Yarmouth and species being sensitive to disturbance. .The significance of these impacts is uncertain.</p>	NLSE	Uncertain
	Lapwing <i>Vanellus vanellus</i>		NLSE	Uncertain
Broadland Ramsar	CRITERION 5			

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Calcareous fens with <i>Cladium mariscus</i> and species of the <i>Caricion davalliana</i>	These habitats are highly sensitive to water abstraction, tourism and recreational pressures. The site is not particularly vulnerable to disturbance.	NLSE	LSE
	Alkaline fens	Stretches of the A47 are within the buffer zone for this site (see Figure A.3, Volume III). Any increase in traffic levels due to the developments proposed in areas close to the SAC (namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle) and in Great Yarmouth and the new NNDR are considered likely to be significant. Potential increase in road run-off might increase if traffic levels also increase.	NLSE	LSE
	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i>		NLSE	LSE
	Desmoulin’s whorl snail <i>Vertigo moulinsiana</i>	It is unlikely that changes in hydrology patterns are will occur from the implementation of this policy. No likely significant effects are anticipated.	NLSE	NLSE
	Otter <i>Lutra lutra</i>	Otters may be negatively affected by changes in water quality that affect the fish community and abundance. Potential increase in road run-off might increase if traffic levels also increase in the A47.	NLSE	LSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Fen orchid <i>Liparis loeselli</i>	No likely significant effects are anticipated that might affect this species.	NLSE	NLSE
	CRITERION 6			
	Bewick’s swan <i>Cygnus columbianus bewickii</i>	Highly sensitive to water abstraction, discharge impacts and disturbance effects (see Volume III, section 1.4).	NLSE	LSE
	Wigeon <i>Anas penelope</i>		NLSE	LSE
	Gadwall <i>Anas atrepera strepera</i>	Impacts may result if traffic increase due to developments proposed in some areas, namely the Old Catton-Sprowston-Rackheat-Thorpe St Andrew triangle (proposed to be highly developed with up to 10,000 dwellings).	NSLE	LSE
	Shoveler <i>Anas clypeata</i>		NSLE	LSE
Stretches of the A47 are located within the buffer zone (orange buffer, see maps in Volume III). As such impacts from disturbance may be significant in areas of the SPA. However, it is considered that this will not be significant from the implementation of this policy alone. In-combination impacts may result from the overall proposed developments under this strategy and proposed developments in Great Yarmouth LDF.				
	Minsmere – Walberswick	CRITERION 1		

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
Ramsar	Mosaic of marine, freshwater, marshland, with the largest continuous stand of reedbeds and transitional grazing marsh ditch plants	Proposed improvements to main routes are unlikely to impose direct impacts on this type of habitats. No Likely significant effects are anticipated.	NLSE	NLSE
	CRITERION 2			
	Support nine nationally scarce vascular plant species and at least 26 red data book invertebrates including the mollusc <i>Vertigo angustior</i> .	Proposed improvements to main routes are unlikely to impose direct impacts on this type of habitats. No Likely significant effects are anticipated.	NLSE	NLSE
	An important assemblage of rare breeding birds associated with marshland and reedbeds.	Proposed improvements to main routes are unlikely to impose direct impacts on this type of habitats. No Likely significant effects are anticipated.	NLSE	NLSE
North Norfolk Coast Ramsar	CRITERION 1			
	Long expanse of undeveloped coastal habitat. It is a good example of marshland coast, saltmarshes, shingle banks and sand dunes.	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance from the proposed routes for improvements) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE
	Brackish water lagoons and		NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	freshwater grazing marsh and reed beds.			
	CRITERION 2			
	Supports at least three Red data book and nine nationally scarce vascular plants, one red Data Book lichens and 38 Red Data Book invertebrates.	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance from the proposed routes for improvements) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE
	CRITERION 5			
	Waterfowl assemblages of international importance.	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance from the proposed routes for improvements) it is unlikely that significant impacts to the habitats will occur.	NLSE	NLSE
	CRITERION 6			
	Pink-footed goose <i>Anser brachyrhynchus</i>	Due to the location of this SAC in relation to the development area proposed in this policy (more than 40 km distance from the proposed routes for improvements) it is unlikely that significant	NLSE	NLSE
	Brent goose <i>Branta bernicla bernicla</i>		NLSE	NLSE

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Wigeon <i>Anas penelope</i>	impacts to the habitats will occur.	NLSE	NLSE
	Pintail <i>Anas acuta</i>		NLSE	NLSE
	Knot <i>Calidris canutus islandica</i>		NLSE	NLSE
	Little tern <i>Sternula albifrons</i>		NLSE	NLSE
	Sandwich tern <i>Sterna sandvicensis</i>		NLSE	NLSE
	Common tern <i>Sterna hirundo</i>		NLSE	NLSE
Redgrave & South Lopham Fens Ramsar	CRITERION 1			
	Extensive example of spring-fed lowland base rich valley and mires lacking fragmentation.	Due to the fact that proposed routes for improvements are outside the buffer boundary for the SAC no likely significant effects are anticipated.	NLSE	NLSE
	CRITERION 2			

Policy	<u>P16 – Strategic access and transportation</u>			
Designated Site	Qualifying feature	Possible impacts	Likely significant effect alone?	Likely significant effect in-combination?
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> .	Due to the fact that proposed routes for improvements are outside the buffer boundary for the SAC no likely significant effects are anticipated.	NLSE	NLSE
	CRITERION 3			
	Supports many rare and scarce invertebrates including the fen raft spider <i>Dolomedes plantarius</i> , important for maintaining the biological diversity of the region.	Due to the fact that proposed routes for improvements are outside the buffer boundary for the SAC no likely significant effects are anticipated.	NLSE	NLSE
The Wash Ramsar	Pink-footed goose <i>Anser brachyrhynchus</i> Brent goose <i>Branta bernicla bernicla</i> Wigeon <i>Anas Penelope</i> Pintail <i>Anas acuta</i> Knot <i>Calidris canutus islandica</i>	Impacts are unlikely to be significant due to the location of this Ramsar in relation to the proposed routes for improvements. The key vulnerability for the site is coastal squeeze and off-shore activities (see Volume III, section 1.17 and 1.25), neither of these would be excubated by the Policy.	NLSE	NLSE

