



**South
Cambridgeshire**
District Council

South Cambridgeshire Local Development Framework

Cambridge Southern Fringe Area Action Plan

~~Draft~~ Final Sustainability Report



**SOUTH CAMBRIDGESHIRE
LOCAL DEVELOPMENT FRAMEWORK:
CAMBRIDGE SOUTHERN FRINGE
AREA ACTION PLAN**

**~~DRAFT~~ FINAL
~~SUSTAINABILITY~~ SUSTAINABILITY
REPORT**

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1. SUMMARY AND OUTCOMES

1.1 Non-technical summary

Introduction

Sustainable Development aims to balance the needs of society and the economy against the impacts of growth in housing, new shops, offices and associated infrastructure on the surrounding environment, both natural and man-made. Plans prepared by Local Planning Authorities must undergo a combined process of Sustainability Appraisal (SA) and Strategic Environmental Assessment (SEA) to ensure that they support the government's sustainability objectives – which are economic, environmental and social – are reflected in the policies they contain.

This document is a non-technical summary providing an overview of the approach to and conclusions of the combined SA / SEA of the Cambridge Southern Fringe Area Action Plan (AAP) prepared by South Cambridgeshire District Council.

Legislative Context

The SA was undertaken in compliance with Regulation 19 of the Planning and Compulsory Purchase Act (2004), which requires that an appraisal of the sustainability of the plan and that its findings are documented in a report. SA is required for all AAPs and other documents, which comprise the new Local Development Framework (LDF), replacing the District Local Plan.

UK law requires that component documents in the LDF must also undergo Strategic Environmental Assessment (SEA), which is very similar to SA. A combined SA / SEA of this AAP has been undertaken based on the guidance issued by the Office of the Deputy Prime Minister. Plan development and SA / SEA have occurred during a transitional period when the new Planning Act and SEA Regulations have become part of UK law, and which has seen guidance on the assessment process revised. The approach to assessment has been compliant with the guidance available at the time. Where changes in guidance have occurred, consideration has been given to whether this would have resulted in a material change to the earlier stage of assessment and whether any further work is needed to ensure compliance with regulations. This has been included within this document as necessary.

SA / SEA has occurred in parallel with the preparation of the AAP, so that sustainability considerations are identified at an early stage and reflected in its content. This document summarises the process and results of assessment to provide the transparency that is a requirement of SA / SEA.

Preparatory Steps in the SA / SEA

The initial stage of SA / SEA, which involves collecting a base of evidence to determine current environmental, economic and social conditions in the District, and to identify any problems or key issues which must be addressed, was undertaken between Autumn 2003 and Summer 2004. It was undertaken by South Cambridgeshire District Council in partnership with Cambridgeshire County Council and the other Local Planning Authorities in the county. The

material was adapted to provide specific information about conditions in the District, and the key issues it faces, and documented in a Scoping Report as required by SA / SEA guidance.

This Report was presented for consultation to the nominated environmental bodies (the Countryside Agency, Environment Agency; English Heritage and English Nature) in June 2004. A revised Scoping Report, taking account the views of those bodies, was presented to a broad range of public bodies and private sector stakeholders, including the nominated environmental bodies, October / November 2004, and provides a base of information, evidence, and an SA / SEA assessment framework for the LDF as a whole. The Council intends to review and update the Scoping Report periodically to reflect new policy, changing conditions, and to ensure future SA / SEA is based on up to date information.

The initial research included the review of more than 80 documents ranging from the EU Directive on conserving key natural habitats, national and regional planning guidance and strategies, to the Cambridgeshire Structure Plan and a range of District plans and strategies on housing needs, economic development, community safety, etc. The review identified a number of pre-requisites (including targets) which policies in the AAP must reflect in the light of local circumstances. A second programme of research was undertaken to assemble a baseline dataset which quantifies local conditions on 40 parameters, including river water quality, air quality, loss of high quality agricultural land, the area and condition of important wildlife habitats, housing completion rate and the achievement of energy efficiency ratings in new dwellings, levels and patterns of commuting and travel to school, availability of shops and other amenities in the District's villages, unemployment levels, educational achievement rates, etc. Data on conditions in adjacent local authority areas, in the East of England, or nationally, was used to determine whether environmental, economic and social conditions in the District were favourable, average or typical of the surrounding region, or unsatisfactory and in need of specific corrective policy.

From the initial evidence a set of key issues was identified which are to be addressed by all the policies in the LDF. These are grouped under seven headings shown below, and with examples of some key issues.

<i>Land and water resources</i>	Loss of agricultural land; the effect of new development on water consumption and resources
<i>Biodiversity</i>	Deterioration of important vegetation features (e.g. hedgerows); the need to protect nationally important wildlife assets.
<i>Landscape, townscape & archaeology</i>	Protecting the character and setting of Cambridge, communities within the District, and its wider landscape; development design and materials that conform to local traditions; and the need to protect open space.
<i>Climate change and pollution</i>	High levels of car usage due to separation of homes and jobs; the constraints imposed by flood risk especially in the north of the District; and the need for effective energy conservation.
<i>Healthy communities</i>	Need to encourage healthier lifestyles and travel choices; the growing retired community, and their concerns about crime.
<i>Inclusive</i>	Increasing disparity between house prices and incomes which

<i>communities</i>	affect the public sector in particular; the need to retain a basic range of amenity in rural communities; the need to provide good access to all services for the whole population; and the need to cater to the needs of the travelling community.
<i>Economic activity</i>	Need to balance employment growth in the sub-region's key strengths with a range of opportunities across all skill levels and sectors; need to encourage appropriate farm diversification to prevent rural stagnation; and to maintain services in spite of the local dominance of Cambridge.

An SA Framework was prepared based on these issues. It comprises a set of 22 objectives for Council policy which will result in environmental, economic and social protection and / or improvement, and which address the issues listed above. These objectives formed the structure for the subsequent phases of SA / SEA.

Initial Sustainability Appraisal: Assessing the Options

In parallel with work on the Scoping Report, the Council completed the preparation of a Preferred Options Report in June 2004. Guidance on the SA / SEA process requires the consideration of policy alternatives. In this case options were constrained by government targets on use of brownfield land, housing density, etc., and also by policies in the Cambridgeshire Structure Plan, which the Council is obliged to enact locally. This situation was reflected in the Preferred Options Report for the Cambridge Southern Fringe AAP, which presented 35 policy options of which 6 were alternatives to a preferred approach.

Scott Wilson undertook an Initial Sustainability Appraisal (ISA) of the options in June 2004, the results of which were presented to Council Members in August 2004, and published for public participation in October / November 2004.

The results of the ISA were clearly positive as many of the AAP policies concern landscaping and other mitigation or improvements to the area, and there was very limited evidence of adverse impacts against individual SA objectives throughout the assessment. There are absolute negative impacts in the additional demands on energy, water and waste infrastructure as a result of development, however that covered by the AAP – the creation of a small urban extension at Trumpington West which is a tenth of the size of the new town of Northstowe which is proposed in a separate AAP – represents a much smaller growth.

Overall the policies set out design principles for the Trumpington West site that are consistent with those in the Council's Core Strategy, and with those in other LDF documents, concerning layout, integration of built development with open space, proximity to sustainable transport modes, and measures to enable the new extension to be integrated into the existing southwestern suburbs of Cambridge.

The ISA proposed a number of changes to policy text to improve the effectiveness of mitigation measures, and 4 of these were accepted by the

Council and taken forward into the options which were then presented for an initial consultation.

Assessing the Impact of the Plan: Initial Re-Assessment

The Council took account of the representations received during consultation on the Preferred Options in preparing the draft Area Action Plan, distilling the large number of options into 26 draft policies. It was considered appropriate to re-assess the new policies to ensure they were subject to thorough appraisal.

Scott Wilson undertook this re-appraisal of emerging policies, and the assessment of potential plan impacts, together with proposals on mitigation and monitoring plan effects in April 2005.

The results of this appraisal reflected those at the ISA stage. The assessment is clearly positive with modest absolute impacts on water, energy and waste being the only major problems identified. Notwithstanding this, the AAP includes balancing policies encouraging energy and water conservation, recycling of construction wastes, and incorporation of waste recycling facilities into new development.

Assessing the Impact of the Plan: Assessing Significance

It was not possible to assess the significance of plan impacts in the full manner envisaged by SA / SEA guidance, or in the way this task is approached in the Environmental Impact Assessment (EIA) of development proposals. Recently issued government guidance states that significance assessment should be appropriate to scope, the stage reached in the decision-making process, and whether it would be appropriate to assess impacts elsewhere. In some cases this would occur through the subsequent EIA of a development proposal at the planning application stage. With many aspects of the layout and design of the site still to be clarified, and no firm detail about timing of development of its different parts, it is not possible to assess visual and other impacts at this stage. Also, Scott Wilson considers it is not the role of SA / SEA to duplicate an EIA that will be undertaken in response to a development proposal as this will be based on more detailed information at a later stage in the planning process. The assessments presented in the report can, however, assist the Council in determining whether EIA will be needed, and identify the impacts which will need to be assessed in detail.

Such constraints are identified in the Draft Sustainability Report together with recommendations of how they should be addressed. Typically these involve early surveys of the site (eg. for archaeological remains, to identify whether protected species inhabit the site) so that any conclusions can be incorporated into the Master Plan for the site, which has yet to be prepared. Assessment has therefore focused on the extent to which each policy meets the requirements of each objective in the SA Framework, using this as a proxy to assess the likelihood that the AAP will have significant impacts in due course.

No specific adverse impacts were identified as being significant based on information available at this stage of planning. Apart from the absolute effects on, for example, energy consumption, much of the Plan remains concerned with sympathetic design and landscaping to enhance the A10 approach to

Cambridge, and to maintain the open aspect towards the Gog Magog Downs to the south of the new development on the edge of Trumpington and on the Addenbrooke's Hospital site.

Assessing the effectiveness of the plan

In the absence of well-defined quantifiable significant impacts it was necessary to evaluate how well the draft plan policies were meeting the objectives in the SA Framework. The points below summarise the assessment in each case; some of the objective descriptions (italicised) are paraphrased.

- *Minimise irreversible loss of agricultural land:* A strength of the development proposal, which maximises use of the current Monsanto site to develop Trumpington West, protecting its aspect and further expansion westwards by redesignating the position of the Green Belt. The chosen option takes a small amount of open land within the current Monsanto facility but is less extensive than one of the options presented initially, and only marginally larger than the smallest alternative.
- *Reduce use of non-renewable resources.* There are absolute impacts but these are incremental on top of consumption from existing housing and industry, small in scale alongside developments at Northstowe and Cambridge East, and mitigated in part by policies in the AAP.
- *Conserve water resources.* As above, with the impact mitigated by an ambitious target to reduce average consumption by 25% compared to the current stock.
- *Avoid damage to designated sites.* The Plan makes provision to prevent contamination of water running into the Hobson's Brook / Nine Wells area from development to the north which lies within the City boundary, and therefore requires coordination with the City Council. Such measures combined with landscape enhancement and a change in use of this area is intended to improve water and habitat quality in the hope that the area's status as a Site of Special Scientific Interest might be regained. At Trumpington West the main issue is the need to control the discharge of water and sediment into the River Cam to minimise flood and contamination risks.
- *Maintain and enhance habitats and species.* The Plan makes provision for landscape improvements beyond Trumpington West and in the area south of Addenbrookes, which will also retain existing features and add new vegetation such as small stands of trees to improve its appearance and appeal to wildlife. As with other LDF documents, an early survey of local habitats and to detect possible presence of protected species will be a necessary input to the development of the Master Plan for the two developments.
- *Improve access to wildlife sites.* Enhancements south of Addenbrookes include improved foot and cycle access to and through the area to Gog Magog Downs and Wandlebury hill fort, while extensive landscaping measures include a new country park between the Trumpington West housing area and the River Cam.
- *Avoid damage to heritage assets.* Early survey is also required of archaeological assets which are known to exist south of Addenbrookes (where they will not be disturbed by the proposed landscaping measures) and between Trumpington West and the Cam. These lie within the boundary of the proposed country park but also lie along the line of the drainage facilities envisaged for this part of the site, and which may therefore involve excavation.

- *Maintain landscape and townscape.* The plan is very clearly sustainable with the broad scope of its measures for the two sites that it covers. Enhancement is provided west of the A10 approach both to improve the aspect of this area and also mitigate the development at Trumpington West, while that south of Addenbrooke's preserves the open aspect of this area.
- *Create good spaces and places.* Design of Trumpington West incorporates the same broad design principles as other LDF documents, with use of 'green fingers' of open or vegetated land running through the high density housing development and provide access to the adjacent open areas.
- *Reduce emissions and development impacts.* The Trumpington West site lies adjacent to the existing park & ride facility and will be connected to foot and cycle routes into the City centre and to the Addenbrooke's site, encouraging sustainable commuting as there will only be limited new employment on the development.
- *Waste reduction and improved recycling.* Another absolute impact which is only partly mitigated by the requirement to include recycling facilities, which will be coordinated with the County Council.
- *Reduce vulnerability to climate change.* Addressed in part through policies requiring basic energy conservation in design and the installation of technology such as solar panels in a proportion of all new development. The main issue is the management of the release of water running off the Trumpington West site into the Cam, which will be controlled by a sustainable drainage system, although its design is not yet finalised.
- *Human health.* Any plan impacts depend largely on changes in human behaviour which it cannot enforce. The principal beneficial impacts are delivered through sustainable transport and design policies which increase or improve cycling and pedestrian infrastructure, particularly for commuting into Cambridge. The Trumpington West site will have ready access to recreational space in the development and in the country park to the west, while the area south of Addenbrookes will have access improvements especially for walkers and cyclists, which will benefit residents of adjacent Cambridge suburbs and the Shelfords.
- *Reduce crime and fear of it.* Design policies encourage better lighting, overlooked play areas, secure cycle parking, etc., reflecting the fact that the AAP has limited means to address this objective.
- *Improve public open space.* A clearly sustainable approach is adopted with provision in Trumpington West based on established guidelines. On both parts of the site the landscaped areas will provide for increased public access where there are constraints at present.
- *Quality, range & accessibility of services.* Trumpington West will primarily contain housing, but its development will parallel improvement of the retail and amenity facilities in Trumpington just across the City boundary. The location of the site exploits proximity to the park & ride for easy access to central Cambridge facilities, and the Plan provides for improved public transport services including a link across to the proposed Guided Busway interchange at the Addenbrooke's complex.

- *Redress inequalities.* As with other components of the LDF, inequalities are addressed indirectly, with improved access to benefit the less mobile, and housing policy the tackles current supply problems. The Plan appears to envisage Trumpington West that Trumpington West will provide homes for those of a working age as there is no explicit provision for the elderly.
- *Access to appropriate, affordable housing.* Although it is not based on an existing policy in the County Structure Plan, it is proposed because it can be developed early to address imbalances in housing supply even if this is only on a small scale compared to Northstowe for example. Moreover the site provides an opportunity to add to housing stock close to the city, its services and employment, and is therefore more sustainable than a development some distance away.
- *Increased community involvement.* The AAP provides for some new community facilities within Trumpington West, although they will also benefit from access to those in the existing village. Further consideration may need to be given to traffic management measures to provide the whole community with safe access to facilities that lie either side of the A10 where it enters the City.
- *Access to appropriate work.* The AAP addresses this objective primarily by providing sustainable access to the city centre and to the Addenbrooke's site. A small amount of local employment within the development is envisaged also.
- *Appropriate infrastructure investment.* Infrastructure investment is addressed extensively by a set of policies, with the exception of education as this lies outside the scope of the LDF. The Plan also makes provision for funding some ancillary infrastructure as well as some landscaping measures by requiring a financial contribution from the developer(s).
- *Improve the local economy.* The Plan has very limited impact on this objective except by small-scale expansion of housing stock; its principal sustainability benefits are addressed under other objectives.

Assessing cumulative, synergistic and secondary impacts

Cumulative effects occur where two insignificant impact combine to form a significant impact. Therefore it is not possible to identify such effects at this stage in the development of the DPD because virtually all the policies have no spatial expression at present. However policies can work together to achieve what it may be more accurate to call a 'collective impact' and several positive (synergistic) and negative (cumulative) examples were identified.

Positive / Synergistic

- The extensive landscape improvements on both parts of the site, which will maintain and enhance this area of the City's surroundings, with recreational facilities potentially attracting visitors who will also patronise local services and amenities.
- Effect of good design and spatial policy linking services and ways of accessing them will improve the feel of new development over time.
- The location which will be served by existing sustainable transport modes, encouraging a switch to non-car commuting, even if this is only on a small scale locally.

Negative / Cumulative

- Effect of good design and spatial policy linking services and ways of accessing them will improve the feel of new development over time.
- As with other AAPs there is an impact on energy, water and waste, but this is relatively minor given the small scale of development at Trumpington West.

It should also be stressed that the extensive range of mitigating measures contained in the AAP reduces the scope for cumulative adverse impacts.

Assessing the Impact of the Plan: Mitigating Impacts & Monitoring

Here too the extent of mitigation measures already in the AAP limits the scope for the SA / SEA to propose further extensive changes. Mitigation proposals are offered for seven policies, all of which require only clarification of the scope and powers of policies. However further investigation of impacts will be necessary once the Master Plan for the sites has been prepared, and there is also a need for early wildlife and archaeological surveys. Any further mitigation requirements would be delivered either through these forthcoming planning activities, or through the Environmental Impact Assessment of the development.

An initial, outline monitoring plan based on 44 indicators is proposed. It is based largely on the baseline parameters in the Council's Scoping Report. However this is a proposal only as responsibility for monitoring rests with the Council, and there will be savings in time and cost of combining these proposals with the annual monitoring of the LDF which the Council is obliged to undertake. This plan will need to be supplemented by a monitoring programme during the construction of Trumpington West to ensure that the extensive mitigation policies incorporated in the current Plan are effective in preventing impacts on those occupying the site, on other housing in Trumpington, and on the adjacent open areas.

Development of the two parts of the AAP will occur in parallel with expansion of the Addenbrooke's site and redevelopment of land within the City boundary to the south of Long Lane. Mitigation and monitoring will need to be coordinated with that prepared for these sites in the light of possible cross-boundary effects, particularly noise and light pollution, air and water contamination.

Conclusion and next steps

The assessment concludes that the AAP has a strong fit with sustainability requirements, not only in its overarching policies, but also in an interlocking set of development control and broad design policies, which anticipate the likely impacts of new land use and require measures to limit their adverse impact.

The draft Report on the SA / SEA is now presented for public consultation and comment in parallel with that on the pre-submission draft AAP. The Report will be revised at the end of participation, reflecting any significant changes that are required as a result of representations received and will accompany the draft AAP for submission to the Secretary of State. A final Report will be published with the adopted AAP.

1.2 Statement on the difference the process has made

This SA / SEA has contributed to plan development by providing an independent assessment of the sustainability of the Council's proposed policies at an intermediate stage, when options were available for some areas of policy. In all but one instance the assessment concurred with the Council's preferred option, however the assessment identified a number of textual modifications which were taken forward to clarify the focus of certain policies. However the development of plan options is constrained by government planning guidance, and by policies in the adopted Cambridgeshire Structure Plan. This situation limited the opportunity to assess a broad range of policy alternatives at the Initial Sustainability Appraisal stage.

Changes to the Preferred Options report after initial consultation necessitated a re-assessment of all policies to ensure their sustainability implications were fully addressed in the light of potential changes.

Assessment of policy impacts has been constrained by the nature of the proposals in the plan. Apart from site-specific allocations of land, policies have no clear spatial expression. The assessment can therefore only outline the nature of their impact and their likely significance.

The assessment has therefore provided an initial check on the sustainability of plan policies as envisaged by government guidance. Plan assessment identifies likely impacts which will require further investigation in response to planning applications.

1.3 How to comment on the report

This Report will be made available by South Cambridgeshire District Council in parallel with the draft Area Action Plan for the Cambridge Southern Fringe. The timetable, process and contact point(s) for responding to both documents will be advised separately by the Council.

2. BACKGROUND

2.1 Purpose of the Sustainability Appraisal and the Sustainability Appraisal Report

Sustainability Appraisal (SA) is a requirement under Regulation 19 of the *Planning and Compulsory Purchase Act* (2004) for the Local Development Documents that comprise a Local Development Framework (LDF).

The purpose of SA is *“to promote sustainable development through better integration of sustainability considerations into the preparation and adoption of plans. [It is] an iterative process that identifies and reports on the likely significant effects of the plan and the extent to which the implementation of the plan will achieve the social, environmental and economic objectives by which sustainable development can be defined.”* (ODPM, 2004)

The SA Report is a key output of the process and should reflect and support the draft plan on which formal public consultation is to be carried out. This report has been prepared in support of the Cambridge Southern Fringe Area Action Plan (CSF AAP) for this purpose, to demonstrate that sustainability considerations have been incorporated into the development of the AAP from an early stage, and to provide a formal statement and audit trail of the assessment.

2.2 Plan objectives and outline of contents

The CSF AAP is one of the key documents of the South Cambridgeshire LDF, which will also include two other Area Action Plans for developments at Cambridge East and Northstowe, and the Core Strategy, Development Control Policies, Site Specific Policies Development Plan Documents (DPDs).

The AAP supports the broader strategic vision for the District (stated in the Core Strategy DPD), which is that it will *“contribute to satisfying the development needs of the Cambridge Sub-Region rather than those generated by pressures to the south while preserving its rich built and natural heritage and distinctive character. The District will continue to provide an attractive rural hinterland and setting for the historic City of Cambridge, much of which will be kept permanently open, those parts closer to Cambridge being protected by a Green Belt. The District will prosper in its own right as a rural district that makes up the largest part of the Cambridge Sub-Region and will continue to develop as part of the home of the largest cluster of research and development activity in Europe whilst maintaining and where possible improving the character, environment, economy and social fabric of its villages and countryside”*.

As a component of the LDF, the objectives of this AAP are consistent with and supportive of the Strategic Vision for South Cambridgeshire, and include:

- Provide an adequate and continuous supply of land for housing and employment, to meet strategic requirements, in sustainable locations.
- Locate development where it will provide the opportunity for people to satisfy their day-to-day needs for employment, shopping, education and

other services locally or in locations which minimise the need to travel and where there are modes of transport available in addition to the car.

- Create new and distinctive sustainable communities on the edge of Cambridge, connected to the rest of the City by high quality public transport and other non-car modes of transport, which will enhance the special character of the City and its setting.
- Create a sustainable small new town close to but separate from the villages of Longstanton and Oakington, connected to Cambridge by a high quality rapid transit system along the route of the disused St Ives railway. The new town will make best use of previously developed land.
- Protect the varied character of the villages of South Cambridgeshire by ensuring that the scale and location of development in each village is in keeping with its size and character, and that buildings and open spaces which create character are maintained and where possible enhanced.
- Ensure that the District's built and natural heritage is protected and that new development identifies and protects cherished townscape assets of local urban design and conservation importance.
- Ensure that any new development provides appropriate provision for the protection and enhancement of native biodiversity in order to contribute towards biodiversity gain, while having regard to the site's current biodiversity value. Opportunities for increased access to the countryside and enjoyment of biodiversity should be viewed as integral requirements of new development.

This AAP present policies under several headings:

- Vision & Development Principles
- The Site & Its Setting
- Enhancing landscape etc.
- The Structure of Trumpington West
- Housing
- Employment
- Community Facilities, etc.
- Transport
- Landscape
- Biodiversity
- Archaeology & Heritage
- Recreation
- Drainage & Water Conservation
- Telecommunications
- Sustainability Exemplars
- Phasing & Implementation

The AAP covers two areas to the immediate south southwest of the Cambridge City Council boundary adjoining Trumpington and shown in Figure 1 overleaf.

- A mixed land use development (predominantly providing housing) of 600 dwellings on the current site of the Monsanto / PBI agro-research facility. The development represents an extension of the Cambridge urban area and lies close by Trumpington centre and next to its park & ride facility. The development will be complemented by landscaping to the south to enhance the appearance of the southwestern entrance to the city, and the creation of a sizeable country park along the eastern bank of the Cam as far as Hauxton.

Figure 1a: Concept diagram of Cambridge Southern Fringe – Trumpington West (source: South Cambridgeshire District Council, 2005; base map © Crown copyright).

Figure 1b: Concept diagram of Cambridge Southern Fringe – development south of Addenbrookes (source: South Cambridgeshire District Council, 2005; base map © Crown copyright).

- An extensive area of landscape improvements in open land bordered by Trumpington and development along Long Lane (and the Addenbrookes site) to the north, and the ribbon development of Great Shelford to the west. These improvements will be complemented by additional foot and cycle infrastructure to encourage use of the area and access to local features of interest to the southeast of the city, the setting of which will be respected and enhanced by the landscaping of the open area.

Further detail of the initial design, layout, etc. of each component is provided in the AAP.

2.3 Compliance with the SEA Directive/Regulations

In summer 2001, the European Union legislated for Strategic Environmental Assessment with the adoption of Directive 2001/42/EC on the *Assessment of the Effects of Certain Plans and Programmes on the Environment* (the 'SEA Directive'). Article 13 of the Directive states that SEA must be undertaken for a range of UK plans and programmes whose preparation began after 21st July 2004, or whose formal adoption is not complete by 21st July 2006.

An Environmental Report on these environmental effects is a requirement of the Directive but this report can be incorporated into other reports required for similar purposes. This report is referred to as the Final Environmental / Sustainability Report, but it also meets the requirements of the Environmental Report as defined by the Directive and corresponding UK Regulations.

Annex 1 of the SEA Directive identifies the information to be provided in the Environmental Report as required by Article 5(1) of the Directive. The location of the corresponding material in this Report is summarised in Table 1.

2.4 Compliance with guidance on undertaking Sustainability Appraisal

Appraisal began in the period preceding the passage of the Planning and Compulsory Purchase Act in late Spring 2004 and continued into early 2005. Over this period, government guidance on undertaking SA that also meets the requirement of the SEA Directive evolved and the appraisal was undertaken according to the terms of the guidance in force at the time of each task¹.

- Consultation draft guidance issued in October 2003 was used for tasks up to consultation in October and November 2004 on the Preferred Options Report and publication of the Initial Sustainability Appraisal Report¹.
- Consultation draft guidance issued in September 2004 was used for the remaining stages of the process².

However, where changes in guidance have occurred, consideration has been given to whether this would have resulted in a material change to the earlier stage of assessment and whether any further work is needed to ensure compliance with regulations. This has been included within this document as necessary.

Table 1: Locating report contents that comply with requirements of the SEA Directive

Requirement of SEA Directive	Location in this report
Contents and main objectives of plans and programmes that may affect the plan (DPD)	Provided in the Scoping Report. Table 5 in section 4.1 lists the documents reviewed
Relevant aspects of the current state of the environment and its likely evolution without the implementation of the plan (DPD)	Appendix 1 of this report
The environmental characteristics of the areas likely to be significantly affected	Most plan policies have no spatial expression. Relevant characteristics are identified in detailed assessments of site specific allocations and which are provided in a separate document
Any existing environmental problems (issues) in particular those relating to areas designated under the Habitats and Birds Directives	The principal issues are summarised in section 4.4
The environmental protection objectives which are relevant to the plan or programme, and the way those objectives have been taken into account in its preparation	Identified during the context review and collection of the baseline, and reflected in the plan issues and objectives (see sections 4.4 and 4.5)
The likely significant effects on the environment (and economic and social impacts)	See section 6.1; detailed assessments are provided in a separate document
The measures envisaged to prevent, reduce and as fully as possible offset any significant effects on the environment	Summarised in Appendix 5; more detailed discussion accompanies the detailed assessments in the separate document
An outline of the reasons for selecting the alternatives dealt with ...	Summarised in sections 5.1 and 5.2, and in Table 8
... and a description of how the assessment was undertaken, any problems, etc.	See sections 3, 6.3 and 6.4
A description of the measures envisaged concerning monitoring	Summarised in Appendix 4
A non-technical summary of the above	See section 1 of this report

Details of changes to the report and assessments made following public consultation are provided in section 8 of this report, and the nature of changes is documented in Appendix 7.

2.5 Explanation of reporting requirements

Interpretation of the current guidance suggests that the Final Sustainability Report (and/or its SEA equivalent, the Environmental Report) should provide a comprehensive statement summarising every aspect of the analysis, including those stages that have been described in preceding Reports. In practice this suggests the Final Sustainability Report could become an extremely large document. In order to keep this report to a manageable size it has been considered necessary to cross-refer to other reports detailing earlier stages of the analysis, rather than incorporating large amounts of duplicate text into this one.

Therefore this report should be read in conjunction with the Scoping Report prepared by South Cambridgeshire District Council. Also, Section 5 summarises the initial development of strategic options and we refer to the results of the earlier assessments which were published in the Initial Sustainability Appraisal, and the corresponding detailed assessments were published on the Council's website.

3. APPRAISAL METHODOLOGY

3.1 Approach to the Sustainability Appraisal

The Initial and Final Sustainability Appraisals were based on a common approach which assessed the potential impact or contribution of each policy or policy option to achieving the 22 objectives in the SA Framework (see section 4.5).

Assessing the nature of the plan impacts

The nature, impact and potential significance of the impacts were assessed using a standard scoping approach which is summarised in Table 2.

Table 2: Appraisal scoring symbols.

Symbol	Likely effect against the SA Objective
+++	Strong and significant beneficial impact
++	Potentially significant beneficial impact
+	Policy supports this objective although it may have only a minor beneficial impact
~	1. Policy has no impact 2. Effect is neutral insofar as the benefits and drawbacks appear equal and neither is considered significant
?	Uncertain or insufficient information on which to determine base the assessment at this stage
-	Policy appears to conflict with the objective and may result in adverse impacts
--	Potentially significant adverse impact
---	Strong and significant adverse impact

Two difficulties were encountered in the assessments:

- Absolute and relative impacts.** The majority of the adverse or negative impacts are in absolute terms and reflect the tension between a planning system that presumes in favour of development, and nationally or internationally mandated policies to safeguard landscape, protect habitats, and reduce consumption of non-renewable natural resources. The LDF defines proposals for major development within the District over the period 1999-2016, most of which reflect the requirements of government housing policy and policies in the adopted Cambridgeshire Structure Plan. These developments will have a negative impact in absolute terms as they will contribute to energy and water consumption and growth in waste arisings. However the assessment also recognises that preparation of the Structure Plan included a sustainability assessment of alternative locations for housing and other land uses, and that those proposed in the LDF represent the most sustainable locations if it is accepted that such development must occur in the wider public interest. Absolute impacts are identified in the assessments, but these are qualified to reflect the points above.

- **Important and significant impacts.** SA and SEA are concerned with identifying significant impacts in order that these can be mitigated or compensated. Many of the policies in the DPD are generic and have no clear spatial expression at this stage of plan development. Those dealing with Development Control Principles will only gain this spatial context when they are applied to specific planning proposals, and this is equally true for a much wider range of policies such as those advocating use of energy efficient technology, design principles, determining provision of open space and advocating sustainable transport policy.

In this assessment we have used the term 'significant' to distinguish such impacts where they are the result of pervasive development control policies that are likely to have a repetitive and cumulative effect over the lifetime of the Plan, although strictly speaking it may be more apt to describe these as 'important' effects if the impact cannot be quantified.

Assessing cumulative and other impacts

SA must also consider the cumulative, synergistic and secondary impacts of policies. Detailed assessment of the effects of the proposed policies was based on a template form which included a summary of such effects that were identified on a case-by-case basis. Once the detailed assessment was complete a separate evaluation of these effects was undertaken using a matrix-based approach reflecting the example given in Figure 27 of the current SA guidance. The results of this assessment are summarised in section 6.1.

Assessing site-specific impacts

It is not clear from the guidance what level of site-specific evaluation is appropriate for the purposes of SA / SEA, bearing in mind the strategic nature of the assessment. Assessment is seen as a preparatory act for a subsequent Environmental Impact Assessments (EIAs) for individual developments. However it would be inappropriate for SA / SEA to duplicate or pre-empt the detailed evaluation undertaken during EIA. Ideally SA / SEA should identify the likely significant effects without investigating them in unwarranted detail.

3.2 When the Sustainability Appraisal was carried out

The timetable for the principal components of the full appraisal process is summarised in Table 3.

Table 3: Timetable of the principal appraisal stages.

Task	When	Comments
Initial consultation on local issues, the scope and objectives of the LDF	Mid / late 2003	The initial preparatory stage for the LDF, although not part of the SA process itself.
A1 to A4: define context, baseline, issues and draft objectives	Late 2003 to early 2004	
A5: cross-check objectives	April 2004 and June 2004	Cross-checking of the SA objectives with one another occurred first. Cross-checking of the SA Framework against Plan Objectives was only introduced in the September 2004 guidance. However the Plan Objectives were included as options in the Preferred Options Report and the cross-checking of SA and Plan Objectives occurred during Initial Sustainability Appraisal.
A6: consultation on Scoping materials	June 2004 and October to November 2004	The four statutory consultees were invited to comment on the draft Scoping Report in June 2004. Full public consultation occurred in October and November 2004, following review by Council Members in the preceding two months.
B1: development of options and initial SA	Early 2004 to June 2004, and September 2004	Initial evaluation of relevant and appropriate options was undertaken by the Council during early 2004 as the Preferred Options Report for this DPD was being prepared. The initial SA was undertaken in June 2004. As a result of consultation with Members the Council made a number of revisions to the Site & Vision, Transport, Landscape and Land Drainage sections, with additional minor changes to options in the Recreation and Phasing & Implementation sections.
B2: consultation on initial SA report	August to November 2004	Consultation occurred in parallel with that on the Scoping Report (see A6 above).
C1 to C5: appraising effects of the plan; define mitigation measures; prepare the draft final report	April 2005	
D1 to D2: consulting on the draft plan and review changes	June to July 2005	<u>Consultation from July to September 2005. Proposed changes were submitted to Scott Wilson in October 2005 and revisions to this report made later that month. Dates indicate the consultation period with the assessment of changes immediately afterwards.</u>
E1 to E2: monitoring effects	April 2005	<u>Initial proposals incorporated in the draft Final SA Report., and to be finalised on</u>

of the plan	adoption. <u>Initial proposals incorporated in the draft Final SA Report.</u>
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3.3 Who carried out the Sustainability Appraisal?

South Cambridgeshire District Council collaborated with Cambridgeshire County Council and Huntingdonshire District Council in assembling a common set of context (policy) review material, baseline data, generic key issues and SA Objectives during late 2003 and early 2004. Each authority then adapted these materials to reflect local conditions, and to incorporate local baseline / indicator information into a Scoping Report.

The initial and final Sustainability Appraisals were undertaken by staff from Scott Wilson, with the assistance of staff in the Council's Planning division, and using the content of the Scoping Report and the SA Framework developed by the Council. Scott Wilson also undertook an initial compliance check on the Scoping Report before beginning the appraisal.

3.4 Who was consulted, when and how?

All consultation was organised by South Cambridgeshire District Council and preceded publication of its Statement of Community Involvement. Three consultation processes have occurred previously.

- An initial consultation with key stakeholders was carried out in April/May 2004 to provide input to identify local concerns, issues and priorities as input both to plan development and the pre-production tasks (SA / SEA Stage A).
- An informal consultation occurred in June 2004 when draft copies of the Scoping Report were emailed to the statutory consultees. Responses were received from all four bodies. Their comments and any resulting amendments were incorporated in the Scoping Report and SA Framework before the Initial Sustainability Appraisal occurred. These changes are recorded in the Scoping Report.
- A formal public and stakeholder consultation was undertaken in October and November 2004 focusing on the Preferred Options Report on the Cambridge Southern Fringe AAP and the accompanying Initial Sustainability Appraisal report. Documents were sent to a wide range of consultees (see Table 4), and the consultation was publicised on the Council's website.

Table 4: List of formal consultees.

Regional, sub-regional & local authorities	Statutory consultees
Government Office for the East of England	English Nature – Beds, Cambs & Northants
Regional Assembly for the East of England	Environment Agency, Peterborough
Cambridgeshire County Council	English Heritage – East of England Region
Bedfordshire County Council	Countryside Agency
Suffolk County Council	Utilities
Essex County Council	Strategic Rail Authority
Hertfordshire County Council	Anglian Water Services
Cambridge City Council	Three Valleys Water
Peterborough City Council	Veolia Water Partnership
East Cambridgeshire DC	Cambridge Water Company
Huntingdonshire DC	Eastern Energy
Fenland DC	PowerGen
Braintree DC	British Telecom - Mid Anglia District
Forest Heath DC	British Telecom – Network Capacity
Mid Bedfordshire DC	NTL
North Hertfordshire DC	Mobile Operators' Association
St Edmundsbury BC	Transco – Network Planning
Uttlesford DC	Non-governmental organisations
Cambridgeshire Association of Local Councils	Council for the Protection of Rural England
All parish councils within the District (96 bodies)	Royal Society for the Protection of Birds
All town and parish councils adjoining the District (49 bodies)	The Wildlife Trust
MPs for the District (3 individuals)	Centre for Ecology & Hydrology
Other statutory bodies & authorities	Conservators of the River Cam
East of England Development Agency	Cambridge Sub-Regional Infrastructure Partnership
DEFRA	Federation of Master Builders
Ministry of Defence – Defence Estates	The House Builders' Federation
Dept for Transport – Airports Policy Unit	The Housing Corporation
Cambridgeshire Fire & Rescue Service	Cambridgeshire Acre
Police Authority for Eastern England	Renewables East
Highways Agency – South East and East of England	South Cambridgeshire Local Strategic Partnership
HM Health & Safety Inspectorate	Cambridge Sustainable City Reference Group
Health & Safety Executive	Cambridge Ethnic Community Forum
Operational Support Directorate	Cambridge Federation of Tenants, Leaseholders and Residents' Associations
HM Railway Inspectorate	The Gypsy Council
South Cambridgeshire PCT	Cambridge Council for Voluntary Service
Cambridge City PCT	Cambridge Organisation Promoting Disability Awareness
Huntingdonshire PCT	RAVE
East of England Regional Housing Board	
Association of Drainage Boards	
Local Drainage Boards (4 bodies)	

4. SUSTAINABILITY OBJECTIVES, BASELINE AND CONTEXT

4.1 Links to other strategies, plans and programmes and sustainability objectives

Links with other plans and programmes are given in the Scoping Report for the South Cambridgeshire Local Development Framework. These include the plans and programmes listed in Table 5 below.

Table 5: Plans and programmes relevant to the South Cambridgeshire LDF (Source: South Cambridgeshire District Council, 2005).

International Level	
1	The Kyoto Protocol on Climate Change (1992)
2	The Bern Convention on the Conservation of European Wildlife and Natural Habitats (1979)
3	EC Council Directive 79/409/EEC, on the Conservation of Wild Birds (1979)
4	EC Council Directive 92/43/EEC, on the Conservation of Natural Habitats and of Wild Fauna and Flora (1992)
5	The Bonn Convention on the Conservation of Migratory Species of Wild Animals (1979)
6	EC Council Directive 85/337/EEC & 97/11/EC, on the Assessment of the Effects of certain Public and Private Projects on the Environment (1985)
7	EC Council Directive 1999/31/EC, on the landfill of waste (1999)
8	The Ramsar Convention on Wetlands of International Importance especially as Waterfowl Habitat (1971)
9	Water Framework Directive (EC 2002)
National Level	
10	A better quality of life, a strategy for sustainable development for the UK (DETR 1999)
11	Working with the Grain of Nature – A Biodiversity Strategy For England (DEFRA 2002)
12	PPS1 Delivering Sustainable Development (ODPM 2004)
13	PPG3 Housing (ODPM 2000)
14	PPS6 Town Centres and Retail Development (ODPM 2003, draft)
15	PPS7 Sustainable Development in Rural Areas (ODPM 2004)
16	PPG9 Nature Conservation (DoE 1994)
17	PPG13 Transport (DETR 2001)
18	PPG15 Planning and the Historic Environment (DoE 1994)
19	PPG16 Archaeology and Planning (DoE 1993)
20	PPG17 Planning for Open Space, Sport and Recreation (ODPM 2002)
21	PPS22 Renewable Energy (ODPM 2004)
22	PPS23 Planning and Pollution Control (ODPM 2004)
23	PPG25 Development and Flood Risk (ODPM 2001)
24	Transport Ten Year Plan (Department of Transport 2000)
25	Energy White Paper: Our energy future – creating a low carbon economy (DTI 2003)
26	Rural White Paper: Our Countryside: The Future - A Fair Deal for Rural England (DETR 2000)
27	Planning (Listed Buildings and Conservation Areas) Act 1990
28	The Air Quality Strategy for England, Scotland, Wales and Northern Ireland: Addendum (DEFRA 2003)
29	Planning Policy Statement 1 Delivering Sustainable Development (ODPM 2004)
30	UK Waste Strategy (DEFRA 2000)
31	Saving Lives: Our Healthier Nation White Paper (DoH 1999)
32	Home Office target Delivery Report 2003
33	Strategy for Sustainable Farming and Food (Defra 2002)

Regional Level	
34	Sustainable Communities in the East of England (ODPM 2003)
35	A Sustainable Development Framework for the East of England (EERA 2001)
36	Our Environment, Our Future (Regional Environment Strategy, EERA 2003)
37	Culture: A Catalyst for Change. A strategy for cultural development for the East of England (Living East 1999+)
38	Regional Economic Strategy (EEDA, 2001)
39	EEDA Corporate Plan 2003 - 2006
40	RSS14 East of England Plan (EERA 2004, draft)
41	East of England Regional Waste Management Strategy (East of England Region Waste Technical Advisory Body 2002)
42	Sustainable Tourism Strategy for the East of England – Draft (East of England Tourist Board 2003)
43	Framework for Regional Employment and Skills Action (FRESA) (EEDA, 2003)
44	Regional Social Strategy (EERA 2003)
45	Woodland for Life: The Regional Woodland Strategy for the East of England (EERA & the Forestry Commission, 2003)
46	Regional Housing Strategy 2003-2006 (Regional Housing Forum, 2003)
47	Water Resources for the future: A Strategy for Anglian Region (Environment Agency, 2001)
48	Towns and Cities Strategy and Action Plan (EEDA, 2003)
49	Towards Sustainable Construction, A Strategy for the East of England (EP, CE, GO-E, PECT 2003)
50	Living with Climate Change in the East Of England (East of England Sustainable Development Roundtable 2003)
51	East of England Plan For Sport (Sport England East, 2004)
52	Draft RSS 14 East of England Plan (EERA 2004)
County Level	
53	Cambridge and Peterborough Structure Plan 2003 (CCC & PCC 2003)
54	Cambridgeshire County Council's Environment Strategy and Action Plan (CCC 2002)
55	Public Library Position Statement 2003 (CCC 2003)
56	Cambridgeshire and Peterborough Joint Waste Management Strategy 2002-2022 (CCC & PCC 2002)
57	Cambridgeshire and Peterborough Waste Local Plan 2003
58	Cambridgeshire Local Transport Plan 2004 – 2011 (CCC 2003)
59	A County of Culture – A Cultural Strategy for Cambridgeshire 2002 – 2005
60	Cambridgeshire Landscape Guidelines (CCC 1991)
61	Cambridgeshire Rural Strategy (CCC 1992)
62	Cambridgeshire Health Improvement & Modernisation Plan 2002 – 2005 (HIMP Partners 2001)
63	Prospects for Learning (CCC 2001)
64	Cambridgeshire Aggregates (Minerals) Local Plan, (CCC 1991)
65	Biodiversity Checklist for land use planners in Cambridgeshire and Peterborough (CCC 2001)
66	Cambridgeshire Biodiversity Action Plan (CCC 2004)
67	The Infrastructure Partnership – sustainable development for the Cambridge sub-region (CCC)
District / Local Level	
68	South Cambridgeshire Corporate Strategy 2003/04 – 2007/08
69	South Cambridgeshire Community Strategy 2004
70	South Cambridgeshire Economic Development Strategy 2003
71	Today and Tomorrow – South Cambridgeshire District Council LA21 Community Action Plan 2001
72	LA21 Consultation Results June 2000
73	South Cambridgeshire District Council – Housing Strategy 2002-2005
74	South Cambridgeshire District Council – Community Safety Strategy – 2002 - 2005

75	South Cambridgeshire District Council – Lighting the Way – Arts Strategy 2002 - 2005
76	South Cambridgeshire District Council – Local Strategic Partnership – 20 Year Vision
77	South Cambridgeshire District Council – Sports Development Strategy 2002 - 2004
78	South Cambs Primary Care Trust - Health Improvement and Modernisation Plan 2002 –2005
79	South Cambs Primary Care Trust - South Cambridgeshire Improving Health Plan 2003 – 2006
80	South Cambs Primary Care Trust - Health Matters in South Cambridgeshire 2004
81	South Cambridgeshire District Council - Housing Needs Survey 2002 – June 2003
82	South Cambridgeshire Corporate Strategy 2003/04 – 2007/08

4.2 Description of the social, environmental and economic baseline characteristics and the predicted future baseline

The description of the social, environmental and economic baseline characteristics and the predicted future baseline can be found in the Scoping Report for the evolving South Cambridgeshire Local Development Framework. The current baseline (ie. reflecting recommendations received during consultation) is shown in Appendix 1.

4.3 Difficulties in collecting data and limitations of the data

Gaps in the dataset are consistent with problems known to exist in the current availability of data on the sustainability indicators proposed in the SA guidance. The collaboration between the Council, adjacent authorities and the County Council has resulted in a dataset that contains a good degree of local information with sub-regional comparators.

A number of outcome indicators are currently missing, and are acknowledged as priorities for data collection because they measure locally important variables:

- Water consumption rates – dependent on provision by water companies, and granularity of data is not yet known
- Achievement of biodiversity targets – awaiting implementation of software
- Rights of Way – awaiting results of December 2004 survey
- House completions meeting EcoHomes standards
- Infrastructure investment – baseline suggests there is a Structure Plan indicator, although presumably this will not be maintained in the future. Possibly use value of developer contributions as a proxy.

There are also a substantial number of parameters for which there is no trend. In many cases these are socio-economic parameters based on census data or other information only monitored over long timescales. It may be necessary to review the value of these parameters in due course and consider replacing them with others that can be more readily monitored.

4.4 Main social, environmental and economic issues and problems identified

The issues identified in the LDF Scoping Report are summarised below.

Land and water resources

- Limited stock of brownfield land means new development will inevitably result in the loss of high-quality agricultural land;
- New development may sterilise important local sources of sand and gravel;
- New development could alter natural drainage patterns while also providing scope for contamination of groundwater in areas where rainfall currently percolates directly into the soil;
- Development will make additional demands of water supply (for homes, industry, etc.) in an area where the capacity of natural systems is limited.

Biodiversity

- The rural nature of the district means that development may result in the loss or deterioration of local habitats such as hedgerows and verges;
- Development may affect specific areas covered by national and international designations, which are often very sensitive and can be easily affected by impacts from non-adjacent locations.

Landscape, townscape & archaeology

- Further expansion at the fringes of Cambridge could adversely affect the unique character and setting of the city by hemming it in, affecting the quality of approaches to the City, harming the quality of the landscape, and shutting off key views of its distinctive skyline.
- The pace of growth and infilling around Cambridge means that there is no clear local style or building material and further growth may exacerbate this situation if clear design controls are not imposed;
- Uncontrolled or unsympathetic development could harm local landscape character if it occurs on a large enough scale, or repeatedly through a particular area
- South Cambridgeshire's archaeological heritage could be threatened by development that in effect sterilises known sites, or which harms the setting of sites with important historical or cultural associations;
- Development may encroach on existing areas of open space, amenity and recreation value, or it may harm their setting and tranquillity.

Climate change and pollution

- Development pressure in the north of the district may result in use of land potentially subject to flooding by the Great Ouse and its tributaries (there is a lower risk in the south of the district);
- Local topography and drainage systems mean that there is an existing flood hazard across parts of the district;
- Adoption of sustainable development objectives that reduce the direct and indirect impacts of climate change, increased use of renewable energy, and more energy-efficient management of homes and business

- properties cannot occur without the support of, and direct action by, employers, homeowners and parents;
- The rural nature of the district makes residents dependent on the private car, resulting in high levels of ownership and usage;
 - The district straddles several important transport arteries, and addressing local transport issues such as encouraging a modal shift to public transport will not solve the whole problem;
 - Dispersal of housing and employment beyond Cambridge city has occurred at different rates and in different directions, contributing to high levels of commuting, particularly that by private car;
 - Despite improvements in composting and recycling, the rate of waste production is still rising;
 - Development through infilling or creation of new communities will contribute to noise and light pollution.

Healthy communities

- Fear of crime in the district is disproportionate to actual crime rates;
- Dependence on the private car for shopping, commuting and the school run has knock-on effects on people's willingness to use more sustainable forms of transport for these activities, and for recreation;
- Gradual increase in the size of the retired sector of the local population will make increasing demands on provision of appropriate health care, and the need to ensure this part of the community has convenient access to shops, amenities and social facilities;
- Development pressure may result in the loss of open space that has recreational value, which may encourage sports activities, or which benefits the character of the locality.

Inclusive communities

- House purchase and rental rates in the district are above the national average and continue to rise while salaries do not (particularly in the public sector), with the result that more than half the households in the district could not buy an average-priced home, creating a divided society;
- Lack of facilities in rural communities for young people in particular may contribute to residents' fears about crime;
- Loss of amenities and services in rural centres is likely to occur without positive action to reverse the trend;
- The increasing proportion of aged population will make increasing demands of the need for special access facilities, including community transport schemes;
- The increasing trend for the district's communities to become dormitory or commuting suburbs for Cambridge and London could lead to a loss of community identity, reducing inclusiveness and community involvement;
- The district has a substantial population of travellers whose needs differ from those of the resident population;
- Rural dispersal can make it difficult to justify the business case for regular transport connections to major shopping, employment and entertainment facilities.

Economic activity

- Research and technology are vitally important to the Cambridge sub-regional economy but the district must not become over-dependent on a limited employment base, and people with other skills should not be driven away from the district in search of work;
- Farm diversification or the conversion of farm buildings for other business uses could add to vehicle traffic in rural areas offsetting any employment benefits generated;
- The district's (sub-region's) rapidly growing economy will make substantial demands on infrastructure investment;
- Unplanned growth in tourism and related developments could increase traffic, detract from rural or urban character, and place additional pressure on other resources such as water supply;
- The disproportionate size of Cambridge as a retail centre could have adverse effects for attempts to retain and improve service and amenity provision in smaller centres in the district;
- The predominantly dispersed rural population of the district makes it difficult to justify the cost of installing broadband telecommunications infrastructure which could encourage teleworking and support the dispersal of some businesses.

The Scoping Report was prepared to provide a common SA Framework for all the DPDs in the initial Local Development Framework, and to be adapted in the future. No issues are identified specifically for the Southern Fringe area and its surroundings, however many of the broader issues are relevant to the locality or the proposed development (eg. water consumption, sustainable transport to effect modal shift in commuting) and result in a range of mitigation policies in the AAP as indicated in section 6.2.

4.5 Framework

The Sustainability Appraisal

The aforementioned issues were used to define a set of appropriate policy responses, which then contributed to definition of a set of objectives, decision-making criteria and relevant indicators, which collectively comprise the SA Framework. The Framework is presented in Table 5.

Following discussion with Cambridge City Council (prompted by use of the South Cambridgeshire Framework to assess the Cambridge East development, which straddles the border between the two authorities), some very minor changes were made to the Framework, affecting the definition of Objective 1.2 and the decision-making criteria for Objectives 1.2, 4.1, 6.1, 7.1 and 7.3. The revised Framework was used for the detailed assessment of plan impacts and is that shown in Table 6.

Table 6: Sustainability Appraisal Framework (Source: South Cambridgeshire District Council, 2004, revised 2005).

Sustainability topic	Sustainability appraisal objectives	Decision-making criteria	Relevant Indicators
Land and water resources	1.1 Minimise the irreversible loss of undeveloped land and productive agricultural holdings	Will it use land that has been previously developed?	% of dwellings completed on previously developed land Net density of new dwellings completed
		Will it use land efficiently?	
		Will it protect and enhance the best and most versatile agricultural land?	
	1.2 Reduce the use of non-renewable resources, including energy sources	Will it reduce emissions of greenhouse gases by reducing energy consumption?	KwH of gas consumed per household per year
		Will it lead to an increased proportion of energy and other resources being met from renewable sources?	Generating potential of renewable energy sources within the District
	1.3 Limit water consumption to levels supportable by natural processes and storage systems	Will it reduce water consumption?	Water consumption per capita (however this data is not currently available)
Will it conserve ground water resources?			
Biodiversity	2.1 Avoid damage to designated sites and protected species	Will it protect sites designated for nature conservation interest?	% of SSSIs in favourable or recovering condition
	2.2 Maintain and enhance the range and viability of characteristic habitats and species	Will it conserve species, reversing declines, and help to enhance diversity?	Total area designated as SSSI Progress in achieving BAP targets
		Will it reduce habitat fragmentation?	
		Will it help achieve Biodiversity Action Plan targets?	
	2.3 Improve opportunities for people to access and appreciate wildlife and wild places	Will it improve access to wildlife, and wild places?	% of rights of way that are open and easy to use Area of strategic open space per 1000 people
		Will it maintain and, where possible, increase the area of high-quality green space in the District?	
Will it promote understanding and appreciation of wildlife?			

Sustainability topic	Sustainability appraisal objectives	Decision-making criteria	Relevant Indicators
		Will it improve access to the wider countryside through the network of public rights of way?	
Landscape, townscape and archaeology	3.1 Avoid damage to areas and sites designated for their historic interest, and protect their settings.	Will it protect or enhance sites, features of areas of historical, archaeological, or cultural interest (including conservation areas, listed buildings, registered parks and gardens and scheduled monuments)?	% of listed buildings classified as being 'at risk'
		3.2 Maintain and enhance the diversity and distinctiveness of landscape and townscape character	% of built-up area having conservation area status
	Will it protect and enhance open spaces of amenity and recreational value?		
	Will it maintain and enhance the character of settlements?		
	3.3 Create places, spaces and buildings that work well, wear well and look good	Will it improve the satisfaction of people with their neighbourhoods as places to live?	Residents' satisfaction with the quality of the built environment
		Will it lead to developments built to a high standard of design, and good place making?	% of new homes meeting the EcoHomes or similar standard
Climate change and pollution	4.1 Reduce emissions of greenhouse gasses and other pollutants (including air, water, soil, noise, vibration and light)	Will it reduce emissions of greenhouse gases?	CO ₂ emissions per household per year
		Will it improve air quality?	
		Will it reduce traffic volumes?	Average annual NO ₂ concentration
		Will it support travel by means other than the car?	Days when fine particle levels are in 'moderate' or 'high' bands
		Will it reduce levels of noise or noise concerns?	
		Will it reduce or minimise light pollution?	Vehicle flows across urban boundaries

Sustainability topic	Sustainability appraisal objectives	Decision-making criteria	Relevant Indicators
		Will it improve water quality including by reducing diffuse and point source water pollution?	boundaries % of main rivers of good or fair chemical / biological quality
	4.2 Minimise waste production and support the recycling of waste products	Will it reduce household waste?	Household waste collected per person per year
		Will it increase waste recovery and recycling?	% of household waste recycled
	4.3 Limit or reduce vulnerability to the effects of climate change (including flooding)	Will it minimise risk to people and property from flooding, storm events or subsidence?	No. of properties within flood risk areas
Healthy communities	5.1 Maintain and enhance human health	Will it reduce death rates?	Life expectancy at birth (specified separately for males and females)
		Will it encourage healthy lifestyles, including travel choices?	
	5.2 Reduce and prevent crime, and reduce the fear of crime	Will it reduce actual levels of crime?	Recorded crimes per 1000 people
		Will it reduce fear of crime?	% of residents feeling 'safe' or 'fairly safe' after dark
5.3 Improve the quantity and quality of publicly accessible open space	Will it increase the quantity and quality of publicly accessible open space?	Area of strategic open space per 1000 people No. of sports pitches for public use per 1000 people	
Inclusive communities	6.1 Improve the quality, range and accessibility of services and facilities (e.g. health, transport, education, training, leisure opportunities)	Will it improve the quality and range of services and facilities, including health, education, shopping, sport, leisure, arts and cultural activities?	% of population in categories 1, 2 or 3 for access to primary school, food shop, post office and public transport
		Will it improve accessibility to key local services and facilities, including health, education and leisure (shops, post offices, pubs etc)?	

Sustainability topic	Sustainability appraisal objectives	Decision-making criteria	Relevant Indicators
		Will it improve accessibility by means other than the car and improve the attractiveness of environmentally better modes including public transport, cycling and walking?	
		Will it support and improve community and public transport?	
	6.2 Redress inequalities related to age, gender, disability, race, faith, location and income	Will it improve relations between people from different backgrounds or social groups?	% of residents who feel their local area is 'harmonious' Index of multiple deprivation
		Will it reduce poverty and social exclusion in those areas most affected?	
		Will it promote accessibility for all members of society, including the elderly and disabled?	
	6.3 Ensure all groups have access to decent, appropriate and affordable housing	Will it support the provision of a range of housing types and sizes, including affordable and key worker housing, to meet the identified needs of all sectors of the community?	House price / earnings ratio % of all dwellings completed that are provided under affordable purchase or tenancy arrangements
		Will it reduce the number of unfit homes?	
		Will it meet the needs of the travelling community?	
	6.4 Encourage and enable the active involvement of local people in community activities	Will it increase the ability of people to influence decisions?	% of adults who feel they can influence decisions affecting their local area % of adults who have provided support to others in the past year
		Will it encourage engagement with community activities?	
Economic activity	7.1 Help people gain access to satisfying work appropriate to their skills, potential and place of residence	Will it encourage businesses development?	Unemployment rate % of residents aged 18-74 in employment and working within 5km of home (or at home)
		Will it improve the range of employment opportunities to provide a satisfying job or occupation for everyone who wants one?	

Sustainability topic	Sustainability appraisal objectives	Decision-making criteria	Relevant Indicators
		Will it improve accessibility to local employment by means other than the car?	
		Will it encourage the rural economy and diversification?	
	7.2 Support appropriate investment in people, places, communications and other infrastructure	Will it improve the level of investment in key community services and infrastructure?	% of 15 year old pupils in schools maintained by the local authority achieving 5 or more GCSEs at grades A* to C or equivalent (Possible indicator measuring the level of Section 46 contributions to infrastructure projects that have an impact on the plan area)
		Will it support provision of key communications infrastructure, including broadband?	
		Will it improve access to education and training, and support provision of skilled employees to the economy?	
	7.3 Improve the efficiency, competitiveness, vitality and adaptability of the local economy	Will it improve business development and enhance competitiveness?	Annual net change in VAT registered firms Economic activity rate (% of working age population in full or part-time employment)
		Will it support the Cambridge area's position as a world leader in research and technology based industries, higher education and research, particularly through the development and expansion of clusters?	
		Will it support sustainable tourism?	
		Will it protect the shopping hierarchy, supporting the vitality and viability of Cambridge City Centre, town, district, and local centres?	

5. PLAN ISSUES AND OPTIONS

5.1 Main strategic options considered and how they were identified

The range of options and alternative approaches was determined by the Council during plan development. The Council identified options where they were considered relevant and appropriate, however the detailed content of the plan and its position in the wider plan structure limited the number of alternatives that were proposed. Specific constraints were:

- Government housing targets, strategic policy in RPG6
- Many of the principal over-arching strategic policies derive directly from planning guidance (particularly PPS1, PPG3, PPG6, PPS7, PPG12) and it was considered inappropriate to propose options that deviated from current practice
- Development Control policies, which represent a large proportion of the plan's content, are largely defined by existing practice. The Council has some discretion to vary the thresholds for these controls, for example specifying a minimum number of dwellings or industrial floorspace above which the policy would apply. However the priority attached to preserving the valued character of the District's settlements and landscapes suggests there is an over-riding need to impose controls regardless of the size of the development, thereby removing another opportunity to consider alternative approaches.

The Council considered that these conditions therefore limited the number of policy areas for which it was possible to define relevant and appropriate alternative options. Appendix 2 details consideration of alternative approaches, and why in many cases it was not considered that there were reasonable alternatives. The Preferred Options Report contains a number of 'rejected' policy options which enabled consultees to comment on approaches that were not considered reasonable.

Alternative policy options presented in the Preferred Options Report were as shown in Table 7. Those policies shown as being prepared at the Council's discretion may also reflect best or mandated practice as defined in government planning guidance. Note that the figures in the second column refer to the policy numbering used in the Preferred Options Report.

Table 7: Alternatives presented at Preferred Options Report stage (Source: South Cambridgeshire District Council, 2004).

Policy area	Policies	Dictated by	Summary of policies
The site – Trumpington West	CSF3 to CSF5	Government housing policy and targets; RPG6, Cambridgeshire Structure Plan (policy 5/1) and South Cambs Local Plan (policy HG1); Housing Needs Survey	1 preferred option involving redevelopment of the current built site (which straddles the city boundary) with limited extension onto the arable (Green Belt) land to the southwest. One alternative restricting redevelopment to that part of the built site within the city boundary so there is no take of Green Belt land; and a second alternative in which an additional, modest amount of Green Belt land is taken to the south and southwest of the redeveloped area
Drainage - south of Addenbrookes	CSF7 and CSF8	Council's discretion, but recognising local constraints	1 preferred option of keeping balancing ponds and other infrastructure close to the development it serves (within the city boundary south of Trumpington), and one rejected option locating these features south of Hobson's Brook
Open space maintenance and management by trust	CSF15 and CSF16	Council's discretion	1 preferred option of management by a public trust and an alternative of management by the local authorities with some funding from developers
Public open space	CSF19 and CSF20	South Cambs Local Plan and audit of local needs; informed by National Playing Fields Association and Cambridge City open space standards	1 preferred option proposing standards consistent with those in the Cambridge City local plan, and one consistent with those in proposed in

Policy area	Policies	Dictated by	Summary of policies
			the Development Control Policies DPD.
Sports provision – Trumpington West	CSF23 and CSF24	Council's discretion	1 preferred option locating some playing space and the associated infrastructure in former Green Belt land adjacent to the built development, and a rejected option to locate all facilities in former Green Belt land adjacent to the built development

5.2 Comparison of the social, environmental and economic effects of the options

The evaluation of the initial set of preferred, alternative and rejected options was based on the original SA Framework and involved the assessment of the nature, significance and duration of the effects of the policy on the 22 objectives. The results of the analysis are documented in the Initial Sustainability Appraisal Report, and the detailed assessments are currently accessible for reference on the Council's website.

5.3 How social, environmental and economic issues and consultation responses were considered in choosing the preferred options

In addition to consideration of alternative approaches, Appendix 2 also summarises the initial appraisal of options. It then briefly summarises the result of public participation, resulting changes to the approach to the policy, and the District Council's justification for the policy approach.

5.4 Mitigation measures proposed

At the Initial Sustainability Appraisal stage mitigation proposals were largely reflected in recommended changes to policy wording. During the initial review of the Appraisal results a very small number of such changes were proposed, the number reflecting the modest scale of development and the sustainability of the preferred options text. The Council accepted two recommendations and the detail of the changes are recorded in the Initial Sustainability Appraisal Report.

In summary the changes taken forward were:

- CSF4 [Monsanto site preferred option] – add two statements, one acknowledging the need to adjust service provision to reflect the scale of development, and the other to coordinate it with existing services in Trumpington and those provided as a result of development on the eastern side of the A10. Also an amendment of text to highlight the opportunity to develop the site at an early stage.
- CSF17 [treatment of construction spoil] – amend text acknowledging the need to handle and dispose of spoil in a manner that does not adversely affect landscape character.

Full details of mitigation proposals are given in the detailed assessment sheets which can be viewed on the Council's website.

6. PLAN POLICIES

The predicted effects of each policy on the SA objectives are contained in detailed appraisal tables which are provided in a separate document due to their size. This section draws together information from the Scoping Report – particularly the baseline – with the results of the assessments of overall and cumulative, and other impacts to summarise the overall social, environmental and economic effects of the plan, discussing them in the context of each SA objective in turn.

Each section of the AAP begins with a set of objectives that for the plan which are not strictly part of the policy itself. These objectives have not been assessed separately, however we have satisfied ourselves that they are adequately covered by the corresponding policies and supporting text which have been assessed.

6.1 Summary of cumulative, synergistic and secondary impacts

Current guidance requires the explicit review of these three types of effect in order that each policy is not assessed in isolation. Guidance proposes a range of assessment techniques, each of which has merits and drawbacks. We have used the matrix-based assessment in this instance as it provides a clearer correlation between policies and objectives than some of the other techniques, although clearly it is a further, subjective element of the assessment.

Appendix 3 contains a table cross-referencing the SA objectives against the policies and the conclusions are summarised in a table outlining the principal impacts. In summary, the principal effects identified are:

- Positive benefits from landscape improvements, edge treatments, and protective measures to preserve the prospect towards the Gog Magog Down, coupled with improvements in access to and around the two areas will have a synergistic benefit on the appearance of this area and its attraction and amenity to local people
- Potential synergistic benefits from providing new housing close to Cambridge and located with convenient access to a choice of sustainable transport modes. From the District's perspective this will be a modest impact over time as Trumpington West is built, however the benefit will accumulate with that from redevelopment within the City to the east of the A10.
- Potential synergistic benefits from expanding the range of services and amenities in and close to Trumpington centre. Primarily this will benefit new and existing residents and in certain instances may obviate the need for trips into the centre of Cambridge. Facilities in Trumpington centre, conveniently close to car parks for the park & ride and supermarket, may also attract those travelling into the city from adjacent villages, reducing congestion towards the centre.

As noted above, in several cases it has proved difficult to distinguish between cumulative impacts and collective impacts – ie. where several policies contribute to an objective. Also, many of the policies and their supporting text provide mitigation measures for the recognised impacts of the development

limiting the number of instances where additional cumulative adverse impacts might occur.

6.2 Significant social, environmental and economic effects of the preferred policies

Appendix 4 contains a matrix indicating where there are potentially significant positive and negative impacts from policies on the SA objectives. In reviewing this table and the summaries below reference should be made to the discussion about important and significant impacts in section 3.1 of this report to understand the terminology we have used. In many cases significance cannot be established quantitatively, as it can in EIA for example, due to the limited information about the design and layout of the settlement at this stage.

In summary the only consistently significant negative impacts we have identified are the absolute effects on water and energy consumption, and waste generation, which are the inevitable effects of new development. The requirement of CSF is not as directly predicated on government house building targets and over-arching policies in the Regional Spatial Strategy and Cambridgeshire Structure Plan as the other two AAPs, nevertheless the site presents an opportunity contribute to this target in a location well-served by various transport modes, and which brings housing close to employment in the City. Consequently these impacts must be considered neutral in relative terms since development elsewhere would have more adverse impacts. Moreover their effects are mitigated by specific policies within the AAP.

Otherwise our assessments are overwhelmingly positive and no draft policy is considered unsustainable. Clearly a development on this scale will have significant impacts which will require extensive mitigation. However the draft AAP contains a wide range of mitigation measures expressed as policy, and the limited number of additional and changes are largely concerned with clarifying specific issues, balancing these with the landscape enhancement of this approach to Cambridge, and the conservation of the prospect of the Gog Magog Downs from the City's southern suburbs.

Each section follows a common structure, presenting the issue that the objective seeks to address, supported by baseline data where appropriate. The impact of the plan is discussed and the key policies which are predicted to have positive or negative impacts are identified. The section concludes with a discussion of synergistic, cumulative or secondary effects which are also referred to in the sections below. All data defining conditions in the District are taken from the baseline dataset unless otherwise stated.

Figure 2 overlays the current proposals map with various parameters that summarise design issues and constraints for the development of relevance to this part of the assessment.

Figure 2: Cambridge Southern Fringe constraints map (Source: South Cambridgeshire District Council, DEFRA; base map © Crown copyright).

1.1 Minimise the irreversible loss of undeveloped land and productive agricultural holdings

The shortage of previously developed land in the District is reflected in the target that 37% of new dwellings should be built on brownfield sites, compared to the 60% stipulated by ODPM, but which is established in the adopted Structure Plan. In 2003 the rate was 27%, consistent with that over the preceding five years, and suggesting the need for improvement. Over the same period average housing density was 19.7 dwellings/ha., which is typical of the sub-region as a whole, but some way below the minimum threshold of 30/ha. specified in PPG3. Both rates reflect the transition from the former development strategy for the District to current policy.

Developments within the District along the Southern Fringe have a negligible impact on greenfield land due to their limited scale. The current proposals map indicates that the footprint of the urban extension on the Monsanto site will extend beyond the area of the existing buildings and approach roads. This land is currently used for agro-research rather than commercial agriculture and therefore it is debatable whether this represents loss of greenfield land.

Some of this area will also be given over to an edge treatment which screens the west and south sides of the development. The country park will use a substantial area of agricultural land (current believed to be largely pastoral) however this is not an irreversible change, while development proposed for the area south of Addenbrookes involves only landscape enhancement with no land use change. The most sizeable loss of agricultural land appears to occur to the east of the A10 with the extension of the south side of Trumpington. This lies within the City boundary and therefore outside the scope of this AAP and assessment. Policies with a potentially significant or important beneficial impact: CSF/4. This Green Belt policy contains the extension of the urban area although its impact can only be estimated qualitatively.

Policies with a potentially significant or important harmful impact: none identified.

Cumulative, synergistic and secondary impacts: none identified. Since Green Belt designations are non-statutory and can change, it will be important to maintain the revised configuration between Trumpington and the M11 to prevent further creep of Cambridge over the longer term, and any impact this may have on the open land towards the Cam.

1.2 Reduce the use of non-renewable resources, including energy sources

Prudent use of natural resources in general is one of the basic themes of the UK sustainable development agenda. Baseline data suggests local consumption of gas is lower than the UK average, at 15,395KwH per home, compared to 17000KwH for the UK as a whole. Nevertheless, climate change concerns mean a need to control consumption or exploit more sustainable power sources. Current targets require a 10% increase in production of renewable energy, although the District's capacity has remained static at just under 9GwH for the last five years. There is a regional target to generate 14% of electricity needs from renewable sources over the same period. At present there is no other information to assess the District's performance and an additional indicator might measure the number of new developments where recycling of building materials occurred in line with Development Control policy DP/2.

Introduction of energy efficient technology and renewable energy generation are addressed by policies NE/1 and NE/3 in the Development Control Policies DPD. These establish quotas or thresholds which developers must achieve for the installing photovoltaic cells, solar panels and heat-retention measures. The targets are not particularly stringent, however the Council considers this the most effective way of providing flexibility in that this is expected to encourage developers to meet these thresholds.

Unlike the Cambridge East and Northstowe AAPs, that for the Southern Fringe does not contain an explicit statement on installing energy conservation technology although policy CSF/21 does provide for exemplar projects in energy and water conservation. The two Development Control policies above would still apply in principle and state a clear purpose of using all new development to contribute to energy reduction even if this only has a minor, incremental effect, which is likely to be the case with this AAP due to the small scale of housing growth compared to the other AAPs.

Policies with a potentially significant beneficial impact: CSF/12 and CSF/24. The absolute impact of these policies will depend on two factors: whether (or how many) developers embrace the proposals in the Development Control Policies DPD; and whether developers implement the minimum requirement or are encouraged to equip more properties with the relevant technology.

Policies with a potentially significant adverse impact: CSF/2. As with other development facilitated by the LDF, growth in housing and employment will increase consumption in absolute terms. Unlike Northstowe and Cambridge East, development on the Southern Fringe is not based on specific Structure Plan policies, although it will contribute to achieving the District's house building targets. With the information available at the time of this assessment it is not possible to determine whether this is the most sustainable of the remaining sites with development potential, although its absolute impact is limited by its small scale. Nevertheless it is vital that conservation technology is deployed throughout the development to mitigate its impact.

As with comparable policies in other AAPs, the main issue for this objective is the limited cumulative benefit since even the provisions of the Development Control policies mentioned above are voluntary and developers do not necessarily have to implement conserving technology, or on the scale proposed. The benefit of this policy would be maximised if a reasonably ambitious rate of deployment can be encouraged. The built development on the edge of Trumpington appears small-scale alongside Northstowe but is larger than any of the housing allocations in Site Specific policy SP/1, and therefore it has a role to play in facilitating the roll-out of energy and water conservation technology.

1.3 Limit water consumption to levels supportable by natural processes and storage systems

The District lies in one of the driest areas of the UK (Scoping Report, para. 8.3), although it benefits from the chalk geology in its southern half, as a result of which measures to maintain the openness of land (for percolation) and maintain the nature structure of drainage systems are essential. Unfortunately evaluation of current conditions is limited by the lack of sustainable indicator information at present, although the Scoping Report notes this is a priority for which a source of data is being investigated. (Note that water quality issues are addressed by objective 4.1).

Water consumption is addressed more aggressively than energy conservation, with policy CSF/19h requiring use of technology which reduces it by at least 25% per household compared to current rates. This clearly requires a substantial reduction in usage as a result of greywater recycling and other techniques and is more stringent than the generic approach taken in policy NE/15 in the Development Control Policies DPD.

However this target has been withdrawn on the advice of GO-East as it goes beyond the scope of what the planning system can seek. This change somewhat weakens policy CSF/19 but it is consistent with changes to other AAPs and to the Core Strategy as a result of formal guidance. It has been replaced with a more general statement reaffirming that Council's commitment to seeking water conservation measures.

Groundwater protection is covered primarily by the range of conditions in policy CSF/19 covering run-off, use of surface and sub-surface infrastructure, foul drainage removal, etc.

Policies with a potentially significant beneficial impact: CSF/19. The target in clause CSF/19h sets a minimum threshold for consumption which might be surpassed.

Policies with a potentially significant adverse impact: CSF/2. The assessment for this objective largely mirrors that of 1.2 above. In absolute terms the development will increase water consumption and this should be addressed through the conservation measures proposed in CSF/19. The small footprint of the re-developed land means that any changes to run-off rates and patterns should be negligible, and part of this land is already covered by buildings and other impermeable features such as approach roads.

The primary secondary and cumulative effects are likely to be the impact on run-off and groundwater absorption. It is not possible to assess the practicality of this requirement without further detail of the site layout.

2.1 Avoid damage to designated sites and protected species

The biodiversity value of the Cambridgeshire countryside is a key component of the District Vision (see Section 2.2). However the Scoping Report states that there is a relatively low level of formally protected wildlife area given the District's rural character.

There are no existing designations affecting the immediate vicinity of the site – see Figure 3 overleaf. The Hobson's Brook / Nine Wells site in the centre of the southern area of the AAP is a former SSSI, having lost its status due to water contamination from surrounding agricultural land. There is also a modest sized SSSI on rising ground on the edge of the Gog Magog Downs to the east, and which also contains a small Local Nature Reserve, but nothing within 2-3kms downstream of the Cam.

The impact of development cannot be assessed until an initial ecological survey of the site has been undertaken as required by policy CSF/15, however there appears only modest scope for any significant impact due to the lack of local designations.

Policies with a potentially significant beneficial impact: none identified. However policy CSF/19 aims for improvement of water quality along Hobson's Brook (see para. D10.1) with the apparent intention of re-instating it as an SSSI in due course.

Policies with a potentially significant adverse impact: none identified.

Potential secondary, cumulative or synergistic effects: none identified.

Figure 3: Location of principal landscape and conservation designations in South Cambridgeshire (Source: DEFRA - Magic, 2005; map © Crown copyright).

2.2 Maintain and enhance the range and viability of characteristic habitats and species

The Scoping Report refers to software under development that will record the extent to which Biodiversity Action Plan targets and objectives are being achieved. This facility is not available at present, a common problem for councils in our experience. Other indicators such as the trends in farmland and woodland bird populations are not available at local level, but might show significant trends that need to be addressed, given the intensity of the agriculture in the District, especially the north-east.

The Cambridgeshire Biodiversity Action Plan identifies five broad habitats (including *acid grasslands* and *rivers & streams*) and a further ten priority habitats (including *ancient and/or species-rich hedgerows*, *cereal field margins*, coastal and *floodplain grazing marsh*, fens, lowland calcareous grassland, *lowland meadows* and *reedbeds*)². Some of these will be present in each of the areas covered by DPDs in the initial South Cambridgeshire LDF, and action plans have been prepared for each habitat. A further twelve local habitats (including churchyards and cemeteries, roadside verges, *drainage ditches* and *arable land*) have been identified. Those habitats which may be present locally are indicated in italics above:

- South of Addenbrookes – arable land; cereal field margins; drainage ditches; acid / calcareous grassland at the perimeter (Downs edge)
- Trumpington to the Cam – arable land; species-rich hedgerows; cereal field margins; floodplain grazing marsh and lowland meadows; reedbeds (along the Cam).

The impact of development cannot be assessed until an initial ecological survey of the site has been undertaken as required by policy CSF/15, however there appears only modest scope for any significant adverse impact because of the limited scale of re-development, which is confined to existing brownfield land.

The principal impact is positive in terms of maintaining the existing landscape features and enhancing them where appropriate as required by policies CSF/5, CSF/12 and CSF/15. Consequently this AAP differs from the others in that much of it is concerned with retaining existing land use (with limited changes in the case of the country park). We would expect remediation and improvement work to favour provision of priority habitats listed above. We also assume that turning over land along the eastern bank of the Cam from agriculture to the country park will involve minimal changes to the existing habitat, supported by some enhancements. There is also scope to incorporate SUDS reedbed components into this area as this is a priority habitat found along the Cam. This is recognised by the policy (see para. D10.5) though its

² <http://www.ukbap.org.uk/lbap.aspx>

feasibility depends on whether there are reedbeds on the adjacent stretch of the river.

Policies with potentially significant beneficial impacts: none identified. As noted above, this AAP focuses less on built development and more on sympathetic and selective landscaping and biodiversity improvements, consequently adverse impacts should be less likely.

Ideally the principal synergistic impact is the improvement of biodiversity in the western part of the AAP area and maintaining the existing quality in the south (with localised improvement of Hobson's Brook).

2.3 Improve opportunities for people to access and appreciate wildlife and wild places

This objective is not directly related to specific government policies or targets, although there is a strong fit with the objectives of the Countryside and Rights of Way Act 2000 (CRoW), and with government initiatives to promote healthier lifestyles. The baseline dataset has no information on relevant parameters (notably the % of rights of way that are open and in reasonable condition) and we expect this will be addressed by the obligation to measure their availability arising from CRoW. This requirement is made more explicit in a post consultation change to this policy which acknowledges the Council's obligation under the Act to prepare a rights of way improvement plan.

The AAP makes substantial provision for this objective. In the western area the country park will open up a substantial area which currently has limited public access, and which is also impeded by the M11 corridor. Existing public rights of way will be improved, with the creation of a footpath/cycle route along the east side of the park, providing an opportunity to create a circular walk around this area of the development comparable to that being planned for the perimeter of Northstowe. In the southern area improvements to routes across the open land will assist this objective, particularly the new route providing easy foot and cycle access to Gog Magog Downs and Wandlebury.

Policies that have potentially significant benefits: CSF/1, CSF/2, CSF/4, CSF/5, CSF/12, CSF/13, CSF/14, CSF/18. Overall significance cannot be quantified as this depends on public use of these features.

There are no policies that conflict with this objective, and any concerns about the broader implications of development on biodiversity in general (places and species) are covered by the comments for 2.2 above. However note that the AAP envisages these spaces being frequented by residents across Cambridge and from the adjacent villages. Ideally many of these people will reach the area on foot or cycle, however it is not clear what car parking will be provided for those travelling further. Clearly the Trumpington park & ride offers spaces on the north of the county park although it is not clear what facility is available in the south at the edge of Hauxton. There is also a small car park on the south side of Haverhill Road on the Magog Down.

These improvements offer a form of synergistic social benefit as they will benefit the broader community, not just residents of Trumpington old and new. However there is a potential secondary impact resulting from the opening of land to public access where this is currently restricted. This will

have some unquantified impact on tranquillity which the landscaping and other improvements of this area should aim to offset. Development Control policy NE/5 provides for areas of quiet countryside enjoyment based on informal designation of Countryside Enhancement Areas. The Council should consider applying this designation to parts or all of the country park, particularly that stretch along the Cam adjacent to Byron's Pool where this approach would also support the objective of protecting the setting of sites with historical or heritage associations.

3.1 Avoid areas and sites designated for their historic interest, and protect their settings

This objective can be difficult to measure because assets are widely fragmented, and their presence only suspected. The age of many settlements in the District means a potentially high level of listed buildings, but there is a much broader significance because of the rural settlement pattern and the shared heritage with Cambridge city. The Scoping Report notes that the principal indicator - % of listed buildings considered at risk - has remained roughly static at around 2%.

Figure 2 shows the location of scheduled monuments, listed buildings and artefact finds based on DEFRA information³. There are four scheduled monuments within or adjacent to the AAP area.

Within

- Remains of a Romano-British settlement on land adjacent to the Cam and overlooking Byron's Pool. This site will lie within the area of the proposed country park
- An undefined feature identified from cropmarks and pottery finds lying between the railway line and Hobson's Brook immediately west of Nine Wells, and which may also be a Romano-British settlement.

Adjacent

- An enclosure and barrow on the Magog Down immediately south of Haverhill Road (shown in Appendix C – map 2).
- Wandlebury hill camp / fort to the east of the area south of Addenbrookes.

Neither of the adjacent features will be affected directly by the AAP, although policy CSF/5 provides for sympathetic landscape treatment of the open land which both overlook, and the improvement of pedestrian and cycle access to these features, which all supports objective 5.3.

Policy CSF/16 requires a comprehensive archaeological survey, recognising the number and diversity of local finds and features. Building construction will be confined to the east of the Monsanto site; the need for survey and opportunity for in situ inspection applies here although the disturbance of ground as a result of the original development of the site suggests there may be little to identify. However survey of other parts of the AAP footprint will be important.

³ <http://www.magic.gov.uk>

The main aim should be to ensure that landscaping and other improvements do not disturb features. This will be particularly important in the area to the west and southwest of Trumpington due to the presence of the settlement identified above which appear to lie along the most direct route for the SUDS between the built development and the Cam. However the lack of built development considerably reduces the risk of disturbance of these sites, and the archaeological survey might also consider the scope to incorporate the settlement remains into the country park as a visible feature.

There is less risk of disturbance in the area south of Addenbrookes where changes are restricted to landscape improvements, however these must avoid disturbance of the monument identified above alongside Hobson's Brook. A pair of non-scheduled monuments (comprising a moat and other earthworks) also lie within the landscaped area and appear to straddle the route of the western foot/cycle link shown on the concept map for this area.

The AAP recognises the importance of the setting and aspect of the views from the city edge towards the Gog Magog Downs. It is less evident that a similar approach should be taken along the Cam, particularly at the northwest edge of the AAP area due to the historical associations of Byron's Pool. This will remain some distance from the edge of Trumpington West, but any changes resulting from, for example, incorporation of SUDS features, will need sensitive integration to preserve the setting.

Policies with a potentially significant beneficial impact: CSF/2, CSF/16. The impact of development depends on the scarcity and historical importance of the listed and scheduled features listed above, and this will only be evident once the survey has been undertaken.

Policies with potentially significant adverse impacts: none identified.

Potential secondary, cumulative and synergistic effects: none identified.

3.2 Maintain and enhance the diversity and distinctiveness of landscape and townscape character

The Strategic Vision (section 2.1) sets great stock in the importance of the District's character to its attractiveness as a place to live and work (notwithstanding the costs involved), and as a complement to the principal tourist attraction of Cambridge itself. It is difficult to identify meaningful indicators that can be measured readily and at an appropriate scale for the built environment. However this is largely subsumed by the designation of Landscape Character Areas which reflect the integration of settlement pattern and density, building materials, flatness of the terrain, along with more subtle nuances such as the importance of the openness of the East Anglian Chalk to recharging the District's groundwater resources, and the need for new development to reflect the layout and structure of settlements in the vicinity.

The plan addresses urban design issues through various policies, both in terms of housing density and layout, and also through the integration of additional features such as green fingers as well as open space required by current planning policy. Specific aspects are not defined and will be addressed in a set of design guides to be produced subsequently.

As indicated under the preceding objectives, this Plan places greater emphasis on landscaping – whether this is to improve the presentation of the southwestern approach to Cambridge, or to preserve the aspect of the area south of Addenbrookes. The need for sympathetic landscaping is addressed in policies CSF/5 and CSF/12, and is itself mitigated by other policies (eg. CSF/16) which prevent these works having unforeseen secondary impacts on other local assets such as archaeological features.

Policies with potentially significant beneficial impacts: CSF/2, CSF/4, CSF/5, CSF/6, CSF/12. It is not possible to assess the impacts of these policies at this stage. We assume an EIA of the western part of the development will be needed and it would be appropriate to undertake a formal visual impact assessment at that time.

Policies with potentially significant negative impacts: none identified. In practice this conclusion assumes that the screening and other impact reduction measures proposed in policies on green separation, etc. will balance the desire to improve the southwestern entrance to the city against the need for suitable treatment of this edge of the development.

Potential secondary, cumulative and synergistic effects: none identified. It will be important to resist pressure for further redesignation of the Green Belt land between Trumpington West and the M11 to contain development pressure and to maintain the positive landscape improvements introduced by this plan.

3.3 Create spaces, places and buildings that work well, wear well and look good

This objective is one of the most difficult to assess since it is largely subjective. Good urban design principles address specific requirements within settlements, and this is assumed to be the focus of the objective. The need for good quality landscape is assumed to be addressed by objectives 2.2 and 3.2. A 2002/3 survey suggest South Cambridgeshire is performing well, with 90% of residents satisfied with the quality of their immediate (built) environment, which is above the national average. This outcome appears to reflect the predominantly rural aspect of the area, and the open, low density layouts of many of the District's principal settlements.

As noted in the Core Strategy, this objective is closely related to 3.2. The surveys above suggest residents should appreciate the efforts taken to maintain a high quality environment, and in the Southern Fringe most changes will enhance the existing spaces. Satisfaction is also likely to be strongly linked to the relationship between new built development and the surrounding community, and this issue is considered in the assessment of objectives 6.1 and 6.4.

We cannot assess the implications for the built environment as the concept diagram and policy text only provides an outline of the design.

Policies with potentially significant beneficial impacts: CSF/2, CSF/4, CSF/5, CSF/12, CSF/17, CSF/23.

As with objective 3.2, the overall effect of the plan policies is strongly positive provided that mitigation of the development on the surroundings are effective. We identified no policies with a significant negative impact.

Potential synergistic, cumulative and secondary impacts: none identified.

4.1 Reduce emissions of greenhouse gases and other pollutants (including air, water, soil, noise, vibration and light

Section 11 of the Scoping Report highlights several issues under this objective where local conditions are below national averages, or where performance has deteriorated recently. Commuting patterns (including the school run) are a particular issue, which contribute to local congestion to add to the 28% increase in vehicle traffic over the period 1992-2002. Local monitoring has shown that traffic flows into and out of Cambridge are static but above the level stipulated in the Local Transport Plan. A further indication of the nature of the problem is that trunk traffic flows are 70% above the national average, and that on other principle roads is 35% higher. This situation has implications for air quality with recent data suggesting a significant deterioration with a 30% increase in NO₂ levels at one local monitoring station alongside the Cambridge-Huntingdon link of the A14 close to Northstowe, while at another station on the Cambridge Northern Fringe levels were static but already 30% above UK and European thresholds. Furthermore, dust concentration may be an issue. Two measurement stations providing local data (again north of Cambridge) show concentrations of 40 and 72µg/m³ respectively, the first equaling the air quality threshold for this parameter, and the second being almost double. However from 2005 the dust concentration threshold is cut to 20 µg/m³ (to be achieved by 2010) suggesting a potential air quality problem if these levels are typical of other parts of the District.

Limiting adverse impacts and potential for pollutants covers both the temporary impacts resulting from construction of the settlement (policy CSF/22 in particular), and the more permanent impacts once Trumpington West is established.

Analysis of National Air Quality Survey (NAQS) forecasts for this area shows NO₂ levels predicted to be around 60% of the UK threshold level of 40 µg/m³ in 2005 along the A10 and the centre of Trumpington. This is assumed to reflect queuing traffic during peak periods and the volume of traffic handled by this principal route into the city. The park & ride site was completed in the period when these forecasts were generated and should have contributed to a local reduction on the route into the city and in Trumpington, assuming it has eased congestion. Levels are forecast to drop to around 50% of the threshold level by 2010, although there are currently no local measurements to check the accuracy of the 2005 forecast.

Airborne 'nuisance dust' (PM₁₀) is forecast to be around 50% of the national threshold at 2005, but by 2010 this target will be halved, and the NAQS data forecasts PM₁₀ levels around 90% of the revised target at that time.

Maintaining air quality at the very least therefore requires that the proposals in policy CSF/11 encourage local residents to use public transport and other modes for commuting, and this will be supported by expanding the facilities in Trumpington Centre (to be covered by City Council policies) to provide more local amenity within easy reach.

Noise impacts will depend on the timing and location of construction activities, and depend on their duration (ie. nuisance effect over a sustained period), proximity, and whether there are cumulative effects from various plant operating simultaneously. Time of day is assumed not to be an issue provided the considerate contractor strategy required by policy CSF/22 is enforced.

Site plant typically emits sound levels above 80dB (decibels) at a distance of 7m, with levels exceeding 100dB for unsilenced equipment⁴. These levels reduce by 3dB with each doubling of distance from the source, however this means there are areas around the perimeter of the Trumpington West site where there may be potential noise impacts. These would primarily affect:

- Any residents of Trumpington West who occupy the site early, while construction is continuing;
- Properties on the City side of the north end of the development, including Anstey Hall;
- Users of the park & ride and retail area in Trumpington centre (unlikely the two locations above this would not be a continual exposure to noise);
- Residents on the east side of Hauxton Road, including those in any new housing developed within the City boundary (however this is likely to be confined to the southern end of the site where the build part of the development adjoins the A10).

The construction strategy should require the installation of temporary noise abatement measures (possibly paneling) to limit the impact on neighbouring areas, as well as appropriate management processes and controls on working hours. Given the small scale of the development it is not clear whether construction spoil would be available in sufficient volume to be stored temporarily as a noise-reduction berm before it is redistributed across the site (as proposed for other developments).

Visual impacts are addressed extensively through edge treatments for the two and four-storey buildings planned for the west and southwest sides of the built development.

Water quality is addressed explicitly in terms of the need to prevent any water leaving the site, whether through natural processes or in sewage systems, from contaminating the surface and groundwater regime.

In addition a range of generic policies in the Development Control Policies DPD, including NE/10 to NE/14 (water resources and drainage), NE/16 and NE/20 (hazardous installations and land contamination), and NE/17 to NE/19 (light, noise and air pollution) would also apply across the site, although the

⁴ British Standard 5228, quoted in Morris P & Therivel R (eds), 2001, Methods of Environmental Impact Assessment, 2nd ed.

current AAP text not state this explicitly. We would also expect matters such as requirements to limit light spill to be addressed in the detailed design brief for the settlement.

Policies with a potentially significant beneficial impact: CSF/6, CSF/11, CSF/19, CSF/22 (particularly in the early stages of development), CSF/26. At present the significance of the impact of these policies cannot be calibrated as this will depend on the design brief and timing of new development.

Policies with potentially significant adverse impacts: none identified. However the development of Trumpington West will generate transport impacts from plant movement. Policy CSF/22 requires that site access will minimise disruption on Hauxton Road, but this is an issue that will need to be addressed in the construction strategy.

The principal temporary impact will be the sustained effect on air quality of phased construction over a period of 10 years, arising from:

- Excavation, storage and replacement of topsoil and construction spoil
- Other excavations
- Exhaust fumes from construction traffic and other plant
- Emissions from other site equipment (eg. crushers, drilling / piling equipment, etc.)

It is not possible to calibrate the effect of these activities in terms of the likely increase in NO₂ and PM₁₀ levels without more details of the location and timing of site activities and an indication of which activities will occur concurrently. Table 9 indicates best practice criteria for assessing how far 'nuisance dust' (equivalent to the PM₁₀ pollutant) can be expected to penetrate away from construction activities, and also how far soiling (ie. deposition of other particulate matter on surfaces) is likely to penetrate. Activities at Trumpington West are likely to fall into the 'minor construction site' category given the fairly compact area of the site.

The rates shown in Table 8 suggest that any impacts of construction activities should be relatively localised within the areas under development at a particular time. Nevertheless it should be noted that soiling and nuisance dust would be more extensive if there are inadequate controls on site.

Table 8: Construction dust assessment criteria (Source: Laxen, 2000⁵)

Source	Potential Distance for Significant Adverse Effects (Distance from source)	
	Soiling	PM ₁₀ *
Large construction sites, with high use of haul routes	100 m	25-50 m
Moderate sized construction sites, with moderate use of haul routes	50 m	15-30 m
Minor construction sites, with limited use of haul routes	25 m	10-20 m

⁵ Laxen, D., 2000. Diben Terminal Technical Statement, Air quality Impact assessment TS/AQ1, Associated British Ports.

* Based on 35 permitted exceedances of 50 µg/m³ in a year

As stated for previous objectives, it will be essential that there are consistent and effective site operational processes to minimise the generation of dust during the removal, storage and re-location of spoil, and its disturbance by site traffic.

Given the duration of the work there is also an inevitable risk of material being washed from the site into adjacent water courses. This is particularly important in terms of the 'cross-border' effects of construction within the City and its impact on the Hobson's Brook / Nine Wells area. This issue illustrates the need for a coordinated construction strategy for the City and District, although it is not apparent from the Plan at this stage how this will be delivered.

Note also that the policies dealing with construction activities do not currently refer to the possibility of contaminated land on the core of the Monsanto site given its former use. A survey of this risk will be necessary during the initial master planning of the development so that mitigation and remediation measures are incorporated into the construction strategy, and to meet the requirements of Development Control policy NE/20.

4.2 Minimise waste production and support the recycling of waste products

The Scoping Report suggests this is another pressing problem for the District with a 25% increase in waste generation to 352kgs/household over the period 2001-2003. In 2003 just over 20% of this material was recycled and a further 5.3% was composted. While both represent good progress, the sizeable increase in waste generation creates extra pressure to meet the target for value recovery from 40% of waste by 2005.

The AAP implies an absolute negative impact due to the additional waste that will be generated by housing, employment and community sites. As with other impacts it may be assumed that the relative impact is neutral, given the need to expand the District's housing stock, and if it is accepted that this represents one of the most sustainable sites for redevelopment after Cambourne, Northstowe and Cambridge East.

The need for effective control and reduction in waste to support landfilling and recycling targets is acknowledged in section D13 of the Plan although the scope for action is limited because the Council has no waste collection or treatment responsibilities. Nevertheless this section of the plan does not specify that built development (particularly the housing areas) should include basic facilities to support recycling, although in principle Development Control policy DP/3 clause 7 will apply. The text appears to preclude major waste collection and/or treatment facilities in the vicinity of Trumpington West (proximity to civic amenity or other sites cannot be determined at this time though the adjacent park & ride and supermarket car park areas are typical sites), however it would be appropriate to incorporate a small recycling 'bring' site in the development, or to provide a facility shared with the new development on the opposite side of the A10.

On a broader scale the Plan does provide some more explicit support for recycling through re-use of materials from the Monsanto site once it is demolished (policy CSF/24). The suitability of these structures for other uses

cannot be determined at this time, although the intention for a development largely of housing suggests they are likely to be demolished and will provide a limited supply of secondary materials. Provision is also made for re-use of construction spoil for landscaping and possibly its use as a sound-proof berm along the M11. Re-use of water through greywater systems and other technology is also addressed and supports objective 1.3.

Policies with a potentially significant beneficial impact: CSF/19. Policies CSF/22 and CSF/24 also contribute but the limited amount of materials that may be available for recycling limits their impact.

Policies with a potentially significant adverse impact: CSF/2. As with objectives 1.2 and 1.3, growth implies an increase in impacts, in this case of waste arisings. However the impact here is less significant than at Northstowe or Cambridge East, though it is likely to occur earlier.

Potential secondary, cumulative and synergistic impacts: a secondary impact and concern is uncertainty about the future of Milton STW and its possible replacement. This should not be an issue provided any change in location of the receiving works does not require reconfiguration of waste water removal infrastructure on the site. If this is likely then it may be pertinent to use a Grampian condition or other mechanism to prevent development until sewage treatment arrangements can be finalised.

4.3 Limit or reduce vulnerability to the effects of climate change (including flooding)

This objective addresses two areas: reducing the vulnerability to flooding, and improving the thermal efficiency of structures to retain heat thereby reducing energy demands. Both parameters are difficult to calibrate at present, although the Scoping Report proposes to use GIS of Environment Agency data to determine the number of properties currently lying within moderate to high (100 to 50 year incidence) areas within the District.

The emerging Strategic Flood Risk Assessment for South Cambridgeshire indicates there is limited risk in the area covered by this AAP; details of the Environment Agency's Flood Zones are shown on the proposals map which accompanies the Cambridge Southern Fringe draft AAP.

The built section of the Monsanto lies on a slight rise around 10m above the floor of the Cam to the west. The only part of the area lying within the functional floodplain is a strip approximately 50m wide adjacent to the river of which 30m lies within the 10 year event risk area and the rest within the 100 year event risk area. All this land lies within or beyond the boundary of the country park and therefore away from structures which would require protection. Part of this area may contain reedbeds and other features which are part of the SUDS. Policy CSF/19c requires that there is no net adjustment to discharge into the Cam, and this will be particularly important at this point to prevent damage to water habitats along the river, and because there is a scheduled ancient monument just to the east of the effective floodplain which might be damaged by an increase in water levels.

Reflecting a similar change to the Cambridge East AAP, post consultation revision of the AAP introduced the need for a Strategic Surface Water

Drainage Scheme to coordinate and integrate drainage infrastructure of different developers.

There is also a small strip of land subject to 100-year event risk along Hobson's Brook from the City boundary to the northern edge of Great Shelford. This area will not be affected by development proposed in the AAP however policy CSF/19 (para. D10.1) identifies the need avoid balancing ponds and other features in the open area to the south of Addenbrookes. This indicates that the drainage requirements for new housing within the City boundary south of Trumpington must be coordinated with District policy, and that the provisions of policy CSF/19 should have precedence.

Reducing energy use, particularly by improved heat retention in buildings, is addressed by policy CSF/21, however the discussion of objective 1.2 notes that there is no clear policy requiring energy efficient construction at Trumpington West to parallel statements in the other AAPs.

Policies with potentially significant beneficial impacts: CSF/19. The overall impact of these policies depends on the detailed design of the drainage and flood control infrastructure on both parts of the site, and the coordination of drainage plans with the City council.

Policies with potentially significant adverse impacts: none identified.

Both sets of policies support this objective but will apply only to new development. Other initiatives will be necessary to encourage increased use of energy-efficient solutions in existing housing stock.

5.1 Maintain and enhance human health

Data presented in the Scoping Report suggests this is not a particular problem for the District, with life expectancy above the national average (79 years for men, 83 for women, compared to national averages of 76 and 81 respectively) and incidence of long-term illness below it (12.7% locally compared to 18.2% nationally). Nevertheless concerns about increased obesity levels suggest that any policy initiatives that contribute to healthier communities are desirable.

It is difficult for the components of the LDF to improve human health directly, therefore their main contribution is to provide facilities that support initiatives by other bodies such as the Department of Health and local Primary Care Trusts. In this respect the AAP is supportive. It addresses this issue primarily through infrastructure and design provision that encourages people to take more exercise in several ways:

- Making public transport readily accessible (CSF/2 and CSF/11), so people are encouraged to walk to the bus stop (this facility is already available at the Trumpington park & ride, reducing the need for phasing)

- Designing recreational space and features such as green corridors into the development and providing easy access to adjacent recreation areas and the countryside (CSF/2, CSF/5, CSF/17)
- Adding to the stock of local recreational and strategic open space served by convenient access, including both the country park and the access improvements to the land south of Addenbrookes (CSF/17 and CSF/18).

The first two improvements will principally benefit residents of Trumpington, both old and new parts, whereas the third will be of wider benefit.

Policies with potentially significant beneficial impact: CSF/2, CSF/4, CSF/5, CSF/14, CSF/17, CSF/22. The impact of these policies cannot be calibrated as this will depend on how many people make use of the opportunity to get more exercise, commute by other modes of transport, etc.

Policies with potentially significant adverse impact: none identified.

There are potential secondary impacts from poor air quality which has been identified under objective 4.1. However the country park in particular intended to benefit the wider sub-region and may therefore draw visitors from further afield, not all of whom will have convenient public transport, pedestrian or cycle access. Car parking is available at the Trumpington park & ride site, but it is not clear whether access to the park will be available from the south, at Hauxton, and which car parking might be provided there.

5.2 Reduce crime and the fear of crime

Crime does not appear to be a problem with local rates a little above half those across the county (57 per 1000 people, compared to 94), and with a small drop in rates over the last two years. It is not clear how crime rates compare to those in Cambridge, and whether the higher county-wide rate reflects higher incidence in larger urban areas. The most recent Quality of Life survey reveals 70% of residents feel safe or fairly safe after dark, which is better than the level across the county as a whole but still capable of improvement. Moreover provision of good recreation and leisure facilities for teenagers was seen as an important contributory task.

Primary responsibility for reducing crime lies with other authorities, and the AAP only deals with the objective through a general statement about car and cycle parking. Development Control policy DP/3 clause 8 requires crime opportunities to be 'designed out' of new development and would apply also to Trumpington West.

Consideration will need to be given to the safe design of pedestrian and cycle routes across the open land south of Addenbrookes as any lighting along these routes would introduce an additional impact into an unlit area.

Policies with a potentially significant positive impact: none identified.

Policies with potentially significant adverse impact: none identified.

Potential secondary, cumulative and synergistic impacts: the Scoping Report identifies concerns about fear of crime and the potential contribution of the lack of recreational facilities for teenagers on the street scene. Although the Report suggests this is a particular concern in some villages it is reasonable

to assume it will occur in some suburban areas around Cambridge. Provision of recreational space (CSF/17) and appropriate community facilities (CSF/9) will help and may provide amenities that benefit other neighbouring parts of Trumpington if they are poorly served at present.

5.3 Improve the quantity and quality of publicly accessible open space

Local performance on this objective is below standard with local provision 25% below the equivalent level across the county, and the most recent District audit shows that some smaller villages have no informal recreation space.

As stated previously, landscaping and open space provision are the primary focus of this AAP, which opens up large areas south and southwest of Trumpington for public access, encouraging use with sustainable access infrastructure, and links to the adjacent settlements and to other interesting local sites (eg. Wandlebury).

Policies with a potentially significant beneficial impact: CSF/1, CSF/2, CSF/5, CSF/11, CSF/12, CSF/13, CSF/14, CSF/17, CSF/23. The Plan makes provision for more open space in line with national, county or City standards.

Policies with potentially significant adverse impact: none identified.

Potential synergistic, cumulative and secondary impacts: the most likely effect is a secondary impact of serving residents of a wider area of Trumpington and possibly Great Shelford, and of attracting visitors to the country park from a much larger part of the sub-region. Both developments will contribute to objectives such as 5.1, though the latter may contribute to incremental traffic growth.

6.1 Improve the quality, range and accessibility of services (eg. health, transport, education, training, leisure opportunities)

County monitoring shows that 83% of the District's population lives in communities with low levels of provision or ready access to basic services, such as a primary school, doctors' practice, shop, and regular and convenient public transport.

Trumpington currently provides a limited range of shopping facilities just north of the A10 / A1301 junction, with a large supermarket adjacent next to the park & ride site. There are further amenities scattered along Great Shelford Road down to Great Shelford and Stapleford, which is designated by Core Strategy policy ST/3 as a Rural Centre.

Policy CSF/2 refers to enhancing Trumpington Centre with additional services and facilities, with a focus on education, sport and recreation. Unfortunately Trumpington centre lies within the City boundary and therefore it was not included in the 2000 survey of village amenity which has informed the assessment of the other DPDs. Lack of mention of retailing implies that the City and District councils consider shopping facilities are adequate. Trumpington inevitably lies in the shadow of central Cambridge, and further expansion might affect growth of Great Shelford / Stapleford.

However the key issue is the siting of new housing and some employment at Trumpington West next to the park & ride facility which will provide ready access to services, employment, etc. in the city centre. This is complemented by shuttle buses across to Addenbrookes (which will also have an interchange for the guided busway) and links for local pedestrian and cycle routes to similar facilities providing safe, segregated access into the city.

Post consultation changes made clearer the intention to seek employers to develop travel plans to mitigate potential transport impacts.

Policies with potentially significant beneficial impacts: CSF/5, CSF/7, CSF/9, CSF/11, CSF/17. This is another objective where it is difficult to quantify the benefits or their potential significance, though these – and those with lesser beneficial impacts – will contribute to the sustainability of Trumpington West.

Policies with potentially significant adverse impacts: none identified.

The principal synergistic impact is likely to be the effect of ready transport access on commuting patterns. The park & ride facility is operating now and Cambridge city already has an extensive network of cycle routes.

An additional secondary impact concerns community cohesion. The Scoping Report identifies the shortages of recreational facilities and strategic open space that occur across the District. It is not clear if these problems affect Cambridge suburbs, or whether the level of recreational provision is superior. Their suburban setting suggests a greater potential catchment and that they may be better provided. Nevertheless the facilities designed into Trumpington West can benefit not only new development across the A10 but also the rest of the immediate community, and this will also help to integrated the new site into the existing settlement.

6.2 Redress inequalities related to age, gender, disability, race, faith, location and income

The Scoping Report provides two statistics that illustrate the difficulty of measuring this objective. The most recent Quality of Life survey shows 70% of residents regard their local environment as 'harmonious' (compared to a county-wide figure of 64%) and an Index of Multiple Deprivation score of 6.9, a little over half the county average. The latter figure is not particularly surprising given the largely rural nature of the county and the nature of local employment growth, which has largely been in sectors offering attractive salaries. However this situation should not overlook the need to provide balance work opportunities for a wide range of skills and skill levels.

The AAP does not deal with the listed equalities explicitly. Requirements for access to services, amenities, recreational areas and open space such as the country park for the elderly and less mobile are not addressed specifically, although this is also true of the other AAPs. In principle Development Control policy DP/3 clause 6 provides for this requirement, and improvements in amenities could benefit residents in Trumpington, and possibly Great Shelford. One slight concern, which was raised in the initial SA report and is not addressed explicitly, is the potential barrier of the heavily-used A10 to movement between Trumpington West and the rest of the local community.

Provision of affordable housing addresses income disparities, with Trumpington West contributing a further 300 dwellings to the affordable housing target. This will be important since the introduction to the AAP notes that the site offers potential for early development, helping to address the disparity between housing supply and demand, and escalating price/income ratios, that have occurred over the last decade.

Policies with potentially significant beneficial impacts: CSF/7, CSF/9, CSF/23. As with many other policies the benefits are intrinsic and cannot be measured effectively. They may not be significant in the same way as environmental impacts such as air or water pollution, but will be important to the social cohesion of Trumpington West, and to integrating it with the existing settlement.

Policies with potentially significant adverse impacts: none identified.

Potential synergistic, cumulative and secondary impacts: none identified.

6.3 Ensure all groups have access to decent, appropriate and affordable housing

A Land Registry survey shows that the house price-to-earnings ratio of 6.6 in 2003, which was in line with the East of England average, but which is rising and which will be disadvantageous to those on low or modest incomes. Moreover, in common with elsewhere in the county, too much of the recently-added stock has comprised large 4-5 bedroom houses on spacious plots. The situation is worsened by recent completions in which only 19% were classed as affordable. This is almost double the average rate over the period 1998-2003 but below the 30% target specified in ODPM guidance. The Council acknowledges that current provisioning does not meet Housing Needs Survey requirements of 800 units immediately, and a further 1047 per year thereafter, and that the requirement for this form of housing is growing.

Policy CSF/7 provides for open market and affordable housing in the proportions required by Development Control Policy HG/1 and in the same ratio of social rented and intermediate tenancies as that required by Development Control Policy HG/3. As noted for objective 6.2, the development will contribute 300 affordable dwellings. Although this is relatively small in scale compared to the contribution of the other AAPs and the allocations in Site Specific policy SP/1, it appears to offer the prospect of delivering more dwellings relatively early to address the recent market disparities mentioned above.

As noted for objective 6.2, one area where the policy is somewhat deficient is in failing to make clear the how the requirements for elderly, retired residents and other special needs housing will be determined, or if provision is to be made at all. The Core Strategy and Development Control Policies make no specific statement about whether special needs housing should be provided more centrally than other types, to help efficient provision of care facilities and ease any access problems of the residents. In this respect it may be appropriate to consider specific special needs housing at Trumpington because of its proximity to the enhanced suburban centre, park & ride and other access infrastructure.

Policies with potentially significant positive impact: CSF/7. This is possibly an overstatement of the significance of Trumpington West since it contributes around a tenth of what will be delivered at Northstowe.

Policies with a potentially significant adverse impact: none identified.

Secondary, synergistic and cumulative impacts: none identified.

6.4 Encourage and enable the active involvement of local people in community activities

Increased community involvement has been a hallmark of the current government, down from the establishment of National and Regional Assemblies to encouraging more consultation on decisions that affect the local community. Material in the Scoping Report focuses on the aspect of community involvement in decision-making, however this is difficult to measure accurately and objectively. Nevertheless the Scoping Report notes the most recent Quality of Life survey shows only one in five residents considers that they can influence decisions affecting the local area, and this leaves clear room for improvement.

As with the assessment of the Core Strategy DPD, we have adopted a broader definition of this objective which focuses less on empowerment and more on involvement of residents in their community both through social activity and semi-formal administrative forums. In this respect the AAP supports the objective in a number of ways

The AAP is supportive in several respects: through providing infrastructure for social interaction, whether in general community activities or recreation; and also in requiring residents to be consulted in the design of recreational facilities and a broader range of amenities. The supporting text for policy CSF/9 suggests that Cambridgeshire Horizons is already undertaking some community research to determine the needs of Trumpington West through public participation.

Policies with a potentially significant benefit: CSF/9, CSF/17, CSF/25.

Policies with a potentially significant negative impact: none identified.

Cumulative and other impacts: as noted for other objectives, adding to the range of locally accessible facilities for the wider settlement of Trumpington will help to integrate the new settlement into the existing community. We assume that amenities will tend to be located so they are conveniently located near the improvements for Trumpington Centre, and that this will mean that similar facilities provided in development within the City boundary to the east of the A10 will be available to Trumpington West residents.

7.1 Help people gain access to satisfying work appropriate to their skills, potential and place of residence

Unemployment has remained consistently low around the last 5 years at around 1%. This is well below the county average and suggests this will not be a problem provided the appropriate employment can be provided for the new residents of the new communities and new arrivals in existing ones.

However one adverse trend in the current employment situation is that over a third of the District's population travel more than 5kms to work, although this is lower than the regional average and to be expected given its dispersed settlement pattern.

The decision-making criteria in the SA Framework cover rural diversification, business development, type and availability of employment, and access to work by sustainable transport. The first is clearly inappropriate to this AAP, and the impact on the second and third is limited by the small scale of new employment planned for Trumpington West. However the Plan clearly addresses access to work by siting the built development on an existing and readily accessible access node/interchange, and by connecting its footpath and cycleway infrastructure to links into the city centre. These links, and bus services will also connect to Addenbrookes which will provide expanded employment with growth of the site and the possible relocation of Papworth cardiac facilities as considered in Site Specific policy SP/11. The Plan also mentions access to the guided busway from the interchange at Addenbrookes, and this may benefit Trumpington residents working in the science park areas on the Northern Fringe.

Policies with potentially significant beneficial impacts: CSF/6, CSF/8. The significance of these policies depends on whether local residents can be encouraged to use sustainable transport for commuting, although the existence of facilities (park & ride, cycleway network) today means there is no issue of phasing delivery.

Policies with potentially significant negative impacts: none identified.

One additional issue, which might be considered a secondary impact, is the limiting impact of the organisation of the Cambridge park & ride services. Any new residents of Trumpington who work in the science park areas to the north of the city would have to travel across to Addenbrookes for the guided bus service, or use the park & ride service and change in the city centre, as the system does not provide 'through routes' in the same way as that in Oxford. Any such changes would add to commuting time and might provide some disincentive. It is not known whether these changes are feasible, and they lie beyond the scope of this Plan, but they are proposed as a possible contribution to the sustainable transport policies.

7.2 Support appropriate investment in people places, communications and other infrastructure

There is currently no data available and this objective will be difficult to measure. We assume appropriate investment will encompass private and public sector projects, with a sizeable proportion of the former being securing through Section 46 agreements.

As with other AAPs a key statement that "*development will fund in full the services, facilities and infrastructure that are required by the development alone or by service, facility and infrastructure providers ...*" (para. E1.15) is presented at the end of the document. We consider this is a fundamental aspect of the concept which should be more apparent, perhaps from

relocating it to the text in policies CSF/1 or CSF/2, even if it reflects standard policy for developments of this size and complexity.

Notwithstanding this the AAP makes extensive provision for securing funding for further infrastructure through this process, supported by Section 46 agreements in certain cases. Additional infrastructure items to be funded by the development include:

- affordable housing (CSF/7)
- services, facilities and public art, the first including contribution towards a new secondary school (CSF/9, although the plan text suggests the onus will lie with public sector agencies and private sector providers)
- landscaping features, biodiversity improvements, and maintenance of stock for a 10 year period (CSF/5, CSF/12 and others)
- biodiversity mitigation measures (implicit in NS/15)
- public open space, sports facilities, and countryside recreation facilities (CSF/17 and CSF/18)
- the water/drainage infrastructure and management facilities (CSF/19).

Policies with a potentially significant positive impact: CSF/2, CSF/9, CSF/11, CSF/19, CSF/26. The significance of these impacts cannot be assessed without more detail of the scale, scope and location of developments to which these policies would apply.

Policies with a potentially significant negative impact: none identified.

Cumulative and other impacts: none identified however, as with other AAPs, there is a concern about the scale of the financial responsibilities of the developer(s) which will be responsible for basic infrastructure as well as any additional requirements covered by Section 46 agreements.

7.3 Improve the efficiency, competitiveness, vitality and adaptability of the local economy

This is another sustainability area that is surprisingly difficult to assess in a robust and effective manner, and the primary indicators are indirect. Recent trends show an increase in viable VAT-registered firms of just below 0.9% per annum, somewhat below the District figure for 2001. Nevertheless the sub-region is also regarded not just as a centre of excellence in R&D and IT but also as an entrepreneurial hotbed.

The AAP can make a small incremental contribution to the sub-regional economy by helping to reduce any imbalance between housing demand and supply which may have a knock-on effect on the range of skills in the local workforce. However the Plan is largely concerned with housing and landscaping and therefore is not likely to have a significant impact.

Policies with potentially significant positive impact: none identified.

Policies with a potentially significant negative impact: none identified.

Cumulative, synergistic and secondary impacts: none identified.

6.3 How social, environmental and economic problems were considered in developing the policies

Social, environmental and economic problems were identified from the initial scoping work and are listed in section 4.4 of this report. The range of policies and options proposed in the Preferred Options Report include measures to address these issues through individual targeted policies (eg. that on landscape character protection corresponds to the need to preserve open views to Cambridge and its skyline).

As comments in the detailed assessments indicate, many aspects of policy are dictated by central and regional government planning guidance and strategy, government policy on housing, and adopted policies in both the Cambridgeshire Structure Plan and the South Cambridgeshire Local Plan. Any plans and strategies which diverge from current guidance are unlikely to be regarded as acceptable, and therefore these documents constrain the number and range of alternatives that might be proposed and which are reasonable.

Table 9 cross-references the issues identified in the Scoping Report (see section 4.5) against the policies in the draft AAP to show the extent to which each issue is addressed by at least one policy⁶. It shows that the only policies with no significant impacts are:

- CSF/8 (employment): which has limited impact due to the negligible amount of employment that will be provided at Trumpington West
- CSF/25 (management of services): which is primarily a procedural policy
- CSF/26 (timing of services): this does not strictly address the issues however coordinating delivery of services with occupation of the site will be essential for its coherence.

Apart from those issues which are inappropriate for an urban edge development, two are not addressed by any of the policies:

- CSF housing policies does not specifically state the intention to meet special needs housing for the aged and other groups, although this issue is addressed by other AAPs and the Council may have a specific purpose of concentrating housing for the economically active at this site.
- As with other AAPs, the needs of travellers are not addressed, however the Council has stated this will be addressed in a separate DPD;

⁶ The original cross-check was based on the Preferred Options Report, which contained 117 policies. Table 10 is based on identifying the corresponding policy area in the draft DPD; in some cases this may be policy itself or the supporting text.

Table 9: Cross-check that Cambridge Southern Fringe policies are addressing the environmental and sustainability issues identified in the Scoping Report.

Environmental, social or economic issue	CSF/1	CSF/2	CSF/3	CSF/4	CSF/5	CSF/6	CSF/7	CSF/8	CSF/9	CSF/10	CSF/11	CSF/12	CSF/13	CSF/14	CSF/15	CSF/16	CSF/17	CSF/18	CSF/19	CSF/20	CSF/21	CSF/22	CSF/23	CSF/24	CSF/25	CSF/26
Land and water resources																										
Limited brownfield land			■				■																			
Sterilisation of sand & gravel	Not addressed specifically but policies CSF/12, CSF/22 and CSF/24 provide for recycling of materials where appropriate.																									
Altering natural drainage																				■						
Increased water consumption																				■		■				
Biodiversity																										
Loss of local key habitats		■		■	■							■			■					■						
Impact on designations														■						■						
Landscape & townscape																										
Impact on Cambridge's setting	■	■		■	■	■						■														
Loss of local character / style	■			■	■	■					■	■	■	■				■		■						
Uncontrolled development		■	■	■	■	■				■		■	■	■				■				■				
Sterilisation of archaeol. sites																										
Loss of openness / tranquillity		■		■	■	■						■	■	■	■			■		■				■		
Climate change																										
Increased flood risk		■											■							■		■	■			
Conserve energy + renewables		■																		■		■	■			
High level of private car use		■				■					■	■														
Impact on strategic roads										■	■												■			
High levels of commuting			■			■	■			■	■															
Waste production is growing																						■		■		
Growth = light + noise impacts		■			■					■	■			■						■		■	■		■	

Environmental, social or economic issue	CSF/1	CSF/2	CSF/3	CSF/4	CSF/5	CSF/6	CSF/7	CSF/8	CSF/9	CSF/10	CSF/11	CSF/12	CSF/13	CSF/14	CSF/15	CSF/16	CSF/17	CSF/18	CSF/19	CSF/20	CSF/21	CSF/22	CSF/23	CSF/24	CSF/25	CSF/26
Healthy communities																										
High rate of fear of crime																										
Attitude to sustainable transp't																										
Accessibility of services for all																										
Loss of open space																										
Inclusive communities																										
House price / income disparity																										
Lack of youth facilities																										
Loss of village services	Issue concerns a rural problem that is not relevant to an AAP dealing with an urban extension and its edge treatments.																									
Special access needs of aged																										
Villages becoming dormitories																										
Needs of travelling community	Generic policy issue which would be addressed in the Core Strategy unless there is a specific local problem.																									
Limited public transport service	Issue concerns a rural problem that is not relevant to an AAP dealing with an urban extension and its edge treatments.																									
Economic activity																										
Balanced employment growth																										
Farm diversification & traffic	AAP does not cover rural areas where this is an issue.																									
Infrastructure investm't needs																										
Unplanned growth in tourism																										
Cambridge's retail dominance																										
Economics of rural broadband																										

Note : the only 2 policies which have no direct effect on the issues are CSF/25 and CSF/26, both of which address management and procedural issues.

It should be stressed that Table 9 indicates where a policy in the AAP can contribute to dealing with a particular issue but it is not possible to determine whether it will play a leading role or contribute indirectly. In some cases these issues will be addressed on a wider scale by Core Strategy policies; others may require mechanisms outside the LDF. The table does not suggest that the AAP is a panacea for all these issues, but demonstrates that they have been addressed to some degree by its range of plan policies.

A small number of issues are not addressed directly but would be addressed by corresponding policies in the Core Strategy DPD and Development Control Policies DPD, and which are subsumed by the other documents in the LDF.

6.4 Proposed mitigation measures

As noted previously, a large number of the policies in the AAP are mitigation measures in their own right. Across the rest of the policies, apart from a small number of cases, the mitigation proposals fall into two categories:

- Measures to be defined in the development and design briefs for the site.
- Adjustments of policy text or the supporting text.

The full set of mitigation proposals are shown in Appendix 4.

6.5 Uncertainties and risks

The principal uncertainty is the limited information about the detailed layout of the settlement and its surroundings, and the sequence for developing the site. Figure 2 presents the concept diagram, which provides the only available information about the layout of the site and the spatial relationships between the key features. Detail of layout, for example, around local centres will not be available until master planning work is under way.

For this reason much of the assessment of impacts is qualitative, and has proved difficult to be conclusive about the magnitude of some impacts, and the significance of many of them. We have already noted this issue with comments in section 3.1 of this report, which acknowledge that many of the impacts we have identified as “significant” may only be regarded as “important” since they cannot be quantified. Many policies are mitigation measures for recognised impacts and the lack of detail about layout and development process have caused us to take a pragmatic view of the effectiveness of the policies. Issues that are not clearly addressed in mitigation are identified in order that they can be incorporated into the site design brief and similar documents in due course. For example, without information about the sequence of development of different parts of the site, the layout of construction facilities and access, it is not possible to assess the duration and magnitude of noise and air quality impacts and it is only possible to refer to best practice design guidelines.

Lack of information is not a problem specific to this plan. Because SA / SEA is based on the front-loaded approach to appraisal, there is a possibility that assessment occurs early in the land development process at a time when there is limited information about the detailed spatial expression of policies or

land use changes. In these circumstances it is only possible to provide a comprehensive but qualitative assessment of impacts and their significance. This situation has been recognised in interim guidance issued by ODPM in the period when this Report was being prepared.⁷

In principle we assume the enhancement activities south of Addenbrookes could commence relatively soon, subject to any compulsory purchase of land in this area.

In the interim period it will be necessary to complete master planning, to issue design briefs for the development as a whole and for specific aspects, and for developers to prepare various strategies required by the AAP. In this same period it will be necessary to undertake an EIA of the Trumpington West development which can make use of the emerging design information. It will be essential to undertake some activities within the EIA as early as possible so that any previously unidentified problems – notably the presence of protected species on the site – can be dealt with appropriately and the mitigation measures incorporated into the core planning documents.

⁷ ODPM, Sustainability Appraisal of Regional Spatial Strategies and Local Development Frameworks: interim advice note on frequently asked questions, April 2005, section 5.

7. IMPLEMENTATION

7.1 Links to other tiers of plans and programmes and the project level (environmental impact assessment, design guidance, etc)

The detailed assessments have identified a wide range of mitigation needs which require more specific guidance or definition of certain areas of policy.

To avoid repetition, the AAP does not make explicit reference to each relevant part of the Core Strategy DPD and Development Control Policies DPD. However a wide range of generic policies will apply to Cambridge Southern Fringe even if this is not stated explicitly, and these include:

- Development principles: sustainable development, design of new development and construction methods;
- Green Belt: location and design of development; landscaping and design measures; recreation in the Green Belt; improvements to landscape and biodiversity;
- Natural environment: energy efficiency; renewable energy; groundwater; surface water and drainage; sustainable drainage; flood risk; water conservation; land contamination; lighting, noise and emissions;
- Travel: sustainable travel; (most aspects are dealt with explicitly in the AAP);
- Cultural heritage: archaeological sites;
- Housing: (covered explicitly by AAP policies).

The Council is currently developing a list of documents that will be incorporated into the LDF and which will provide additional detail on how policies must be implemented in the local text. These documents include:

- A planning obligations SPD, which will indicate the type of contribution that may be sought in conjunction with specific types of development.
- A design guidelines SPD, providing additional detail on appropriate design, materials, layout, etc., for the general street scene but possibly also for conservation areas.
- An open space standards SPD, providing guidance on good design including safety.
- An energy efficiency SPD, providing guidance on appropriate technologies and design approaches for energy conservation.

These documents will provide guidance for all developments which will also be relevant to detailed design at the Southern Fringe.

7.2 Proposals for monitoring

ODPM published new guidance in March 2005⁸ addressing the requirements for monitoring the effectiveness of plans in the LDF. While this does not deal directly with the requirements of SA Task E1, there is a clear opportunity to integrate the two processes as far as possible to prevent duplication.

The guidance advocates:

- No more than 50 parameters in total (for the initial LDF)
- No more than 3-4 indicators per policy objective
- Also include indicators relating to the most relevant local context issues and any significant effects identified in the assessment.

This proposal takes a pragmatic approach to the guidance since it is not possible to provide 3-4 indicators per objective, and include the other two types, within a 'budget' of 50 objectives. Moreover the extremely broad scope of the DPD means that a wide range of potentially significant indicators can be recommended in order to cover the full breadth of policy areas.

Monitoring proposals are presented in Appendix 6. Finalising and implementing monitoring remains the Council's responsibility, to occur once the AAP is adopted. The Appendix therefore documents recommendations, based on the baseline parameters and impacts summarised in Section 6, for the Council's consideration.

The Annex presents a table of parameters identical to those proposed in the Core Strategy since it is essential that a common monitoring framework applies to the LDF.

In addition to monitoring of the principal district-wide parameters, local monitoring will be necessary during construction to assess its impacts on:

- Air quality (vehicle emission and dust levels)
- Water quality in surface water courses
- Road surfaces (transfer of dirt off-site)
- Ambient noise
- Traffic levels around the site
- Condition of vegetation and other landscaping measures.

The monitoring plan proposed in Appendix 5 should also be adapted so that it combines district-wide measurement with local monitoring around new development of certain parameters, notably traffic levels.

⁸ ODPM, Local Development Framework Monitoring: A Good Practice Guide, March 2005.

8. POST-CONSULTATION ACTIVITIES

8.1 Responding to consultation

After publishing the pre-submission drafts of the AAP and of this report for public consultation, Council officers reviewed the implications for policies, proposing changes where necessary, during September and October 2005. Policy changes were then reviewed by Scott Wilson in early November 2005 to evaluate their impact on the original assessment, and on cumulative and other impacts. Assessment tables presented in Appendix 2 were modified, adjusting scoring where necessary, and to amend text as appropriate. Other modifications were made to scoring of significant and cumulative impacts in Appendices 3 and 4 respectively, and to the summary of how well the AAP addresses the SA objectives as presented in Section 6.2.

Detail of changes to policies and the supporting text, and the resulting changes to this report, are documented in Appendix 8.

The changes resulted in a small number of changes to the sustainability scores of certain policies. Those that altered the significance of an assessment against individual SA objectives were:

- Policy CSF/2 (development principles) contains more explicit controls on impacts on the historic environment and character impacts
- CSF/11 (alternative modes) more positive due to explicit reference to travel plans required for new employment sites
- CSF/18 (countryside recreation) more positive due to clear linkage to the preparation of a Rights of Way Improvement Plan
- CSF/19 (land drainage) more positive due to the addition of a requirement to prepare a Strategic Surface Water Drainage Strategy. However scoring against water consumption was adjusted to reflect the removal of a target on the advice of GO-East (this change is consistent with those made to other AAPs)
- CSF/22 (construction strategy) more positive due to the added requirement for a Strategy to be prepared in advance of development

A slightly larger number of minor adjustments to the detailed assessments was made.

The Council will formally consider the proposed changes together with the revised appraisal in November and December 2005 and agree the Area Action Plan for Submission to the Secretary of State. Any further changes made by the Council will be subject to further appraisal ahead of submission.

APPENDIX 1: BASELINE DATASET

Objective	Indicator	Current Situation		Trends		Assessment	Data Sources
		South Cambs	Comparator	South Cambs	Comparator		
LAND AND WATER RESOURCES							
Minimise the irreversible loss of undeveloped land and productive agricultural holdings	% dwellings completed on previously-developed land	2003 27%	Cambridgeshire and Peterborough 2002-03 48%	Average over period 1999-2003 26%	Average over period 1999-2003 26%	Structure Plan target for SCDC is 37%. Targets reflect limited supply of previously developed land available in the District, and the amount of housing development required. Large areas of PDL will be developed as part of Area Action Plans, to enable SCDC to meet the target later in the plan period.	District monitoring; County Monitoring; EERA Structure Plan AMR Indicator C

Objective	Indicator	Current Situation		Trends		Assessment	Data Sources
		South Cams	Comparator	South Cams	Comparator		
	Net density of new dwellings completed	2003 19.7 (gross) Dwellings per ha	Cambridgeshire and Peterborough 2002-03 18.45 (gross)	Average over period 1999-2003 18 (gross)	Cambridgeshire and Peterborough Average over period 1999-2003 20 (gross)	Densities in rural South Cambridgeshire have historically been lower than achieved in Cambridge and the Market Towns. Higher densities must be sought from new developments if Structure Plan targets are to be met.	District monitoring; County Monitoring; EERA Structure Plan AMR Indicator P is intended to collect data on net density, but currently is based on Gross. Monitoring systems and being developed to collect net data in the future.
Reduce the use of non-renewable energy sources	KWh of gas consumed per household per year	2001/2 15,395	UK 2001/2 17,004			The District figure compares favourably to the national figure. Further monitoring of trends is required.	Transco (plus household stock data) QoL/LIB058 provides the methodology, with information published on the Transco website. Future monitoring will require the figure to be calculated annually.

Objective	Indicator	Current Situation		Trends		Assessment	Data Sources
		South Cambs	Comparator	South Cambs	Comparator		
	Generating potential of renewable energy sources	8.94 GWh/yr (2002)	Cambridgeshire & Peterborough (2002) 333.5 GWh/yr* UK - 11450GWe	8.94 GWh/yr (1999)	Cambridgeshire & Peterborough (1999) 36.1 GWh/yr*	While energy generation from renewable sources has not increased in the District since 1999, a number of new projects have been initiated in the County.	Structure Plan APR indicator 21, monitored through planning process.
Limit water consumption to levels supportable by natural processes and storage systems							Water consumption data is available by water company regions. A method of estimating water consumption at the County and District level is being investigated. This indicator is a priority because sustainable water supply is a key local issue.

Objective	Indicator	Current Situation		Trends		Assessment	Data Sources
		South Cambs	Comparator	South Cambs	Comparator		
BIODIVERSITY							
Avoid damage to designated sites and protected species	% SSSIs in favourable or unfavourable recovering condition		Cambridgeshire and Peterborough 2004 68% UK – 63%		N/a		English Nature. The first complete survey of SSSI condition was published in early 2004. DEFRA target is 95% by 2010. Additional work is required to disaggregate the data to District level.
Maintain and enhance the range and viability of characteristic habitats and species	Total area designated as SSSIs (ha)	2004 954.01 ha.				The District has a relatively low amount of SSSI compared to many rural District. The amount designated has remained static for a number of years.	District GIS; English Nature

Objective	Indicator	Current Situation		Trends		Assessment	Data Sources
		South Cambs	Comparator	South Cambs	Comparator		
	Progress in achieving priority BAP targets	N/a		N/a			Awaiting implementation of monitoring software for County data. Expect to begin late 2004. Limited usefulness as LDF policies may not have a direct impact.
Improve opportunities for people to access and appreciate wildlife and wild places	% of rights of way that are easy to use (NB also see open space indicators below)	N/a		N/a			New survey conducted by County Council of 5% per year. Data available December 2004.
LANDSCAPE, TOWNSCAPE AND ARCHAEOLOGY							
Avoid damage to areas and sites designated for their historic interest, and protect their settings	% listed buildings 'at risk'	2004 2% (48 buildings)		2003 2% (49 buildings)		There have only been minor fluctuations in number of listed buildings at risk in the last 5 years, and they have remained a low percentage of the total stock of listed buildings.	District monitoring (no regional comparator)

Objective	Indicator	Current Situation		Trends		Assessment	Data Sources
		South Cams	Comparator	South Cams	Comparator		
Maintain and enhance the diversity and distinctiveness of landscape and townscape character	% of total built-up areas falling within conservation areas <i>(NB also see biodiversity indicators above)</i>	2004 21.2%				Figure varies as Conservation Areas are designated, or village frameworks amended through development plan review. % is likely to fall as major new developments are completed creating new built up areas.	District GIS (no regional comparator) Calculated as % of land within village frameworks that lies within a Conservation Area.
Create places, spaces and buildings that work well, wear well and look good	Satisfaction rating for quality of built environment	2002/03 90.0%	Cambridgeshire 2002/03 87.0%	In a 2003 survey, 33% believed their neighbourhood was getting worse (QoL 19)	Cambridgeshire In a 2003 survey, 33% believed their neighbourhood was getting worse (QoL 19)	Results indicate a high satisfaction rate, that is also higher than the countywide rate.	Quality of life survey – CCC Research Group (no regional comparator) QoL18/LIB133 The percentage of residents surveyed satisfied with their neighbourhood as a place to live Data in trend column not directly comparable.
	% of new homes developed to Ecohomes good or excellent standard.						SCDC Community Strategy Milestone Monitoring framework needs to be developed

Objective	Indicator (* key after table)	Current Situation		Trends		Assessment	Data Sources
		South Cams	Comparator	South Cams	Comparator		
CLIMATE CHANGE AND POLLUTION							
Reduce emissions of greenhouse gasses and other pollutants (including air, water, soil, noise, vibration and light)	CO2 emissions per domestic property per year						District monitoring (no direct regional comparator)
	<p>a) Annual average concentration of Nitrogen Dioxide (ug/m3)</p> <p>b) Days when fine particle concentration found to be in bandings 'moderate' or higher (days)</p>	<p>2003</p> <p>a)</p> <p>Bar Hill: 49.7</p> <p>Impington: 52.2</p> <p>Histon (urban background): 19</p> <p>Histon (roadside): 32</p> <p>b)</p> <p>Bar Hill: 40</p> <p>Impington: 72</p>	<p>National Air Quality Objectives</p> <p>a) 40 ug/m3 (To be achieved by end 2005)</p> <p>b) 35 days (to be achieved by end 2004)</p>	<p>a)</p> <p>Bar Hill: 38.2 (2001)</p> <p>Impington: 52.7 (2002)</p> <p>Histon (urban background): 31 (1999)</p> <p>Histon (roadside): 48 (1999)</p> <p>b)</p> <p>Bar Hill: 9 (2001) and 27 (2002)</p> <p>Impington: 22 (2002)</p>	<p>National Air Quality Objectives</p> <p>a) 40 ug/m3 (To be achieved by end 2005)</p> <p>b) 35 days (to be achieved by end 2004)</p>		<p>Air Quality Review and Assessment progress report 2004. Structure Plan monitoring based on district reporting.</p>

	Vehicle flows across urban boundaries	2003 Cambridge 170,036	N/a	2001 Cambridge 172,926	N/a	Rate of traffic going in and out of Cambridge is stable, but still higher than LTP target.	County monitoring (no regional comparator) Local Transport Plan
	% main rivers of good or fair quality (chemical & biological)	2000/02 Chemical 100% 2000 Biological 100%	Cambridgeshire and Peterborough 2000/02 Chemical 90% 2000 Biological 100%	1997/99 Chemical 85%	Cambridgeshire and Peterborough 1997/99 Chemical 75% 1998/2000 Biological 99%	The improving river quality in the District reflects improvements taking place across the county.	Environment Agency Cambridgeshire Structure Plan AMR indicator 16
Minimise waste production and support the recycling of waste products	Household waste collected per person per year (kg)	2003 352	Cambridgeshire 2003/4 498 (Hardcore included)	2002 282	Cambridgeshire (2001-02) 481 (Hardcore included)	The amount of waste produced per person is increasing. This will reduce the impact of increasing recycling and composting rates.	District monitoring (BV84) Waste Data for Cambridgeshire 2001/2002 and 2003/2004 (BV184)
	% household waste collected which is recycled	20.3% recycled (2002-03) 5.3% composted (2002-03) (data excludes hardcore waste)	Cambridgeshire and Peterborough 16.19% recycled (2002-03) 8.48% composted (2002-03)	1999-2000 10.1% recycled 4.8% composted	Cambridgeshire and Peterborough 11.56% recycled (1999-2000) 6.78% composted (1999-2000)	Recycling rates compare favourably with other Districts in Cambridgeshire, although the composting rate is slightly lower. Further work is required to meet the recycling target of 25% by 2005.	Structure Plan AMR Indicator 20 Waste Data for Cambridgeshire Waste Local Plan

Objective	Indicator (* key after table)	Current Situation		Trends		Assessment	Data Sources
		South Cambs	Comparator	South Cambs	Comparator		
Limit or reduce vulnerability to the effects of climate change (including flooding)							Appropriate indicators needs to be developed to monitor the impact of climate change. Possibly use GIS analysis of Environment Agency data to estimate no. of properties within flood risk areas.
HEALTHY COMMUNITIES							
Maintain and enhance human health	Life expectancy at birth (male & female)	2000-2002 Male – 79.0 Female – 83.0	England & Wales 2000-2002 Male – 75.9 Female – 80.6	1999-2001 Male – 79.0 Female – 82.6	England & Wales 1999-2001 Male – 75.6 Female – 80.3	Life expectancies in the District are significantly higher than the national average, and have risen alongside national rates.	Office of National Statistics
	% residents with limiting long-term illness	12.7%	East of England 15.6% England & Wales – 18.23 %	N/a	N/a	The age structure of the population of South Cambs is younger than that of the region overall – so less LLTI is to be expected.	Census of Population

Objective	Indicator (* key after table)	Current Situation		Trends		Assessment	Data Sources
		South Cambs	Comparator	South Cambs	Comparator		
Reduce and prevent crime, and reduce the fear of crime	Number of recorded crimes per 1,000 people	2003/04 57.0	Cambridgeshire 2003/04 93.6	2002/03 59.2	Cambridgeshire 2002/03 90.9	Crime in South Cambridgeshire is significantly lower than the County average, and has decreased while it has actually increased in the County as a whole. This reflects the rural nature of the District.	CCC Research Group; Home Office County Council Research Group mid-2002 population estimates.
	% residents feeling 'safe' or 'fairly safe' after dark	2002/03 70.0%	Cambridgeshire 2002/03 56.0%	N/a	N/a	The % of residents feeling safe after dark compares well to county levels, but indicates that there is still room for improvement.	Quality of life survey – CCC Research Group (no regional comparator) QoL15/LIB002
Improve the quantity and quality of publicly accessible open space	Ha of strategic open space per 1,000 people	4.3 ha/1000 *	Cambridgeshire 5.5 ha/1000 * Cambridgeshire and Peterborough 4.8 ha/1000 *			South Cambridgeshire does not compare favourably to countywide levels. New strategic open spaces are being planned as part of strategic housing developments.	Strategic Open Space study – CCC *All figures are combined 'natural greenspace' and 'parks & gardens' ha/1000 population

	Number of sports pitches available for public use per 1,000 people	2004 1.33				Provision varies greatly across the District, and there are also issues of cross border usage, particularly close to Cambridge. District Audits provide a more detailed comparison of provision compared to need.	District monitoring through recreation audits. Pitches are for Hockey, football, Cricket, Rugby etc (not MUGA). QoL/LIB038 Future monitoring will be dependent on future open space audits.
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INCLUSIVE COMMUNITIES							
Improve the quality, range and accessibility of services and facilities (e.g. health, transport, education, training, leisure opportunities)	% of population in categories 1-3 for access to Primary school, food shop, post office and public transport.	2004 83%	Cambridgeshire 2004 % Of rural areas 81%			Reflects the fact that many small villages in the District have limited services available locally.	County monitoring; Countryside Agency. Structure Plan AMR Indicator 22. Choice of services measured was based on availability within the settlement of four basics - primary school, food shop, post office and public transport. % of population in categories 1-3. No comparator data available, but Structure Plan AMR will provide future monitoring.

Redress inequalities related to age, gender, disability, race, faith, location and income	% residents who feel their local area is harmonious	2002/03 70.0%	Cambridgeshire 2002/03 64.0%	N/a	N/a	District figures compare favourably to the county comparator, but there is still room for improvement.	Quality of life survey - CCC Research Group QoL25/LIB139 Percentage of people surveyed who feel that their local area is a place where people from different backgrounds get on well together
	Index of multiple deprivation	2004 Average IMD score : 6.90	2004 Cambridgeshire average IMD score: 12.34	2000 Average IMD score: 7.33		South Cambridgeshire compares favourably to most regional and county deprivation indicators.	Office of Deputy Prime Minister, Indices of deprivation
Ensure all groups have access to decent, appropriate and affordable housing	House price/earnings ratio	2003 6.6	East of England 2003 6.6	2002 6.1	East of England 2002 5.6	House price to earnings ratio in South Cambs is around the regional figure but both the South Cambs and region ratios are worsening.	Land Registry & New Earnings Survey House prices for January to March average. Earnings data for April.

	% of all dwellings completed that are 'affordable'	2003 19%	Cambridgeshire 2003 12%	Average over period 1999-2003 9.8%	Cambridgeshire and Peterborough Average over period 1999-2003 10%	Rate is low compared to urban districts like Cambridge City, although actual numbers compare favourably with other Districts. Numbers of dwellings provided do not meet needs indicated by housing needs surveys.	District monitoring. Structure Plan AMR Indicator L.
Encourage and enable the active involvement of local people in community activities	% adults who feel they can influence decisions affecting their local area	2002/03 22.0%	Cambridgeshire 2002/03 21.0%	N/a	N/a	Although the rate compares favourably to the county comparator, only 1 in 5 people feel they can influence local decisions.	Quality of life survey - CCC Research Group QoL23/LIB137
	% adults who had given support to others (non-family) in past year	N/a	N/a	N/a	N/a		Quality of life survey - CCC Research Group

ECONOMIC ACTIVITY							
Help people gain access to satisfying work appropriate to their skills, potential and place of residence	Unemployment rate	January 2004 1.0%	Cambridgeshire January 2004 1.7%	January 2003 1.1%	Cambridgeshire January 2003 1.7%	The unemployment rate in the District has remained consistently low.	Nomis / CCC Research Group ONS claimant count unemployment figures with CCC RG economically active denominator Structure Plan AMR Indicator 1
	% residents aged 16-74 in employment working within 5km of home, or at home	2001 37.2%	East of England 2001 46.5%	N/a	N/a	South Cambs has a relatively widespread population and more concentrated workplaces. People are on average travelling further to work than they did in 1991	Census of Population
Support appropriate investment in people, places, communications and other infrastructure	Percentage of 15 year old pupils in schools maintained by the local authority achieving five or more GCSEs at grades A*-C or equivalent	2001 63.1%	Cambridgeshire 2001 53.6%		Cambridgeshire 1998 52.0%		QofL /BV38 (County Council monitoring)

	Infrastructure investment						County Monitoring. Structure Plan APR Indicator M: Investment secured for infrastructure and community facilities, including developer contributions for development that has an impact within the Plan area and the strategic improvements needed in the CSR Currently no data available
Improve the efficiency, competitiveness, vitality and adaptability of the local economy	Annual net increase (or decrease) in VAT registered firms, %	2001/02 0.9%	Cambridgeshire 2001/02 1.2%	2000/01 1.1%	Cambridgeshire 2000/01 1.1%	From being significantly greater than the county rate in 1997/98, the South Cambs rate has steadily fallen and is now below the county rate	NOMIS / CCC Research Group VAT stocks at the end of the year – percentage change from end of year to end of next year

	Economic activity rate	83.7%	East of England 79.3%	N/a	N/a	South Cambs has very high rates of activity. However, as there are no higher education establishments in the district except part of Girton College (a part of Cambridge University), a significant proportion of young people leave home to study at university and so are not counted in either the numerator or denominator – so the rates are likely to be higher than average	Census of Pop / NOMIS / CCC Research Group Expressed as a percentage of the working age population
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APPENDIX 2: POLICY ALTERNATIVE ASSESSMENT

Due to its size this section of the report will be supplied separately

APPENDIX 3: CUMULATIVE, SYNERGISTIC & SECONDARY EFFECTS

Policy	Policy area	1.1 Land	1.2 Energy	1.3 Water	2.1 Designated sites	2.2 Habitats / species	2.3 Access to sites	3.1 Heritage assets	3.2 Character	3.3 Good spaces	4.1 Emissions	4.2 Waste & recycling	4.3 Climate change	5.1 Human health	5.2 Crime	5.3 Open space	6.1 Services / facilities	6.2 Inequalities	6.3 Affordable housing	6.4 Involvement	7.1 Access to work	7.2 Infrastructure	7.3 Economy	
Key: +/++ positive (synergistic) impact -/-- negative (cumulative) impact +/- mixed impacts ? - impact uncertain blank – no impact																								
CSF/1	Vision	-	-	-												+								
CSF/2	Development principles	-	-	-		+	++	++	++	++	+/-	?		+		++	+/-		+		?	++		
CSF/3	The site	?																						
CSF/4	Revised Green Belt	++					++	+	++	++			?	++		++								
CSF/5	Landscape, biod'sity, etc.					++	++	+	+	++	+/-			?		++	+							
CSF/6	Trump. West structure		-	-					++	+	++	-					?			?	++	+		
CSF/7	Trump. West housing	?							?	+							++	++	++	?	?			
CSF/8	Employment		-	-							+/-	-									?			
CSF/9	Community services, etc.		-	-								-		?			++	+		++		++		
CSF/10	Road infrastructure		?									?		?			+					+		
CSF/11	Alternative modes		++								++			+		+	++	?			+/-	++	?	
CSF/12	Landscape principles					++	+	?	++	++						++								
CSF/13	Landscaping in Tr. West					+	++		+/-	+				+		++	+							
CSF/14	Links to surroundings					+	++		?					++			+							
CSF/15	Enhancing biodiversity				+	++					+													
CSF/16	Archaeology							++																
CSF/17	Public open space									+				++	+	++	+			+		+		
CSF/18	Countryside recreation						++									?								
CSF/19	Land drainage, etc.			++	+				+		++	++	++			?							++	

Policy	Policy area	1.1 Land	1.2 Energy	1.3 Water	2.1 Designated sites	2.2 Habitats / species	2.3 Access to sites	3.1 Heritage assets	3.2 Character	3.3 Good spaces	4.1 Emissions	4.2 Waste & recycling	4.3 Climate change	5.1 Human health	5.2 Crime	5.3 Open space	6.1 Services / facilities	6.2 Inequalities	6.3 Affordable housing	6.4 Involvement	7.1 Access to work	7.2 Infrastructure	7.3 Economy	
Key: +/++ positive (synergistic) impact		-/- negative (cumulative) impact										+/- mixed impacts		? - impact uncertain		blank – no impact								
CSF/20	Telecoms infrastructure							?										?		+	?		?	
CSF/21	Sustainability exemplars		++	++							+		?											
CSF/22	Construction strategy		?	-							+/ +	+/-		+/-										+
CSF/23	Countryside enhancem't					++			+	+						+		+						
CSF/24	Using existing resources		++					?																
CSF/25	Mgmt of services, etc.																			+				
CSF/26	Timing & service provision										+												++	

Summary comments on synergistic and cumulative impacts

The relatively small size of the two areas covered by the AAP limit the scope for potentially significant impacts of each type. As with other assessments, several policies may benefit a particular objective without necessarily producing, for example, synergistic (positive cumulative) effects. Where possible the assessment takes account of the potential cumulative impact of the District's policies alongside the development occurring within the City boundary, though in some cases the lack of detail in the AAP means this is speculative. Any uncertainty as a result is indicated as appropriate.

Objective	Overall rating	Commentary
1.1 Land	(none)	No cumulative or other type of impact identified.
1.2 Energy and natural resources	-	Development will contribute incrementally to the demands on energy, water, waste and sewage treatment. Full development (Trumpington West and that within the City boundary) is about 10% of the size of the full extent of Cambridge East, and 15% of the size of Northstowe. As the policy suggests the phasing of development, new housing and other land uses demanding extra resources would be added in small increments and this may enable easier adjustment of supply than if the whole development is completed rapidly. However the impact of this change will be offset by policies to reduce fuel consumption through sustainable transport, water conservation, etc.
1.3 Water resources	-	Same qualified comments as for 1.2.
2.1 Wildlife designations	(none)	No cumulative or other type of impact identified.
2.2 Habitats & species	(none)	No cumulative or other type of impact identified. Many policies benefit this objective but many of them overlap, defining the same landscape treatments. Moreover the impact of the AAP is limited by the small scale of the development.
2.3 Access to wildlife sites	?	It is not clear that there is a synergistic impact. Policies such as CSF/23 aim to create limited synergies by providing countryside recreation facilities that combine individual design elements (cycle paths; country park; improved access from urban edge to the countryside) but this is not strictly a synergistic impact of the type sought by this stage of the assessment process.
3.1 Heritage assets	+?	The AAP includes edge treatments along the Cam and for the area south of Addenbrookes which protect the setting of key local heritage assets such as Byron's Pool and the Gog Magog Downs, however these are primarily mitigation measures for the impact of the proposed developments.

Objective	Overall rating	Commentary
3.2 Maintain character	(none)	No cumulative or other type of impact identified. Certain policies introduce design components (open water in green fingers; four storey structures on one side of the development) which are not necessarily consistent with local conditions but these are very limited in their extent and cannot really be assessed as a cumulative impact.
3.3 Spaces that work well	+	Again it is difficult to qualify this issue, but the policies collectively improve the setting of this part of Cambridge, enhancing the existing landscape assets (eg. south towards Gog Magog Downs) and supplementing it with new public rights of way and means of accessing the adjacent countryside. This objective is calibrated in terms of residents' satisfaction with their surroundings and, in principle, we would expect these improvements to benefit not only residents of the new development but also a wider community within Trumpington and from elsewhere in Cambridge and its surroundings.
4.1 Emissions	-	There is a potential cumulative impact of commuting traffic from the new development either side of the A10 however this should be caught at an early stage and directed onto more sustainable modes as soon as the developments are occupied (recognising that the park & ride facility exists now and the little on-site employment will be provided). There are short-term temporary impacts of construction traffic and the policy text anticipates that the construction strategy will detail how the developer will limit its impact on both the A10 Hauxton Road and A1301 Shelford Road. At present the AAP does not clarify the timescales for development of Trumpington West and the development on the opposite side of the A10. Moreover there is the prospect of further disruption over a wider area in this part of Cambridge resulting from construction of the new access road to the Addenbrookes complex, and the enlargement of the complex itself. This suggests that the Council should expect the construction strategies for the developments to be integrated. Since they may be the responsibility of different developers, the District and City councils may need to take the initiative in coordinating the strategies. Other potential temporary impacts arise from construction effects, particularly on air and water quality, and the need to protect the Hobson's Brook/Nine Wells area south of Addenbrookes, and the Cam itself.
4.2 Waste & recycling	-	Same qualified comments as for 1.2.
4.3 Climate change	?	Contributes incrementally to the introduction of conservation/energy efficient technology in new development across the District, although the small scale limits its contribution, moreover the key issue is improving performance of the existing housing stock.
5.1 Human health	?	Again there is the prospect of incremental contribution by improving the extent and accessibility of facilities and by integrating open space in the urban edge and beyond it. Any impact depends on usage levels over which the Council has limited control. One potential small cumulative benefit is if open space provision locally improves on what is currently available to Trumpington residents.
5.2 Crime	(none)	No cumulative or other type of impact identified.

Objective	Overall rating	Commentary
5.3 Public open space	++?	Substantial improvement in area of accessible space and in its quality, but again it is difficult to see this as a cumulative impact.
6.1 Access to services, etc.	-	There is a potential secondary impact of the improvement of facilities at Trumpington on adjacent centres. Trumpington village centre lies within the City boundary and is therefore a suburban centre competing (if possible) with central Cambridge and otherwise with Cherry Hinton. However its location suggests an enhanced Trumpington Centre as stated in policy CSF/2 might affect the viability of Great Shelford and Stapleford as Rural Centres (see Core Strategy policy ST/3). This situation suggests a retail impact assessment of the impact of enhancing Trumpington would be needed. We assume that coordination of policy on this issue is predicated on the settlement / retail hierarchy defined in the Cambridgeshire Structure Plan.
6.2 Reduce inequalities	(none)	No cumulative or other type of impact identified.
6.3 Access to housing	+	Incremental contribution to the needs of the District and wider sub-region for rebalancing of housing supply and demand.
6.4 Active involvement	(none)	No cumulative or other type of impact identified.
7.1 Work, skills, potential	(none)	No cumulative or other type of impact identified as there is limited new employment provision on the development.
7.2 Investing in people, etc.	(none)	No cumulative or other type of impact identified.
7.3 Economic vitality	(none)	No cumulative or other type of impact identified.

APPENDIX 4: SIGNIFICANT IMPACTS MATRIX

The symbols below are used to indicate the nature of relative significance of impacts:

√	Policy has a significant medium / long-term benefit on the objective
√	Policy may have a potentially significant benefit in the longer term
	Policy has minor impacts which are not significant, or has a neutral effect
x	Policy may have a potentially significant adverse impact in the longer term
X	Policy has a significant medium / long-term adverse impact on the objective

Your attention is drawn to the discussion in section 3.1 of this report which defines the nature of 'significant impacts' in the context of this assessment.

Policy	Policy area	1.1 Land	1.2 Energy	1.3 Water	2.1 Wildlife sites	2.2 Habitats / species	2.3 Access to sites	3.1 Heritage assets	3.2 Character	3.3 Good spaces	4.1 Emissions	4.2 Waste & recycle	4.3 Climate change	5.1 Human health	5.2 Crime	5.3 Open space	6.1 Services / facilities	6.2 Inequalities	6.3 Affordable housing	6.4 Involvement	7.1 Access to work	7.2 Infrastructure	7.3 Economy
CSF/1	Vision						√									√							
CSF/2	Development principles		x	x			√	√	√	√		x		√		√						√	
CSF/3	The site																						
CSF/4	Revised Green Belt	√					√		√	√				√									
CSF/5	Landscape, biod'sity, etc.				√	√			√	√				√		√	√						
CSF/6	Trump. West structure								√		√										√		
CSF/7	Trump. West housing																√	√	√				
CSF/8	Employment																				√		
CSF/9	Community services, etc.																√	√		√		√	
CSF/10	Road infrastructure																						
CSF/11	Alternative modes		√								√					√	√					√	
CSF/12	Landscape principles				√	√			√	√						√							
CSF/13	Landscaping in Tr. West					√										√							
CSF/14	Links to surroundings					√								√		√							
CSF/15	Enhancing biodiversity				√																		
CSF/16	Archaeology						√																
CSF/17	Public open space									√				√		√	√			√			
CSF/18	Countryside recreation						√																
CSF/19	Land drainage, etc.			√							√	√	√									√	
CSF/20	Telecoms infrastructure																						
CSF/21	Sustainability exemplars																						
CSF/22	Construction strategy										√			√									

Policy	Policy area	1.1 Land	1.2 Energy	1.3 Water	2.1 Wildlife sites	2.2 Habitats / species	2.3 Access to sites	3.1 Heritage assets	3.2 Character	3.3 Good spaces	4.1 Emissions	4.2 Waste & recycle	4.3 Climate change	5.1 Human health	5.2 Crime	5.3 Open space	6.1 Services / facilities	6.2 Inequalities	6.3 Affordable housing	6.4 Involvement	7.1 Access to work	7.2 Infrastructure	7.3 Economy		
CSF/23	Countryside enhancem't					√			√	√						√		√							
CSF/24	Using existing resources		√									√													
CSF/25	Mgmt of services, etc.																			√					
CSF/26	Timing & service provision										√												√		

APPENDIX 5: MITIGATION PROPOSALS

Policy / policies	Proposed mitigation	Delivery mechanism (proposed or known)
CSF/1	Clarify the amount of greenfield land (this is agricultural land adjacent to the built area of the Monsanto site) which will be required for the development	Minor policy text clarification
CSF/2	Consider whether to merge CSF/1 and CSF/2	Text adjustment entirely at the Council's discretion
CSF/3	As for CSF/1	As for CSF/1
CSF/4	None	
CSF/5	None	
CSF/6	Clarify the need for District and City councils to collaborate in determining what additional facilities are required as a result of growth either side of the A10	Policy text clarification
CSF/7	None	
CSF/8	None	
CSF/9	Clarify what arrangements will be available to allow Trumpington West residents to reach services in Trumpington centre and on the opposite (east) side of the A10 – and possibly vice versa for residents of new housing within the city boundary who may want to access facilities in Trumpington West	Policy text clarification
CSF/10	None	
CSF/11	Also require employers occupying units in Trumpington West to submit a green travel plan (possibly depending in size of unit)	Minor policy text clarification
CSF/12	None	
CSF/13	None	
CSF/14	Possibly propose that the cycle/footpath forms part of a circular walking route through the country park and landscaped area, as suggested for the linked green areas at Northstowe	Minor policy text clarification
CSF/15	None	
CSF/16	None	

Policy / policies	Proposed mitigation	Delivery mechanism (proposed or known)
CSF/17	Consider making more specific the need for facilities for youths to address the fear of crime issue indirectly. The City open space standards do state requirements for this	Minor policy text revision
CSF/18	None	
CSF/19	None	
CSF/20	None	
CSF/21	None	
CSF/22	None	
CSF/23	None	
CSF/24	None	
CSF/25	None	
CSF/26	Consider repositioning the statement that the development will fund all associated infrastructure in policy CSF/2 as appears a fundamental issue of sustainability.	Policy text adjustment

APPENDIX 6: OUTLINE MONITORING PLAN

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
Loss of undeveloped land							
Brownfield land stock	Not known	Important local context indicator	Urban capacity studies / GIS?	Not known	Dynamic, depends on consumption of existing stock and future needs ⁹	Periodic survey of available land for redevelopment	SCDC, through future capacity studies?
Housing completed on brownfield land in last year	27% (2003)	Important local output indicator	Planning proposals	Council is source so assumed to be good	37% (Structure Plan target). Also 42% - suggests brownfield stock is being used to quickly	Review balance of greenfield and brownfield use	SCDC, adjusted through phasing of housing delivery?
Hectareage of employment land completed on brownfield land in last year	Not specified	Local output indicator	Planning proposals	Council is source so assumed to be good	Dynamic, depends on existing stock and future needs (see above)	As above	SCDC, adjusted through phasing of employment land availability?
Energy consumption							
Gas consumption (KwH) per home per year	15,395KwH (2001/2)	Significant (adverse) impact indicator	Utility companies	Somewhat crude measurement but will indirectly track impact of energy saving initiatives	Any increase (since this suggests adverse trend on a wide scale) ¹⁰	Review design criteria (notably policies NE/1 to NE/3)	SCDC can change energy efficiency targets for new housing but not householders' attitudes
Electricity consumption (KwH) per home per year	No information	Significant (adverse) impact indicator	Utility companies	As above	As above	As above?	As above
% of new homes achieving the EcoHomes 'good' standard	Not yet collected	Important local output indicator	BRE	To be determined	75%?	Enforce standards with revised policy	SCDC

⁹ A possible threshold is if the projected stock of brownfield land is less than that needed to meet projected allocations for housing and employment land for the next five years.

¹⁰ Ideally the data would be available on a parish or settlement basis to identify any particularly poorly-performing areas.

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
Water consumption							
Water consumption per household per year	No information	Significant (adverse) impact indicator	Water companies	Not known	As above	Review design criteria; possibly set targets for installing new technology using policy NE/18	SCDC?
Avoid damage to designated sites							
% of SSSIs in favourable or unfavourable recovering condition	72% (2005)	Local context indicator	English Nature annual / semi-annual surveys	Good	Any reversal in improvement rate shown in recent years (review once achievement is over 90%?)	Council Environmental Officer to discuss appropriate actions with E.N. contacts	English Nature
Maintain / enhance characteristic habitats, etc.							
Achievement of BAP targets for habitats & species	Not yet measured	Local output indicator ¹¹	County Council; English Nature	Not known, and parameters will be difficult to calibrate initially	To be determined	Liaise with RSPB, English Nature and wildlife groups	English Nature, RSPB, other groups
Improve opportunities to enjoy wild places							
% of rights of way open and in good condition ¹²	Not known	Local output indicator	Council's annual survey	Assumed to be acceptable – based on 5% sample	Initially at least 65%, but should be increased over time	Identify priorities for improvement; liaise with Countryside Agency and others	SCDC, Countryside Agency, BTCV and other voluntary groups ?
Levels of usage of rights of way and other sites	Not known	Local output indicator	Possibly through QoL survey or similar	May be patchy and inconsistent	To be determined	Liaise with other agencies to promote facilities	To be determined – possibly SCDC & Countryside Ag'cy

¹¹ Only counts as an output indicator if statistics can measure the impact of LDF policies; otherwise it is a context indicator.

¹² Ideally this parameter should also include Countryside Enhancement Areas (policy NE/11) and possibly sites for remediation in the Green Belt (policy GB/8). Note that DEFRA also publishes a headline sustainability indicator – frequency of visits to the countryside. This is a potentially useful indicator that also tracks transport mode, however it is not clear that it is collected systematically at regional or lower level.

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
Avoid damage to heritage assets							
% of listed buildings at risk	2% (2004)	Local context indicator (proxy for development pressure)	Council's GIS and Devt Control records	Not known	To be determined	Review allocations and development control criteria ?	SCDC
Maintain & enhance townscape & landscape							
% of developments in or within 400m of a conservation area, SMR or similar	Not known	Local context indicator (proxy for development pressure)	English Heritage (Pastscape database)	Good although very fragmented	To be determined	Review allocations and development control criteria	SCDC
Create spaces that look good, etc.							
Satisfaction with quality of the built environment	90% (2002/3)	Local output indicator	QoL Surveys	Generally good but depends on response rates	75% satisfaction 20% concern with deterioration	Review spatial pattern and ideally identify specific problems from responses. Address with design guidance / revision of SPD ?	SCDC and others depending on causes
Reduce emissions & pollutants							
CO ₂ emissions per dwelling / year	Not measured	Significant (adverse) impact indicator	To be developed	Not yet established	To be determined	Review design criteria and amend SPD, Development Brief and other documents	SCDC
Background NO ₂ /NO _x levels	Ca. 50 µg/m ³	Significant (adverse) impact indicator	AQ Monitoring network – needs to be supplemented with more local monitoring	Quality good but compromised by small no. of sites	40 µg/m ³	Consider declaring AQMA. Could be obviated if more detailed local data available	SCDC
Background PM ₁₀ levels	Between 40 and 70 µg/m ³	Significant (adverse) impact indicator	As above – and may need to be monitored on ad hoc basis for large construction sites	As above	40 µg/m ³ to end 2005 then 20 µg/m ³	Depends on source – declare AQMA if problem is widespread or identify local	SCDC

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
						sources	
% of main water courses in good or fair quality	100% (2002)	Local context indicator	EA monitoring	Good	94%	Identify sources and nature of contaminations	SCDC / EA / others
No. substantiated public complaints about odours, noise, light and other problems	Not measured	Local context indicator	Council records?	Not yet established	To be determined	Determine need for new policy / plan guidance or action on case-by-case basis	SCDC / Env. Health / others
Waste arisings							
Household waste collected per household / year	Not measured	Local output indicator	WCA records	Not yet established	To be determined (based on BVPI target)	Consider fiscal & other measures	SCDC / WCA
% household waste from which value is recovered	25.6% (2002/3)	Local output indicator	WCA records	Good	40% (2005)	Improve resident involvement and awareness. Look at new treatment approaches	SCDC / WCA / others
Limit / reduce vulnerability to climate change							
No. of properties at risk from flooding	Not yet calculated	Significant (adverse) impact indicator	GIS-based survey	Should be good	To be determined	Review flood risk prevention measures with Env. Agency	SCDC / Environment Agency
Maintain and enhance human health							
Life expectancy at birth	Male – 79 years; female – 82 years (2002/3)	Local context indicator	Office of National Statistics (census + monitoring)	Good	Any reduction	Alert PCTs and regional health authorities	Health trusts, D of Health, etc.
Exercise levels ¹³	Not yet calculated	Local output indicator	Local surveys	Will depend on sample size and response rates	To be determined	Alert PCTs	Health trusts and SCDC
No. of people commuting on foot or cycle	14% (2003 – East of England only)	Local output indicator	Local surveys, possibly also with data from corp.	Will depend on sample size and response rates	To be determined, though should be at least 30% for	More promotion; review patterns to identify problem	SCDC + County Council transport planning

¹³ Indicator to be determined, though it could be based on the percentage of people involved in sporting activity at least once a week, or the number who walk at least two miles each week for leisure (including dog walking).

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
			travel plans		new development	areas	
Reduce crime and the fear of crime							
Recorded crimes per 1000 people ¹⁴	57 (2003)	Local context indicator	Local research groups	Assumed to be good	Any increase (?)	Liaise with police authority; identify spatial patterns	SCDC & Cambs Police
% of residents feeling safe or fairly safe after dark	70% (2003)	Local context indicator	QoL Survey	Will depend on sample size and response rates	Any reduction	Identify localities where perception is poor	SCDC
Improve quantity / quality of public open space							
Hectareage of strategic open space ¹⁵	4.3 ha. / 1000 people	Local output indicator	Open space surveys	Assumed to be good, though depends on survey frequency	To be determined (not clear what national targets exist at present)	Review allocation; identify scope to expand space and funding sources	SCDC & also Cambs County Council
Improve quality, range and accessibility of services & facilities							
% of population in categories 1-3 for access to a range of basic amenities ¹⁶	83% (2004)	Local output indicator	County monitoring; also data from Countryside Ag'cy; supplemented by council monitoring	Assumed to be good	Any reduction, and any failure to meet spatial targets in AAPs (eg. policies NS/6 & NS/8 in Northstowe AAP)	Review design briefs and housing allocations to prioritise growth at best-served sites	SCDC
Available capacity in local primary and secondary schools	Not identified	Significant (adverse) impact indicator	Local survey / education authority monitoring	Assumed to be good once collected	To be determined based on discussions with ed. authority ¹⁷	Review provision with education authority and impact of any remaining housing	SCDC + Cambs Education Authority

¹⁴ Ideally this indicator should discriminate between types of crime - burglary; thefts of vehicles; thefts from vehicles; sexual offences; crime against the person – consistent with UK sustainable development and ONS indicators.

¹⁵ The scope of this parameter could be expanded to provide detail of different types of open space, and this could subsume information about informal play space, formal recreation / sporting facilities, etc. An alternative indicator would be the % of residents living within 200m of open space, although comparative statistics do not exist currently and the indicator would have to be estimated using the Council's GIS system.

¹⁶ In principle this parameter could be used to assess the viability of housing allocations in smaller communities. Monitoring should also ensure that spatial criteria in the AAPs in particular for locating all dwellings within a given distance of local centres, public transport access, etc. are being achieved.

¹⁷ The 2000 settlement survey reveals that many village colleges had student enrolments well in excess of their nominal capacity, and the threshold should reflect a realistic normal capacity for each type of establishment.

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
Reduce inequalities related to age, gender, etc.							
% of residents who feel their local neighbourhood is harmonious ¹⁸	70% (2002/3)	Local output indicator	QoL survey	Good but depends on sample size / response rates	Any reduction	Review pattern and nature of concerns to identify appropriate responses	SCDC + community groups
Ensure all groups have access to housing							
House price / earnings ratio	6.6 (2003)	Significant (adverse) impact indicator	Land registry; Office of National Statistics	Good	To be determined, but initially set at 5 as indicative of wider national conditions	Review housing allocations and criteria for affordable housing	SCDC
% of homes judged unfit to inhabit or of sub-standard quality	Not identified	Significant (adverse) impact indicator	Housing Needs survey	Good, though survey is periodic	To be determined	Review housing completion rates and affordable housing provision	SCDC
House completions available under 'affordable' funding / tenancy	19% (2003)	Significant (adverse) impact indicator	Planning applications (Dev't Control)	Good	50% (or target in Core Strategy if this changes)	Review housing allocations and criteria for affordable housing	SCDC
Encourage active involvement in community activities							
% of adults who feel they can influence decisions	22% (2002/3)	Local context indicator	QoL survey	Good but depends on sample size / response rates	To be determined	Follow-up survey to determine reasons for feeling lack of influence	SCDC + community groups
Usage levels for community facilities in new development ¹⁹	Not yet measured	Local output indicator	Local survey	May be difficult to measure accurately and consistently	To be determined	Initiatives to encourage more use of facilities	SCDC

¹⁸ Note that the baseline include the index of multiple deprivation. While this might be included in monitoring it is not evident that land use planning policy can substantially affect the parameter, compared to other areas of Council policy on social and welfare provision.

¹⁹ This is a speculative indicator intended to measure whether the design policies for new communities at Northstowe and Cambridge East are successfully encouraging community involvement; it is not proposed as a county-wide measure. However, consideration needs to be given to the feasibility of this measure.

Indicator	Current value	Type	Data source(s)	Data quality	Threshold	Reaction(s)	Responsibility
Help people gain access to satisfying & appropriate work							
Unemployment level	1.0% (2004)	Local output indicator	Office of National Statistics and local sources	Good, though depends on calculation method	+0.5% increase in any 12-month period	Identify spatial and sectoral pattern; review employment land allocations	SCDC ?
% of economically active residents working within 5kms of home	37.2% (2001)	Significant (adverse) impact indicator	Office of National Statistics (needs to be supplemented by more regular local monitoring?)	Good provided it is based on full survey rather than a sample	Reduction below 35%	Review employment land allocations and/or development criteria	SCDC
Support appropriate investment in infrastructure, etc.							
% of pupils achieving 5 or more A* to C GCSE grades	63.1% (2001)	Local context indicator	QoL survey and Education Auth'y monitoring	Good	To be determined (through discussion with education auth'ty)	Liaise with education authority	County / local education authorities and schools / colleges
Level or value of developer contributions in the current year	Not currently measured	Local output indicator	Planning applications	Depends on ease of data collection	To be determined ²⁰	Review policy on contributions and revise SPD as necessary	SCDC
Improve the vitality, etc. of the local economy							
Net annual growth in VAT registered firms	0.9% (2001/2)	Local context indicator	Cambs CC survey	Assumed to be good though may be surveyed infrequently	Shrinkage of >0.1% in the year	Investigate sector and spatial pattern?	SCDC ?
Economic activity rate	83.7% (2001) ²¹	Local context indicator	Office of National Statistics	Good	Change of -2% or more	Review spatial and sectoral pattern	SCDC ?
Sectoral split of employment	Not yet determined	Local output indicator	Local survey?	To be determined	To be determined (threshold needs to reflect shifts in sectoral balances)	Review policy on employment land use allocations	SCDC ?

²⁰ The indicator ideally needs to measure the volume of contributions relative to the area developed, the notional market value of the development or the land it occupies, or some other meaningful comparator, since it is meaningless to set a threshold or target level solely in terms of value of contributions.

²¹ Note that this parameter expresses the % economically active out of the population within the economically active age band (15-75). The figure as a percentage of total population was just over 73% at the time of the last census.

APPENDIX 7: DETAIL OF POST CONSULTATION CHANGES

Change	Summary of implications for SA / SEA	Action for SA / SEA
CAMBRIDGE SOUTHERN FRINGE AAP		
Context		
<u>Delete the 3rd sentence in paragraph 1.13 and replace as follows: "...Whilst under the terms of the new plan making system the LDF must be in general conformity with RSS6, in the circumstances of the Cambridge area it is also appropriate and consistent for the LDF to meet the policy requirements of the Structure Plan, as there is currently no evidence that the draft RSS14 is proposing divergent emerging policies on the development strategy for the sub region relative to those set out in the current RSS and the 2003 Structure Plan.</u>	<u>Procedural clarification of the role of the document.</u>	<u>No change required</u>
Chapter A: Introduction		
<u>Add a new section to Chapter E Delivering The Cambridge Southern Fringe to show the proposed housing trajectory for Southern Fringe which will include annual house building targets and proposed milestones timing of service, facility and infrastructure provision.</u>	<u>Editorial amendment consistent with that made to other LDDs to provide additional information on the scope of the Plan.</u>	<u>No change required</u>
<u>Amend the Proposals Map to clearly indicate the extent of the Southern Fringe AAP, with the inset map boundaries precisely drawn</u>	<u>As above</u>	<u>No change required</u>
Chapter B: Vision & Development Principles		
<u>Include new section in Core Strategy to follow paragraph 1.16 as follows: "RELATIONSHIP WITH OTHER PLANS AND STRATEGIES 1.16A The Council has consulted all key stakeholders at three stages in the preparation of the DPDs and it is for them to advise the Council how their own strategies affect the South Cambs LDF. Where such information has been received, this has been taken into account in preparing the DPDs. Where organisations did not advise the Council of their delivery plans, it will be for</u>	<u>Procedural clarification</u>	<u>No change required</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>Cambridgeshire Horizons, as the delivery vehicle for the Cambridge Sub Region, to draw together the delivery plans for all aspects of the major developments as part of the negotiations on the planning obligations agreements."</u>		
<u>Amend "Wandlebury" to "Wandlebury Country Park" throughout document.</u>	<u>Editorial amendment</u>	<u>No change required</u>
<u>CSF/2 Development & Countryside Principles</u>		
<u>Revise criterion I of CSF/2 to read: "...built to be an exemplar of sustainable living with low carbon and greenhouse GAS emissions and be able to accommodate the impacts of climate change;"</u>	<u>Editorial clarification</u>	<u>No change required</u>
<u>Include new chapter in Part E: "E4 Monitoring Cambridge Southern Fringe" drawn from the separate Monitoring Strategy.</u>	<u>Requires creation of new material consistent with changes to the other LDDs.</u>	<u>No change required</u>
<u>Revised paragraph 1: A Strategic Masterplan and Strategic Design Guide for the Cambridge Southern Fringe as a whole will be submitted to and approved by the Local Planning Authorities prior to the granting of any planning permission to ensure that Trumpington West will develop;</u>	<u>Change appears to remove an important planning document but is balanced by changes to criterion (cc) – see below.</u>	<u>No change required</u>
<u>Amend criterion (f): "With a landscaped setting which respects and reinforces local landscape character including countryside enhancement measures AND WHICH RESPECTS THE UNDERLYING HISTORIC CHARACTER OF THE SITE ESTABLISHED BY REFERENCE TO HISTORIC LANDSCAPE CHARACTER DATABASE AND ARCHAEOLOGICAL EVALUATION;"</u>	<u>Emphasises the requirement for archaeological survey, although this actually reiterates that in CSF/16.</u>	<u>Assessment against objective 3.1 increased to strongly positive ('+++') and appropriate changes made to section 6.2, and Appendices 3 and 4.</u>
<u>Amend criterion g of CSF/2 to read: "These routes will provide for linkages to the wider Strategic Open Space network including Coton Countryside Reserve, Teversham Country Park, Milton Country Park, WIMPOLE HALL and Wicken Fen;"</u>	<u>Addition of a further item to the network of links. Does not affect the overall intention of the policy.</u>	<u>No change required</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>Amend criterion (m): "As a place where people can live a healthy lifestyle, in a AND safe environment and where most of their learning needs are met;"</u>	<u>Change reflects scope of Council's ability to require people to adopt a healthy lifestyle but does not affect the overall, positive assessment.</u>	<u>No change required</u>
<u>Amend criterion (p): Green spaces and water features to contribute to the character of the area, provide a recreational resource and enhance biodiversity AND LANDSCAPE, AND PROVIDE GREEN LINKS TO THE WIDER COUNTRYSIDE;</u>	<u>Clarification of function which was implicit in original policy and supporting text, and also evident in the description of these features in the other AAPs.</u>	<u>No change required</u>
<u>Amend wording of criterion (t) of CSF/2 to read: "...and an improved network connecting it to TRUMPINGTON HIGH STREET, the City, neighbouring villages, the open countryside and the wider network;"</u>	<u>Intention to exploit the site and its proximity to the existing amenities in Trumpington was clear in the original policy and supporting text.</u>	<u>No change required</u>
<u>Amend wording in criterion (x) of CSF/2 to read: "An appropriate level of services and facilities including education, sport, recreation AND HEALTH</u>	<u>Clarification of facilities to be provided.</u>	<u>Change is acknowledged alongside objective 5.1, however this and 7.2 (infrastructure) are already fairly positive and it was not considered necessary to change the scoring.</u>
<u>Amend criterion CSF2 (y): In such a way that the developers provide necessary services, infrastructure and facilities, EITHER DIRECTLY OR VIA FINANCIAL CONTRIBUTIONS, including APPROPRIATE provision for long-term management and maintenance;</u>	<u>Clarifies the mechanisms for seeking contributions and the intention to seeking financial ones also. The second change is assumed to refer to the possible need for external financing where CSF facilities benefit the wider community, as well as the need for an explicit link between contributions and their purpose. These issues are already reflected in the assessment and comments, particularly of objective 7.2.</u>	<u>No change required</u>
<u>CSF2 (bb) In phases to ensure that the necessary services, facilities, landscaping and infrastructure are provided from the start and in step with THE development and the needs of the community;</u>	<u>While this appears a minor change it makes less clear the phasing of provision of these facilities. While the change appears to remove the need for all forms of infrastructure from the outset, it does not make clear the need for some, such as landscaping and screening, and a range of basic facilities.</u>	<u>Comments against objective 7.2 and in the summary have been added to note this issue which appears to be mainly one of clarification rather than a major change in the intent of the policy.</u>

Change	Summary of implications for SA / SEA	Action for SA / SEA
<u>Amend criterion (cc): With minimum the impact of development during construction on both the existing and new communities AND TO THE ENVIRONMENT;</u>	<u>Inferred from the original policy, and others on delivering the development which refer to the need to mitigate construction impacts.</u>	<u>Change noted in the assessment comments but not considered sufficient to warrant adjusting the score.</u>
<u>Add: A STRATEGIC DESIGN GUIDE TO SET OUT THE GENERAL PRINCIPLES FOR GOOD DESIGN OF THE TOWN AS A WHOLE TO BE SUBMITTED TO AND APPROVED BY THE LOCAL PLANNING AUTHORITY PRIOR TO THE GRANTING OF PERMISSION FOR RESERVED MATTERS APPLICATIONS. CSF2 (dd) In accordance with Masterplans, Design Guides and Design Codes WILL BE PREPARED for each phase of development, TO BE submitted to and approved by the Local Planning Authority prior to the granting of any planning permission FOR RESERVED MATTERS APPLICATIONS.</u>	<u>Changes balance the amendment of the first policy paragraph to ensure a key document is still produced.</u>	<u>Re-scored with a more positive performance against objectives 3.2 and 3.3 in the short and medium terms. This did not affect the comments in the main report or scores in the Appendices.</u>
Chapter C: Trumpington West & the Southern Setting of Cambridge		
CSF/3 The Revised Cambridge Green Belt		
<u>Amend criterion 1 of CSF/4 to read: "Ensure that the development at Trumpington and Addenbrooke's Hospital / The Bell School does not detract from the CHARACTER AND setting of Cambridge;"</u>	<u>Already implicit in the policy and text. No effect on the assessment.</u>	<u>No change required</u>
<u>Replace paragraph C2.5 with the following: "The Green Belt boundary at Trumpington West abuts the western and southern built edge of the development. This development edge relates to the contours of the site, existing features associated with the previous use of the site, the enhanced River Cam corridor, the southern gateway to Cambridge and strategic views across the landscape towards Trumpington and Cambridge beyond. It provides a Green Belt boundary and community park that will protect and enhance the quality and purpose of the remaining green</u>	<u>Various textual changes which describe the features which define the extent of the revised Green Belt but which do not appear to change the intention or extent of the policy apart from providing clarification of the features which will be included in the Belt.</u>	<u>Brief review of relevant assessments undertaken it was concluded no changes were appropriate.</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>belt land."</u>		
<u>Chapter D: Trumpington West</u>		
<u>D2 Housing Objectives</u>		
<u>Amend D4/c to read: "To ensure the provision of a WELL INTEGRATED MIX of housing types, TENURES and sizes, including affordable housing, to meet the identified needs of all sectors of the community, including key workers."</u>	<u>Change appears to amplify the intent of the closing words of the existing policy and is considered a clarification only that was assumed in the assessment.</u>	<u>No change required</u>
<u>CSF/7 Trumpington West Housing</u>		
<u>Amend criterion 1 of CSF/7 to read: "Trumpington West will provide an adequate and continuous supply of land for housing for at least 600 dwellings WITHIN SOUTH CAMBRIDGESHIRE."</u>	<u>Clarification reflecting the geographical scope of the Council's powers and which does not affect the build level.</u>	<u>No change required</u>
<u>CSF/9 Community Services, Facilities, etc.</u>		
<u>Amend CSF/9 (2): 'The development at Trumpington West will make a proportional contribution to the provision of the full range of community services and facilities, HEALTH AND SOCIAL CARE FACILITIES, leisure, art and culture identified in the strategy.'</u>	<u>Addresses a point in the original assessment which contributed to an uncertain score ('?'). However an additional point about healthy lifestyles depending on personal choices of residents remains valid.</u>	<u>Scoring against objective 5.1 improved to positive ('+') though this does not affect other comments in the assessment, main report or appendices.</u>
<u>Add to end of para. D4.4: "THE DEVELOPMENT WILL PAY FOR OR CONTRIBUTE TO THE COST OF ALL OF SERVICES OR FACILITIES WHICH WOULD NOT HAVE BEEN NECESSARY BUT FOR THEIR DEVELOPMENT EVEN WHERE THIS WOULD CONFER SOME WIDER BENEFIT ON THE COMMUNITY. ONLY IF EXTRA PROVISION IS MADE BECAUSE IT IS DESIRABLE TO SERVE THE WIDER COMMUNITY WOULD IT BE APPROPRIATE THAT FUNDING FROM OTHER SOURCES WOULD BE REQUIRED."</u>	<u>Statement clarifies intention to seek contributions on the basis of the Council's right to link these to the infrastructure necessitated by the development in its own right. Also makes provision for external funding which we presume will be proportional to the estimated level of benefit to the wider community so as not to provide an undue or unfair burden on the developers.</u>	<u>Comments at left added to those alongside objective 7.2 (infrastructure) but the existing score was considered appropriate and was not changed.</u>

Change	Summary of implications for SA / SEA	Action for SA / SEA
<u>D5 Transport Objectives</u>		
<u>Add new heading and paragraph after paragraph D5.13: Green Travel Plans: Employers in Trumpington West will be required to prepare green travel plans to show how they intend to ensure that travel to work by car by their employees is not encouraged, and travel by other modes is positively promoted.'</u>	<u>Transport Objectives were assessed independently during Regulation 25 assessment. The most relevant component of the preferred policies is in CSF/11, where para. 4 on car pooling refers to the possibility of travel plans. This change strengthens that policy intent and the scoring and comments have been adjusted accordingly.</u>	<u>CSF/11 score against emissions (objective 4.1) and access (6.1) both made more positive (increased from '++' to '+++') in the longer term in both cases), and comments added against these objectives and in the summary. Corresponding changes made to section 6.2 in the main report, and to Appendix 4 scores. However we note that this change refers to "green travel plans" whereas post consultation changes to another AAP removed the reference to "green".</u>
<u>Amend objective D5/c: "To provide a HIGHLY ACCESSIBLE network of SAFE AND CONVENIENT cycleways, segregated from other modes where appropriate and secure cycle parking facilities."</u>	<u>Both requirements implicit in the policy and other text and assumed in the assessment.</u>	<u>No change required</u>
<u>CSF/10 Road Infrastructure</u>		
<u>Replace CSF10 (1) with: Planning permission for development at Trumpington West will not be granted until it has been demonstrated by the applicants that there will be sufficient highway capacity on Hauxton Road to serve all stages of the development such that morning peak traffic queuing between Shelford Road and the M11 would not be materially worse than conditions prevailing at the time of submission of the first planning application;</u>	<u>Appears to make minor change to the conditions that would have to be satisfied (reference to school holiday periods) but does not appear to affect the overall intention of the policy to a significant degree.</u>	<u>No change required</u>
<u>Delete sub heading 'Addenbrooke's Access Road' above CSF/10 (4).</u>	<u>Editorial adjustment</u>	<u>No change required</u>
<u>Amend reference in paragraph D5.1 from 'Medical Research Park' to 'Cambridge Bio-Medical Campus'</u>	<u>As above</u>	<u>No change required</u>
<u>CSF/12 Landscape Principles</u>		
<u>CSF12 (1) A Landscape Strategy for Trumpington West must be submitted and approved prior to the granting of planning permission, OF A LEVEL OF DETAIL</u>	<u>Appears to be a procedural classification only.</u>	<u>No change required</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>APPROPRIATE TO THE TYPE OF APPLICATION. It will be implemented as part of the conditions / planning obligations for the development of the new urban extension. The strategy will:</u>		
<u>Amend CSF12 (2): A Strategy for Construction Spoil will be required which will need to be approved by the Local Planning Authority prior to the granting of any planning permission. The Strategy will ensure CONSTRUCTION SPOIL that spoil is retained on-site MUST BE in a manner appropriate to the local topography and landscape character.</u>	<u>Change replaces a clear requirement with an indication of what the Council would like the developer to provide. However other changes (to policy CSF/22) ensure this issue is a requirement and the change appears to remove a possible additional administrative and procedural requirement replacing it with a policy obligation.</u>	<u>No change required</u>
<u>Amend CSF12 (3): IN ORDER TO ASSIST THE CREATION OF A MATURE LANDSCAPE WITHIN THE TOWN AT AN EARLY STAGE IN THE DEVELOPMENT existing landscape features on the Trumpington West site will be retained WHERE THEY CAN MAKE A SIGNIFICANT CONTRIBUTION TO THE URBAN ENVIRONMENT in order to assist in the creation of a mature landscape within the urban extension at an early stage in its development.</u>	<u>Makes the policy marginally more pragmatic but this is intuitive in the original intention and taken into account in the original assessment.</u>	<u>No change required</u>
<u>Para. D6.1 (add to end) THE LEVEL OF DETAIL REQUIRED IN A LANDSCAPE STRATEGY WILL BE DIFFERENT AT THE OUTLINE AND DETAILED PLANNING APPLICATION STAGES, WITH A STRATEGY AT THE OUTLINE STAGE BEING MORE STRATEGIC IN NATURE.</u>	<u>Content clarification</u>	<u>No change required</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>CSF/13 Landscaping within Trumpington West</u>		
<u>Amend CSF13 (4): "The built environment will be landscaped with high quality design, materials and planting; this will be addressed in the Strategic Design Guide required by the Local Planning Authority which will need to be approved PRIOR TO THE GRANTING OF ANY RESERVED MATTERS APPLICATIONS OR DETAILED PLANNING CONSENTS." prior to the approval of any planning permission.</u>	<u>Considered to be a procedural clarification.</u>	<u>No change required</u>
<u>D7 Biodiversity Objectives</u>		
<u>Amend D7/f: To provide for the MANAGEMENT, maintenance, AND MONITORING of habitats.</u>	<u>Expands nature of what the policy is seeking. This is considered to improve the 'fit' with statements in the policy itself rather than adding something to it.</u>	<u>No change required</u>
<u>CSF/15 Biodiversity</u>		
<u>Add to Policy CSF/15 (4): 'Connections will be provided for Green Fingers within the urban extensions to the surrounding countryside by enhanced landscaping, planting and the creation of wildlife habitats to provide links to larger scale wildlife habitats further afield including Nine Wells, the Magog Down, Wandlebury, the River Cam corridor, Coton Country Park, WIMPOLE HALL, and Wicken Fen.'</u>	<u>Extends the range of facilities but not the intent of the policy (and corresponds to a change made to CSF/2).</u>	<u>No change required</u>
<u>CSF/16 Archaeology at Trumpington West</u>		
<u>Revise Policy CSF/16 to read: "The developers of Trumpington West will be required to undertake a detailed, fully analytical archaeological assessment and evaluation of known and suspected sites or features of archaeological importance, including the Scheduled Ancient Monument between Trumpington West and the river. The results of the comprehensive site survey will inform the design of any development at Trumpington West."</u>	<u>Change appears to be a response to an objection which proposed that assessment should be clearly required in advance of seeking planning permission. Assuming this is correct it adjusts the timing but not the intention of the policy.</u>	<u>No change required</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>CSF/17 Public Open Space and Sports Provision</u>		
<u>Replace paragraph C3.10 with: 'The development will be required to contribute towards provision of Strategic Open Space at a standard of 5.1ha per 1000 people. Strategic Open Space provides more than a local function and spaces are generally larger, more varied, and provide a different visitor experience to village open spaces.'</u>	<u>Change is consistent with S.O.S. standards proposed in other LDDs.</u>	<u>No change required, though the Council should note that the paragraph reference appears to be incorrect.</u>
<u>Amend policy CSF/17 point 1 to read: Provision for outdoor sports facilities, teenagers and children, informal open space and allotments will be made in Cambridge Southern Fringe in accordance with the Open Space and Recreation Standards set out in Appendix 3.</u>	<u>Editorial clarification; text in para. 9.3 signposts the same link. It is assumed the standards themselves are unchanged.</u>	<u>No change required</u>
<u>Amend: CSF17 (2): A Strategy for Formal Sports Provision will be prepared, for the approval of the Local Planning Authority before occupation of the first house at Trumpington West. It will provide a full assessment of the formal indoor and outdoor sports facilities required to meet the needs of the new community. It will include an audit of existing facilities in the Cambridge Sub Region and the impact of the Cambridge Southern Fringe on these facilities.</u>	<u>Response to an objection noting this places an unfair burden on the developer since it requires survey beyond the scope of the development. This appears consistent with other issues relating to planning obligations, etc. The same objection notes that Cambridgeshire Horizons may provide an alternative mechanism and it is assumed that the audit will occur separately.</u>	<u>No change required</u>
<u>Amend CSF17 (3): The requirements of the strategy FOR FORMAL SPORTS PROVISION WHICH ARE DIRECTLY RELATED TO THE NEEDS OF THE FUTURE RESIDENTS OF TRUMPINGTON WEST will be funded MET in full by the development.</u>	<u>Reins in policy within the scope of what the Council is entitled to seek that it necessitated by the development.</u>	<u>No change required</u>
<u>CSF/18 Countryside Recreation</u>		
<u>A strategy will be developed WITH REFERENCE TO THE RIGHTS OF WAY IMPROVEMENT PLAN to link all parts of the Southern Fringe to the wider countryside through an enhanced network of RIGHTS OF WAY INCLUDING</u>	<u>Clear improvement of the policy, the need for which was referred to implicitly in the original assessment.</u>	<u>Score against access to wild places objective (2.3) increased to reasonably positive ('++') and improvement of 3.3 (places that work well). Comments against objective 5.3 (open space) also amended though the</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>footpaths, cyclepaths and bridleways the provision of which will be funded by planning obligations on development at Trumpington West and development within Cambridge City at Glebe Farm, Clay Farm, Showground, Addenbrooke's and The Bell School Site.</u>		<u>change does not address quality or quantity of space. Corresponding changes made to the review of objective 2.3 in section 6.2 of the main report, and to Appendices 3 and 4.</u>
<u>Add before last sentence of para. D9.11: THIS SHOULD BE DEVELOPED HAVING REGARD TO THE RIGHTS OF WAY IMPROVEMENT PLAN (ROWIP). THIS IS A STATUTORY PLAN REQUIRED BY THE COUNTRYSIDE AND RIGHTS OF WAY (CROW) ACT 2000. THE ROWIP WILL SUPPORT IMPROVEMENTS TO THE RIGHTS OF WAY NETWORK OVER THE WHOLE COUNTY, AND IT IS ANTICIPATED THAT THE COUNTY COUNCIL WILL WORK WITH DISTRICTS AND OTHER PARTNERS TO ACHIEVE THIS</u>	<u>Procedural clarification related to the previous amendment.</u>	<u>No change required</u>
<u>Amend wording of paragraph 9.13 to read '...Strategic OPEN SPACE needs of the Cambridge Southern Fringe'.</u>	<u>Editorial clarification</u>	<u>No change required</u>
<u>CSF/18 Countryside Recreation – Appendix 3: Open Space & Recreation Standards</u>		
<u>Add new paragraph to table reiterating policy CSF/18: Development at Trumpington West will provide strategic open space in accordance with the standards set out in the Development Control Policies DPD.</u>	<u>Repeats change already assessed above</u>	
<u>D10 Integrated Water Strategy Objectives</u>		
<u>Add: TO INCORPORATE THE PRINCIPLES OF SUSTAINABLE DRAINAGE SYSTEMS WITHIN THE DEVELOPMENT.</u>	<u>Clause 1 of CSF/19 refers to the need for such a system and this was taken into account in the assessment.</u>	<u>No change required</u>
<u>CS/19 Land Drainage, Water Conservation, etc.</u>		
<u>Add the following to policy CSF/19 at the end of paragraph 1 A STRATEGIC SURFACE WATER DRAINAGE SCHEME WILL BE REQUIRED AT AN EARLY STAGE FOR THE SOUTHERN FRINGE AREA Add to the table</u>	<u>Change consistent with that proposed to the Cambridge East AAP recognising the need for a mechanism to coordinate individual developers' drainage infrastructure. Original scoring of this policy</u>	<u>Scores against objective 4.3 made strongly positive ('+++') in the short and medium term.</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>under para E2.5 at the row on surface water drainage "A STRATEGIC SURFACE WATER DRAINAGE SCHEME WILL BE REQUIRED"</u>	<u>was already strongly positive against objective 4.3 (climate change impacts).</u>	
<u>Amend policy CSF/19(3) & (4) to allow for more than one body to take responsibility for surface water drainage subject to a requirement to integrate management and maintenance regimes with all other relevant bodies as follows: "3. All water bodies and watercourses required to serve the development will be maintained and managed by one or more organisations publicly accountable bodies to ensure a comprehensive and integrated approach to surface water drainage with clearly defined areas of responsibility and funding ensure that: 4. Planning permission will not be granted until the written agreement of the Local Planning Authority has been secured that organisations with sufficient powers, funding, resources, expertise and integrated management have legally committed to maintain and manage the surface water systems for Trumpington West in perpetuity."</u>	<u>Procedural change reflecting possibility that more than one management body will be needed.</u>	<u>No change required</u>
<u>Delete Policy CSF/19 (3.) (d.).</u>	<u>Removes the requirement to improve water quality in the Hobson's Brook and Nine Wells former SSSI. The requirement has been withdrawn as a result of an objection which appears to question whether it is strictly related to the development itself (where development presumably refers to Trumpington West rather than the landscape improvements planned for the area south of Addenbrooke's. This change does appear to remove a rare opportunity for development to improve natural environmental conditions, however the legal prerogative above is recognised.</u>	<u>Assessment of objective 2.1 was only mildly positive and this reflects policy intentions across the whole of CSF. This individual change was not considered sufficient to warrant a change to '?' or even '-' though it is noted in the assessment comments.</u>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>Amend CSF19 (3) h. The managing organisation will be funded in perpetuity at the cost of the development.</u>	<u>Procedural change assumed to reflect the scope of the obligations that the Council can seek.</u>	<u>No change required</u>
<u>Amend criterion 5 of Policy CSF/19: 'All development in Trumpington West will incorporate water conservation measures, including water saving devices, rainwater harvesting and greywater recycling, whilst managing the recycling of water to ensure no adverse impact on the water environment and biodiversity.' Add new sentence to the end of paragraph D10.11 to read: "...THIS IMPORTANT ISSUE SHOULD BE CONSIDERED AS PART OF THE CAMBRIDGE SOUTHERN FRINGE PROPOSALS.</u>	<u>Change is consistent with those in other LDDs and reflects advice from GO-East that the planning system cannot specify target levels of achievement. In the circumstances the amendment to para. 10.11 appears the most the Council can do in the circumstances with this planning instrument.</u>	<u>Scoring against objective 1.3 (water consumption) changed from absolutely positive to conditionally positive. Reason for the change noted in the assessment, its summary, and in the appropriate part of section 6.2 of the main report.</u>
<i>CSF/21 An Exemplar in Sustainability</i>		
<u>Delete paragraphs D10.12 and D10.13.</u>	<u>Removes paragraphs referring to target levels of water consumption and is therefore subsumed by the comments above.</u>	<u>No change required</u>
<u>Add additional bullet to paragraph 10.6: Green roofs where appropriate to the urban design;</u>	<u>Supportive in principle but not considered sufficiently extensive to warrant change to the assessment.</u>	<u>Comments against various objectives reviewed but no change required</u>
<u>Delete paragraph D12.4</u>	<u>Additional editorial change necessitated by removal of the target for water consumption, the effects of which are summarised above.</u>	

Change	Summary of implications for SA / SEA	Action for SA / SEA
Chapter E: Delivering the Cambridge Southern Fringe		
<u>CSF/22 Construction Strategy</u>		
<u>CSF/22 (new first bullet) A COMPREHENSIVE CONSTRUCTION STRATEGY WILL BE REQUIRED FOR ALL PHASES OF DEVELOPMENT.</u>	<u>Strengthens the existing policy by providing a mechanism to coordinate various actions to limit construction impacts.</u>	<u>Performance against objectives 3.2 (character) and 4.1 (emissions) improved, the latter becoming fairly significant. Rational explained in additional comments, and acknowledged in the summary of achievement of objective 4.1 in the main report.</u>
<u>Action Add two new sections to Chapter E. " Delivering Cambridge Southern Fringe" will include matters affecting delivery and a housing trajectory. " Monitoring Cambridge Southern Fringe " will be drawn from the separate Monitoring Strategy and provide a framework to ensure that the implementation and delivery of Southern Fringe is efficiently and effectively carried out.</u>	<u>Additional content requirement (content not specified) which repeats a change to the introduction.</u>	
<u>Amend: CSF22 (1) The location of the site accesses for construction vehicles for Trumpington West will be taken from Hauxton Road outside the existing built-up area of Trumpington and ensure that any haul roads are located, designed and landscaped in such a way as to minimise any noise, smell, dust, visual or other adverse impacts on existing residents and businesses, and the new residents and businesses at Trumpington West. THEY SHOULD ALSO AVOID ADVERSE EFFECTS ON THE ENVIRONMENTAL AMENITIES OF BIODIVERSITY, RIGHTS OF WAY AND GREEN SPACES. Traffic flows will be monitored to ensure that the public has a mechanism to feed back any concerns that arise during development.</u>	<u>Taken into account implicitly in the original assessment, and we would assume these issues would be addressed in practical terms through the Construction Strategy (see above).</u>	<u>No change required (in addition to those mentioned above).</u>

Change	Summary of implications for SA / SEA	Action for SA / SEA
<p><u>Change Paragraph 2 of CSF/22 to read: "Construction haul roads for development at Glebe Farm, Clay Farm, Showground, Addenbrookes the Bells School Site with Cambridge will not be permitted in the countryside within South Cambridgeshire."</u></p>	<p><u>Notwithstanding objections from developers, this change removes the need for landscaping to protect the open land south of Addenbrookes from the effects of construction activities. It is difficult to judge the impact of this change and within the wider area of the CSF it has been assumed that its impact will be negligible, not the least because it is temporary. Moreover it raises the procedural issue of whether, in confining haul roads to the City side of the boundary, the Council can require contractors to implement measures beyond its boundary.</u></p>	<p><u>No change believed to be necessary</u></p>
<p><u>CSF22 (add new section after 3) CONSTRUCTION METHODS DEVELOPMENT AT TRUMPINGTON WEST WILL BE REQUIRED TO RECYCLE CONSTRUCTION WASTE WITHIN THE SITE DURING CONSTRUCTION AND IN THE LONG TERM. EXCEPTIONS WOULD INCLUDE WASTE HAVING POTENTIALLY HAZARDOUS PROPERTIES AND ANY OTHER MATERIALS WHERE OFF-SITE TREATMENT WOULD BE MORE APPROPRIATE. A 'RESOURCE RE-USE AND RECYCLING SCHEME' WILL BE NEEDED TO ADDRESS TREATMENT OF ALL WASTE ARISING DURING THE DEVELOPMENT.</u></p>	<p><u>Makes explicit certain requirements referred to in the supporting text and already taken into account in the earlier assessments.</u></p>	<p><u>No change required</u></p>
<p><u>Amend paragraph 5 of CSF/22 to read: "...The construction spoil strategy will provide for all SUITABLE spoil generated by development at Trumpington West to be accommodated within the development site and in accordance with a landscaping scheme to be approved by the Local Planning Authority..."</u></p>	<p><u>Obvious requirement implicit in the original assessment.</u></p>	<p><u>No change required</u></p>

<u>Change</u>	<u>Summary of implications for SA / SEA</u>	<u>Action for SA / SEA</u>
<u>Amend para. E1.4: Cambridge City Council, in association with the Cambridge Forum for the Construction Industry runs a 'Considerate Contractors Scheme' designed to ensure that construction activities do not make life unpleasant for people who live and work nearby. SOUTH CAMBRIDGESHIRE DISTRICT COUNCIL IS DEVELOPING A SIMILAR SCHEME.</u>	<u>Procedural clarification.</u>	<u>No change required</u>
<u>CSF/24 Making Use of Existing Buildings</u>		
<u>Amend wording of CSF/24 to read: "Redundant buildings together all other redundant structures will be recycled, WHERE APPROPRIATE, within the Cambridge Southern Fringe to provide a local source of hardcore or other building materials."</u>	<u>Editorial clarification</u>	<u>No change required</u>
<u>CSF/25 Management of Services, Facilities, etc.</u>		
<u>Amend: CSF25 (last paragraph) Management strategies will need to demonstrate that it receives the full support of the local communities who must be involved in the development of services, facilities, landscape and infrastructure. THEY MUST ALSO BUILD IN PROVISION FOR ONGOING CONSULTATION WITH THE EMERGING COMMUNITY.</u>	<u>Extends duration and scope of consultation.</u>	<u>Performance against objective 6.4 (community involvement) increased from '+' to '++' and corresponding changes made to the main report (section 6.2) and Appendix 4.</u>
<u>CSF/26 Timing & Order of Service Provision</u>		
<u>Include new chapter "E3: Delivering Cambridge Southern Fringe" to include matters affecting delivery and a housing trajectory. Include new chapter "E4 Monitoring Cambridge Southern Fringe" with indicators drawn from the separate Monitoring Strategy.</u>	<u>Reiterates change already reviewed previously (to Introduction).</u>	