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Gloucestershire Waste Core Strategy

Main Modifications

Sustainability Appraisal Addendum

Prepared by LUC

April 2012

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1 SA of Main Modifications

Background

- 1.1 The Gloucestershire Waste Core Strategy (WCS) was formally published in December 2010. In accordance with legislative requirements, the WCS was supported by a Sustainability Appraisal (SA) Report¹ prepared by LUC.
- 1.2 The purpose of the SA report was to predict the potential sustainability effects of the WCS vision, strategic objectives and core policies using a series of SA objectives such as health and well-being, biodiversity and landscape.
- 1.3 The SA Report showed that whilst the WCS is generally expected to have positive sustainability impacts, some potential negative effects were identified in relation to biodiversity and the potential for areas of habitat within or adjacent to waste sites to be lost as a result of development.

WCS Focused Changes

- 1.4 In response to the publication WCS, a total of 48 individuals and organisations submitted just over 200 separate comments. To address some of these comments, Gloucestershire County Council decided to publish a revised version of the WCS incorporating a number of 'focused changes' with representations on the changes invited over a period of 6 weeks from 27th June to 8th August 2011. The Council also revisited and updated the findings of the original SA report, these were published in the "SA Report Update" (June 2011)². For example this included sub-division of Policy WCS 2 into three discrete policy areas of recycling/composting, AD and bulking/transfer.
- 1.5 This included a table setting out all of the focused changes made to the WCS including the spatial vision, strategic objective and core policies and showed whether the focused changes affect the original SA 'scoring'. The focused changes made to the supporting text of the WCS were also included.

WCS Main Modifications

- 1.6 Following the Examination in Public for the WCS (hearings held in January-February 2012), Gloucestershire County Council has proposed a number of changes to the WCS which result from the Examination process, and need to be made in order for the WCS to be found 'sound' by the Inspector.
- 1.7 These changes have been referred to as "Main Modifications" in line with s20(7C) of the 2004 Act (as amended), and comprise a mixture of amendments to the Vision, Objectives, some Policies and minor changes to the Strategic Site Schedules in Appendix 5. Many of the Main Modifications were already included in the Focused Changes consultation, and assessed in the SA Report Update (June 2011). However, a number of the Main Modifications are new as they have arisen from the debates held during the Examination, and some supersede the earlier Focused Changes.

SA Addendum

- 1.8 The Council considers that the SA findings from the original SA Report (November 2010) and SA Report Update (June 2011) should be revisited to consider whether the Main Modifications to the WCS would have any sustainability implications. LUC has been commissioned to prepare this SA Addendum, which sets out whether the Main Modifications affect the original SA 'scoring'. The

¹ Gloucestershire Waste Core Strategy: Sustainability Appraisal Report, Prepared for Gloucestershire County Council by Land Use Consultants (LUC), November 2010.

² Gloucestershire Waste Core Strategy Focused Changes: Sustainability Appraisal (SA) Report Update, Gloucestershire County Council, June 2011.

same approach that was applied to the Focused Changes has been followed, such that **Table 1** lists the Main Modifications and sets out the impact on the previous SA findings and whether the SA score has changed. **Appendix 1** includes new or revised SA assessments for revised Core Policy WCS4 and the five Strategic Site allocations, as well as new Core Policies WCS6a and 12a.

Summary of findings

Changes to the original SA scores

- 1.9 In general, the Main Modifications to the WCS have not changed the original SA findings significantly. There has been some minor improvements in SA scores relating to SA objectives 8 (protecting biodiversity) and 9 (protecting the landscape) due to the Main Modifications affecting policy WCS4 and the General Development Criteria in Appendix 5 of the WCS. In addition, the strengthening of policy WCS12 through MM20 has slightly improved the original SA scoring for SA objective 8 (protecting biodiversity), as it removes the potential negative aspect by ensuring that there will be an overall net gain for biodiversity. There does however remain a slight element of uncertainty because it could still be possible to permit developments, which have some impact on biodiversity. Core Policy WCS12 originally scored +/+-? and now scores ++?
- 1.10 The only change to a significant effect from the original SA scores, is for **Policy WCS8**, due to the addition of the word 'ecology' under MM15, which strengthens the policy's requirement for the assessment of cumulative impacts to consider ecology, and it is considered that this **would change the score for SA Objective 8 to a significant positive effect** in relation to protecting biodiversity in Gloucestershire.

SA findings for new policies WCS6a Landfill and WCS12a Historic Environment

- 1.11 The new **Policy WCS6a** for dealing with any proposals that come forward for new or extensions to existing landfills **is not likely to have any significant effects**, but could have a minor negative effect on a number of the SA objectives (to do with impacts on amenity, health and wellbeing, biodiversity, landscape, townscape, heritage assets, geodiversity, air, soil, water quality, climate change contributions). However, these effects are uncertain as they will depend on where development proposals are located, and are also considered to be very unlikely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, there are a number of safeguards within the WCS that should ensure that any adverse effects are avoided or mitigated before planning permission is granted for new or extended existing landfills (e.g. policy WCS7, 9-13 and the General Development Criteria in Appendix 1). The new policy on landfill is considered to have a mixed positive and negative effect on SA objectives 12 (protecting geodiversity) and 20 (reducing waste to landfill and promoting the waste hierarchy), and no effect on the remaining SA objectives (2, 4-6, 10, 21 plus original SA objectives 1 and 2).
- 1.12 The new **Policy WCS12a** for protecting the historic environment **is likely to have significant positive effects on SA objectives 11** (protecting cultural and heritage assets) **and 13** (protecting townscapes, architectural and archaeological heritage). It is also likely to have minor positive effects on SA objectives 3 (safeguarding amenity of local communities) and 12 (conserving and enhancing geodiversity), but is unlikely to affect any of the other SA objectives. This policy also provides stronger mitigation of potential effects on heritage assets that may occur from development at any of the five Strategic Sites.

Potentially significant sustainability effects of implementing the WCS (with Main Modifications)

- 1.13 Chapter 4 of the November 2010 SA Report summarised the potential significant effects of the WCS. These are listed again below, showing any changes to the list as a result of the Main Modifications in **bold**.

1.14 Most of the SA objectives against which the Waste Core Strategy vision, strategic objectives and policies were appraised are likely to be significantly positively affected by from at least one of the proposals within the WCS. The following **significant positive** effects have been identified:

- Protecting the health and wellbeing of local communities (Strategic Objective 5);
- Maximising the opportunities for education and public participation in waste management (Strategic Objective 1 and WCS1);
- Safeguarding levels of amenity within Gloucestershire (Strategic Objective 5);
- Conserving the quality of the landscape (WCS10, 11 and 13);
- Maximising the opportunities available for screening waste sites and/or incorporating innovative design (WCS13);
- Protecting Gloucestershire's material, cultural and recreational assets (WCS11, **12a** and 13);
- **Protecting and enhancing biodiversity and geodiversity (WCS8 and 12)**
- Protecting townscapes and built heritage assets (WCS**12a** and 13);
- Minimising the risk of flooding (WCS9);
- Preventing pollution (WCS5);
- Conserving water quality (WCS5);
- Reducing the impacts of lorry traffic associated with the transportation of waste (Strategic Objective 5 and WCS4, 14);
- Encouraging the movement of waste up the waste hierarchy (Vision, Strategic Objectives 1 to 3, WCS1, 2, 3, 4, 6);
- Minimising the use of primary materials (Vision, WCS1, 2, 3, 6);
- Adapting to, or mitigating the effects of, climate change (Strategic Objective 5, WCS2, 3, 14); and
- Safeguarding waste sites for waste management facilities (Strategic Objective 5 and WCS8).

1.15 The majority of the significant positive impacts identified are associated with the proposals in the Waste Core Strategy to move waste management practices up the waste hierarchy, minimise the use of primary materials and adapt to and mitigate the effects of climate change.

1.16 **No significant negative** effects were associated with the Vision or any of the WCS Strategic Objectives or Core Policies.

1.17 In general, the five allocated waste sites in policy WCS4 are likely to have the following **significant positive effects**:

- Focusing development in areas at lower risk of flooding;
- Reduction in the loss of good quality soil/land through the use of large previously developed sites;
- Minimising lorry movements, particularly on local roads, and therefore having a further positive impact on air quality;
- Reduced contributions to climate change through reductions in carbon dioxide (CO₂) and methane (CH₄) emissions; and
- Reduced contribution to climate change if energy, including heat, were to be generated from the waste management process and used within nearby development as waste as a fuel can act as a substitute for fossil fuel energy generation.

1.18 No **potentially significant negative** effects were identified in relation to the construction and operation of new waste management facilities on the five allocated sites. However, some minor negative effects were identified.

Monitoring the sustainability effects of the WCS

- 1.19 Section 6 of the WCS sets out how progress with implementing the Spatial Strategy will be measured. It includes a Monitoring Framework, which describes the targets and indicators that will be used to monitor successful implementation of all the Core Policies.
- 1.20 MM25 proposes a number of changes to the original Monitoring Framework in order to reflect government changes such as the removal of national indicators and core output indicators, as well as changes brought about by the amendments to Core Policies set out in the previous Main Modifications (including the four new Core Policies). Some of the changes to the Monitoring Framework for policies WCS3a and WCS13a were previously included within FC13.
- 1.21 The Monitoring Framework in the WCS was not assessed specifically in the original SA. However, it was used to inform the SA Monitoring Framework set out in Chapter 6 of the November 2010 SA Report, as the WCS Monitoring Framework includes targets and indicators that will also be relevant for monitoring the predicted significant sustainability effects of the Waste Core Strategy.
- 1.22 Therefore, the SA Monitoring Framework has been updated to reflect the changes to the WCS Monitoring Framework (and the effects identified for the new policies), and this is presented in **Appendix 2** of this SA Addendum.

LUC

11th April 2012

Table 1: Assessment of the Main Modifications and implications for original SA scoring

Main modification/s Affecting Contextual Information in Sections 2 and 3 (including supporting text for the Spatial Vision and/or Strategic Objectives)	
Main Modification/s:	MM1 (was FC3), MM2, MM3 (includes elements of FC8, FC9)
Impact on SA	Whilst the wording of the spatial vision and strategic objectives were assessed and scored in the SA report, the supporting text contained in Sections 2 and 3 of the publication WCS was not. Focused Changes 1-9 which all relate to the supporting text in Sections 2 and 3 will therefore not impact upon the original SA scores. It should be noted in any case that these focused changes are all minor in nature and are intended either to correct factual errors or to provide improved clarification. They do not introduce new subject material.
Change to SA Score(s)	No Change.
Main modification/s Affecting the Vision	
Main Modification:	MM4 (includes FC10)
Impact on SA	This focused change involves minor alteration to the wording of the vision. The vision now includes reference to the 'zero-growth' aspiration applying to all waste streams. It has also been amended to emphasise that the strategic allocations are intended to deal with both municipal waste and commercial waste. The vision also now more strongly emphasises the importance of providing enough waste management capacity to meet Gloucestershire's needs. Since the Examination, it also now clarifies that 'Waste arisings from outside of Gloucestershire should only be managed within the county where it can be demonstrated to be the most sustainable option'. The most applicable SA Objective is 20, which was originally scored ++ and will not change due to this modification. However, SA Objective 19 (to reduce the adverse impacts of lorry traffic) scored +/-? due to the fact that the vision supports the development of strategic waste sites in the central area of the county (which may reduce lorry transport distances and have a positive impact on air quality) but as it also supports non-strategic sites in more rural areas of the county may mean that in these cases, the opposite impact occurs. While, the addition to the vision by MM4 may result in reduced transport of waste from outside of the county, it is not considered that this score should change.
Change to SA Score(s)	No Change.

Main modification/s Affecting the Strategic Objectives	
Main Modification:	MM5 (includes FC11)
Impact on SA	The Main Modification to Strategic Objective 2 includes the previous Focused Change 11, so that it clarifies the aspiration for 70% recycling/composting is to be achieved by the year 2030, which arose through the Council's review of its residual waste project. Additional changes have arisen through the examination process which identified a need to separate the requirement for recycling/composting to that of recovery. The modifications to the figures in strategic objectives 2 and 3 reflect MM3, and these provide clarification and do not affect the original SA scoring.
Change to SA Score(s)	No Change.
Main modification/s Affecting Core Policy WCS1: Waste Reduction	
Main Modification/s:	MM6 (was FC12)
Impact on SA	MM6 (was FC12) is a minor change to Policy WCS1 which emphasises that in addition to working with the District Councils and other public and private sector organisations, the County Council will also work with local communities in relation to waste reduction and awareness. The most relevant SA objective is Objective 2 which relates to educating the public and maximising community participation. However, this objective has already been given a score of ++ when the policy was originally assessed and cannot be increased further. FC12 does not affect any of the other SA scores either.
Change to SA Score(s)	No Change.

Main modification/s Affecting Core Policy WCS2: Recycling and Composting	
Main Modification/s:	MM7 (was part of FC13)
Impact on SA	<p>In the publication WCS, Core Policy WCS2 addressed three separate issues; recycling and composting, anaerobic digestion and bulking and transfer. A number of respondents argued that the policy was too complex and should be split into separate policies. Therefore, the Focused Changes split WCS2 into three new policies; recycling and composting, anaerobic digestion (AD) and bulking and transfer. In light of this, the SA Report Update (June 2011) presented a revised SA assessment of Policy WCS2, and new SA assessments of the new core policies identified as Policy WCS3a and WCS13a (included in Appendix 1 of the SA Report Update). While some minor amendments were made to the justification in the scoring for Policy WCS2 no amendments were made to the actual scores which remain unchanged.</p> <p>As the changes to Policy WCS2 under MM7 have not changed since the FC13, there is no change in the SA scores.</p>
Change to SA Score(s)	No Change.
Main modification/s Affecting Core Policy WCS3: Inert Waste Recycling and Recovery	
Main Modification/s:	MM8 (was FC14)
Impact on SA	<p>A minor change was made to Policy WCS3 to ensure that development proposals are supported by a Transport Assessment (TA) as well as a Travel Plan. This will help to ensure the transport implications of a proposed development are more fully ascertained with mitigating measures identified and implemented as necessary. The most relevant SA objectives are 19 and 22 which relate to reducing the impacts of lorry traffic and reducing contributions to climate change. These were originally scored + and ++ respectively. Although it is considered that FC14 is likely to help ensure the impacts of lorry traffic are more fully considered and where possible mitigated e.g. through sensitive lorry routing, it is not likely that this will be of great enough magnitude to affect the original SA scoring.</p>
Change to SA Score(s)	No Change.

Main modification/s Affecting New Core Policy WCS3a: Anaerobic Digestion	
Main Modification/s:	MM9 (was part of FC13)
Impact on SA	<p>The Focused Changes to the WCS split WCS2 into three new policies; recycling and composting, anaerobic digestion (AD) and bulking and transfer. In light of this, the SA Report Update (June 2011) presented a revised SA assessment of Policy WCS2, and new SA assessments of the new core policies identified as Policy WCS3a and WCS13a (included in Appendix 1 of the SA Report Update).</p> <p>While there has been a change to new paragraph 4.53b to reflect MM3, MM5 and MM7, MM9 does not propose any changes to Policy WCS3a since the version in FC13, therefore, there is no change in the SA scores presented in the SA Report Update (June 2011).</p>
Change to SA Score(s)	No Change.
Main modification/s Affecting Core Policy WCS4: Recovery	
Main Modification/s:	<p>MM10 (including FC21)</p> <p>The Main Modifications affecting the Strategic Site Schedules in Appendix 5 of the WCS have been addressed under MM26.</p>
Impact on SA	<p>Given the extent of changes to Policy WCS4 proposed in MM10, a revised SA assessment of Policy WCS4 has been presented in Appendix 1 of this SA Addendum.</p> <p>Core Policy WCS4 includes five strategic site allocations. The general development criteria attached at Appendix 5 relate to the strategic allocations and the Main Modifications that have been made to these development criteria need to be considered accordingly. Five focused changes were made to Appendix 5 including the insertion of reference to unstable land, proximity to the rail network, details of local heritage assets, revisions to groundwater information and clarification over the planning permissions in place at Wingmoor Farm (West). None of these changes were considered to affect the original SA scoring either for Policy WCS4 or the individual site allocations as recorded in the SA Report Update (June 2011).</p> <p>However, Core Policy WCS4 has been amended more significantly through MM10, and it now includes a more clear alignment with the Development Criteria in Appendix 5, plus additional safeguards to Green Belt and international nature conservation sites (SACs, SPAs and Ramsar sites). As all waste proposals, not just those on the strategic site allocations will need to comply with the General Development Criteria, the SA scores for the most relevant SA objectives (8 – biodiversity and 0 – landscape) have been changed from having no effect to having a minor positive effect.</p> <p>The addition of the requirement in WCS4 for any proposals for waste recovery to demonstrate that they are principally for Gloucestershire's waste needs, unless a supporting statement can demonstrate that it is the most sustainable option to manage waste arisings from outside the county at that facility strengthens the positive effects already identified for SA objectives 1, 3, 19 and 20. However, it is not considered that this is sufficient to change the original SA scores, as SA objectives 1 and 3 were mixed +/-, and 19 and 20 were already significant positive ++.</p>

Change to SA Score(s)	Original score for SA objectives 8 and 9 changes from no effect (0) to minor positive +.
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Main modification/s Affecting Core Policy WCS5: Waste Water	
Main Modification/s:	MM11 (was FC24) (Policy)
Impact on SA	MM11 (previously FC24) is a minor change to Core Policy WCS5 to insert reference to the Water Framework Directive (WFD). It does not affect the original SA score.
Change to SA Score(s)	No Change.
Main modification/s Affecting New Core Policy WCS6a: Landfill	
Main Modification/s:	MM12 (was FC25) (Supporting text) MM13 (Supporting text – para. 4.129 (deletes FC26), and New Core Policy)
Impact on SA	<p>MM12 was previously consulted upon as FC25, and the text in para. 4.125 has not changed, therefore, there is no change in the SA scores presented in the SA Report Update (June 2011).</p> <p>As MM13 proposes a new Core Policy WCS6a: Landfill, a new SA assessment for this policy has been prepared and is presented in Table A7 in Appendix 1.</p> <p>The SA findings are that this new policy could have a minor negative effect on a number of the SA objectives (to do with impacts on amenity, health and wellbeing, biodiversity, landscape, townscape, heritage assets, geodiversity, air, soil, water quality, climate change contributions). However, these effects are uncertain as they will depend on where development proposals are located, and are also considered to be very unlikely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, there are a number of safeguards within the WCS that should ensure that any adverse effects are avoided or mitigated before planning permission is granted for new or extended existing landfills (e.g. policy WCS7, 9-13 and the General Development Criteria in Appendix 1). The new policy on landfill is considered to have a mixed positive and negative effect on SA objectives 12 (protecting geodiversity) and 20 (reducing waste to landfill and promoting the waste hierarchy), and no effect on the remaining SA objectives (2, 4-6, 10, 21 plus original SA objectives 1 and 2).</p>
Change to SA Score(s)	Not applicable as this is a new SA assessment.
Main modification/s Affecting Core Policy WCS6: Hazardous Waste	
Main Modification/s:	MM14 (was FC27)

Impact on SA	Focused Change 27 introduced an additional criteria to Core Policy WCS6 which seeks to ensure that any hazardous waste proposal should seek to manage the hazardous waste as high up the waste hierarchy as possible and as close to source as possible. MM14 retains this change, therefore the findings of the SA Report Update (June 2011) remain: the focused change is most relevant to SA Objectives 1, 19, 20, 21 and 22. Although there has been an overall improvement to the policy, the focused change is not considered great enough to have affected the original SA scoring for these objectives.
Change to SA Score(s)	No Change.

Main modification/s Affecting Core Policy WCS7: Cumulative Impacts	
Main Modification/s:	MM15 (includes FC28)
Impact on SA	MM15 incorporates all the changes made in FC28 to Policy WCS7, and adds the word 'ecology' within the body of the policy and related wording at the end of paragraph 4.183 to reiterate that the cumulative impact of development is taken into account in the context of the Conservation of Habitats and Species Regulations 2010. The SA Report Update (June 2011) found that FC28 improved the policy but did not affect the original SA scoring. The addition of the word 'ecology', and the related additional supporting text also proposed under MM15, is most relevant to SA Objective 8 (to protect, conserve and enhance biodiversity in Gloucestershire), which was originally scored + in the November 2010 SA Report. The addition of the word 'ecology' strengthens the policy's requirement for the assessment of cumulative impacts to consider ecology, and it is considered that this would change the score for SA Objective 8 to a significant positive effect in relation to protecting biodiversity in Gloucestershire.
Change to SA Score(s)	Original score for SA objective 8 changes from minor positive + to significant positive ++.
Main modification/s Affecting Core Policy WCS8: Safeguarding Sites for Waste Management	
Main Modification/s:	MM16 (replaces FC29 which is no longer considered appropriate)
Impact on SA	Core Policy WCS8 sets out the Council's approach in relation to the safeguarding of sites for waste management purposes. In response to discussions at the Examination, changes have been made to the supporting text at paragraph 4.193 to explain how Policy WCS8 will be implemented. Such is the minor nature of the change to Policy WCS8 it is considered to have no impact on the original SA scoring.
Change to SA Score(s)	No Change.
Main modification/s Affecting Core Policy WCS9: Flood Risk	
Main Modification/s:	MM17 (was FC30)
Impact on SA	Core Policy WCS9 relates to flood risk and sets out the Council's approach towards development within or affecting a flood risk area. MM17 has not proposed anything different to Focused Change 30, therefore the findings of the SA Report Update (June 2011) remain: the most relevant SA objective is 14 which seeks to prevent flooding and was originally scored ++. It is not considered that the focused change affects the original SA scoring for this objective.
Change to SA Score(s)	No Change.

Main modification/s Affecting Core Policy WCS10: Green Belt	
Main Modification/s:	MM18 (include FC31)
Impact on SA	Core Policy WCS10 sets out the Council's approach towards development in the Green Belt. MM18 proposes additions to the policy text to strengthen the protection of the Green Belt in line with national policy. This change will continue to have positive effects in relation to the same SA objectives identified in the November 2010 SA Report, it is unlikely to change any of the minor effects identified to significant, nor can it change the score for the most relevant objective (SA Objective 9 – to protect, conserve and enhance landscape in Gloucestershire), as it was already scored as significant positive (++).
Change to SA Score(s)	No Change.
Main modification/s Affecting Revised Core Policy WCS11: Landscape	
Main Modification/s:	MM19 (supersedes FC32)
Impact on SA	Core Policy WCS11 has been revised to cover the importance of local landscape character as well as the nationally designated Areas of Outstanding Natural Beauty (AONBs) within the County. This change will continue to have positive effects in relation to the same SA objectives identified in the November 2010 SA Report, and has been strengthened and improved in terms of the most relevant objective (SA Objective 9 – to protect, conserve and enhance landscape in Gloucestershire), as it now ensures that local landscape character and sensitivity will be taken into account if waste development proposals come forward outside of the strategic site allocations. However, it is unlikely to change any of the minor effects identified to significant (on amenity, health and wellbeing), nor can it change the score for SA Objective 8, as it was already scored as significant positive (++).
Change to SA Score(s)	No Change.

Main modification/s Affecting Core Policy WCS12: Nature Conservation (Biodiversity and Geodiversity)	
Main Modification/s:	MM20 (includes FC34)
Impact on SA	<p>MM20 (almost the same as FC34) is a change to Core Policy WCS12 to strengthen the policy. The revised policy now requires all development proposals to assess their impact on the natural environment and to make a contribution to local nature conservation targets to ensure net gain for biodiversity. Furthermore development must be able to be mitigated and be of benefit that outweighs any potential impact.</p> <p>The most relevant SA objectives to FC34 are Objectives 8, 10, 12, 16 and 22. The strengthening of the policy through FC34 is considered to slightly improve the original SA scoring Objective 8, which relates to the protection, conservation and enhancement of biodiversity. Core Policy WCS12 originally scored + +/-?</p> <p>It is considered that MM20 removes the potential negative aspect by ensuring that there will be an overall net gain for biodiversity. There does however remain a slight element of uncertainty because it could still be possible to permit developments, which have some impact on biodiversity.</p>
Change to SA Score(s)	The score for SA objective 8 is changed from + +/-? to + +?
Main modification/s Affecting New Core Policy WCS12a: Historic Environment	
Main Modification/s:	MM21
Impact on SA	<p>As MM21 proposes a new Core Policy WCS12a: Historic Environment, a new SA assessment for this policy has been prepared and is presented in Table A8 in Appendix 1.</p> <p>The SA findings are that this new policy seeking to ensure that there is an adequate policy framework in place to cover the historic environment is likely to have significant positive effects on SA objectives 11 (protecting cultural and heritage assets) and 13 (protecting townscapes, architectural and archaeological heritage). It is also likely to have minor positive effects on SA objectives 3 (safeguarding amenity of local communities) and 12 (conserving and enhancing geodiversity), but is unlikely to affect any of the other SA objectives. This policy also provides stronger mitigation of potential effects on heritage assets that may occur from development at any of the five Strategic Sites.</p>
Change to SA Score(s)	Not applicable as this is a new SA assessment.

Main modification/s Affecting New Core Policy WCS13a: Bulking and Transfer	
Main Modification/s:	MM22 (was part of FC13)
Impact on SA	<p>The Focused Changes to the WCS split WCS2 into three new policies; recycling and composting, anaerobic digestion (AD) and bulking and transfer. In light of this, the SA Report Update (June 2011) presented a revised SA assessment of Policy WCS2, and new SA assessments of the new core policies identified as Policy WCS3a and WCS13a (included in Appendix 1 of the SA Report Update).</p> <p>MM22 does not propose any changes to the supporting text and new Core Policy WCS13a since those proposed in the Focused Changes, therefore, there is no change in the SA scores presented in the SA Report Update (June 2011).</p>
Change to SA Score(s)	No change from the SA Report Update (June 2011).
Main modification/s Affecting Core Policy WCS14: Sustainable Transport	
Main Modification/s:	MM23 (was FC37)
Impact on SA	<p>Core Policy WCS14 relates to sustainable transport and MM23 (which was FC37) is a minor amendment to Core Policy WCS14 to state that in determining whether a Transport Assessment (TA) will be required, regard will be had to the location of the proposed development as well as Department of Transport thresholds. MM23 has not proposed anything different to Focused Change 37, therefore the findings of the SA Report Update (June 2011) remain: it is not considered that the focused change affects the original SA scoring for this objective.</p>
Change to SA Score(s)	No change.

Main modification/s Affecting Section 5: Implementing the Strategy	
Main Modification/s:	MM24 (includes part of FC13)
Impact on SA	<p>Section 5 of the WCS sets out how and when the Spatial Strategy will be delivered and the main agencies and partners that will help to deliver it. It includes an Implementation Framework, which describes the delivery mechanisms, agents, funding and timescales for each of the Core Policies, and includes an outline of the potential constraints to delivery of the policy and measures for how those constraints might be mitigated or overcome.</p> <p>MM24 does not propose any changes to the original Implementation Framework, but proposes new delivery implementation information for the four new Core Policies: WCS3a Anaerobic Digestion; WCS6a Landfill; WCS12a Historic Environment; and WCS13a Bulking and Transfer. The Implementation Framework for policies WCS3a and WCS13a was previously included within FC13.</p> <p>The Implementation Framework in the WCS was not assessed specifically in the original SA, because the information it provides about delivery mechanisms, timescales etc. are unlikely to have any direct effect on the SA objectives. Therefore, there are no original scores that need to be re-assessed for MM24.</p>
Change to SA Score(s)	No change.
Main modification/s Affecting Section 6: Measuring Progress	
Main Modification/s:	MM25 (includes part of FC13)
Impact on SA	<p>Section 6 of the WCS sets out how progress with implementing the Spatial Strategy will be measured. It includes a Monitoring Framework, which describes the targets and indicators that will be used to monitor successful implementation of all the Core Policies.</p> <p>MM25 proposes a number of changes to the original Monitoring Framework in order to reflect government changes such as the removal of national indicators and core output indicators, as well as changes brought about by the amendments to Core Policies set out in the previous Main Modifications (including the four new Core Policies). Some of the changes to the Monitoring Framework for policies WCS3a and WCS13a were previously included within FC13.</p> <p>The Monitoring Framework in the WCS was not assessed specifically in the original SA. However, it was used to inform the SA Monitoring Framework set out in Chapter 6 of the November 2010 SA Report, as the WCS Monitoring Framework includes targets and indicators that will also be relevant for monitoring the predicted significant sustainability effects of the Waste Core Strategy.</p> <p>Therefore, the SA Monitoring Framework has been updated to reflect the changes to the WCS Monitoring Framework (and the effects identified for the new policies), and this is presented in Appendix 2.</p>
Change to SA Score(s)	No change.

Main modification/s Affecting Appendix 5: Strategic Site Schedules (and Development Criteria)	
Main Modification/s:	<p>MM26, MM27, MM28, MM29 (was FC39), MM30, MM31, MM32 (was FC40) (General Development Criteria)</p> <p>MM28 (includes FC41) (individual changes to Local Heritage sections within the five Strategic Site Schedules)</p> <p>MM29 (individual change to Contaminated Land section within The Park Strategic Site Schedule)</p> <p>MM30 (individual changes to Ecology/HRA Environmental Considerations and Key Development Criteria within the five Strategic Site Schedules)</p> <p>MM31 (individual changes to Landscape/Visual Impact Environmental Considerations within the five Strategic Site Schedules)</p> <p>MM33 (removes Suitable Uses section from the five Strategic Site Schedules)</p> <p>MM34 (was FC42) (individual changes to Flood Risk/Water Protection Environmental Considerations within the five Strategic Site Schedules)</p> <p>MM35 (individual changes to Green Belt Key Development Criteria for Wingmoor Farm East, Wingmoor Farm West and The Park Strategic Site Schedules)</p> <p>MM36 (change to Site Description and Planning Status for Wingmoor Farm East)</p> <p>MM37 (splits The Park and Wingmoor Farm West into two separate Site Schedules)</p> <p>MM38 (revised boundary for Javelin Park – Inset Map 3 and consequent changes to information in Site Schedule)</p> <p>MM39 (revised boundary for Moreton Valence – Inset Map 4 and consequent changes to information in Site Schedule)</p>
Impact on SA	<p>Appendix 5 of the WCS includes 'Site Schedules' for each of the Strategic Sites allocated under Core Policy WCS4. The Site Schedules include a summary of the Gloucestershire County Council site assessment for each site, along with Key Development Criteria that will need to be considered for each site when the applicant is preparing a planning application and when the Council is determining that planning application.</p> <p>At the beginning of Appendix 5 is a set of 'General Development Criteria' which will apply to all sites identified within Core Policy WCS4 as well as (now clarified through MM26) to any waste management development proposals of a strategic scale that may come forward on non-allocated sites.</p> <p>The Site Schedules were not assessed specifically in the original SA, but were used to inform the SA matrices for the Strategic Site allocations. These matrices have been updated for this SA Addendum to take into account all of the Main Modifications listed above (where relevant to each site), these are presented in Tables A2-A6 in Appendix 1.</p> <p>The Main Modifications proposed that affect Sites 1 (Wingmoor Farm East), 3 (Javelin Park) and 4 (Land at Moreton Valence) are not significant enough to have changed any of the original SA scores from the November 2010 SA report, although some of the justifications have been amended to reflect the updated information and revised boundaries.</p>

	<p>The Main Modifications that affect Sites 2a (The Park) and 2b (Wingmoor Farm West) are mostly not significant enough to change the original SA scores. The original SA scores were based on both of these two sites comprising separate components of a single site. As they are now separate sites, the score for Site 2a in relation to SA objective 14 (reduce the risk of flooding) has changed from an uncertain minor positive effect +? to a more certain minor positive effect (+), as the water bodies causing the uncertainty are only present on Site 2b (for which the SA score has not changed). In addition, for both sites, the score for SA objective 9 (protecting landscape) has improved from an uncertain minor negative effect to no effect for the large-scale non-thermal facility type, due to the amendments to the site description relating to screening and landscape quality. Similarly, for SA objective 13 (protecting townscapes, archaeological and architectural heritage) the score for both sites has changed from minor positive to uncertain, as the amendments to the Site Schedules state that the archaeological potential of both sites is unknown.</p>
Change to SA Score(s)	<p>Site 2a: SA objective 9 has changed from -? to 0; SA objective 13 has changed from + to ?; SA objective 14 has changed from +? to +</p> <p>Site 2b: SA objective 9 has changed from -? to 0; SA objective 13 has changed from + to ?</p>

Appendix 1 SA Assessment of Revised Core Policy WCS4 and New Core Policies WCS6a and 12a

Revised Core Policy WCS4

Table A1 Revised Core Policy WCS4: Other Recovery (including energy recovery)

(Any changes to the original scores and justification are shown as "tracked changes".)

*Note that the Strategic Site Allocations were appraised separately in Tables 12 to 15 of Appendix 3 of the November 2010 SA Report. Due to the revisions proposed in the Main Modifications to three of the site boundaries, the separate profiles for The Park and Wingmoor Farm West, and the revisions to Environmental Considerations and Key Development Criteria, SA assessment tables for the five Strategic Site Allocations have also been included below this table – **Tables A2-A6**.*

SA Objective	SA Score	Justification
Policy WCS4: Other Recovery (including Energy Recovery)		
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	+/-	The fact that all of the strategic scale waste facilities are to be allocated within the central 'Zone C' should reduce the distances that lorries are required to travel for the transportation of waste, as these larger sites will be located within reasonably close proximity of the main sources of waste arisings within the county, i.e. the main urban centres. <u>In addition, MM10 introduces a requirement for any proposals for waste recovery to demonstrate that they are principally for Gloucestershire's waste needs, unless a supporting statement can demonstrate that it is the most sustainable option to manage waste arisings from outside the county at that facility.</u> As such, the emissions from transport that have an adverse impact on air quality will be reduced, resulting in a positive impact on public health in this sense. However, the fact that the lorries are more likely to be travelling within close proximity of the main population centres means that residents are more likely to experience adverse impacts such as noise pollution which can affect public health. As such, the overall likely effects on this objective are mixed.
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	0	The policy is not considered likely to have a direct impact on education or levels of public participation in waste management.
3. To safeguard the amenity of local	+/-	The fact that all of the strategic scale waste facilities are to be allocated within the central 'Zone C'

SA Objective	SA Score	Justification
Policy WCS4: Other Recovery (including Energy Recovery)		
communities from the adverse impacts of waste development.		should reduce the distances that lorries are required to travel for the transportation of waste, as these larger sites will be located within reasonably close proximity of the main sources of waste arisings within the county, i.e. the main urban centres. <u>In addition, MM10 introduces a requirement for any proposals for waste recovery to demonstrate that they are principally for Gloucestershire's waste needs, unless a supporting statement can demonstrate that it is the most sustainable option to manage waste arisings from outside the county at that facility.</u> As such, the emissions from transport that have an adverse impact on air quality will be reduced, resulting in a positive impact on local amenity in this sense. However, the fact that the lorries are more likely to be travelling within close proximity of the main population centres means that residents are more likely to experience adverse impacts on amenity such as noise pollution. As such, the overall likely effects on this objective are mixed.
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	0	The policy is not considered likely to have a direct impact on sustainable economic development.
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	+	Locating strategic waste management facilities within the central 'Zone C' is expected to have a positive effect on this objective as this will require the majority of waste to be transported smaller distances which will be more economical.
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	+	The allocation of <u>four</u> <u>five</u> strategic scale waste management sites within the central 'Zone C' is expected to have a positive effect in terms of employment creation in easily accessible locations. The number of jobs created is not likely to be significant, however, in the context of overall employment levels within the county.
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	0	The policy is not likely to have a direct impact on aircraft safety; instead this will be determined by the type of facility developed at each site (i.e. whether it includes an emissions stack) and by its precise location. The locations of sites other than the <u>four</u> <u>five</u> strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below.
8. To protect, conserve and enhance biodiversity in Gloucestershire.	+	The policy <u>now includes a specific requirement for all proposals on the five strategic site allocations to be supported by sufficient information for the purposes of an appropriate assessment of the</u>

SA Objective	SA Score	Justification
Policy WCS4: Other Recovery (including Energy Recovery)		
		<p>implications of the proposal alone or in-combination with other plans and projects, for any Special Area of Conservation (SAC), Special Protection Area (SPA) and Ramsar site. This is not likely to have a direct positive impact on biodiversity within these internationally and nationally designated nature conservation areas; instead this will be determined by the precise location of each facility developed. The locations of sites other than the four five strategic allocations will not be known until the planning application stage, however, the clarifications to the General Development Criteria under MM26 and MM30 also ensure that proposals on non-allocated sites will also have to provide sufficient information to enable an appropriate assessment under the Habitats Regulations. and The impacts of each strategic site are appraised separately below.</p>
9. To protect, conserve and enhance the landscape in Gloucestershire.	0 +	<p>The policy <u>now includes a specific reference for any proposals on three of the five strategic site allocations (sites 1, 2a and 2b) to be in accordance with the provisions set out in Core Policy WCS10 Green Belt.</u> This is not likely to have a direct positive impact on landscape within Green Belt areas; instead this will be determined by the precise location of each facility developed. The locations of sites other than the four five strategic allocations will not be known until the planning application stage however, the clarifications to the General Development Criteria under MM26 and MM31 also ensure that proposals on non-allocated sites will have to be supported by a landscape and visual impact assessment. and The impacts of each strategic site are appraised separately below.</p>
10. To ensure that waste sites have the potential for adequate screening and/or innovative design to be incorporated.	0	<p>The policy is not likely to have a direct impact on the potential for waste sites to be well-screened; instead this will be determined by the design and precise location of each facility developed. The locations of sites other than the four five strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below.</p>
11. To protect conserve and enhance Gloucestershire's material, cultural and recreational assets .	0	<p>The policy is not likely to have a direct impact on material, cultural and recreational assets; instead this will be determined by the type and precise location of each facility developed. The locations of sites other than the four five strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below.</p>
12. To protect conserve and enhance geodiversity in Gloucestershire.	0	<p>The policy is not likely to have a direct impact on geodiversity; instead this will be determined by the type and precise location of each facility developed. The locations of sites other than the four five strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below.</p>
13. To protect conserve and enhance	0	<p>The policy is not likely to have a direct impact on townscapes, architectural and archaeological</p>

SA Objective	SA Score	Justification
Policy WCS4: Other Recovery (including Energy Recovery)		
townscapes and Gloucestershire's architectural and archaeological heritage.		heritage; instead this will be determined by the type and precise location of each facility developed. The locations of sites other than the four <ins>five</ins> strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below.
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	0	The policy is not likely to have a direct impact on townscapes, architectural and archaeological heritage; instead this will be determined by the type and precise location of each facility developed. The locations of sites other than the four <ins>five</ins> strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below. In addition, the policy states that non-strategic waste sites will need to meet the relevant policies and criteria set out elsewhere in the Waste Core Strategy, including WCS9: Flood Risk, which should help to ensure that both strategic and non-strategic waste sites do not have a detrimental effect in terms of the risk of flooding in Gloucestershire.
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	0	The policy is not likely to have a direct impact on pollution prevention; instead this will be determined by the type, design and precise location of each facility developed. The locations of sites other than the four <ins>five</ins> strategic allocations will not be known until the planning application stage, and the impacts of each strategic site are appraised separately below.
16. To protect and enhance soil/land quality in Gloucestershire.	+	The policy is likely to have a positive impact on soil/land quality in Gloucestershire as it states that non-strategic waste facilities must be either located on an existing employment site/ <ins>industrial estate</ins> , on previously developed land, or involves the development of an existing waste or minerals site. As such, development on greenfield land which may involve the loss of high quality soil/land should be avoided. The impacts of each strategic site are appraised separately below.
17. To protect and enhance air quality in Gloucestershire.	+	The fact that all of the strategic scale waste facilities are to be allocated within the central 'Zone C' should reduce the distances that lorries are required to travel for the transportation of waste, as these larger sites will be located within reasonably close proximity of the main sources of waste arisings within the county, i.e. the main urban centres. As such, the emissions from transport that have an adverse impact on air quality will be reduced, resulting in a positive impact on this objective.
18. To protect and enhance water quality in Gloucestershire.	0	Potential sites for waste management are expected to have no effect on this objective, as the requirement for future residual waste management within Gloucestershire is likely to be met by modern facilities within enclosed buildings.
19. To reduce the adverse impacts of	++	The fact that all of the strategic scale waste facilities are to be allocated within the central 'Zone C'

SA Objective	SA Score	Justification
Policy WCS4: Other Recovery (including Energy Recovery)		
lorry traffic on the environment and communities through means such as: <ul style="list-style-type: none"> a) reducing the need to travel b) promoting more sustainable means of transport e.g. by rail or water c) sensitive lorry routing d) the use of sustainable alternative fuels e) promoting the management of waste in one of the nearest appropriate installations. 		<p>should reduce the distances that lorries are required to travel for the transportation of waste, as these larger sites will be located within reasonably close proximity of the main sources of waste arisings within the county, i.e. the main urban centres. <u>In addition, MM10 introduces a requirement for any proposals for waste recovery to demonstrate that they are principally for Gloucestershire's waste needs, unless a supporting statement can demonstrate that it is the most sustainable option to manage waste arisings from outside the county at that facility.</u> As such, a significant positive effect on this objective is expected.</p>
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy (i.e. Prevent, Reduce, Reuse, Recycle, Recover, Dispose) to achieve the sustainable management	++	<p>The allocation of strategic sites to make provision for the recovery of <u>up to 170</u>,000 tonnes per year of municipal waste and <u>between 143,000 and 193 up to 73</u>,000 tonnes per year of C&I waste is expected to have a significant positive impact on this objective by enabling the diversion of significant volumes of waste from landfill.</p>
21. To reduce the global use of primary materials and minimise net energy balance requirements.	+	<p>The policy is likely to have a positive impact on reducing the use of primary materials as it states that non-strategic waste facilities must be either located on an existing employment site/<u>industrial estate</u>, on previously developed land, or involves the development of an existing waste or minerals site. As such, development is more likely to incorporate existing buildings and require less primary materials for construction. The impacts of each particular strategic site are appraised separately below.</p>
22. To reduce contributions to and to adapt to Climate Change .	+	<p>The fact that all of the strategic scale waste facilities are to be allocated within the central 'Zone C' should reduce the distances that lorries are required to travel for the transportation of waste, as these larger sites will be located within reasonably close proximity of the main sources of waste arisings within the county, i.e. the main urban centres. <u>In addition, MM10 introduces a requirement for any proposals for waste recovery to demonstrate that they are principally for Gloucestershire's waste needs, unless a supporting statement can demonstrate that it is the most sustainable option to manage waste arisings from outside the county at that facility.</u> As such, the emissions from transport that contribute to climate change will be reduced, resulting in a positive impact on this objective.</p>

SA Objective	SA Score	Justification
Policy WCS4: Other Recovery (including Energy Recovery)		
Original SA Objective 1: To promote sustainable development and sustainable communities in Gloucestershire in particular giving people the opportunity to live in an affordable and sustainably designed and constructed home.	0	The policy is not considered likely to have a direct effect on this objective.
Original SA Objective 2: To safeguard sites suitable for the location of waste management facilities or future mineral development from other proposed development.	0	The policy is not considered likely to have a direct effect on this objective.

Core Policy WCS4 – Strategic Site Allocations

Table A2 Revised SA Assessment for Site 1 – Wingmoor Farm East

(Any changes to the original scores and justification in Table 12 of Appendix 3 in the November 2010 SA Report are shown as "tracked changes".)

Note that the site boundary has not changed, but this revised SA Assessment takes into account the following Main Modifications:

- MM28 (includes FC41) (individual changes to Local Heritage sections within the five Strategic Site Schedules)
- MM30 (individual changes to Ecology/HRA Environmental Considerations and Key Development Criteria within the five Strategic Site Schedules)
- MM31 (individual changes to Landscape/Visual Impact Environmental Considerations within the five Strategic Site Schedules)
- MM33 (removes Suitable Uses section from the five Strategic Site Schedules)
- MM34 (was FC42) (individual changes to Flood Risk/Water Protection Environmental Considerations within the five Strategic Site Schedules)
- MM35 (individual changes to Green Belt Key Development Criteria for Wingmoor Farm East, Wingmoor Farm West and The Park Strategic Site Schedules)
- MM36 (change to Site Description and Planning Status for Wingmoor Farm East)

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	0	0	0	0	There are no sensitive receptors within 250m of the site boundaries, although some are present within 1km. As such, negligible effects on health and wellbeing are expected to result from development of a waste facility at this site, regardless of the size or type.
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	+?	+?	+?	+?	Waste management facilities at any of the strategic sites could have an indirect positive effect on education opportunities, as they may include education centres within the site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	0	0	0	0	There are no sensitive receptors within 250m of the site boundaries, although some are present within 1km. As such, negligible effects on local amenity are expected to result from development of a waste facility at this site, regardless of the size or type.
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	+?	+?	+?	+?	The creation of additional waste management facilities within Gloucestershire in any location may have a minor positive impact on encouraging investment and growth of 'green industry' in the County. This particular site is adjacent to existing landfill activities, meaning that there is potential for positive effects on sustainable local economic activity as complementary activities to waste management may be encouraged, e.g. reprocessing facilities or composting outlets that could make use of recyclate or compost generated. This score is uncertain, however, as it is dependent on the nature of neighbouring industrial/commercial outlets.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	+	+	+	+	At this stage it is difficult to assess how the location of new strategic waste facilities may affect this objective. However it is important to note that certain sites will be more efficient than others (e.g. in terms of the resulting reductions in transport movements & costs), given their proximity to the main sources of waste arisings and to transfer stations and/or any other facilities that may service them. The proximity of this site to Cheltenham, along with the fact that there are already waste facilities located at the site, means that transport distances are likely to be lower, having a positive effect on this objective. It should also be noted that the type of facilities eventually proposed on sites once they have been allocated in the Waste Core Strategy may differ in terms of overall costs but this will not be known until the planning application stage.
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	+/-	+/-	+/-	+/-	In terms of opportunities for future employees to use sustainable transport to travel to work, the GCC Highways Assessment found that pedestrian access from Bishop's Cleeve may need upgrading and that bus frequency is poor, therefore in this sense negative effects on this objective are likely. However, positive effects are associated with the general job creation that will result from development of the site, so the overall effects are likely to be mixed. Although it is likely that larger facilities will result in greater levels of employment generation during both construction and operation, this will not always be the case and therefore significant positive effects for larger facilities cannot be assumed.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	-?	0	-?	0	The site is within the Aerodrome Safeguarding zone for Gloucestershire Airport; therefore thermal treatment facilities, which are likely to include tall emissions stacks, could potentially present a hazard to aircraft if developed on this site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
8. To protect, conserve and enhance biodiversity in Gloucestershire.	-?	-?	-?	-?	<p>A Key Wildlife Site (Wingmoor Farm Meadow GWT Reserve) and a BAP priority habitat (Lowland Meadows) are located adjacent to the site; indicating that there is the potential for a minor negative effect on biodiversity for all of the facility types; however this is dependent on the exact design and layout of the facility eventually developed. In addition, <u>there is the potential for Dixton Wood SAC to be affected. However, the Key Development Criteria now note that with respect to the General Development Criteria for HRA, any appropriate assessment for this site will need to ensure that there will be no significant effect on Dixton Wood SAC either alone or in combination with other plans or projects (MM30).</u> Therefore, it is not considered that the SA score should change, as this potential negative effect is uncertain until a planning application comes forward. the initial findings of the HRA Report indicate that any proposal for a thermal treatment facility here will need to demonstrate that there will be no adverse impact on the integrity of Dixton Wood SAC. However, this is at present uncertain as the judgement is subject to the completion of the full HRA Report and further assessment that may be required at the planning application stage.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
9. To protect, conserve and enhance the landscape in Gloucestershire.	-?	0	-?	0	<p>This site is of poor landscape quality, is more than 1km from the nearest AONB and is adjacent to an existing landfill site; indicating that negligible impacts on the landscape may be expected. However, <u>the site has been assessed as being of medium landscape suitability for a waste facility and the erection of an emissions stack could have an adverse effect on would create a significant vertical landmark out of keeping with</u> the surrounding landscape character. As such, potential negative effects are associated with the development of thermal treatment facilities here, depending on the height of any emissions stack. <u>The General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape. The original SA did not consider impacts in relation to this landscape objective with respect to the Green Belt in the Site Assessments, but MM35 requires that development proposals on this site are in accordance with national Green Belt policy and policy WCS10, helping to strengthen the potential mitigation and avoidance of adverse effects on the landscape.</u></p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
10. To ensure that waste sites have the potential for adequate screening and / or innovative design to be incorporated.	-	-	-	-	The GCC assessment notes that there is limited screening around the site, particularly along the southern boundary, due to the predominantly flat topography of the land. The tall emissions stacks incorporated into the design of thermal treatment facilities could make screening particularly difficult. There are several residential properties overlooking fields adjacent to the site, with glimpses of the existing landfill activities on site; therefore it may be difficult to adequately screen any type of additional facility at this site. <u>However, the General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape.</u>
11. To protect, conserve and enhance Gloucestershire's material, cultural and recreational assets .	+/-	+/-	+/-	+/-	There is a park, a civic amenity site and areas of non-coniferous trees to the west of the site; therefore there is the potential for negative effects on recreation activities in the local area. The GCC assessment, however, scores the site positively (+) in relation PRoW, noting that there is no PRoW network present within 250m, so the overall likely effects are mixed.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
12. To protect conserve and enhance geodiversity in Gloucestershire.	0	0	0	0	The site is within 500m of a RIG (Wingmoor Farm Pit) and so development of any type of waste facility here could potentially have a negative effect on local geodiversity. However, the site is a temporary RIG and the Geological Trust makes it clear that it will eventually be landfilled. As such, the likely effect of development at this site on local geodiversity is classed as negligible.
13. To protect conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	+	+	+	+	Wingmoor Farm East scored positively (+) in the GCC Archaeology site assessment due to the low potential for development to impact upon known historical or archaeological remains. <u>However, the Site Schedule now notes that there are four Grade II Listed buildings within 1km of the site boundary (MM28). According to the SA assumptions used in the November 2010 SA Report (Appendix 2) this would not change the original score. In addition, more protection is now afforded to the historic environment through new policy WCS12a.</u>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	+	+	+	+	The SFRA Level 2 indicates that there are no significant flooding issues on the Wingmoor Farm East site, <u>and the EA identified the site as overlying unproductive strata with the groundwater risks associated with the location as low for the geological setting (MM34)</u> , therefore development here should have a positive effect.
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	N/A	N/A	N/A	N/A	In relation to the location of potential waste sites, potential pollution effects are already covered under SA Objectives 1, 3, 16-18. The precautionary principle is inherently being applied to the site allocation process through the Council's own site assessment methodology and this independent SA of the Waste Core Strategy including the potential strategic waste sites to be allocated.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
16. To protect and enhance soil / land quality in Gloucestershire.	+	+	+	+	This site is located on previously developed land; therefore should have a positive effect on this objective. Medium sized facilities may result in a smaller area of the site being developed, thus having even greater positive effects, although this is uncertain and will depend on the final design of the facility which will not be known until the planning application stage.
17. To protect and enhance air quality in Gloucestershire.	+/-	+	+/-	+	The GCC Highways Assessment found that the site is within reasonable proximity of the strategic highways network via the A435. In addition, it is more than 1km from an AQMA; therefore in this sense development of this site should have positive impacts on the protection of air quality. However, where thermal treatment facilities are proposed there could also be negative impacts on air quality due to the release of gases through thermal processes. This effect would not be significantly negative however, because the overall scale of emissions from thermal treatment facilities is relatively small and also because of the distance of the site from an AQMA.
18. To protect and enhance water quality in Gloucestershire.	0	0	0	0	Potential sites for waste management are expected to have no effect on this objective, as the requirement for future residual waste management within Gloucestershire is likely to be met by modern facilities within enclosed buildings.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
19. To reduce the adverse impacts of lorry traffic on the environment and communities.	+-	+-	+-	+-	The GCC Highways Assessment found that, although the site is adjacent to a mapped freight rail head, at present there are no sidings and thus a new main line connection and loading siding would be required. The cost of installing such a mainline connection is likely to be very high; therefore negative effects in terms of sustainable transport use are likely. However, the GCC Highways Assessment found that the site is within reasonable proximity of the strategic highways network via the A435, therefore mixed effects are likely overall. There may be some level of variation between the effects of medium and larger sites, as larger sites may result in higher levels of waste transportation. However, as this will not always be the case and cannot be assumed, no differences are reflected in the scores.
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy .	+	+	+	+	The Waste Core Strategy is seeking to allocate strategic sites for recovery of residual municipal waste, as well as C&I waste. All facility types that may be developed on these sites are therefore likely to have minor positive effects by ensuring waste management occurs using processes higher up the waste hierarchy than landfill.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 1: Wingmoor Farm East					
21. To reduce the global use of primary materials and minimise net energy balance requirements.	++?	+	++?	+	All facility types that may be developed on sites allocated for residual waste management in the Core Strategy are likely to have positive effects by ensuring that waste management occurs using processes higher up the waste hierarchy than landfill, which should involve recycling, composting and recovering value or energy from waste and reducing the use of primary materials. Thermal treatment facilities may have a significant positive effect on this objective if the potential for using the energy produced is realised.
22. To reduce contributions to and to adapt to Climate Change .	++	+?	++	+?	The fact that the site is already developed means that there are unlikely to be opportunities for incorporating a CHP scheme. However, the energy recovered from the waste management process within a thermal treatment facility may still be used for something other than CHP and this would have a significant positive effect on this objective. The contribution of the facility to climate change adaptation will depend more on the specific design of the facility and its layout, and the incorporation of sustainable construction techniques, drainage systems and measures to enable changes to new technologies as they develop. This cannot be assessed until the detailed proposals for a site are made known at the planning application stage, and will be influenced by other Waste Core Strategy policies such as WCS13: Design.

Table A3 Revised SA Assessment for Site 2a – The Park

(MM37 splits the original Site 2 Wingmoor Farm West into two sites: 2a The Park and 2b Wingmoor Farm West. However, the original Wingmoor Farm West site was already split into two parts 'A and B' the boundaries of which are the same as Site 2a The Park and Site 2b Wingmoor Farm West respectively. Therefore, this new SA assessment for Site 2a is based on the original assessment in Table 13 of Appendix 3 in the November 2010 SA Report, and any changes to the original scores and justification are shown as "tracked changes".)

Note that this revised SA Assessment takes into account the following Main Modifications:

- MM28 (includes FC41) (individual changes to Local Heritage sections within the five Strategic Site Schedules)
- MM29 (individual change to Contaminated Land section within The Park Strategic Site Schedule)
- MM30 (individual changes to Ecology/HRA Environmental Considerations and Key Development Criteria within the five Strategic Site Schedules)
- MM31 (individual changes to Landscape/Visual Impact Environmental Considerations within the five Strategic Site Schedules)
- MM33 (removes Suitable Uses section from the five Strategic Site Schedules)
- MM34 (was FC42) (individual changes to Flood Risk/Water Protection Environmental Considerations within the five Strategic Site Schedules)
- MM35 (individual changes to Green Belt Key Development Criteria for Wingmoor Farm East, Wingmoor Farm West and The Park Strategic Site Schedules)
- MM37 (splits The Park and Wingmoor Farm West into two separate Site Schedules)

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	0	0	0	0	There are a small amount of sensitive receptors within 250m of the site boundaries, including a HRC and a gun club. However, the nearest residential properties and businesses are located further from the site. As such, a negligible effect on health and wellbeing is likely to result from development of a waste facility at this site, regardless of the type or size.
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	+?	+?	+?	+?	Waste management facilities at any of the strategic sites could have an indirect positive effect on education opportunities, as they may include education centres within the site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	0	0	0	0	The only sensitive receptors within 250m of the site boundaries are a HRC and a gun club which are not considered likely to be adversely affected in amenity terms by the development of a waste management facility at this site. As such, a negligible effect is associated with all sizes and types of waste management facility here.
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	+?	+?	+?	+?	The creation of additional waste management facilities within Gloucestershire in any location may have a minor positive impact on encouraging investment and growth of 'green industry' in the County. This particular site is close to a HRC and active landfill site. As a result there is potential for positive effects on sustainable local economic activity as complementary activities to waste management may be encouraged, e.g. reprocessing facilities or composting outlets that could make use of recyclate or compost generated. This score is at present uncertain, however, as it is dependent on the nature of neighbouring industrial/commercial outlets.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	+	+	+	+	At this stage it is difficult to assess how the location of new large-scale waste facilities may affect this objective. However, it is important to note that certain sites will be more efficient than others (e.g. in terms of reductions in transport movements & costs), given their proximity to the main sources of waste arisings and to transfer stations and/or any other facilities that may service them. The proximity of the site to Cheltenham, along with the fact that there are existing waste facilities at the site, means that transport distances are likely to be lower, having a positive effect on the economically sustainable management of waste. It should also be noted that the type of facilities eventually proposed on strategic sites once they have been allocated in the Waste Core Strategy may differ in terms of overall costs but this will not be known until the planning application stage.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	+-	+-	+-	+-	In terms of opportunities for future employees to use sustainable transport to travel to work, the GCC Highways Assessment found that the site is some distance from Bishop's Cleeve, thus opportunities for employees to walk to the site are limited. There may be some potential for cycling, although the presence of HGV's may make this unrealistic, indicating that negative effects are likely in this sense. However, positive effects are associated with the job creation that will result from development of the site, so overall effects are likely to be mixed. Although it is likely that larger facilities will result in higher numbers of jobs being created during construction and operation, this will not always be the case and therefore significant positive effects for larger facilities cannot be assumed.
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	-?	0	-?	0	The site is within the Aerodrome Safeguarding zone for Gloucestershire Airport; therefore thermal treatment facilities, which are likely to include tall emissions stacks, could potentially present a hazard to aircraft if developed on this site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
8. To protect, conserve and enhance biodiversity in Gloucestershire.	-?	-?	-?	-?	<p>The GCC ecological assessment found that there should be no significant effects on biodiversity from a potential waste management facility developed on the Wingmoor Farm West site, within which Areas A (Site 2a The Park) and B (Site 2b Wingmoor Farm West) lie. However, a number of priority habitats and species lie within 1km or closer, indicating that there is the potential for a minor negative effect on biodiversity for all of the facility types; however this is dependent on the exact design and layout of the facility eventually developed. In addition, there is the potential for Dixton Wood SAC to be affected. However, the Key Development Criteria now note that with respect to the General Development Criteria for HRA, any appropriate assessment for this site will need to ensure that there will be no significant effect on Dixton Wood SAC either alone or in combination with other plans or projects (MM30). Therefore, it is not considered that the SA score should change, as this potential negative effect is uncertain until a planning application comes forward. the initial findings of the HRA Report indicate that any proposal for a thermal treatment facility here will need to demonstrate that there will be no adverse impact on the integrity of Dixton Wood SAC. However, this is at present uncertain as the judgement is subject to the completion of the full HRA Report and further assessment that may be required at the planning application stage.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
9. To protect, conserve and enhance the landscape in Gloucestershire.	-?	-? <u>0</u>	-?	0	<p>Although the site is more than 1km from the nearest AONB and is an existing industrial estate, therefore indicating that a negligible impact on the landscape is likely. <u>However, it is still uncertain whether the erection of an emissions stack could have a negative effect on the landscape.</u> GC assessments have concluded that although both sites A and B could accommodate a medium-sized facility with minimal impact, site A is inappropriate for large-scale development. It was also found that an emissions stack of either medium or large size could have a moderate adverse impact. This potential adverse effect would, however, not be significant due to the presence of similar structures in the surrounding area.</p> <p><u>The General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape.</u> The original SA did not consider impacts in relation to this landscape objective with respect to the Green Belt in the Site Assessments, but MM35 requires that development proposals on this site are in accordance with national Green Belt policy and policy WCS10, helping to strengthen the potential mitigation and avoidance of adverse effects on the landscape.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
10. To ensure that waste sites have the potential for adequate screening and / or innovative design to be incorporated.	+?	+?	+?	+?	<p>The site is surrounded to the north and west by a heavily vegetated bund, and to the south is the Wingmoor Farm recycling centre, which is also enclosed by grassed mounds. The tall emissions stacks incorporated into the design of thermal treatment facilities could make screening of a waste facility at this site more difficult. However, all sites would have the potential for positive effects to be achieved through design, although the effects are uncertain until the exact design of the proposed facility is submitted with a planning application at a later stage. This is particularly likely given that all applications will need to adhere to policy WCS13: Design. enclosed character of the study area indicates that there may be particular opportunities for a waste site to be well-screened here. In addition, the General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
11. To protect, conserve and enhance Gloucestershire's material, cultural and recreational assets .	+/-	+/-	+/-	+/-	GCC site assessment and GIS analysis indicates that there are no PROW present on site, but that there may be potential to enhance the local footpath network; therefore having a minor positive effect on material, cultural and recreational assets. However, the site is close to a rugby ground and rifle range and may have the potential for a minor negative effect on recreation in the local area by reducing the attractiveness of these facilities to users.
12. To protect, conserve and enhance geodiversity in Gloucestershire.	0	0	0	0	The site is within 500m of a RIG (Wingmoor Farm Pit) and so development of any type of waste facility here could potentially have a negative effect on local geodiversity. However, the site is a temporary RIG and the Geological Trust makes it clear that it will eventually be landfilled. As such, the likely effect of development at this site on local geodiversity is classed as negligible.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
13. To protect, conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	+?	+?	+?	+?	<p>The larger Wingmoor Farm West site, within which Areas A and B lie, scored positively (+) in the GGC Archaeology site assessment due to the low potential for development to impact upon known historical or archaeological remains. The site is <u>near to</u> <u>within</u> the former Stoke Orchard World War II airfield <u>and the archaeological potential of the site is unknown (MM28)</u>, but much of the site has already been destroyed by landfill, and the remainder of the airfield is now used by the Coal Research Establishment. This changes the original SA score from minor positive to uncertain. However, more protection is now afforded to the historic environment through new policy WCS12a.</p>
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	+?	+?	+?	+?	<p>The whole of the site lies within Flood Zone 1, <u>and the EA identified the site as overlying unproductive strata with the groundwater risks associated with the location as low for the geological setting (MM34)</u>. Therefore development here is likely to have a positive effect on flood risk <u>and water quality</u>, although this is uncertain, as some fluvial flood risk is posed from water bodies present within the wider Wingmoor Farm site.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	N/A	N/A	N/A	N/A	In relation to the location of potential waste sites, potential pollution effects are already covered under SA Objectives 1, 3, 16-18. The precautionary principle is inherently being applied to the site allocation process through the Council's own site assessment methodology and this independent SA of Waste Core Strategy and the potential strategic waste sites to be allocated within it.
16. To protect and enhance soil / land quality in Gloucestershire.	++	++	++	++	These areas <ins>This site is</ins> comprises a large sized site located entirely on previously developed land, therefore development here is likely to have a significant positive effect on this objective. Medium sized facilities may result in a smaller area of the site being developed, thus having even greater positive effects, although this is uncertain and will depend on the final design of the facility.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
17. To protect and enhance air quality in Gloucestershire.	+-	+	+-	+	The GCC Highways Assessment found that the site is within reasonable proximity of the strategic highways network via the A435. In addition, it is more than 1km from an AQMA; therefore in this sense the site should have positive impacts on protecting air quality. However, where thermal treatment facilities are proposed, there could also be negative impacts on air quality due to the release of gases through thermal processes. The negative effect would not be significant however, because the overall scale of emissions from thermal treatment facilities is relatively small and also because of the distance of the site from an AQMA.
18. To protect and enhance water quality in Gloucestershire.	0	0	0	0	Potential sites for waste management are expected to have no effect on water quality as the requirement for future residual waste management within Gloucestershire is likely to be met by modern facilities within enclosed buildings.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
19. To reduce the adverse impacts of lorry traffic on the environment and communities.	+-	+-	+-	+-	The GCC Highways Assessment found that, although the site is adjacent to a mapped freight rail head, at present there are no sidings and thus a new main line connection and loading siding would be required. The cost of installing such a mainline connection is likely to be very high; therefore negative effects in terms of sustainable transport use are likely. However, the GCC Highways Assessment also found that the site is within reasonable proximity to the strategic highways network via the A435, therefore mixed effects are likely overall. There may be some level of variation between the effects of medium and larger sites, as larger sites may result in higher levels of waste transportation. However, as this will not always be the case and cannot be assumed, no differences are reflected in the scores.
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy .	+	+	+	+	The Waste Core Strategy is seeking to allocate strategic sites for recovery of residual municipal waste and C&I waste. All facility types that may be developed on these sites are therefore likely to have minor positive effects by ensuring waste management occurs using processes higher up the waste hierarchy than landfill.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2a: The Park					
21. To reduce the global use of primary materials and minimise net energy balance requirements.	++?	+	++?	+	<p>All facility types that may be developed on sites allocated for residual waste management in the Waste Core Strategy are likely to have positive effects by ensuring that waste management occurs using processes higher up the waste hierarchy than landfill, which should increase levels of recycling, composting and recovering value or energy from waste and reducing use of primary materials.</p> <p>Thermal treatment facilities may have a significant positive effect on this objective if the potential for using the energy produced is realised.</p>
22. To reduce contributions to and to adapt to Climate Change .	++	+?	++	+?	<p>The fact that the site is already used for waste management means that there are unlikely to be opportunities for incorporating a CHP scheme. However, where energy is recovered from the waste management process within a thermal treatment facility, there would be significant positive effects on this objective. The contribution of the facility to climate change adaptation will depend more on the specific design of the facility and its layout, and the incorporation of sustainable construction techniques, drainage systems and measures to enable changes to new technologies as they develop. This cannot be assessed until the detailed proposals for a site are made known at the planning application stage, and will be influenced by other Waste Core Strategy policies such as WCS13: Design.</p>

Table A4 Revised SA Assessment for Site 2b – Wingmoor Farm West

(MM37 splits the original Site 2 Wingmoor Farm West into two sites: 2a The Park and 2b Wingmoor Farm West. However, the original Wingmoor Farm West site was already split into two parts 'A and B' the boundaries of which are the same as Site 2a The Park and Site 2b Wingmoor Farm West respectively. Therefore, this new SA assessment for Site 2b is based on the original assessment in Table 13 of Appendix 3 in the November 2010 SA Report, and any changes to the original scores and justification are shown as "tracked changes".)

Note that this revised SA Assessment takes into account the following Main Modifications:

- MM28 (includes FC41) (individual changes to Local Heritage sections within the five Strategic Site Schedules)
- MM30 (individual changes to Ecology/HRA Environmental Considerations and Key Development Criteria within the five Strategic Site Schedules)
- MM31 (individual changes to Landscape/Visual Impact Environmental Considerations within the five Strategic Site Schedules)
- MM33 (removes Suitable Uses section from the five Strategic Site Schedules)
- MM34 (was FC42) (individual changes to Flood Risk/Water Protection Environmental Considerations within the five Strategic Site Schedules)
- MM35 (individual changes to Green Belt Key Development Criteria for Wingmoor Farm East, Wingmoor Farm West and The Park Strategic Site Schedules)
- MM37 (splits The Park and Wingmoor Farm West into two separate Site Schedules)

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	0	0	0	0	There are a small amount of sensitive receptors within 250m of the site boundaries, including a HRC and a gun club. However, the nearest residential properties and businesses are located further from the site. As such, a negligible effect on health and wellbeing is likely to result from development of a waste facility at this site, regardless of the type or size.
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	+?	+?	+?	+?	Waste management facilities at any of the strategic sites could have an indirect positive effect on education opportunities, as they may include education centres within the site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	0	0	0	0	The only sensitive receptors within 250m of the site boundaries are a HRC and a gun club which are not considered likely to be adversely affected in amenity terms by the development of a waste management facility at this site. As such, a negligible effect is associated with all sizes and types of waste management facility here.
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	+?	+?	+?	+?	The creation of additional waste management facilities within Gloucestershire in any location may have a minor positive impact on encouraging investment and growth of 'green industry' in the County. This particular site contains a HRC , and is close to a HRC and an active landfill site. As a result there is potential for positive effects on sustainable local economic activity as complementary activities to waste management may be encouraged, e.g. reprocessing facilities or composting outlets that could make use of recyclate or compost generated. This score is at present uncertain, however, as it is dependent on the nature of neighbouring industrial/commercial outlets.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	+	+	+	+	At this stage it is difficult to assess how the location of new large-scale waste facilities may affect this objective. However, it is important to note that certain sites will be more efficient than others (e.g. in terms of reductions in transport movements & costs), given their proximity to the main sources of waste arisings and to transfer stations and/or any other facilities that may service them. The proximity of the site to Cheltenham, along with the fact that there are existing waste facilities at the site, means that transport distances are likely to be lower, having a positive effect on the economically sustainable management of waste. It should also be noted that the type of facilities eventually proposed on strategic sites once they have been allocated in the Waste Core Strategy may differ in terms of overall costs but this will not be known until the planning application stage.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	+-	+-	+-	+-	In terms of opportunities for future employees to use sustainable transport to travel to work, the GCC Highways Assessment found that the site is some distance from Bishop's Cleeve, thus opportunities for employees to walk to the site are limited. There may be some potential for cycling, although the presence of HGV's may make this unrealistic, indicating that negative effects are likely in this sense. However, positive effects are associated with the job creation that will result from development of the site, so overall effects are likely to be mixed. Although it is likely that larger facilities will result in higher numbers of jobs being created during construction and operation, this will not always be the case and therefore significant positive effects for larger facilities cannot be assumed.
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	-?	0	-?	0	The site is within the Aerodrome Safeguarding zone for Gloucestershire Airport; therefore thermal treatment facilities, which are likely to include tall emissions stacks, could potentially present a hazard to aircraft if developed on this site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
8. To protect, conserve and enhance biodiversity in Gloucestershire.	-?	-?	-?	-?	<p>The GCC ecological assessment found that there should be no significant effects on biodiversity from a potential waste management facility developed on the Wingmoor Farm West site, within which Areas A (Site 2a The Park) and B (Site 2b Wingmoor Farm West) lie. However, a number of priority habitats and species lie within 1km or closer, indicating that there is the potential for a minor negative effect on biodiversity for all of the facility types; however this is dependent on the exact design and layout of the facility eventually developed. In addition, there is the potential for Dixton Wood SAC to be affected. However, the Key Development Criteria now note that with respect to the General Development Criteria for HRA, any appropriate assessment for this site will need to ensure that there will be no significant effect on Dixton Wood SAC either alone or in combination with other plans or projects (MM30). Therefore, it is not considered that the SA score should change, as this potential negative effect is uncertain until a planning application comes forward. the initial findings of the HRA Report indicate that any proposal for a thermal treatment facility here will need to demonstrate that there will be no adverse impact on the integrity of Dixton Wood SAC. However, this is at present uncertain as the judgement is subject to the completion of the full HRA Report and further assessment that may be required at the planning application stage.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
9. To protect, conserve and enhance the landscape in Gloucestershire.	-?	-?0	-?	0	<p>Although <u>t</u>he site is more than 1km from the nearest AONB and is an existing <u>industrial estate waste management site and the landscape is generally of poor quality in the vicinity of the site (MM31)</u>, therefore indicating that a negligible impact on the landscape is likely. <u>In addition, the site is screened to the north by The Park and to the south by the adjacent remediated landfill.</u> However, facilities with an emissions stack of either medium or large size have potential to have a negative effect on this objective. <u>GCC assessments have concluded that although both sites A and B could accommodate a medium-sized facility with minimal impact, site A is inappropriate for large-scale development.</u> It was also found that an emissions stack of either medium or large size could have a moderate adverse impact. This potential adverse effect would, however, not be significant due to the presence of similar structures in the surrounding area.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
9. To protect, conserve and enhance the landscape in Gloucestershire.					<p>However, the uncertainty will still remain, in particular as the General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape. The original SA did not consider impacts in relation to this landscape objective with respect to the Green Belt in the Site Assessments, but MM35 requires that development proposals on this site are in accordance with national Green Belt policy and policy WCS10, helping to strengthen the potential mitigation and avoidance of adverse effects on the landscape.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
10. To ensure that waste sites have the potential for adequate screening and / or innovative design to be incorporated.	+?	+?	+?	+?	<p>The site is screened to the north by The Park, to the south by the adjacent remediated landfill, and some screening has already been undertaken to the western boundary (MM31). The tall emissions stacks incorporated into the design of thermal treatment facilities could make screening of a waste facility at this site more difficult. However, all sites would have the potential for positive effects to be achieved through design, although the effects are uncertain until the exact design of the proposed facility is submitted with a planning application at a later stage. This is particularly likely given that all applications will need to adhere to policy WCS13: Design. enclosed character of the study area indicates that there may be particular opportunities for a waste site to be well-screened here. In addition, the General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
11. To protect, conserve and enhance Gloucestershire's material, cultural and recreational assets .	+/-	+/-	+/-	+/-	GCC site assessment and GIS analysis indicates that there are no PROW present on site, but that there may be potential to enhance the local footpath network; therefore having a minor positive effect on material, cultural and recreational assets. However, the site is close to a rugby ground and rifle range and may have the potential for a minor negative effect on recreation in the local area by reducing the attractiveness of these facilities to users.
12. To protect, conserve and enhance geodiversity in Gloucestershire.	0	0	0	0	The site is within 500m of a RIG (Wingmoor Farm Pit) and so development of any type of waste facility here could potentially have a negative effect on local geodiversity. However, the site is a temporary RIG and the Geological Trust makes it clear that it will eventually be landfilled. As such, the likely effect of development at this site on local geodiversity is classed as negligible.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
13. To protect, conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	+?	+?	+?	+?	<p>The larger Wingmoor Farm West site, within which Areas A and B lie, scored positively (+) in the GGC Archaeology site assessment due to the low potential for development to impact upon known historical or archaeological remains. The site is <u>near to</u> <u>within</u> the former Stoke Orchard World War II airfield <u>and although part of it may have been landfilled, the archaeological potential of the site is unknown (MM28), but much of the site has already been destroyed by landfill, and the remainder of the airfield is now used by the Coal Research Establishment</u>. This changes the original SA score from minor positive to uncertain. However, more protection is now afforded to the historic environment through new policy WCS12a.</p>
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	+?	+?	+?	+?	<p>The whole of the site lies within Flood Zone 1, <u>and the EA identified the site as overlying unproductive strata with the groundwater risks associated with the location as low for the geological setting (MM34)</u>. Therefore development here is likely to have a positive effect on flood risk <u>and water quality</u>, although this is uncertain, <u>as some fluvial flood risk is posed from water bodies present within the wider Wingmoor Farm site</u>.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	N/A	N/A	N/A	N/A	In relation to the location of potential waste sites, potential pollution effects are already covered under SA Objectives 1, 3, 16-18. The precautionary principle is inherently being applied to the site allocation process through the Council's own site assessment methodology and this independent SA of Waste Core Strategy and the potential strategic waste sites to be allocated within it.
16. To protect and enhance soil / land quality in Gloucestershire.	++	++	++	++	These areas <ins>This site is</ins> comprises a large sized site located entirely on previously developed land, therefore development here is likely to have a significant positive effect on this objective. Medium sized facilities may result in a smaller area of the site being developed, thus having even greater positive effects, although this is uncertain and will depend on the final design of the facility.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
17. To protect and enhance air quality in Gloucestershire.	+-	+	+-	+	The GCC Highways Assessment found that the site is within reasonable proximity of the strategic highways network via the A435. In addition, it is more than 1km from an AQMA; therefore in this sense the site should have positive impacts on protecting air quality. However, where thermal treatment facilities are proposed, there could also be negative impacts on air quality due to the release of gases through thermal processes. The negative effect would not be significant however, because the overall scale of emissions from thermal treatment facilities is relatively small and also because of the distance of the site from an AQMA.
18. To protect and enhance water quality in Gloucestershire.	0	0	0	0	Potential sites for waste management are expected to have no effect on water quality as the requirement for future residual waste management within Gloucestershire is likely to be met by modern facilities within enclosed buildings.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
19. To reduce the adverse impacts of lorry traffic on the environment and communities.	+-	+-	+-	+-	The GCC Highways Assessment found that, although the site is adjacent to a mapped freight rail head, at present there are no sidings and thus a new main line connection and loading siding would be required. The cost of installing such a mainline connection is likely to be very high; therefore negative effects in terms of sustainable transport use are likely. However, the GCC Highways Assessment also found that the site is within reasonable proximity to the strategic highways network via the A435, therefore mixed effects are likely overall. There may be some level of variation between the effects of medium and larger sites, as larger sites may result in higher levels of waste transportation. However, as this will not always be the case and cannot be assumed, no differences are reflected in the scores.
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy .	+	+	+	+	The Waste Core Strategy is seeking to allocate strategic sites for recovery of residual municipal waste and C&I waste. All facility types that may be developed on these sites are therefore likely to have minor positive effects by ensuring waste management occurs using processes higher up the waste hierarchy than landfill.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 2b: Wingmoor Farm West					
21. To reduce the global use of primary materials and minimise net energy balance requirements.	++?	+	++?	+	<p>All facility types that may be developed on sites allocated for residual waste management in the Waste Core Strategy are likely to have positive effects by ensuring that waste management occurs using processes higher up the waste hierarchy than landfill, which should increase levels of recycling, composting and recovering value or energy from waste and reducing use of primary materials.</p> <p>Thermal treatment facilities may have a significant positive effect on this objective if the potential for using the energy produced is realised.</p>
22. To reduce contributions to and to adapt to Climate Change .	++	+?	++	+?	<p>The fact that the site is already used for waste management means that there are unlikely to be opportunities for incorporating a CHP scheme.</p> <p>However, where energy is recovered from the waste management process within a thermal treatment facility, there would be significant positive effects on this objective. The contribution of the facility to climate change adaptation will depend more on the specific design of the facility and its layout, and the incorporation of sustainable construction techniques, drainage systems and measures to enable changes to new technologies as they develop. This cannot be assessed until the detailed proposals for a site are made known at the planning application stage, and will be influenced by other Waste Core Strategy policies such as WCS13: Design.</p>

Table A5 Revised SA Assessment for Site 3 – Javelin Park

(Any changes to the original scores and justification in Table 14 of Appendix 3 in the November 2010 SA Report are shown as "tracked changes".)

This revised SA Assessment takes into account the following Main Modifications, including a revised boundary for Javelin Park:

- MM28 (includes FC41) (individual changes to Local Heritage sections within the five Strategic Site Schedules)
- MM30 (individual changes to Ecology/HRA Environmental Considerations and Key Development Criteria within the five Strategic Site Schedules)
- MM31 (individual changes to Landscape/Visual Impact Environmental Considerations within the five Strategic Site Schedules)
- MM33 (removes Suitable Uses section from the five Strategic Site Schedules)
- MM34 (was FC42) (individual changes to Flood Risk/Water Protection Environmental Considerations within the five Strategic Site Schedules)
- MM38 (revised boundary for Javelin Park – Inset Map 3 and consequent changes to information in Site Schedule)

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	-	-?	-	-?	<p>There are a small number of sensitive receptors within 250m of the site boundary, including two residential properties, a garden centre and some retail units. <u>The 6 hectares of land adjacent to the north of the site is committed for B8 (storage/distribution) employment use.</u> Particularly where thermal treatment facilities are proposed, there could be negative effects on health and well-being as a result of gaseous emissions; however these are classed as minor due to the fact that Government research³ has concluded that modern waste management practices have at most a minor effect on human health. The fact that the effects are likely to be only minor means that no differentiation between the effects of large and medium-sized thermal facilities is expected. With other types of waste management facilities, the potential adverse effects on health and wellbeing are uncertain and will depend on the precise nature of the facility and any mitigation measures proposed.</p>

³ Review of Environmental and Health Effects of Waste Management: Municipal Solid Waste and Similar Wastes. Prepared for DEFRA by Enviro and University of Birmingham, May 2004.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	+?	+?	+?	+?	Waste management facilities at any of the strategic sites could have an indirect positive effect on education opportunities, as they may include education centres within the site.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	-	-	-?	-?	<p>The site has a small number of sensitive receptors within 250m including two residential properties, a garden centre and some retail units and, as potential waste facilities could potentially be served by large numbers of HGVs there could be a cumulative effect on the two residential properties. This may combine with mechanical operations to increase noise levels, thus having negative effects on local amenity. Medium sized facilities may result in fewer negative effects in this sense as they may generate less traffic. As there is an existing waste facility within 250m of the site, there could be a cumulative effect on the two residential properties, although this is relatively unlikely given that the existing facility is a site for the storage of road surfacing materials.–The GCC Highways Assessment for this site found that lorry traffic is unlikely to impact significantly on local amenity as the site is not in close proximity to residential properties, and the vast majority of road traffic should travel directly north to M5.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	+?	+?	+?	+?	<p>The creation of additional waste management facilities within Gloucestershire in any location may have a minor positive impact on encouraging investment and growth of 'green industry' in the county. This site has been previously developed <u>and there is an existing waste facility within 250m</u>. As a result there is potential for positive effects on sustainable local economic activity as complementary activities to waste management may be encouraged, e.g. reprocessing facilities or composting outlets that could make use of recyclate or compost generated. This score is uncertain, however, as it is dependent on the nature of neighbouring industrial/commercial outlets.</p>
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	+	+	+	+	<p>At this stage it is difficult to assess how the location of new strategic scale waste facilities may affect this objective. However it is important to note that certain sites will be more efficient than others (e.g. in terms of reductions in transport movements & costs), given their proximity to the main sources of waste arisings and to transfer stations and/or any other facilities that may service them. The proximity of the site to Gloucester, <u>along with the fact that there are existing waste facilities nearby</u>, means that transport distances are likely to be lower, having a positive effect in terms of the economically sustainable management of waste. It should also be noted that the type of facilities eventually proposed on sites once allocated in the Waste Core Strategy may differ in terms of overall costs but this will not be known until the planning application stage.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	+/-	+/-	+/-	+/-	In terms of opportunities for future employees to use sustainable transport to travel to work, the GCC Highways Assessment found that the site would be difficult to access by walking or cycling due to the distance and the effective barrier of Junction 12 of the M5 (although some bus access can be provided via the existing Stroud-Gloucester service), meaning that negative effects are likely. However, positive effects are associated with the job creation resulting from development at the site, so overall effects are likely to be mixed. Although it is likely that larger facilities will result in higher levels of employment during construction and operation, this will not always be the case and therefore significant positive effects for larger facilities cannot be assumed.
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	0	0	0	0	The site is not within an Aerodrome Safeguarding zone; therefore waste facilities developed on this site are not expected to present a hazard to aircraft.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
8. To protect, conserve and enhance biodiversity in Gloucestershire.	-?	-?	-?	-?	<p>The GCC ecological assessment found that there should be no significant effects on biodiversity from a potential waste management facility at this site. However, a number of protected species have been identified in the vicinity through previous site surveys, indicating that there is the potential for minor negative effects on biodiversity for all of the facility types; but this would be dependent on the exact design and layout of the facility eventually developed. In addition, the <u>initial findings of the HRA Report indicate that the Site Schedule highlights the need to ensure there will be no significant effect on any European sites, in particular potential for an adverse impact on</u> the Severn Estuary SAC/SPA/Ramsar site, Walmore Common SPA/ Ramsar site, Rodborough Common SAC and Cotswold Beechwoods SAC<u>cannot be ruled out, and that any proposal, in particular for a thermal treatment facility here, will need to demonstrate that there will be no adverse impact on the integrity of these sites.</u> Therefore, it is not considered that the SA score should change, as this potential negative effect is uncertain until a planning application comes forward. However, this negative score is at present uncertain as the judgement is subject to the completion of the full HRA Report and further assessment that may be required at the planning application stage.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
9. To protect, conserve and enhance the landscape in Gloucestershire.	-?	-?	-?	-?	<p>The site is more than 1km from the nearest AONB and is previously developed; therefore negligible impacts on the landscape may be expected in this sense. However, a facility which is taller and larger than existing surrounding units would contribute to the encroachment of urban fringe development into the agricultural landscape, and an emissions stack may create a significant vertical landmark out of keeping with local character, depending on its height. <u>In addition, the site is located in an area that is relatively low and flat, therefore any facility would be clearly visible from the Cotswolds AONB, the M5 and the surrounding low lying areas. However, the minor negative score remains uncertain, as the General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape.</u></p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
10. To ensure that waste sites have the potential for adequate screening and / or innovative design to be incorporated.	-?	-?	-?	-?	The GCC site assessment describes the site as containing very little vegetation, with some mature trees along the boundary with the M5 to the west, and considers that screening a large facility would be challenging, <u>although some screening has already been undertaken to the western boundary</u> . The tall emissions stacks incorporated into the design of thermal treatment facilities could make screening particularly difficult. However, the assessment also states that there is the potential to make a high quality architectural statement and that development here presents the opportunity to set the design quality for future development. As such, the potential negative score is uncertain.
11. To protect, conserve and enhance Gloucestershire's material, cultural and recreational assets .	+/-	+/-	+/-	+/-	The GCC site assessment and GIS analysis indicate that there are no PROW present on site, but that there may opportunities for existing routes to be enhanced, therefore having a minor positive effect on material, cultural and recreational assets. However, the site is adjacent to a garden centre and so development here may have a minor negative effect by making this facility less attractive to users.
12. To protect, conserve and enhance geodiversity in Gloucestershire.	0	0	0	0	The site is more than 500m from a RIG so development here is not expected to have an effect on local geodiversity.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
13. To protect, conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	+	+	+	+	The site scored positively (+) in the GCC Archaeology site assessment due to the low potential for development here to impact upon known historical or archaeological remains. <u>However, the Site Schedule now notes that there are eight Grade II Listed buildings within 1km of the site boundary and one Scheduled Monument (MM28). According to the SA assumptions used in the November 2010 SA Report (Appendix 2) this would not change the original score. In addition, more protection is now afforded to the historic environment through new policy WCS12a.</u>
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	+	+	+	+	The SFRA Level 2 indicates a very low risk of flooding on this site and the EA identified the site as overlying a secondary (undifferentiated) aquifer with the groundwater risks associated with the location as low for the geological setting (MM34). Therefore development here should have a positive effect on this objective.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	N/A	N/A	N/A	N/A	In relation to the location of potential waste sites, potential pollution effects are already covered under SA Objectives 1, 3, 16-18. The precautionary principle is inherently being applied to the site allocation process through the Council's own site assessment methodology and this independent SA of the Waste Core Strategy and the potential strategic sites to be allocated within it.
16. To protect and enhance soil / land quality in Gloucestershire.	++	++	++	++	This is-a-large site is located entirely on previously developed land, therefore should have a significant positive effect on this objective. Medium sized facilities may result in a smaller area of the site being developed, thus having even greater positive effects, although this is uncertain and will depend on the final design of the facility which will not be known until the planning application stage.
17. To protect and enhance air quality in Gloucestershire.	++/-	++	++/-	++	The GCC Highways Assessment found that the site is within very close proximity to the strategic highways network via Junction 12 of the M5 motorway. In addition, it is more than 1km from an AQMA; therefore in this sense the site should have significant positive impacts on protecting air quality. However, where thermal treatment facilities are proposed, there could also be negative impacts on air quality due to the release of gases through thermal processes. This negative effect would not be significant, however, because the overall scale of emissions from thermal treatment facilities is relatively small and also because of the distance of the site from an AQMA.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
18. To protect and enhance water quality in Gloucestershire.	0	0	0	0	Potential sites for waste management are expected to have no effect on this objective, as the requirement for future residual waste management within Gloucestershire is likely to be met by modern facilities within enclosed buildings.
19. To reduce the adverse impacts of lorry traffic on the environment and communities.	++/-	++/-	++/-	++/-	The GCC Highways Assessment found that the site is over 1km west of the existing mainline railway. The construction of a new line is likely to need to be around 1.5km length to avoid Haresfield village and this is likely to be prohibitively expensive and could have land ownership issues; therefore negative effects in terms of sustainable transport use are likely. However, the GCC Highways Assessment also found that the site is within very close proximity to the strategic highways network via Junction 12 of the M5 motorway, therefore mixed effects are likely overall. There may be some level of variation between the effects of medium and larger sites, as larger sites may result in higher levels of waste transportation. However, as this will not always be the case and cannot be assumed, no differences are reflected in the scores.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy .	+	+	+	+	The Waste Core Strategy is seeking to allocate strategic sites for recovery of residual municipal waste and C&I waste. All facility types that may be developed on these sites are therefore likely to have minor positive effects by ensuring waste management occurs using processes higher up the waste hierarchy than landfill.
21. To reduce the global use of primary materials and minimise net energy balance requirements.	++?	+	++?	+	All facility types that may be developed on sites allocated for residual waste management in the Waste Core Strategy are likely to have positive effects by ensuring that waste management occurs using processes higher up the waste hierarchy than landfill, which should increase levels of recycling, composting and recovering value or energy from waste and reducing use of primary materials. Thermal treatment facilities may have a significant positive effect on this objective if the potential for using the energy produced is realised.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 3: Javelin Park					
22. To reduce contributions to and to adapt to Climate Change .	++	+?	++	+?	<p>The fact that the site is previously developed means that there are unlikely to be opportunities for incorporating a CHP scheme, <u>except that there is potential for a heat network to be incorporated within any future development at the site or the adjacent site with permission for B8 (storage/distribution) uses.</u> However, <u>t</u>he energy recovered from the waste management process within a thermal treatment facility may <u>also still</u> be used for something other than CHP and this would have a significant positive effect on this objective. The contribution of the facility to climate change adaptation will depend more on the specific design of the facility and its layout, and incorporation of sustainable construction techniques, drainage systems and measures to enable changes to new technologies as they develop. This cannot be assessed until the detailed proposals for a site are made known at the planning application stage and will also be influenced by other Waste Core Strategy policies such as WCS13: Design.</p>

Table A6 Revised SA Assessment for Site 4 – Land at Moreton Valence

(Any changes to the original scores and justification in Table 15 of Appendix 3 in the November 2010 SA Report are shown as "tracked changes".)

This revised SA Assessment takes into account the following Main Modifications, including a revised boundary for Land at Moreton Valence:

- MM28 (includes FC41) (individual changes to Local Heritage sections within the five Strategic Site Schedules)
- MM30 (individual changes to Ecology/HRA Environmental Considerations and Key Development Criteria within the five Strategic Site Schedules)
- MM31 (individual changes to Landscape/Visual Impact Environmental Considerations within the five Strategic Site Schedules)
- MM33 (removes Suitable Uses section from the five Strategic Site Schedules)
- MM34 (was FC42) (individual changes to Flood Risk/Water Protection Environmental Considerations within the five Strategic Site Schedules)
- MM39 (revised boundary for Moreton Valence – Inset Map 4 and consequent changes to information in Site Schedule)

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	-	-?	-	-?	There are a small number of sensitive receptors within 250m of the site boundary including farmhouses, other residential properties, a campsite and business/light industrial uses at Old Airfield Farm. Particularly where thermal treatment facilities are proposed, there may be negative effects on health and well-being as a result of gaseous emissions; however these are classed as minor due to the fact that Government research ⁴ has concluded that modern waste management practices have at most a minor effect on human health. The fact that the effects are likely to be only minor means that no differentiation between the effects of large and medium sized facilities is expected. With non-thermal waste management facilities, the potential negative effects are uncertain and will depend on the precise nature of the facility and any mitigation measures proposed.

⁴ Review of Environmental and Health Effects of Waste Management: Municipal Solid Waste and Similar Wastes. Prepared for DEFRA by Enviro and University of Birmingham, May 2004.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	+?	+?	+?	+?	Waste management facilities at any of the strategic sites could have an indirect positive effect on education opportunities, as they may include education centres within the site.
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	-	-	-?	-?	The site has a small number of residential properties within 250m including farmhouses, other residential properties, a campsite and business/light industrial uses at Old Airfield Farm and, as facilities are served by large numbers of HGVs, this may combine with mechanical operations to increase noise levels, thus having negative effects on local amenity. Medium sized facilities may result in fewer negative effects in this sense as they may generate less traffic movement than larger facilities. The fact that the site is already used for waste management activities may mean that there is some potential for a cumulative negative effect on local amenity, although this would still be expected to be only a minor negative effect as the GCC Highways Assessment concluded that the site is not in close proximity to a significant number of residential properties whose amenity may be adversely affected by lorry traffic.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	+?	+?	+?	+?	The creation of additional waste management facilities within Gloucestershire in any location may have a minor positive impact on encouraging investment and growth of 'green industry' in the County. This particular site is an industrial estate with existing waste management uses and as a result there is the potential for positive effects on sustainable local economic activity as complementary activities to waste management may be encouraged, e.g. reprocessing facilities or composting outlets that could make use of recyclate or compost generated. This score is uncertain, however, as it is dependent on the nature of neighbouring industrial/commercial outlets.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	+	+	+	+	At this stage it is difficult to assess how the location of new strategic scale waste facilities may affect this objective. However it is important to note that certain sites will be more efficient than others (e.g. in terms of reductions in transport movements & costs), given their proximity to the main sources of waste arisings and to transfer stations and/or any other facilities that may service them. The proximity of this site to Gloucester, along with the fact that there are existing waste facilities at the site, means that transport distances are likely to be lower, having a positive effect on the economically sustainable management of waste. Additionally, the type of facilities eventually proposed on sites once they have been allocated in the Waste Core Strategy may differ in terms of overall costs but this will not be known until the planning application stage.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	+-	+-	+-	+-	In terms of opportunities for future employees to use sustainable transport modes to access the site, the GCC Highways Assessment found that the site is outside reasonable walking distances from nearby settlements, and that cycle and bus access is also likely to be fairly limited, in this sense indicating that there may be negative effects on this objective. However, positive effects are associated with general job creation at the site, so overall effects are likely to be mixed. Although it is likely that larger facilities will result in higher levels of job creation during construction and operation, this will not always be the case and therefore significant positive effects for larger facilities cannot be assumed.
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	0	0	0	0	The site is not within an Aerodrome Safeguarding zone; therefore development of any type of waste management facility here would not be expected to have an impact on this objective.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
8. To protect, conserve and enhance biodiversity in Gloucestershire.	-?	-?	-?	-?	<p>The site has no international, national or local designations within the immediate vicinity and was assessed by GCC as having a potentially positive impact on biodiversity. However, there is a Strategic Nature Area (Severn Vale) located 520m from the site, indicating that a negative effect on biodiversity is possible for all of the facility types; but this is dependent on the exact design and layout of the facility eventually developed. In addition, the <u>initial findings of the HRA Report indicate that the Site Schedule highlights the need to ensure there will be no significant effect on any European sites, in particular potential for an adverse impact on</u> the Severn Estuary SAC/SPA/Ramsar site, Walmore Common SPA/ Ramsar site, Rodborough Common SAC and Cotswold Beechwoods SAC<u>cannot be ruled out, and that any proposal, in particular for a thermal treatment facility here, will need to demonstrate that there will be no adverse impact on the integrity of these sites. Therefore, it is not considered that the SA score should change, as this potential negative effect is uncertain until a planning application comes forward. However, this negative score is at present uncertain as the judgement is subject to the completion of the full HRA Report and further assessment that may be required at the planning application stage.</u></p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
9. To protect, conserve and enhance the landscape in Gloucestershire.	-	0	-	0	<p>The site is more than 1km from the nearest AONB and is in an existing waste site/industrial estate; therefore negligible impacts on the landscape may be expected from development at this site. However, although the study area has been found to be able to accommodate development of a similar scale and height as the existing development around the site, an emissions stack of any height could potentially have a detrimental impact on the wider area</p> <p><u>although it should be noted that a small pyrolysis plant with a small/medium stack has already been permitted on this site. In addition, the site is located in an area that is relatively low and flat, therefore any facility would be clearly visible from the Cotswolds AONB, the M5 and the surrounding low lying areas. However, the minor negative score remains uncertain, as the General Development Criteria now include a requirement for all waste proposals to be supported by a landscape and visual impact assessment (MM31), and set out specific requirements in terms of screening for facilities with emissions stacks, which should help to mitigate potential effects on the landscape.</u></p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
10. To ensure that waste sites have the potential for adequate screening and / or innovative design to be incorporated.	-	-	-	-	The GCC assessment states that screening potential at this site would depend on the size and technology of a proposed facility and that there is currently large bunding screening from the M5 which could potentially be improved. The tall emissions stacks incorporated into the design of thermal treatment facilities could make screening more difficult, and there are several residential properties which have views of the site, thus a potential negative effect is predicted.
11. To protect, conserve and enhance Gloucestershire's material, cultural and recreational assets .	+/-	+/-	+/-	+/-	The GCC site assessment and GIS analysis indicates that there are no PROW present within the site and that there may be the potential to enhance the local footpath network, which could have a minor positive effect on material, cultural and recreational assets. However, the site is close to a campsite and there may be potential for a minor negative effect on recreation locally by making this facility less attractive to users. The overall effect is therefore likely to be mixed.
12. To protect, conserve and enhance geodiversity in Gloucestershire.	0	0	0	0	The site is more than 500m from a SSSI or RIG, so development here would not be expected to have an impact on local geodiversity.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
13. To protect conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	+	+	+	+	<p>The site scored positively (+) in the GCC Archaeology site assessment due to the low potential for development to impact upon known historical or archaeological remains. <u>However, the Site Schedule now notes that there are six Grade II Listed buildings within 1km of the site boundary and one Scheduled Monument (MM28).</u> According to the SA assumptions used in the November 2010 SA Report (Appendix 2) this would not change the original score. In addition, more protection is now afforded to the historic environment through new policy WCS12a.</p>
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	++	++	++	++	<p>The site is located entirely within Flood Zone 1 and the GCC assessment scored it significantly positively (++) as there are no historic flood outlines and there are no recorded incidents of flooding from other sources within the site. <u>In addition, the EA identified the site as overlying a secondary (undifferentiated) aquifer with the groundwater risks associated with the location as low for the geological setting.</u> As such, the site could have a significant positive effect on preventing flooding and reducing the risk to the public water supply.</p>

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	N/A	N/A	N/A	N/A	In relation to the location of potential waste sites, potential pollution effects are already covered under SA Objectives 1, 3, 16-18. The precautionary principle is inherently being applied to the site allocation process through the Council's own site assessment methodology and this independent SA of the Waste Core Strategy and the potential strategic waste sites to be allocated within it.
16. To protect and enhance soil / land quality in Gloucestershire.	++	++	++	++	This is a large sized site located entirely on previously developed land, therefore should have a significant positive effect on this objective. Medium sized-facilities may result in a smaller area of the site being developed, thus having even greater positive effects, although this is uncertain and will depend on the final design of the facility which will not be known until the planning application stage.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
17. To protect and enhance air quality in Gloucestershire.	++/-	++	++/-	++	The GCC Highways Assessment found that the site is within close proximity of the strategic highways network via Junction 12 of the M5 motorway (via A38/the Cross Keys roundabout). In addition, the site is more than 1km from an AQMA; therefore in this sense the site should have significant positive impacts on protecting air quality. However, where thermal treatment facilities are proposed, there could also be negative impacts on air quality due to the release of gases through thermal processes. This negative effect would not be significant, however, because the overall scale of emissions from thermal treatment facilities is relatively small and also because of the distance of the site from an AQMA.
18. To protect and enhance water quality in Gloucestershire.	0	0	0	0	Potential sites for waste management are expected to have no effect on water quality, as the requirement for future residual waste management within Gloucestershire is likely to be met by modern facilities within enclosed buildings.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
19. To reduce the adverse impacts of lorry traffic on the environment and communities.	++/-	++/-	++/-	++/-	The GCC Highways Assessment concluded that the site is too far from the existing rail or water infrastructure for these modes of transport to be utilised; therefore negative effects in terms of sustainable transport use are likely. However, the GCC Highways Assessment also found that the site is within close proximity of the strategic highways network via Junction 12 of the M5 motorway (via the A38/the Cross Keys roundabout); therefore mixed effects are likely overall. There may be some level of variation between the effects of medium and larger sites, as larger sites may result in higher levels of waste transportation. However, as this will not always be the case and cannot be assumed, no differences are reflected in the scores.
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy .	+	+	+	+	The Waste Core Strategy is seeking to allocate strategic sites for recovery of residual municipal waste. All facility types that may be developed on these sites are therefore likely to have minor positive effects by ensuring waste management occurs using processes higher up the waste hierarchy than landfill.

SA Objective	Large Facility (Thermal Treatment)	Large Facility (not Thermal Treatment)	Medium Facility (Thermal Treatment)	Medium Facility (not Thermal Treatment)	Justification
Site 4: Land at Moreton Valance					
21. To reduce the global use of primary materials and minimise net energy balance requirements.	++?	+	++?	+	<p>All facility types that may be developed on sites allocated for residual waste management in the Waste Core Strategy are likely to have positive effects by ensuring that waste management occurs using processes higher up the waste hierarchy than landfill, which should increase levels of recycling, composting and recovering value or energy from waste and reducing use of primary materials.</p> <p>Thermal treatment facilities may have a significant positive effect on this objective if the potential for using the energy produced is realised.</p>
22. To reduce contributions to and to adapt to Climate Change .	++	+?	++	+?	<p>The fact that the site is previously developed means that there are unlikely to be opportunities for incorporating a CHP scheme. However, the energy recovered from the waste management process within a thermal treatment facility may still be used for something other than CHP and this would have a significant positive effect on this objective. The contribution of the facility to climate change adaptation will depend more on the specific design of the facility and its layout, and incorporation of sustainable construction techniques, drainage systems and measures to enable changes to new technologies as they develop. This cannot be assessed until the detailed proposals for a site are made known at the planning application stage and will also be influenced by other Waste Core Strategy policies such as WCS13: Design.</p>

New Core Policy WCS6a Landfill

Table A7 New Core Policy WCS6a: Landfill

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	-?	The policy could have a minor negative effect on health and wellbeing if landfill developments or extensions were located within 250m of sensitive receptors such as housing, offices, hospitals, faith centres etc. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, Policy WCS7 requires an assessment of noise, odour, traffic, dust, health and visual impacts and states that planning permission would not be granted where the proposal would have an unacceptable adverse impact. The General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) also require an evaluation to be carried out of the potential environmental impact of development, including noise, dust, fumes, smell and traffic, on the surrounding area and highway network. Appropriate measures would be required to ensure that there would be no unacceptable impact on the local community.
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	0	The policy is not expected to have a direct impact on education and public participation in waste management.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	-?	The policy could have a minor negative effect on amenity of local communities if landfill developments or extensions were located within 250m of sensitive receptors such as housing, offices, hospitals, faith centres etc. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, Policy WCS7 requires an assessment of noise, odour, traffic, dust, health and visual impacts and states that planning permission would not be granted where the proposal would have an unacceptable adverse impact. The General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) also require an evaluation to be carried out of the potential environmental impact of development, including noise, dust, fumes, smell and traffic, on the surrounding area and highway network. Appropriate measures would be required to ensure that there would be no unacceptable impact on the local community.
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	0	The policy is not expected to have a direct impact on sustainable economic development.
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	0	The policy is not expected to have a direct impact on the economically sustainable management of waste.
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	0	The policy is not expected to have a direct impact on employment opportunities within Gloucestershire. Although, should a landfill development be permitted there may be a small amount of new jobs created, but this is considered likely to have a negligible impact due to the relatively small contribution that waste management facilities make to overall employment in Gloucestershire.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	-?	<p>The policy could have a minor negative effect on safety of commercial or military aerodromes if landfill developments or extensions were located within an aerodrome safeguarding area, as landfills which accept putrescible waste, can attract birds. The numbers, and movements of some species of birds, may be influenced by the distribution of landfill sites. Where birds congregate in large numbers, they can provide a hazard to aircraft at locations close to aerodromes or low flying areas. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, the General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) state that where a proposal falls within the safeguarding area of a civil or military airport, the developer should consult with the appropriate organisation (i.e. Civil Aviation Authority, Gloucestershire Airport or Ministry of Defence).</p>
8. To protect, conserve and enhance biodiversity in Gloucestershire.	-?	<p>The policy could have a minor negative effect on biodiversity if landfill developments or extensions were located within close proximity to an international (SAC, RAMSAR, SPA), national (NNR, SSSI), or local nature conservation designation, or BAP Priority Species and Habitat(s). However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, that it would involve the minimum amount of waste necessary to deliver the County's needs, and that it does not fall within European Sites of Nature Conservation (and appropriate buffers). In addition, the General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) state that survey(s) are required to determine whether notable species, habitats or possibly designated sites may be adversely affected by development, and also that sufficient information to inform an appropriate assessment under the Habitats Regulations also needs to be provided to ensure no adverse effects on the integrity of any SAC, SPA or Ramsar site.</p>

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
9. To protect, conserve and enhance the landscape in Gloucestershire.	-?	The policy could have a minor negative effect on landscape as landfill developments or extensions could alter the landscape character of the area in which they are located, and/or have an adverse impact on the views to or from a sensitive landscape such as the AONBs within the County. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, the General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) now require all proposals to be supported by a landscape and visual impact assessment.
10. To ensure that waste sites have the potential for adequate screening and/or innovative design to be incorporated.	0	The policy is not expected to have a direct impact on the potential for waste sites to be well-screened.
11. To protect conserve and enhance Gloucestershire's material, cultural and recreational assets .	-/-?	The policy could have a minor negative effect on cultural and recreational assets if landfill developments or extensions are within close proximity, making the sites less attractive for users or in some cases removing the access (e.g. Public Rights of Way), which would make the negative effect significant. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, the General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) require an evaluation to be carried out of the potential environmental impact of development, including noise, dust, fumes, smell and traffic, on the surrounding area and highway network. Appropriate measures would be required to ensure that there would be no unacceptable impact on the local community.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
12. To protect conserve and enhance geodiversity in Gloucestershire.	+/-?	The policy could have mixed effects on geodiversity; minor positive effects if the landfill development exposed some valuable geological strata and was used and restored in such a way that the geological exposure was retained for public access; but negative if the landfill development destroyed existing exposures or newly exposed geological strata. This will depend on the location of any new or extended landfill development and is therefore uncertain. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs.
13. To protect conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	-/-?	The policy could have a minor negative effect on townscapes and heritage assets if landfill developments or extensions are within close proximity, affecting the character or setting of those assets or in some cases destroying the asset (e.g. archaeological sites), which would make the negative effect significant. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, new Core Policy 12a seeks to ensure stringent protection of the historic environment, and the General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) require all proposals to be supported by an assessment of the significance of the heritage assets that could be affected and an assessment of the impacts of the proposed waste development.
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	-/-?	The policy could have a minor or significant negative effect on flooding if the landfill development or extension was located in an area at high risk of flooding. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, the General Development Criteria in Appendix 5 of the WCS (against which any waste proposal will be assessed) require all proposals to be supported by a Flood Risk Assessment.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	-?	The policy could have a minor negative effect on preventing pollution due to odours and litter that can be associated with landfill operations. However, this effect is not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, it is assumed that new landfill development will be operated in accordance with the strict pollution prevention requirements of the Environmental Permitting regime administered by the Environment Agency.
16. To protect and enhance soil/land quality in Gloucestershire.	-?	The policy could have a minor negative effect on soil/land quality due to loss of good quality soil or land (e.g. high grade agricultural land) during landfill operations. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs.
17. To protect and enhance air quality in Gloucestershire.	-?	The policy could have a minor negative effect on air pollution due to odours and gases that can be associated with landfill operations. However, this effect is not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, it is assumed that new landfill development will be operated in accordance with the strict pollution prevention requirements of the Environmental Permitting regime administered by the Environment Agency.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
18. To protect and enhance water quality in Gloucestershire.	-?	The policy could have a minor negative effect on water pollution due to leachates that can be associated with landfill operations. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, that it would involve the minimum amount of waste necessary to deliver the County's needs, and that it should not fall within major aquifers or source protection zones. In addition, it is assumed that new landfill development will be operated in accordance with the strict pollution prevention requirements of the Environmental Permitting regime administered by the Environment Agency.
19. To reduce the adverse impacts of lorry traffic on the environment and communities through means such as: a) reducing the need to travel b) promoting more sustainable means of transport e.g. by rail or water c) sensitive lorry routing d) the use of sustainable alternative fuels e) promoting the management of waste in one of the nearest appropriate installations.	-?	The policy could have a minor negative effect in terms of increasing lorry traffic along particular routes between waste arisings and the landfill location. However, this effect is uncertain, as the location of potential landfill sites will not be known until planning applications come forward. It is also not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, the policy states that waste from outside the county will only be disposed within Gloucestershire if it can be demonstrated to be the most sustainable option, so cross boundary waste movements are unlikely to increase. Finally, General Development Criteria in Appendix 5 require a full Transport Assessment for all waste development proposals.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy (i.e. Prevent, Reduce, Reuse, Recycle, Recover, Dispose) to achieve the sustainable management	-/+	The policy will have a negative effect in terms of reducing waste to landfill, if proposals for new or extended landfills come forward that meet the strict criteria within the policy and are therefore permitted. However, this is not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. Because of these strict requirements, and in particular ensuring that the waste could not otherwise be managed further up the waste hierarchy, this policy will also have a positive effect on this objective.
21. To reduce the global use of primary materials and minimise net energy balance requirements.	0	The policy is not expected to have a direct impact on the use of primary materials.
22. To reduce contributions to and to adapt to Climate Change .	-?	The policy could have a minor negative effect on reducing contributions to climate change due to the potential for methane gas emissions associated with landfill operations. However, this effect is not considered to be very likely given the restrictions within the policy that landfill will only be a last resort where it can be demonstrated that waste cannot be managed further up the waste hierarchy through reuse, recycling and recovery, and that it would involve the minimum amount of waste necessary to deliver the County's needs. In addition, it is assumed that new landfill development will be operated in accordance with the strict pollution prevention requirements of the Environmental Permitting regime administered by the Environment Agency.
Original SA Objective 1: To promote sustainable development and sustainable communities in Gloucestershire in particular giving people the opportunity to live in an affordable and sustainably designed and constructed home.	0	The policy is not expected to have a direct impact on this objective.

SA Objective	SA Score	Justification
New Core Policy WCS6a: Landfill		
Original SA Objective 2: To safeguard sites suitable for the location of waste management facilities or future mineral development from other proposed development.	0	The policy is not expected to have a direct impact on this objective.

New Core Policy WCS12a Historic Environment

Table A8 New Core Policy WCS12a: Historic Environment

SA Objective	SA Score	Justification
New Core Policy WCS12a: Historic Environment		
1. To promote sustainable development and sustainable communities and improve the health and wellbeing of people living and working in Gloucestershire as well as visitors to the County.	0	The policy is not expected to have a direct impact on health and wellbeing.
2. To educate the public about waste issues and to maximise community participation and access to waste services and facilities in Gloucestershire.	0	The policy is not expected to have a direct impact on education and public participation in waste management.
3. To safeguard the amenity of local communities from the adverse impacts of waste development.	+?	The policy is not expected to have a direct impact on amenity; however preserving the quality of Gloucestershire's historic environment and heritage assets through restricting inappropriate development near to them may have indirect benefits associated with the maintenance of high quality built environments.
4. To promote sustainable economic development in Gloucestershire giving opportunities to people from all social and ethnic backgrounds.	0	The policy is not expected to have a direct impact on this sustainable economic development.
5. To manage waste in an economically sustainable way through means that represent good value for tax payers in Gloucestershire.	0	The policy is not expected to have a direct impact on the economically sustainable management of waste.

SA Objective	SA Score	Justification
New Core Policy WCS12a: Historic Environment		
6. To provide employment opportunities in both rural and urban areas of the County, promoting diversification in the economy.	0	The policy is not expected to have a direct impact on employment opportunities within Gloucestershire.
7. To ensure that waste sites do not compromise the safety of commercial or military aerodromes .	0	The policy is not expected to have a direct impact on aircraft safety.
8. To protect, conserve and enhance biodiversity in Gloucestershire.	0	The policy is not expected to have a direct impact on biodiversity.
9. To protect, conserve and enhance the landscape in Gloucestershire.	0	The policy is not expected to have a direct impact on landscape.
10. To ensure that waste sites have the potential for adequate screening and/or innovative design to be incorporated.	0	The policy is not expected to have a direct impact on the potential for waste sites to be well-screened.
11. To protect conserve and enhance Gloucestershire's material, cultural and recreational assets .	++	Gloucestershire's heritage assets comprise an important cultural and recreational resource within the county; therefore the conservation of their character and quality through restricting the development of waste sites that could adversely affect them is expected to have a significant positive impact on this objective.
12. To protect conserve and enhance geodiversity in Gloucestershire.	+	The policy could have an indirect impact on geodiversity, as it may help to conserve archaeological remains some of which may contribute to geodiversity within the County.

SA Objective	SA Score	Justification
New Core Policy WCS12a: Historic Environment		
13. To protect conserve and enhance townscapes and Gloucestershire's architectural and archaeological heritage .	++	Gloucestershire's heritage assets play an important part in the creation of high quality townscapes and directly constitute Gloucestershire's architectural and archaeological heritage; therefore the conservation of their character and quality through restricting the development of waste sites that could adversely affect them is expected to have a significant positive impact on this objective.
14. To prevent flooding , in particular preventing inappropriate development in the floodplain and to ensure that waste development does not compromise sustainable sources of water supply.	0	The policy is not expected to have a direct impact on flooding.
15. To prevent pollution and to apply the precautionary principle in consultation with waste regulation authorities.	0	The policy is not expected to have a direct impact on pollution prevention.
16. To protect and enhance soil/land quality in Gloucestershire.	0	The policy is not expected to have a direct impact on soil and land quality.
17. To protect and enhance air quality in Gloucestershire.	0	The policy is not expected to have a direct impact on air quality.
18. To protect and enhance water quality in Gloucestershire.	0	The policy is not expected to have a direct impact on water quality.

SA Objective	SA Score	Justification
New Core Policy WCS12a: Historic Environment		
19. To reduce the adverse impacts of lorry traffic on the environment and communities through means such as: a) reducing the need to travel b) promoting more sustainable means of transport e.g. by rail or water c) sensitive lorry routing d) the use of sustainable alternative fuels e) promoting the management of waste in one of the nearest appropriate installations.	0	The policy is not expected to have a direct impact on the impacts of lorry traffic.
20. To reduce waste to landfill and in dealing with all waste streams to actively promote the waste hierarchy (i.e. Prevent, Reduce, Reuse, Recycle, Recover, Dispose) to achieve the sustainable management	0	The policy is not expected to have a direct impact on the proportion of waste going to landfill.
21. To reduce the global use of primary materials and minimise net energy balance requirements.	0	The policy is not expected to have a direct impact on the use of primary materials.
22. To reduce contributions to and to adapt to Climate Change .	0	The policy is not expected to have a direct impact on adaptation to climate change.

SA Objective	SA Score	Justification
New Core Policy WCS12a: Historic Environment		
Original SA Objective 1: To promote sustainable development and sustainable communities in Gloucestershire in particular giving people the opportunity to live in an affordable and sustainably designed and constructed home.	0	The policy is not expected to have a direct impact on this objective.
Original SA Objective 2: To safeguard sites suitable for the location of waste management facilities or future mineral development from other proposed development.	0	The policy is not expected to have a direct impact on this objective.

Appendix 2 Revised SA Monitoring Framework

1.1 **Table A9** below sets out in the first column the likely significant positive effects of the WCS that were identified through the November 2010 SA Report and the SA Report Update (June 2011) and this SA Addendum. The second column includes the relevant indicators included in the WCS Monitoring Framework. Additional potential indicators have been suggested where appropriate, particularly where no indicators are currently included in the framework in relation to a particular significant effect. 'Tracked changes' have been used to show where the SA monitoring framework has been revised to reflect the Main Modifications to the WCS and the findings of this current SA Addendum.

Table A9: How significant positive SA effects will be monitored through the Gloucestershire Waste Core Strategy Annual Monitoring Report

What needs to be monitored?	Is it covered by the WCS Monitoring Framework?
Protecting the health and wellbeing of local communities (SA objective 1)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The number and percentage of proposals where cumulative impact was cited as a reason for refusal • Overall levels of satisfaction with local area (currently NI005)
Maximising the opportunities for education and public participation in waste management (SA objective 2)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The number of education/promotional visits/exhibitions carried out per annum. <p>Suggested additional indicators include:</p> <ul style="list-style-type: none"> • The number of waste facilities incorporating education centres etc.
Safeguarding levels of amenity within Gloucestershire (SA objective 3)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The number and percentage of proposals where cumulative impact was cited as a reason for refusal • Overall levels of satisfaction with local area (currently NI005)
<u>Protecting, conserving and enhancing biodiversity (SA objective 8)</u>	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • <u>The number of waste related planning permissions granted in an area of with features of national or local nature conservation importance</u> • <u>The number of waste related planning applications refused per annum where nature conservation issues were cited as part of the reasons for refusal</u>
Conserving the quality of the landscape (SA objective 9)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • <u>Total extent of the Gloucester/Cheltenham Green Belt (hectares)</u> • <u>The number of waste related planning permissions granted in the Green Belt/AONB per annum</u> • <u>The number of waste related planning permissions refused per annum where Green Belt/AONB issues were cited as part of the reasons for refusal.</u>

What needs to be monitored?	Is it covered by the WCS Monitoring Framework?
Maximising the opportunities available for screening waste sites and/or incorporating innovative design (SA objective 10)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> The number of waste management planning applications submitted with a design and access statement.
Protecting Gloucestershire's material, cultural and recreational assets (SA objective 11)	<p>No – suggested indicators include:</p> <ul style="list-style-type: none"> Percentage of planning permissions that either maintain, provide for or enhance Public Rights of Way.
Protecting townscapes and built heritage assets (SA objective 13)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> <u>Number and % of proposals where impact on the Historic Environment is cited as a reason for refusal.</u> <u>Number of planning applications within 250m of a historic asset</u>
Minimising the risk of flooding (SA objective 14)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> The number and percentage of waste sites incorporating sustainable drainage measures per annum The number and percentage of waste permissions located on designated floodplain land <u>per annum</u> <u>The number and percentage of waste refusals where the floodplain and safeguarding water supplies acted as part of the reason for the refusal per annum</u>
Preventing pollution (SA objective 15)	<p>No – suggested indicators include:</p> <ul style="list-style-type: none"> Number of pollution/contaminated land incidents related to waste Levels of key air pollutants
Conserving water quality (SA objective 18)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> <u>Total number of waste water treatment facilities in Gloucestershire</u> <u>The number of new or expanded waste water treatment facilities permitted per year</u> <u>The number and percentage of waste refusals where the floodplain and safeguarding water supplies acted as part of the reason for the refusal per annum</u>

What needs to be monitored?	Is it covered by the WCS Monitoring Framework?
Reducing the impacts of lorry traffic associated with the transportation of waste (SA objective 19)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The number and percentage of waste related developments using non-road means of transport • The number and percentage of waste related planning applications supported by Travel Plans • <u>The number and percentage of waste related planning applications supported by a Transport Assessment</u> • <u>The number of Section 106 agreements relating to transport entered into per annum</u> • <u>The number and percentage of all waste refusals per annum, where highways was cited as the reason for refusal</u> • <u>The number of applications where the 'county's needs' was used as a refusal reason</u>

What needs to be monitored?	Is it covered by the WCS Monitoring Framework?
Encouraging the movement of waste up the waste hierarchy (SA objective 20)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • <u>The number of 'major development' applications that include a Waste Minimisation Statement</u> • The total available recycling/composting capacity • <u>The number of new/expanded recycling and composting facilities permitted per year</u> • <u>The number of recyclates 're-processing' facilities in Gloucestershire</u> • <u>The total available bulking and transfer capacity</u> • <u>The number of new/expanded bulking and transfer facilities permitted per year</u> • <u>The number of proposals for permanent/temporary inert recycling and recovery facilities permitted per year</u> • <u>The total available AD capacity (and total available AD capacity for agricultural waste and sewage sludge respectively)</u> • <u>The number of new/expanded AD facilities permitted per year</u> • <u>The total amount of residual waste recovery capacity for MSW and C&I waste</u> • <u>The total amount and percentage of C&I waste and MSW 'treated' through 'other recovery' waste management processes per year</u> • <u>The total amount of landfill capacity</u> • <u>The number of landfill applications permitted</u> • The amount of residual waste per household • The percentage of household waste sent for reuse, recycling and composting
Minimising the use of primary materials (SA objective 21)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The number of new developments involving the use of recycled aggregates • <u>The number of 'major development' applications that include a Waste Minimisation Statement</u>

What needs to be monitored?	Is it covered by the WCS Monitoring Framework?
Adapting to, or mitigating the effects of, climate change (SA objective 22)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The installed capacity of new renewable energy systems associated with waste water proposals • The percentage of renewable energy sourced from the by-products of waste management • <u>Energy capacity in mega watts from renewable energy facilities associated with waste water treatment in Gloucestershire and the percentage this represents of total renewable energy capacity in Gloucestershire</u>
Safeguarding sites for waste management facilities (Original SA objective 2)	<p>Yes – indicators include:</p> <ul style="list-style-type: none"> • The number and percentage of non-waste developments permitted on <u>existing waste management sites</u>/proposed (allocated) waste sites • The number and percentage of proposals where impact on an existing or proposed waste management facility was cited as a reason for refusal