

Loughborough University East Park

Supplementary Planning Document – Consultation Draft

February 2005

SUSTAINABILITY APPRAISAL REPORT

Loughborough University East Park Supplementary Planning Document

Sustainability Appraisal Report

Introduction

1. Sustainability Appraisal is an integral part of the process for preparing Supplementary Planning Documents (SPDs). It is about making sure that, by carrying out the proposals set out in such planning documents, the aim of sustainable development is achieved. To achieve sustainable development the Government has 4 objectives:

- Social progress which recognises the needs of everyone
- Effective protection of the environment
- Prudent use of natural resources and
- Maintenance of high and stable levels of economic growth and employment

2. The contribution to sustainable development is a key aim of planning. Sustainable development is simply about ensuring a better quality of life for everyone now and for future generations. A widely used definition was drawn up the World Commission on Environment and Development in 1987:

‘development that meets the needs of the present without compromising the ability of future generations to meet their own needs’.

3. In applying the principles of sustainable development the Council must consider how its planning documents address the four Government objectives. They should seek to achieve outcomes that enable social, environmental and economic objectives are reached together over time. Sustainability appraisal is a tool for achieving this aim.

Summary and Outcomes

4. Sustainability Appraisal is a way of ensuring that the potential economic, social and environmental effects of the proposed Loughborough University East Park SPD are identified and measures are taken to remedy any detrimental effects. The SPD proposes a masterplan to guide the redevelopment and refurbishment of the East Park part of the university Campus. The alternative would be a ‘business as usual’ approach which is likely to result in piecemeal schemes to redevelop the academic and residential accommodation.

5. Loughborough University contributes to the local economy and its continued success is important in this respect. The student population also has a beneficial economic impact to the town. There are also social issues relating to the influence of a high student population in terms of the age make-up as well as the accommodation of students . There are environmental characteristics that will influence the redevelopment of the campus, including flood risk, a ‘Local List’ building and the location of the site fronting a major road route through Loughborough.

6. The policies of the Loughborough University East Park SPD have been assessed individually against the sustainability objectives to measure their likely economic, social and environmental effects. No negative effects were identified. The SPD scores few

positive effects for the sustainability objectives. Significant positive effects are scored for two of the 27 objectives relating to:

- maintaining and enhancing the landscape and townscape character; and
- the re-use of previously developed land and buildings.

7. In terms of the environment objectives there are no significant negative or positive effects for protecting water quality, minimising water consumption, protecting and improving air quality reducing contributions or vulnerability to climate change. Similarly, in terms of material assets, the objectives relating to extraction, re-use and recycling of minerals and aggregates, managing waste and minimising the use of energy do not score any significant effect. Movement towards these objectives relate in particular to the lack of reference in the policies to sustainable design and construction techniques.
8. The social objectives generally do not show significant negative or positive effects. The exception is that there will be marginally positive effects in terms of the provision of some facilities for the users of this part of the University campus. However, these effects are less likely to have such an impact for the wider population of Charnwood.
9. Economic effects relate to improvements in the quality of buildings for academic and associated activities for the university as well as the appearance of the entrance. This is expected to increase the viability of the university and so secondary economic impacts for the wider Borough.
10. In summary, the recommendations relate to three key areas. Firstly, design and construction techniques which consider the wider economic, social and environmental implications must be adequately promoted by the policies of the SPD. Design techniques to address the issues listed below should be added to the policies of this SPD and/or reference made to the Leading in Design SPD:
 - maintaining, enhancing and managing the mix and variety of wildlife habitats and species;
 - maintain and enhance landscape and built form;
 - protecting water quality, reducing water consumption and reducing flood risk;
 - protection and re-use of soils;
 - Designing for less car use, energy efficient design and use of renewable energy to reduce greenhouse gas emissions;
 - Ensure new building is adaptable to temperature change and possible increased flood risk;
 - Reduce, re use and recycling of minerals and aggregates resources used as building materials;
 - Reducing, re-use and recycling of waste materials;
 - techniques to reduce crime, the fear of crime and anti-social behaviour;
 - promoting vibrant and viable towns and villages.
11. Secondly, in terms of transport related issues. The emphasis should encourage a move away from car use. This can be achieved through:
 - amending objective 6 of the SPD to include reference to reducing car use;
 - clear reference is made to access to the Campus by public transport, cycling and pedestrians and
 - clarification is made with regard to reducing car use and car parking standards.

The effect of a new vehicle access from Epinal Way onto the Campus at East Park is unclear in terms of the level of vehicle transport and the impact on walking and cycling and thus any resultant effects upon air quality, climate change or healthy lifestyles. A Transport Impact Assessment will help to determine these issues. Similarly, the scale of the multi-story car park, as compared to the existing car parking spaces, is unclear and it is difficult to appraise the potential effects.

- I2. Thirdly, the site's location is partly within the Environment Agency's flood zone area. This is an issue that should also be tackled in terms of how any development would lessen any risks posed through flooding. This relates to the sustainability objectives on protecting water quality and reducing vulnerability to climate change.
- I3. The Loughborough University East Park SPD will be monitored through a single system for monitoring Charnwood's Development Framework.
- I4. The SPD will be amended to take account of this Sustainability Appraisal after the consultation period and prior to final publication. The key differences the Sustainability Appraisal process has made are:
 - highlighting a number of gaps in terms of policy references to sustainable design and construction. It is recommended that such references are added to bring the policies of the SPD in line with its stated objectives with regard to energy efficiency and undertaking development in an environmentally sustainable manner.
 - Recommending reference is made to the use of the Leading in Design SPD in terms of guidance for sustainable design and construction techniques.
 - Recommending further clarity is given in terms of reducing car use through measures to improve bus routes, walking and cycling but particularly in relation to the scale, in terms of spaces, of the multi-storey car park.
 - Highlighting that the policies should be more clearly defined and linked to the design considerations.

How to Comment

- I5. The Council has produced this Sustainability Appraisal Report to accompany publication of the draft *Loughborough University East Park SPD* for consultation.
- I6. The findings of this sustainability appraisal along with any consultation responses will be taken into account prior to finalising the *Loughborough University East Park SPD*. Any significant and valid responses requiring changes will have to be subject to sustainability appraisal to ensure that there will be no significant economic, social and environmental effects.
- I7. Comments regarding the Sustainability Appraisal Report should be sent to the Council by Thursday 24th March 2005 to:
Planning Policy Team, Charnwood Borough Council, Council Offices, Southfield Road, Loughborough LE11 2TN or by email to localplans@charnwood.gov.uk
- I8. Please feel to contact the Planning Policy Team if you have any queries concerning this document (telephone 01509 634769 or email localplans@charnwood.gov.uk).

If you would like to have the content of any part of this document explained to you in your language or to obtain copies in Braille, on audio tape or large print, please contact the Planning Policy Team (telephone 01509 634769 or email localplans@charnwood.gov.uk).

Appraisal Methodology

19. The Council is developing with the help of Halcrow Group Ltd an approach to Sustainability Appraisal which is at the heart of preparing the Local Development Framework from the outset of developing the constituent Development Plan Documents (DPD) and Supplementary Planning Documents (SPD).
20. The Planning and Compulsory Purchase Act 2004 makes Sustainability Appraisal a requirement for Development Plan Documents and Supplementary Planning Documents. Alongside this is the requirement to undertake environmental assessment of plans and programmes through the European Directive 2001/42/EC. Regulations on Local Development (SI 2004/2204) and the Environmental Assessment of Plans and Programmes (SI 2004/1633) as well as draft Government guidance on sustainability appraisal have also been taken into account in developing an approach. This includes the following stages:
 - Setting the context, objectives and baseline data
 - Developing and refining options
 - Appraising the effects of the draft DPD or SPD
 - Consultation on the Sustainability Report and draft DPD or SPD
 - Monitoring the implementation of the DPD or SPD
21. The approach adopted for this Sustainability Appraisal Report follows the method being developed by Halcrow Group Ltd for Sustainability Appraisal of the documents comprising Charnwood's Development Framework. The development of this approach did not begin until after the publication of the draft Government guidance on sustainability appraisals published in September 2004. Preparation of the draft Loughborough University East Park SPD began prior this. As a result, work on the sustainability appraisal for this SPD did not begin until after an initial key stakeholder consultation had taken place, and therefore, it was not possible to carry out early stakeholder consultation on the scope of the Appraisal. Given the stage the draft SPD has reached it is not considered appropriate to carry out a separate consultation on the scope of the sustainability appraisal for this SPD. The Sustainability Appraisal Report focuses on the SPD. However, if you wish to comment on the scope of the appraisal you may do so at this stage.
22. The Sustainability Appraisal for the *Loughborough University East Park* SPD was undertaken by Council officers in January 2005.
23. An initial stakeholder consultation for the *Loughborough University East Park* SPD was undertaken in October 2004 prior to the Sustainability Appraisal. This involved contacting Countryside Agency, English Heritage, English Nature and Environment Agency and other key stakeholders by letter and requesting their views.

Background

24. The Sustainability Appraisal will measure the policies set out in the *Loughborough University East Park* SPD against a number of sustainability objectives to establish whether

there will be any significant economic, social or environmental effects. Where necessary consideration will be given to revising policy or applying measures to tackle unwanted effects. This Sustainability Report sets out how the sustainability report was undertaken, the results of the appraisal and the recommendations for amendment to policy.

25. The purpose of the *Loughborough University East Park SPD* is to provide a masterplan to establish the key design principles to guide the refurbishment and redevelopment of the East Park area of the university Campus which fronts Epinal Way.
26. The University has found that a number of buildings on this part of the campus are nearing the end of their useful life. These buildings are not fit to meet current academic requirements or allow for growth. The quality of the buildings and spaces around them influence a student's decision concerning the choice of university. The intention is to review the East Park Campus facilities and update them as necessary in a way that reflects the high academic standards over a range of study areas.
27. The objectives of the masterplan are:
 - To allow for redevelopment of a number of buildings on the East Park campus that are outdated and unsuitable for modern academic needs and to provide space for new initiatives;
 - To cater for medium term academic expansion and residential accommodation needs, together with rationalisation of the estate;
 - To achieve the most efficient use of land and buildings and allow for additional floorspace on the site, whilst also improving the environment;
 - To provide a more welcoming presence to Epinal Way, that currently largely consists of blank elevations of substantial sporting facilities at the main gateway to the campus;
 - To create a more pleasant pedestrian environment for users of the campus and reduce pedestrian/vehicular conflict;
 - To reduce vehicular travel distances on the campus;
 - To improve the visual and functional coherence of the campus so that visitors and newcomers can orientate themselves, both as car users and pedestrians;
 - To allow for a flexible phasing of development to respond to prioritisation of academic needs and availability of funding;
 - To provide new buildings that adopt energy efficient design principles;
 - To ensure the continued development of the site in an environmentally sustainable manner, taking into account such factors as flood risk, drainage and biodiversity.
28. Appendix I signposts the components of this Sustainability Report which make up the Environmental Report for the purposes of complying with the Strategic Environmental Assessment Directive (2001/42/EC).

Sustainability Objectives, Baseline Data and Context

29. The *Loughborough University East Park SPD* has been prepared in the context of the Policy CF/4 'Loughborough University and College Campus' of the adopted Borough of Charnwood Local Plan 1991-2006. This policy indicates that proposals for University and college development for academic and ancillary uses and student accommodation on

campus will be considered favourably so long as a number of criteria relating to facilities for pedestrians and cyclists, design and layout, landscaping and the loss of trees, open space and other important features, are met. It is to this policy that the *Loughborough University East Park SPD* is developed. However, the SPD will also take into account other relevant policies of the adopted Local Plan.

30. The Corporate Plan to 2011/12 'Leading in Leicestershire' sets out the overarching priority for the Council as:

'Ensuring the Borough is recognised as Leading in Leicestershire for the quality of its living environment for all.'

This SPD will support the Council's overarching priority and is relevant to the key aims of the Corporate Plan. Six aims have been identified to support achievement of the priority:

- A sustainable environment:
- A clean, safe and healthy environment
- Leisure and cultural opportunities for all
- Decent homes and neighbourhoods
- An economically prosperous environment
- An excellent council

31. Loughborough University East Park is located about 1km from Loughborough town centre and fronts Epinal Way, the A6004, a principal road route through the town. This principal road route can be busy and average traffic flows are measured along this part of Epinal Way as part of traffic flow monitoring. Figures increased by 10% between May 2003 and May 2004 following the opening of the Epinal Way extension. Part of the site falls within the Environment Agency's flood zone indicating an increased risk of flooding in this location. West Tower (also known as 'The Towers') is a 'Local List' building. Although such designated buildings do not enjoy the full protection given to Listed Buildings, the Council will expect development proposals to respect the special architectural and visual qualities of the building and its setting and that a high standard of design is achieved.

32. Loughborough University plays a major role in the local economy, particularly in Loughborough but also in the wider Borough, for example, in terms of an employer and its links to the technology sectors. The student population also has an impact on the local economy in terms of its spending.

33. In addition the student population influences the social characteristics, particularly in Loughborough in terms of the make-up of the population and in relation to the housing market and the impact on local neighbourhoods close to the university. Where student accommodation needs are not being met on the university campus students turn to the private rented market in nearby locations off campus.

34. A sustainability framework has been drawn up to assess consistently the component documents of the Charnwood's Development Framework. This framework takes account of the objectives of national, regional and local planning policy, other strategies, plans and programmes and the context of the economic, social and environmental characteristics of Charnwood. The sustainability framework sets out sustainability

objectives against which the proposals will be measured to assess significant effects. The sustainability framework is set out in Appendix II.

SPD Issues and Options

35. Two options were considered in relation to preparing additional guidance on the refurbishment and redevelopment of the East Park part of the university Campus:
- to prepare a masterplan setting out the key principles to guide the refurbishment and redevelopment of the East Park. This will form the content of the Loughborough University East Park SPD;
 - to undertake a ‘Business as Usual’ approach and rely on the existing Local Plan Policy CF/4 supplemented by other existing national, regional and local planning policy.
36. Although the Local Plan provides broad guidance there is some concern that recent development on Campus has been piecemeal. A ‘Business as Usual Approach’ has the potential to have the same economic, social and environmental effects but is less likely if a piecemeal approach is taken. A masterplan will ensure that the design and layout of the refurbishment and redevelopment of East Park makes full use of the opportunities available whilst remaining compatible with the character and appearance of the Campus and neighbouring areas.

SPD Policies

37. The policies of the *Loughborough University East Park SPD* have been assessed individually against the sustainability objectives. The individual assessments are set out in Appendix III which is available on the Council’s website or by request. A summary is given in Appendix IV. The effects will be greater for some objectives than others. Table A illustrates those policies which will significantly or marginally support the sustainability objectives.

Table A – Loughborough University East Park SPD Policies indicating Positive Effects towards Sustainability Objectives

Sustainability Objective	Significant Positive Effect		Marginal Positive Effect	
	Policies	Number	Policies	Number
To maintain and enhance biodiversity, flora and fauna		0	2	1
To maintain and enhance the landscape and townscape character (whilst minimising visual impacts of proposed developments)	1	6, 7		2
To protect and improve surface and groundwater quality		0		0
To minimise water consumption		0		0
To protect and improve air quality		0		0
To conserve soil resources and quality		0	1, 2, 3, 4, 6, 7	6
To reduce contributions to climate change		0		0

Sustainability Objective	Significant Positive Effect		Marginal Positive Effect	
	Policies	Number	Policies	Number
To reduce vulnerability to climate change		0		0
To conserve and where appropriate enhance the historic and cultural environment		0		0
To increase the (appropriate) re-use of previously developed land and buildings	1, 2, 3, 4	4	5, 6, 7	3
To support the sustainable extraction, re use and recycling of minerals and aggregates resources		0		0
To manage waste in accordance with the waste hierarchy in all sectors (i.e. household, commercial and industrial)		0		0
To minimise the use of energy and optimise the use of renewable resources		0		0
To ensure the population of Charnwood can have access to a full range of appropriate public, private, community and voluntary services		0	6	1
To encourage appropriate access to the countryside, open spaces and semi urban environments (eg parks)		0	2, 6	2
Promote a strong community where people feel they have a say in the future		0		0
To reduce crime, anti social behaviour and promote community safety		0	1, 2	2
To ensure that the people of Charnwood have an opportunity to participate in culture, media and sport in Charnwood Borough		0	6	1
To ensure that the housing stock meets the housing needs of all parts of the community		0	6	1
To reduce poverty and social exclusion		0		0
To improve learning, skills and employability for all sectors of the community		0	3, 5	2
To promote vibrant and viable settlements		0	2, 6, 7	3
To promote sustainable design and construction		0		0
To promote healthy life styles		0		0
To encourage sustainable economic growth		0	3, 5	2
To encourage efficient patterns of movement to support sustainable economic growth		0		0
To reduce disparities in economic performance		0		0

38. Table A illustrates that the *Loughborough East Park SPD* on its own scores few positive effects for the sustainability objectives. Significant positive effects are scored for two of the 27 objectives. These relate to maintaining and enhancing the landscape and townscape character and the re-use of previously developed land and buildings. No negative effects were identified.

39. One of the key factors in the low number of positive scores is that the masterplan addresses the redevelopment of an existing site so the effects are anticipated to be considerably less than accommodating the University’s needs on a new, potentially greenfield, site. This is reflected in the scoring. Potential effects for many of the sustainability objectives are not significant enough to score.

40. The sustainability appraisal process has highlighted a number of areas where the sustainability objectives are not being specifically met by this SPD. Table B below makes recommendations, by policy, on how to change the *Loughborough University East Park SPD* to mitigate these shortcomings:

Table B – Suggested Changes to Loughborough University East Park SPD

Policy number	Policy Title	Suggested Changes as a result of the Sustainability Appraisal
1	Creation of a focal point/point of arrival	<p>Recommend that reference is made to the Leading in Design SPD particularly with regard to:</p> <ul style="list-style-type: none"> • re-using soil resources on site, • reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy, • design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk, • sustainable extraction, re use and recycling of minerals and aggregates resources and other building materials, • managing waste in accordance with the waste hierarchy, • sustainable design and construction techniques. <p>Recommend adding reference to consideration of biodiversity, use of local provenance and connectivity/green grid concept in the preparation stage.</p> <p>Recommend that the design of the focal point/point of arrival and improvement of the Epinal Way frontage takes into account the need to consider ways to reduce crime, anti social behaviour and promote community safety</p> <p>Recommend that clear reference is made to access by bus, cycling and pedestrians. Provision for better bus, cycle and pedestrian use will help to improve air quality and to reduce greenhouse gas emissions.</p>
2	Provision of a substantial pedestrianised central area	<p>Recommend that reference is made to the Leading in Design SPD particularly with regard to:</p> <ul style="list-style-type: none"> • maintain and enhance the landscape and townscape character • re-using soil resources on site, • reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy, • design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk, • sustainable extraction, re use and recycling of minerals and aggregates resources and other building materials, • managing waste in accordance with the waste hierarchy, • reduce crime, anti social behaviour and promote community safety • sustainable design and construction techniques.

Policy number	Policy Title	Suggested Changes as a result of the Sustainability Appraisal
		<p>Recommend adding reference to consideration of 'biodiversity', as opposed to the terminology used and retaining connectivity/green grid concept.</p> <p>Recommend adding reference to providing a valuable townscape feature</p>
3	Development of a collegiate building form	<p>Recommend reference to Leading in Design with regard to:</p> <ul style="list-style-type: none"> • taking into account conservation and enhancement of biodiversity; • landscape and townscape character; • surface and groundwater quality, minimising water consumption and reducing flood risk; • energy efficient design; • re-use of soil resources; • reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy; • to design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk; • the sustainable extraction, re use and recycling of minerals and aggregates resources and building materials; • re-use and recycle waste materials; • sustainable design and construction techniques. <p>Recommend reference to the need to take into account landscape and townscape character.</p>
4	Option of an additional vehicle access to East Park campus and new multi-storey car park	<p>Recommend reference to Leading in Design with regard to:</p> <ul style="list-style-type: none"> • surface and groundwater quality, minimising water consumption and reducing flood risk; • re-use of soil resources • to reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy • design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk • sustainable extraction, re use and recycling of minerals and aggregates resources and building materials • to re-use and recycle waste materials • minimise the use of energy and optimise the use of renewable resources • techniques to reduce crime, the fear of crime and anti-social behaviour when designing a car park • sustainable design and construction techniques <p>Recommend that reference is added to ensure that there is no detrimental effect on landscape or townscape character.</p> <p>Recommend that clarification is made with regard to reducing car use and car parking standards. Provision for better bus, cycle and pedestrian use will help to improve air quality and to reduce greenhouse gas emissions.</p>
5	Provide for additional academic floorspace	<p>Recommend reference to Leading in Design with regard to:</p> <ul style="list-style-type: none"> • maintaining, enhancing and managing biodiversity; • surface and groundwater quality, minimising water consumption and reducing flood risk; • re-use of soil resources;

Policy number	Policy Title	Suggested Changes as a result of the Sustainability Appraisal
		<ul style="list-style-type: none"> • to reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy; • design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk; • sustainable extraction, re use and recycling of minerals and aggregates resources and building materials; • to re-use and recycle waste materials; • minimise the use of energy and optimise the use of renewable resources; • techniques to reduce crime, the fear of crime and anti-social behaviour; • sustainable design and construction techniques.
6	Allow for an additional 450 bed residential building	<p>Recommend reference to Leading in Design with regard to:</p> <ul style="list-style-type: none"> • maintaining, enhancing and managing biodiversity; • surface and groundwater quality, minimising water consumption and reducing flood risk; • re-use of soil resources; • to reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy; • design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk; • sustainable extraction, re use and recycling of minerals and aggregates resources and building materials; • to re-use and recycle waste materials; • minimise the use of energy and optimise the use of renewable resources; • techniques to reduce crime, the fear of crime and anti-social behaviour; • promote vibrant and viable settlements • sustainable design and construction techniques.
7	Building heights to reflect surrounding residential areas and academic buildings and to create a sense of place and arrival	<p>Recommend reference to Leading in Design with regard to:</p> <ul style="list-style-type: none"> • maintaining, enhancing and managing biodiversity; • surface and groundwater quality, minimising water consumption and reducing flood risk; • re-use of soil resources; • to reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy; • design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk; • sustainable extraction, re use and recycling of minerals and aggregates resources and building materials; • to re-use and recycle waste materials; • minimise the use of energy and optimise the use of renewable resources; • techniques to reduce crime, the fear of crime and anti-social behaviour; • promote vibrant and viable settlements • sustainable design and construction techniques.

41. In summary, there is a recurring theme relating to sustainable design and construction techniques that are not adequately covered by the policies of the *Loughborough University*

East Park SPD. However it is noted that the objectives of the *Loughborough University East Park SPD* clearly indicate that the new buildings adopt energy efficient design principles and development should continue in an environmentally sustainable manner taking account of flood risk, drainage and biodiversity. The issues listed below should be adequately addressed through the policies of this SPD. A general reference directing to further guidance in the *Leading in Design SPD* should be considered.

- maintaining, enhancing and managing biodiversity;
 - maintain and enhance landscape and townscape character;
 - surface and groundwater quality, minimising water consumption and reducing flood risk;
 - re-use of soil resources;
 - to reducing greenhouse gas emissions through less car use, energy efficient design and use of renewable energy;
 - design and construction techniques that take into account the need to be adaptable to temperature change and possible increased flood risk;
 - sustainable extraction, re use and recycling of minerals and aggregates resources and building materials;
 - to reducing, re-use and recycling of waste materials;
 - minimise the use of energy and optimise the use of renewable resources;
 - techniques to reduce crime, the fear of crime and anti-social behaviour;
 - promoting vibrant and viable settlements.
42. The effect of an additional vehicle access from Epinal Way onto the Campus at East Park is unclear in terms of the level of vehicle transport and the impact on walking and cycling and thus any resultant effects upon air quality, climate change or healthy lifestyles. Similarly, the scale of the multi-story car park, as compared to the existing car parking spaces, is unclear and it is difficult to appraise the potential effects. The recommendations that clear reference is made to access by bus, cycling and pedestrians and that clarification is made with regard to reducing car use and car parking standards reflect these concerns. In addition objective 6 of the SPD should be amended to include reference to reducing car use.
43. The site's location is partly within the Environment Agency's flood zone area. This is an issue that should also be tackled in terms of how any development would mitigate any risks posed through flooding. This relates to the sustainability objectives on protecting water quality and reducing vulnerability to climate change.
44. The outcome of *Loughborough University East Park SPD* is potentially uncertain because:
- The outcome of a Transport Impact Assessment in relation to the proposed vehicle access of Epinal Way to East Park;
 - Implementation is dependent upon developers, Council officers and Councillors applying the principles set out in the SPD;
 - The uncertainties with regard to climate change.

Implementation

45. The *Loughborough University East Park SPD* sits within the local planning framework through its link to Local Plan Policy CF/4. Further guidance will be set out in the emerging *Leading in Design SPD* which is a framework for securing good design and sustainable construction techniques under the umbrella of the Charnwood Development Framework.

46. The overarching sustainability appraisal framework will set out indicators against which to measure the sustainability effects of implementing the component documents of the Charnwood's Development Framework. Such monitoring will enable any unforeseen undesirable effects and so enable corrective action to be taken. It is proposed to develop a single monitoring system for the various components of the Local Development Framework. This will be reported through an Annual Monitoring Report.
47. The indicators which could be used to monitor the *Loughborough University East Park SPD* are:
- Number of planning permissions granted contrary to advice on flood defence or water quality
 - Percentage of new non-residential development complying with regionally set car parking standards
 - Average traffic flows

Appendix I - Complying with the SEA Directive

The following table indicates how this sustainability appraisal complies with the SEA Directive (2001/42/EC):

SEA Directive	How this Sustainability Appraisal complies with the SEA Directive.
Article 4 – General Obligations Carry out an Environmental Assessment during the preparation of a plan before its adoption.	The Sustainability Appraisal for the Loughborough University East Park SPD was carried out prior to publication of a draft SPD for public consultation.
Article 5 – Environmental Report Prepare an Environmental Report including (information to be provided under Article 5(1), subject to Article 5(2) and (3) of the SEA Directive):	A sustainability report incorporating the environment report was published alongside the draft SPD for public consultation.
(a) an outline of the contents, main objectives of the plan and relationship with other relevant plans and programmes;	Refer to paragraphs 25-27 and 29-30.
(b) the relevant aspects of the current state of the environment and the likely evolution thereof without implementation of the plan;	Refer to paragraphs 31-33.
(c) the environmental characteristics of areas likely to be significantly affected;	Refer to paragraphs 31-33.
(d) any existing environmental problems which are relevant to the plan including, in particular, those relating to any areas of a particular environmental importance, such as areas designated pursuant to Directives 79/409/EEC and 92/43/EEC;	Refer to paragraphs 31-33.
(e) the environmental protection objectives, established at international, Community or Member State level, which are relevant to the plan and the way those objectives and any environmental considerations have been taken into account during its preparation;	Refer to paragraphs 1-3.
(f) the likely significant effects (I) on the environment, including on issues such as biodiversity, population, human health, fauna, flora, soil, water, air, climatic factors, material assets, cultural heritage including architectural and archaeological heritage, landscape and the interrelationship between the above factors;	Refer to paragraphs 37-39 and Appendices III and IV.
(g) the measures envisaged to prevent, reduce and as fully as possible offset any significant adverse effects on the environment of implementing the plan;	Refer to paragraphs 40-44.
(h) an outline of the reasons for selecting the	Refer to paragraphs 35-36.

alternatives dealt with, and a description of how the assessment was undertaken including any difficulties (such as technical deficiencies or lack of know-how) encountered in compiling the required information;	
(i) a description of the measures envisaged concerning monitoring in accordance with Article 10;	Refer to paragraphs 46-47.
(j) a non-technical summary of the information provided under the above headings.	Refer to paragraphs 4-14.
Consult responsible environmental authorities on the scope and level of detail of the information which must be included in the environmental report.	This document includes consultation on the scope of the proposed approach to sustainability appraisal for this SPD.
Article 6 – Consultations Consult with responsible environmental bodies – the Countryside Agency, Environment Agency, English Heritage, English Nature – and the public on the draft plan and the Environment Report before the plan is adopted.	This sustainability report incorporating the environment report is published alongside the draft SPD for public consultation.
Article 7 – Transboundary Consultations Consult with other European Member States where there will be significant effects on the environment in another Member State.	A transboundary consultation is not considered appropriate in the case of the Loughborough University East Park SPD.
Article 8 – Decision Making Take into account the Environment Report and consultation responses during the preparation of the plan before it is adopted	The sustainability report and consultation responses will be taken into account before the Loughborough University East Park SPD is adopted.
Article 9 - Information on the Decision When a plan is adopted responsible environmental bodies, the public and transboundary Member States will be informed of: (a) The plan as adopted; (b) A statement summarising how environmental considerations have been integrated into the plan, how any consultation responses have been taken into account and the reasons for choosing the plan as adopted; (c) The measures for monitoring.	Responsible environmental bodies and the public and other relevant bodies will be informed of the appropriate documents when the Loughborough University East Park SPD is adopted.
Article 10 – Monitoring Monitor the significant environmental effects of the implementation of plans to identify at an early stage unforeseen adverse effects and so to take remedial action.	The draft SPD sets out key monitoring indicators. A single monitoring system for the various components of the Local Development Framework will be developed.

Appendix II – Sustainability Appraisal Framework

Policy Reference:

Date Completed:

Participants:

	Geographic Scale						Comment
	Within the Plan Area				Regional	National /Interntl	
	Within the period Plan period		Beyond the Plan period				
Objective	Urban	Rural	Urban	Rural			
To maintain and enhance biodiversity, flora and fauna							
To maintain and enhance the landscape and townscape character (whilst minimising visual impacts of proposed developments)							
To protect and improve surface and groundwater quality							
To minimise water consumption							
To protect and improve air quality							
To conserve soil resources and quality							
To reduce contributions to climate change							
To reduce vulnerability to climate change							
To conserve and where appropriate enhance the historic and cultural environment							
To increase the (appropriate) re-use of previously developed land and buildings							
To support the sustainable extraction, re-use and recycling of minerals and							

	Geographic Scale						Comment
	Within the Plan Area				Regional	National /Interntl	
	Within the period Plan period		Beyond the Plan period				
Objective	Urban	Rural	Urban	Rural			
aggregates resources							
To manage waste in accordance with the waste hierarchy in all sectors (i.e. household, commercial and industrial)							
To minimise the use of energy and optimise the use of renewable resources							
Ensure the population of Charnwood can have access to a full range of appropriate public, private, community and voluntary services							
To encourage appropriate access to the countryside, open spaces and semi urban environments (eg parks)							
Promote a strong community where people feel they have a say in the future							
To reduce crime, anti social behaviour and promote community safety							
To ensure that the people of Charnwood have an opportunity to participate in culture, media and sport in Charnwood Borough							
To ensure that the housing stock meets the housing needs of all parts of the community							
To reduce poverty and social exclusion							
To improve learning, skills and employability for all sectors of the community							

	Geographic Scale					Comment	
	Within the Plan Area				Regional		National /Interntl
	Within the period Plan period		Beyond the Plan period				
Objective	Urban	Rural	Urban	Rural			
To promote vibrant and viable settlements							
To promote sustainable design and construction							
To promote healthy life styles							
To encourage sustainable economic growth							
To encourage efficient patterns of movement to support sustainable economic growth							
To reduce disparities in economic performance							
Overall Commentary [including suggestions for mitigation and enhancement]:							

Key to Matrix

→	Significant negative effect (i.e. a move away from the objective)	←	Significant positive effect (i.e. a move towards the objective)	↔	Effect depends on how the policy is implemented (one form of uncertainty)	*	There is no relationship or no significant relationship between the objective and the policy
→	Marginal negative effect (i.e. a move away from the objective)	←	Marginal positive effect (i.e. a move towards the objective)	?	It is not known whether the policy will move towards or away from the objective (another form of uncertainty)	T	Denotes a temporary effect Effects are permanent if this symbol is not used.

Appendix III – Sustainability Appraisal of Individual Policies

This Appendix is available on the Council's website or by request.

Appendix IV – Summary of Sustainability Appraisal

Objective	Policies						
	1	2	3	4	5	6	7
To maintain and enhance biodiversity, flora and fauna	*	←	*	*	*	*	*
To maintain and enhance the landscape and townscape character (whilst minimising visual impacts of proposed developments)	← ←	↔	*	↔	*	←	←
To protect and improve surface and groundwater quality	*	*	*	*	*	*	*
To minimise water consumption	*	*	*	*	*	*	*
To protect and improve air quality	*	*	*	↔	*	*	*
To conserve soil resources and quality	←	←	←	←	*	←	←
To reduce contributions to climate change	*	*	*	*	*	*	*
To reduce vulnerability to climate change	*	*	*	*	*	*	*
To conserve and where appropriate enhance the historic and cultural environment	↔	*	*	*	*	*	*
To increase the (appropriate) re-use of previously developed land and buildings	← ←	← ←	← ←	← ←	←	←	←
To support the sustainable extraction, re use and recycling of minerals and aggregates resources	*	*	*	*	*	*	*
To manage waste in accordance with the waste hierarchy in all sectors (i.e. household, commercial and industrial)	*	*	*	*	*	*	*
To minimise the use of energy and optimise the use of renewable resources	*	*	*	*	*	*	*
Ensure the population of Charnwood can have access to a full range of appropriate public, private, community and voluntary services	*	*	*	*	*	←	*
To encourage appropriate access to the countryside, open spaces and semi urban environments (eg parks)	*	←	*	*	*	←	*
Promote a strong community where people feel they have a say in the future	*	*	*	*	*	*	*
To reduce crime, anti social behaviour and promote community safety	←	←	*	*	*	*	*
To ensure that the people of Charnwood have an opportunity to participate in culture, media and sport in Charnwood Borough	*	*	*	*	*	←	*
To ensure that the housing stock meets the housing needs of all parts of the community	*	*	*	*	*	←	*

Objective	Policies						
	1	2	3	4	5	6	7
To reduce poverty and social exclusion	*	↔	*	*	*	*	*
To improve learning, skills and employability for all sectors of the community	*	*	←	*	←	*	*
To promote vibrant and viable settlements	*	←	*	*	*	←	←
To promote sustainable design and construction	*	*	*	*	*	*	*
To promote healthy life styles	*	*	*	*	*	*	*
To encourage sustainable economic growth	*	*	←	*	←	↔	*
To encourage efficient patterns of movement to support sustainable economic growth	↔	↔	*	↔	*	*	*
To reduce disparities in economic performance	*	*	*	*	*	*	*

Key to Matrix

→	Significant negative effect (i.e. a move away from the objective)	←	Significant positive effect (i.e. a move towards the objective)	↔	Effect depends on how the policy is implemented (one form of uncertainty)	*	There is no relationship or no significant relationship between the objective and the policy
→	Marginal negative effect (i.e. a move away from the objective)	←	Marginal positive effect (i.e. a move towards the objective)	?	It is not known whether the policy will move towards or away from the objective (another form of uncertainty)	T	Denotes a temporary effect Effects are permanent if this symbol is not used.