



**Bedfordshire and Luton Minerals
and Waste Development
Framework**

**Minerals Development
Plans Issues and Options
Consultation Paper**

February 2006

Part 1: Core strategy

Part 2: Site Allocations

Bedfordshire and Luton Minerals and Waste Development Framework

Minerals Development Plans Issues and Options Consultation paper

This two-part document sets out issues and potential options for matters that we will address in the Minerals Core Strategy and Site Allocation Plans. The first part sets out policy issues, which will be used to inform the Core Strategy Development Plan Document. These issues relate to the overall scale and nature of future minerals supply in Bedfordshire and Luton. Each issue is accompanied by a series of potential policy options, on which we welcome feedback.

The second part of the document sets out a portfolio of potential new sites for mineral extraction. These sites have been nominated by minerals operators and landowners in the County. All the sites nominated are included in the portfolio at this time, and there is no presumption as to whether or not any particular site is suitable or otherwise for future working. Each site is illustrated on an Ordnance Survey map. We have also identified key features for each site (such as the size and potential mineral yield), together with an initial list of planning issues. We would like feedback on the issues identified for each site, together with any other matters that are not currently addressed. Ultimately, we will narrow down this "long-list" of sites in order to identify sites for inclusion in the Site Allocations Development plan Document.

We are also at this stage issuing a final call for site nominations. Any interested party who would like an area of land to be considered for mineral working should contact us now. As the Site Allocations Plan progresses, it will become increasingly difficult to propose new sites. This is because we will select sites from the long list using a rigorous process of sustainability appraisal, and it will not be possible for us to repeat this appraisal for late nominations.

The next stage in preparation of the Minerals Development plans will be the "preferred options" consultation, which is scheduled for the end of 2006. Full details, including project timetables, for all the documents that will form part of the Minerals and Waste Development Framework for Bedfordshire and Luton are set out in the **Bedfordshire and Luton Minerals and Waste Development Scheme**, which may be downloaded free of charge from www.bedfordshire.gov.uk or purchased in hard copy (price £10) from the contacts given below.

This issues and options paper is being published for consultation for a six-week period starting on Monday 6th February 2006 and ending at 5:00pm on Friday 17th March 2006. Please ensure that your responses reach us by the closing date. Responses should be made in writing and directed to:

**Minerals and Waste Development Plans Team
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Bedford MK42 9AP**

**Fax: 01234 228656
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If you have any queries regarding this consultation, or any other aspect of the Minerals and Waste Development Framework, please contact Charlotte Morbey on 01234 228738, or write to the contacts shown above.

Public Workshops: Evening workshops will be held to discuss the matters arising from this consultation paper. They will run from **6:15 – 7:45 pm** on the following dates:
23rd February, Bedford; 27th February, Biggleswade; 2nd March, Leighton Buzzard.

If you would like to register for one of these workshops, please let us know via the contacts shown above.

Bedfordshire and Luton Minerals and Waste Development Framework

Minerals Development Plans Issues and Options Consultation paper

Part 1: Core Strategy Issues and Options

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1 Background

1.1 Under the provisions of the Town and Country Planning Acts, the County Council is responsible for Minerals and Waste Planning Matters. This involves three main areas of activity:

- Development Control - the determination of planning applications for minerals and waste developments and for internal ("Reg 3") County Council applications;
- Enforcement of planning controls for minerals and waste matters;
- Preparation of development plans for minerals and waste.

The system is “plan-led”. This means that the minerals and waste development plan sets out policies and proposals for future development, and these are then used as the basis for determination of planning applications and enforcement activities.

- 1.2 The current minerals and waste development plan is the Minerals and Waste Local Plan (MWLP), which was adopted by the Council in January 2005. The MWLP is currently the prime source of reference for development control and enforcement activities.
- 1.3 The Government has now introduced sweeping changes to the planning system under the Planning and Compulsory Purchase Act 2004 (PCPA). The key changes in relation to forward planning are:
 - All existing Local Plans must now be replaced by a new set of development plans and related documents, which taken together will comprise the “Local Development Framework” for their area of coverage. This means that the County Council is now obliged to replace the adopted MWLP with a “Minerals and Waste Development Framework”.
 - The existing Structure Plans hitherto prepared by County Councils will be abolished. Their strategic function will be taken up by Regional Spatial Strategies prepared by the Regional Assemblies. All Local Development Frameworks must be “in general conformity” with the relevant Regional Spatial Strategy. In Bedfordshire this will be the East of England Plan, which is currently undergoing formal examination prior to its anticipated adoption late in 2006.
 - Local Development Frameworks must be subjected to a sustainability appraisal throughout their formulative stages. This appraisal must satisfy the requirements of the EU “Strategic Environmental Assessment” directive and also take account of economic and social ramifications of the emerging Framework.
 - Local Development Frameworks must be supported by rigorous community and stakeholder consultation procedures, especially in the early formulative stages. Government expectation is for this “front-loading” of consultation to reduce controversy in the later stages and hence reduce the complexity and cost of the formal examination stage.
 - Prior to adoption, Local Plans were subject to a Public Inquiry at which a Government appointed Inspector would consider objections made against the draft plan and produce a set of recommendations to the Council. Under the new system, Local Development Frameworks will be subject to a new style “Examination in Public”, at which the Inspector will consider the “soundness” of the plan as a whole and produce a set of legally binding instructions as to whether the Council should adopt, modify or abandon the plan.

2 Components of the Minerals and Waste Development Framework

- 2.1 The Minerals and Waste Development Framework for Bedfordshire is being prepared in partnership with Luton Borough Council and will apply to the areas of both authorities. The adopted MWLP will remain in force for the time being as a “saved” plan and will be progressively replaced in stages by the following documents.
 - **Minerals and Waste Development Scheme (MWDS)**. This document is a new requirement of the Planning and Compulsory Purchase Act. Essentially, it is a project plan relating to the production of the above documents. It sets out in detail each document to be prepared, the timetable for production, and the resource implications. The current version of the Scheme was approved on 25th November.
 - **Minerals Core Strategy**. This will replace the minerals chapter of the adopted MWLP and will set out the key policies relating to the scale of minerals activity in the area, together with the broad locational strategy. It must go through 2 stages of preparatory

consultation prior to submission of the final draft for formal examination. The anticipated timetable for production is:

- February – March 2006. “Issues and options” consultation (this is the stage we are working on now) – sets out key issues which the plan should address and possible means for addressing them.
 - November 06 – January 07. “Preferred options” consultation – builds on consultation feedback and sustainability appraisal from the previous stage in order to identify the Council’s preferred options.
 - July 07. Submission of draft plan to Secretary of State for examination.
 - April 08. Examination in Public.
 - September 2008. Receipt of Inspector’s Report.
 - December 08. Adoption (following receipt of binding Inspector’s Report).
- **Minerals Site Allocations Plan.** This will specify preferred sites to satisfy any need for additional mineral reserves that may be identified in the core strategy. Potential sites have been nominated by industry and landowners following a call for sites issued earlier this year. The Sites Allocations Plan will be prepared alongside the Core Strategy and the production timetable is the time. At this “issues and options stage” all sites are being published for consultation, with a list of issues pertinent to each site. The “preferred options” stage will present those sites identified after consultation as being the most suitable for inclusion in the plan.
 - **Waste Core Strategy and Site Allocations Plan.** This will replace the waste chapter of the adopted MWLP. It will set out key policies relating to the scale, nature and general locations of future waste management facilities, and specify preferred sites to satisfy any need for additional waste management sites that is identified in the core strategy.

Preparation of the waste plans will not commence in earnest until the policy lead of the emerging East of England Plan becomes clear, which in practice will be the publication of the Panel Report of the Examination in Public (anticipated mid 2006). This is because we need the lead of the East of England Plan regarding the issue of regional landfill in the Marston Vale in light of the growth agenda.

Waste Supplementary Planning Document (SPD). This document is being prepared in order to provide additional guidance relating to policies W5 and W6 of the adopted MWLP (“Waste Audits” and “Provision of [waste] Facilities with new development”).

Statement of Community Involvement (SCI). This document is a new requirement under the Planning and Compulsory Purchase Act. It must set out procedures and protocols for engagement of the community and other stakeholders in plan-making and development control. Once the SCI is adopted, all future plan-making and development control activities must be undertaken in accordance with its provisions. The SCI is scheduled for submission in March 2006 for the Examination stage.

Internet publicity

- 2.2 Information and documents relating to the Minerals and Waste Development Framework are being posted on the County Council website as work progresses. This appears under the "Environment" pages, following links to “Minerals and Waste Policy and Planning” > “Bedfordshire and Luton Minerals and Waste Development Framework”. A link is also being maintained from the homepage.

3 Minerals in Bedfordshire

3.1 The main types of minerals worked in Bedfordshire are:

- Aggregate sands and gravels
- Specialist (industrial) silica sands
- Chalk
- Clay

There are also limited deposits of fuller's earth and limestone. A brief outline of each of these mineral categories is given below.

Aggregate Sands and Gravels

3.2 This mineral group includes all sands and gravels used for construction purposes. It is commonly subdivided into "concreting" sands and gravels and "building" or "soft" sands. Concreting sands and gravels are used, as the name suggests, for the production of concrete, including on-site production, readymix and pre-cast products. They are generally found in river valley and glacial deposits in the Ivel and Ouse valleys. Building or soft sands are used for a range of purposes including plaster, mortar and "screed" (flooring). It is also common practice to include sands used for asphalt making in this category. Building sands are predominantly worked from deposits in the Greensand Ridge, which runs across the County from Leighton Buzzard in the west to Sandy in the east.

3.3 In general, building sands are made up of small, well rounded grains, which give them a "soft" feel (this is why they are also known as "soft" sands). Concreting aggregates include larger particle sizes (gravels) and sands which are less well rounded (sometimes called "sharp" sands). The two categories are not generally interchangeable in terms of their suitability for particular end uses.

3.4 Aggregate sands and gravels are a major mineral group in terms of the amounts produced. Average production in recent years has been in the order of 1.8 million tonnes per year. More detail on past and possible future production rates is given under Issue 4 in section 4.

Industrial (silica) sands

3.5 This mineral group includes a range of sands with particular properties, such as colour or chemical purity, which make them suitable for specialist end uses such as water filtration, industrial fillers and horticultural purposes. Sands with particular colour characteristics may be used in sports and golf course applications. One feature of all these sands is their relatively high value compared with other sands and gravels.

3.6 A variety of specialist sands are worked from the Greensand Ridge deposits in Bedfordshire. The total annual production is currently in the order of 0.5 million tonnes. More detail on silica sands is given under Issue 4 in section 4.

Chalk and Clay

3.7 Chalk is currently extracted from only one major site in the County; Kensworth Quarry near Dunstable. The entire product, some 1 million tonnes per year, is converted to slurry and piped to cement manufacturing plant located in Rugby.

3.8 Deposits of Oxford Clay are worked in the Marston Vale, south of Bedford, for brick making purposes. Some 250,000 tonnes per year are extracted to serve the Stewartby Brickworks.

Fullers Earth

- 3.9 Fullers earth was worked until recently from deposits located at Aspley Heath (Woburn) and Clophill. Planning permission was refused in 2003 for working of the last known deposit, and it is not thought likely that working of Fullers Earth will resume in the County.

Building Stone

- 3.10 There are currently no building stone quarries in Bedfordshire. The little demand that there is for restoration and extension work is currently met by importing stone from surrounding counties. However imported stone often has different properties to local stone, and is not always suitable for the repair of old buildings or the construction of new buildings in keeping with local character. Small-scale working of stone to serve local need may therefore be considered, and one site for working of limestone has been proposed at Pavenham (see part two of the issues and options paper).

4 Minerals Core Strategy and Site Allocations Plans: The Issues and Options

- 4.1 The Minerals Core Strategy and Site Allocations Plans will replace the minerals chapter of the adopted MWLP. The Core Strategy will set out policies relating to the level of provision for future minerals supply, phasing for release of reserves and the strategic approach to location of sites. The Site Allocations Plan will set out preferred sites to supply any need for further mineral working identified in the Core Strategy.
- 4.2 This “Issues and Options” consultation is a key stage in the preparation of these plans. Its function is to set out the key issues that the Plans must address and the initial options identified for addressing them. These are published for consultation in order to ensure that the Plans are heading in the right direction prior to substantive work on their development. Feedback from the Issues and Options consultation is then used to identify the “Preferred Options”, which are then re-issued for a further round of consultation. Following this, draft versions of the Plans themselves are prepared and submitted to the Secretary of State for formal public examination. The examination stage results in a set of recommendations from a Government inspector, which the Council will be legally obliged to follow.
- 4.3 All stages of Plan preparation are subject to sustainability appraisal. The appraisal of each stage is used to inform the next phase of plan development. An initial sustainability appraisal scoping report is available on the County Council website, www.bedfordshire.gov.uk.
- 4.4 Prior to this issues and options consultation, we have already undertaken an initial scoping consultation in order to ensure that we are covering the relevant matters. This consultation generated seven detailed responses from the mineral industry and government agencies. These have been used to inform production of the issues and options paper. A report of the scoping consultation will be posted on the County Council website at the same time that the issues and options paper is published).
- 4.5 Our assessment of matters to be included in the issues and options consultation is as follows. Options are detailed in the text under each issue and then presented as summary questions. We invite responses to any of the issues and options raised, plus any other matters that you think we should be addressing in the Plans.

Core Strategy

Issue 1. Time period of plan coverage

- 4.6 It is important at the outset to define an appropriate time period over which the Minerals Core Strategy is to apply. The time period will influence the scale of provision for minerals supply which will need to be made in the plan.

- 4.7 Government guidance (Planning Policy Statement 12: Local Development Frameworks), states that a core strategy document should have a coverage of at 10 years beyond the anticipated date of adoption. As the anticipated adoption date in this case is the end of 2008, this means that the core strategy should at least cover the period up to the end of 2018. This may be taken as a minimum requirement.
- 4.8 However, the guidance also states that “the core strategy should aim to look ahead to any longer-term time horizon which is set out in the relevant regional spatial strategy”, which in this case is the East of England Plan with an end date of 2021 (although not clear in the East of England Plan, we assume this to mean the end of 2021). One way to do this would evidently be simply to extend the time period of the core strategy to the end of 2021, but this would imply making explicit provision for an extra three years of mineral supply. Another approach would be to use the 2018 end-date and rely on post-plan landbanks (see below) for the coverage to 2021.
- 4.9 Another matter of relevance is that central government forecasts of demand for aggregate minerals, on which our local production “apportionments” are made, only run up to 2016. It is recognised that the further into the future one attempts to project minerals demand the less reliable the forecasts become. This may indicate that the shorter (i.e. 2018) end date may be more appropriate. In any case, we will monitor the application of the Minerals Plans on an annual basis. This will enable us to pick up any circumstances in which policies are not performing as we anticipated, or any other external developments, and to make adjustments to the Plans as appropriate.
- 4.10 There are therefore two clear options for setting the end date for the plan-period: the end of 2018 or the end of 2021. The former would entail making less provision for mineral extraction in the plan, and may be more reliable in terms of demand forecasts over the lifetime of the plan. The latter may be seen to be in closer conformity with the government guidance, to “look ahead” to the time horizon of the regional spatial strategy.

Issue 1 Options

1.1 Should the end date for the minerals core strategy be:

- a) End of 2018?
- b) End of 2021?
- c) Some other date? (please specify and give reasons)

Issue 2. Aims and objectives

- 4.11 Under the new system, the expectation is that development plans should be based on a clear set of aims and objectives. This enables policies to be clearly defined in terms of the desired outcomes, and also gives a robust foundation for developing indicators and targets for monitoring purposes.
- 4.12 It is therefore important to define an agreed set of objectives to underpin the minerals development plans (core strategy and site allocations). As only the minerals chapter of the current Minerals and Waste Local Plan (MWLP) is being transposed to the development framework at this time, we think that it is appropriate to specify separate objectives for the other sections of the MWLP (“waste” and the “general environment”) in turn as they are reviewed.
- 4.13 What is required at this stage, therefore, is a set of objectives for the minerals development plans only.

4.14 Government guidance states that Development Frameworks should have regard to a range of policy statements and strategies at the national, regional and local levels. These include national planning policy statements (PPS) and minerals planning policy statements (MPSs), Regional Spatial Strategies (RSSs) and Local Community Strategies. In Bedfordshire and Luton, the following are of particular relevance in this light:

- Planning Policy Statement 1 (PPS1): “Delivering Sustainable Development”
- Minerals Policy Statement 1 (MPS1): “Planning and Minerals” (with annexes) (draft)
- The East of England Plan (Regional Spatial Strategy) (draft)
- Community Strategies for Bedfordshire (including the district strategies) and Luton
- The current adopted Minerals and Waste Local Plan.

4.15 In the issues scoping consultation, responses identified a number of other documents which should be taken into account in setting the aims and objectives. These include:

- Existing Minerals Planning Guidance notes (MPGs) – until such time as they are superseded by the new style Minerals Policy Statements (MPSs);
- MPS2 “Controlling and Mitigating the Environmental Effects of Minerals Extraction in England”;
- The Milton Keynes – South Midlands Sub Regional Strategy.
- District Local Plans and emerging Development Frameworks.

4.16 Each of these documents includes its own aims and objectives, which should be considered in developing aims and objectives for the Minerals Core Strategy and Site Allocations Plans.

4.17 There were also comments that the Inspectors Report for the adopted MWLP should be taken into account. This is indeed a highly significant factor for preparation of the new Plans, but does not in itself recommend particular aims or objectives, and we therefore think that it is not relevant to this particular issue.

4.18 There was also suggestion that we should refer to a Department of Transport document relating to sustainable distribution, but we believe that the government’s Planning Policy Guidance note 13: “Transport” is of more direct relevance.

4.19 In light of the above, we propose the following key aims and objectives for the Core Strategy document:

Aim

- To make appropriate provisions for the supply of minerals in Bedfordshire and Luton in accordance with national and regional policy and in the most sustainable manner that can be achieved, taking into account the *Sustainable Communities* growth agenda.

or

- To make appropriate provisions for the supply of minerals in Bedfordshire and Luton in accordance with national and regional policy, whilst protecting so far as possible, and where possible enhancing, the environment.

Objectives

- To identify appropriate landbanks for aggregates and industrial sands including, where necessary and achievable, separate landbanks for sub-divisions of these mineral classes.

- To make appropriate provisions, where necessary, for the working of other mineral types in the plan area.
- To specify preferred sites for the supply of identified mineral needs and to ensure that these sites represent the most sustainable options.
- To conserve mineral resources by protecting them from sterilisation, encouraging their prudent use, and specifying appropriate phasing mechanisms for their release.
- To minimise adverse environmental impacts of mineral working and associated transport of minerals, and to make use of opportunities to improve the environment and make other sustainability gains.
- To ensure the appropriate restoration and after-use of mineral workings, taking particular account of biodiversity and public amenity needs.

Issue 2 Options

2.1 We do not set out alternative aims and options for this issue as the potential range is too large. Instead, we ask the following questions:

- a) Are the above aims and objectives appropriate?
- b) If not, what should the aims and objectives be?

Issue 3. Making provisions for aggregates recycling

4.20 Aggregates recycling could be considered to be a minerals matter (i.e. provision of alternative aggregates supply) or a waste matter (i.e. recycling of construction and demolition wastes). It is not desirable to duplicate policies between sections of the Development Framework, and therefore we need to decide whether aggregates recycling should be considered as a “minerals” or a “waste” matter. In the adopted MWLP aggregates recycling is treated as a waste matter.

4.21 In the scoping consultation, this issue generated a mixed response, with some favouring inclusion in the minerals plans, and others inclusion in the waste plans. Our overall feeling at this stage is that the assessment regarding anticipated levels of recycling supply should be reflected in the Minerals DPDs, taking a lead from the assumptions in the ODPM “National and Regional Guidelines for Aggregates Provisions in England 2001-2016”, together with monitoring data for current levels of recycling activity. However, as aggregate recycling is a controlled waste management activity the identification of sites for recycling should be done via the Waste Site Allocations DPD.

Issue 3 Options

3.1 Should aggregates recycling, in terms of making policies and provisions for new facilities, be addressed in the:

- a) Minerals Core Strategy and Site Allocations Plans, or:
- b) Waste Core Strategy and Site Allocations Plans.

Issue 4. Landbanks for Aggregates and Industrial Sands

Aggregates: Background

- 4.22 Government guidance (MPG6) requires Mineral Planning Authorities (MPAs) to maintain a landbank of aggregates reserves (with benefit of planning permission) sufficient for at least 7 years supply. Minerals Plans should identify existing reserves and/or preferred areas for at least 10 years supply from date of Plan adoption. These requirements relate to total aggregates landbanks – there is no specific requirement for any split between aggregates types (e.g. building sands and concreting sands and gravels), although the guidance does state that separate landbanks may be appropriate where the main landbank comprises a mix of different mineral types, and where reserves of the different aggregate types may be identified separately and unambiguously.
- 4.23 Other MPAs in East England maintain a single aggregates landbank, which is generally dominated by concreting sands and gravels. The situation in Beds is somewhat different, however, with large reserves of building sands located in the Greensand Ridge deposits, principally around Leighton Buzzard / Heath and Reach. These reserves also contain significant deposits of industrial (silica) sands, with both categories of material being intermingled within each pit according to the variation of the strata therein. As government policy requires a 10 year landbank for silica sands (see below from paragraph 4.40 onwards), this effectively means that the landbank for building sands will inevitably be larger than would be the case if the building sand landbank were to be determined on its own. This creates a particular issue as to how the overall aggregates landbank should be addressed. In short, should we:
- a) accept that a larger proportion of the aggregates landbank will be made up of building sands than the production rates for this mineral group would justify, and that this will mean that the landbank for concreting aggregates is correspondingly smaller? or;
 - b) accept that the large landbank for building sands will mean that the overall aggregates landbank will be larger than that required by government policy, and ensure that provision for concreting aggregate is not “crowded out”? This effectively means splitting the aggregates landbank into building sands and concreting aggregate sub-categories.
- 4.24 In the current MWLP, we initially proposed a single aggregates landbank for the following reasons:
- Difficulty in obtaining accurate and consistent data from site operators relating to the breakdown of their remaining reserves (building sand / concreting sand and gravel / silica sand);
 - Consistency with regional practice and government guidance, both of which work to single aggregates landbanks
- 4.25 The Local Plan Inspector, however, accepted arguments from industry that the single landbank approach may lead to a shortfall of concreting aggregates in the County, and that the County council should therefore work to identify an appropriate split to maintain separate landbanks for building sands and concreting aggregates. She did not feel able to recommend what the appropriate split should be. The previous (1996) MWLP had used a 50:50 split, based on evidence of previous production trends. Industry argued that more recent production trends pointed to a dominance of concreting aggregates and suggested a split of 70:30 concreting aggregates to building sands.

Aggregates landbank technical study

- 4.26 In response to the Local Plan Inspector’s recommendation, the County Council has engaged a specialist geological consultant (Cuesta Consulting L^{td}) in order to examine the aggregate landbanks issues in more detail. The report of this study has been published as a supporting

technical document to this issues and options consultation paper. It may be downloaded free of charge from www.bedfordshire.gov.uk, or purchased in hard copy (price £10) from the contacts given at the start of this paper. It is recommended that those with a particular interest in the landbanks issues refer to the technical report. The key findings are incorporated in the following paragraphs.

- 4.27 The landbanks study has provided a snapshot of detailed resource information as at the end of year 2003. It concludes that there is a shortfall in the supply of concreting aggregates, which will need to be addressed in the Minerals Development Plans. It observes that aggregates are worked from two primary resource blocks, with a range of sands (predominantly specialist and building sands) being produced from the Greensand Ridge, and concreting aggregates (sands and gravels) worked from river valley and fluvio-glacial deposits (Quaternary deposits). In particular, the report notes that gravels for concreting are only worked from the Quaternary deposits, and that they cannot be substituted by materials from the Greensand Ridge. The report proposes a number of potential options to tackle the landbanks issues.
- 4.28 The summary findings of the report are reproduced in Table 1, below. The figures are summarised according to the two main resources blocks and by the main end-uses. The final row shows the indicative landbank, in years and based on 2003 production figures only, for each mineral category at the end of year 2003.

Table 1. Summary of aggregates production and reserves 2003

	Concreting aggregates			Building and asphalt sands					Other	Total Aggregates
	Gravels	Sands	Total	Screed	Mortar	Plaster	Asphalt	Total	Fill etc	
Production in 2003 (000 tonnes)										
G-R	0.0	181.0	181.0	51.8	308.4	4.0	43.7	407.9	26.8	615.7
Quat	331.3	509.5	840.8	0.0	7.6	0.0	0.0	7.6	75.1	923.5
Total	331.3	690.5	1,021.8	51.8	316.1	4.0	43.7	415.5	101.9	1,539.2
Reserves at end 2003 (000 tonnes)										
G-R	0	3,079	3,079	1,254	7,673	650	1,324	10,901	763	14,743
Quat	1,279	2,209	3,488	0	19	0	0	19	306	3,813
Total	1,279	5,288	6,567	1,254	7,692	650	1,324	10,920	1,069	18,556
Indicative landbank based on 2003 production and reserve data (years)										
G-R	n/a	17.0	17.0	24.2	24.9	162.5	30.3	26.7	28.5	23.9
Quat	3.9	4.3	4.1	n/a	2.5	n/a	n/a	2.5	4.1	4.1
Total	3.9	7.7	6.4	24.2	24.3	162.5	30.3	26.3	10.5	12.1

Source: Cuesta industrial survey conducted during 2005

Notes: G-R = Greensand Ridge deposits; Quat = quaternary (river valley and fluvio-glacial) deposits

- 4.29 This table shows the particular pressure on concreting gravels, where the indicative landbank, as based on 2003 production figures, was 3.9 years as at end 2003.

Average production rates over time

- 4.30 Table 1 shows indicative landbanks based on a snapshot of the production rates pertaining in 2003. In practice, annual production rates will tend to vary from year to year, and it may therefore be more appropriate to consider an average rate of production as the basis for

landbank calculations. The County Council conducts annual surveys of aggregates production, and the last 10 years data are shown in Table 2, below. This data series includes the breakdown to “concreting” and “building / asphalt” categories, but no further sub-division is recorded. The latest figures, for 2004, include some estimation, as that year’s survey was disrupted owing to difficulties with confidentiality under the Freedom of Information Act and Environmental Information Regulations. Average production rates and % splits are given for the last 3, 5 and 10 years.

Table 2. 10 year record of aggregates sales with annual % split between aggregates types

Absolute sales (tonnes)			As % breakdown of annual sales			
Year	BS	S&G	Total	BS	S&G	Total
1994	1,230,000	640,000	1,870,000	65.8%	34.2%	100.0%
1995	1,280,000	430,000	1,710,000	74.9%	25.1%	100.0%
1996	867,000	537,000	1,404,000	61.8%	38.2%	100.0%
1997	802,000	863,000	1,665,000	48.2%	51.8%	100.0%
1998	748,000	1,162,000	1,910,000	39.2%	60.8%	100.0%
1999	650,000	1,295,000	1,945,000	33.4%	66.6%	100.0%
2000	665,088	1,201,679	1,866,767	35.6%	64.4%	100.0%
2001	710,836	1,198,281	1,909,117	37.2%	62.8%	100.0%
2002	846,447	1,059,850	1,906,297	44.4%	55.6%	100.0%
2003	502,666	1,161,028	1,663,694	30.2%	69.8%	100.0%
2004	836,809	1,096,711	1,933,520	43.3%	56.7%	100.0%
3 yr average	728,641	1,105,863	1,834,504	39.7%	60.3%	100.0%
5 yr average	712,369	1,143,510	1,855,879	38.4%	61.6%	100.0%
10 yr average	830,804	967,686	1,798,490	46.2%	53.8%	100.0%

Source: Beds CC annual monitoring surveys

Notes:

- “BS” = building and asphaltting sands; “S&G” = sands and gravels for concreting
- The total production figures for 2003 do not match those shown in Table 1 owing to adjustments made to data by operators in the context of the Cuesta survey.

4.31 Table 2 shows that the % split has changed over the years, shifting from 66% building sands in 1994 to around 65% concreting aggregates by year 2000. Between years 2000 and 2002, the proportion of concreting aggregate fell back to around 56%, but this trend does not appear to hold in years 2003 and 2004, in which significant short-term fluctuation is apparent. A key issue for the Minerals Development plans will be to identify the most appropriate basis to define any split in the landbank.

Sub-regional apportionment for aggregates supply

4.32 Under the provisions of MPG6, the Government allocates a supply figure for aggregate minerals to each region. This regional figure is then apportioned by the Regional Assembly to each Mineral Planning Authority. The current apportionment for Bedfordshire is **1.93 million tonnes per year**. This means that, in line with the apportionment, Bedfordshire is expected to maintain a landbank sufficient to yield production at this annual rate.

- 4.33 MPG6 states that the sub-regional apportionment should not be regarded as inflexible, and that the preparation of development plans provides an important opportunity to test the practicality and environmental acceptability of the apportionment. In this light it is notable that the apportionment is greater than the average total aggregates production over the last 3, 5 or 10 years, although the annual production rate has come close to the current apportionment in 5 of the last 10 years. We need to determine whether the 1.93 million tonnes apportionment is the appropriate basis for the aggregates landbank(s), or whether an average of actual recorded production should be used.

Potential options for the aggregates landbank(s)

- 4.34 The first question that must be addressed is whether the aggregates landbank should be split into sub-categories. Based on the conclusions of the last Local Plan Inquiry, together with those of the Cuesta landbanks study, we are inclined to think that it should. It is crucial to note, however, that it will only be possible to maintain a split landbank if we can be confident that this can be accurately monitored year on year. This indicates that any split should be as simple as possible, and in any event the successful application of a landbank split will depend on ongoing co-operation of the minerals industry in the annual collection of monitoring data.
- 4.35 If the landbank is to be split, the next question is by what categories, and at what proportions. The Cuesta landbanks study proposes 4 alternatives based on 2003 recorded sales and the 50:50 and 70:30 splits discussed in paragraph 4.25, above. Concreting aggregates are further sub-divided into Woburn sand (Greensand Ridge) and Quaternary (river valley and fluvio-glacial) sources. This is on order to highlight the particular pressure on the Quaternary deposits. The Cuesta scenarios are reproduced in Table 3, below, with additional rows to illustrate the resultant net requirements for release of mineral reserves over the plan period options (i.e. to 2018 or 2021), taking account of remaining reserves as at end 2003.

Table 3. Potential divisions in the aggregates landbank identified in the Cuesta study.

	Concreting Aggregate			Building Sand
	TOTAL	Woburn Sand	Quaternary Sand & Gravel	TOTAL
permitted reserves at 31/12/03 (tonnes)	6,567,000	3,079,000	3,488,000	10,920,000
A) Landbanks calculated using 2003 sales				
annual sales (tonnes)	1,021,782	181,000	840,782	415,534
Landbank from Dec 2003 (years)	6.4	17.0	4.2	26.3
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	8,759,730	n/a	9,123,730	n/a
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	11,825,076	179,000	11,646,076	n/a
B1) Landbanks calculated using apportionment with 50/50 split between concreting/building aggregate and with 18:82 split between Woburn & Quaternary sources (as per 2003 sales)				
annual sales (tonnes)	965,000	173,700	791,300	965,000
Landbank from Dec 2003 (years)	6.8	17.7	4.4	11.3
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	7,908,000	n/a	8,381,500	3,555,000
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	10,803,000	47,600	10,755,400	6,450,000
B2) Landbanks calculated using apportionment with 70/30 split between concreting/building aggregate and with 18:82 split between Woburn & Quaternary sources (as per 2003 sales)				
annual sales (tonnes)	1,351,000	243,180	1,107,820	579,000
Landbank from Dec 2003 (years)	4.9	12.7	3.2	18.9
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	13,698,000	568,700	13,129,300	n/a
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	17,751,000	1,298,240	16,452,760	n/a
B3) Landbanks calculated using apportionment with 71/29 split between concreting/building aggregate and with 18:82 split between Woburn & Quaternary sources (both as per 2003 sales)				
annual sales (tonnes)	1,372,029	246,965	1,125,063	557,971
Landbank from Dec 2003 (years)	4.8	12.5	3.1	19.6
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	14,013,435	625,475	13,387,945	n/a
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	18,129,522	1,366,370	16,763,134	n/a

4.36 In addition to the above scenarios, we need to consider alternatives based on average production rates as these may yield a more robust projection of future need. Applying the 3, 5 and 10 average production rates of Table 2 to the 1.93 mtpa sub-regional apportionment yields the following scenarios.

Table 4. Landbank scenarios using sub-regional apportionment and average recorded annual production rates

	Concreting Aggregate	Building Sand	Total Aggregates
reserves at end 2003	6,567,000	10,920,000	17,487,000
Total apportionment			1,930,000
C1: split by 3 yr average production	60.3%	39.7%	100.0%
annual requirement (tonnes)	1,163,429	766,571	1,930,000
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	10,884,442	578,558	11,463,000
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	14,374,730	2,878,270	17,253,000
C2: by 5 yr average production	61.6%	38.4%	100.0%
annual requirement (tonnes)	1,189,180	740,820	1,930,000
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	11,270,698	192,302	11,463,000
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	14,838,237	2,414,763	17,253,000
C3: by 10 yr average production	53.8%	46.2%	100.0%
annual requirement (tonnes)	1,038,446	891,554	1,930,000
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	9,009,684	2,453,316	11,463,000
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	12,125,021	5,127,979	17,253,000

4.37 Finally, we need to consider whether the 1.93 mt sub-regional apportionment is an appropriate base for the landbank calculations, or whether they should be based on recorded average production rates, in light of the fact that these are lower than the sub-regional apportionment, and may be a more realistic reflection of actual demand. Table 5, 6 and 7 illustrates breakdowns based on the recorded 3, 5 and 10 year average production rates, with the application of the recorded split applicable for each of the periods.

Table 5. Landbank scenarios based on average recorded annual production rates

	Concreting Aggregate	Building Sand	Total Aggregates
reserves at end 2003	6,567,000	10,920,000	17,487,000
D1: 3 year average production (=annual requirement) (tonnes)	1,105,863	728,641	1,834,504
split by 3 yr average	60.3%	39.7%	100.0%
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	10,020,948	9,612	10,030,560
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	13,338,538	2,195,534	15,534,072
D2: 5 year average production (=annual requirement) (tonnes)	1,143,510	712,369	1,855,879
split by 5 yr average	61.6%	38.4%	100.0%
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	10,585,650	n/a	10,351,185
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	14,016,180	1,902,642	15,918,822
D3: 10 year average production (=annual requirement) (tonnes)	967,686	830,804	1,798,490
Split by 10 yr average	53.8%	46.2%	100.0%
Net plan requirements start 2004 - end 2018 (15 years) (tonnes)	7,948,290	1,542,060	9,490,350
Net plan requirements start 2004 - end 2021 (18 years) (tonnes)	10,851,348	4,034,472	14,885,820

4.38 Taken together, the above tables set out 10 potential options for splitting the aggregates landbank, which, we think, encompass all reasonable options.

4.39 The alternative to splitting the landbank would be to maintain a single aggregates landbank. Under this scenario, the dominance of building sands (Greensand Ridge deposits) would tend to squeeze production of concreting aggregates (the Quaternary deposits). This would effectively result in Bedfordshire becoming a net importer of concreting aggregates, although this import may be balanced (at least in part) by export of building sands to surrounding Counties.

Silica sands

4.40 For silica sands, government guidance requires maintenance of a 10 year landbank for individual production sites. The guidance does not, however, state whether a “production site” is intended to mean a processing plant site or an individual extraction site. The Inspector at the latest MWLP Inquiry considered that the guidance should apply to individual extraction sites. This approach is problematic, however, as taken to its logical conclusion it implies maintaining a 10 year landbank in perpetuity for every extraction site. This is clearly not possible; the reserves must eventually be depleted, and there are likely to be considerable environmental problems even before a state of complete exhaustion is reached. In light of

this, we need to identify what specific silica sand products need to be maintained and what the supply implications of this are.

- 4.41 The Cuesta study identified the following silica sand extraction sites working Greensand Ridge deposits for a range of specialised uses.
- Clophill (Silsoe) – Hanson;
 - Munday’s Hill (Heath and Reach) – Aggregate Industries;
 - Grovebury Road (Leighton Buzzard) – Aggregate Industries;
 - Churchways / Checkley Wood / Riddeys Pit complex (Leighton Buzzard) – Aggregate Industries;
 - Pratts Quarry (Leighton Buzzard) – WBB Minerals;
 - Stone Lane Quarry (Heath and Reach) – WBB Minerals;
 - Nine Acres Quarry (Heath and Reach) – WBB Minerals;
 - New Trees Quarry (Heath and Reach) – WBB Minerals;
 - Chamberlain’s Barn Quarry (Leighton Buzzard) – WBB Minerals;
 - Double Arches Quarry (Heath and Reach) – WBB Minerals;
 - Bryant’s Lane Quarry (Heath and Reach) – LB Silica Sands.
- 4.42 It can be seen that all these sites are concentrated around the Leighton Buzzard / Heath and Reach area. In light of this it will be important to take account of cumulative impacts as we work to identify the need and location for any potential future release of silica sand reserves.
- 4.43 In terms of end-uses for silica sands, the Cuesta study identifies the following range of uses for which silica sand products.
- Sports and amenity applications (e.g. non-staining sands for use on golf courses and play areas);
 - Tile and brick facing (to give surface texture and/or colouring);
 - Horticultural and rootzone applications;
 - Water filtration;
 - Resin and industrial fillers;
- 4.44 The Cuesta report notes that no silica sand from Bedfordshire is currently used for “traditional” industrial uses such as foundry casting and glass making. This is significant as it is the importance of these particular end-uses to the national economy that forms a large part of the reason that national policy (PPG15) sets out the 10 year landbank requirement. We therefore need to carefully assess the need for particular grades of silica sand in light of the significance of their end-uses and the cumulative environmental effects of further working. This assessment will need to be undertaken on a site by site basis. This is because, unlike aggregates, it will not generally be appropriate to combine all silica sand reserves into a single landbank.
- 4.45 As an indication of the overall scale of production and the remaining reserves, it is useful to note that the Cuesta study shows total production in 2003 of around 575,000 tonnes, with a total permitted reserve of around 17,250,000 tonnes. Whilst it is not appropriate to derive a single landbank figure, these figures do appear to indicate that overall levels of permitted reserves are buoyant. This in turn may indicate that there should only be a limited need for release of further reserves in particular cases. The key question for the Minerals Plans is therefore, what (if any) particular grades of silica sand merit release of further reserves, taking into account the importance of the mineral product and the (cumulative) environmental impact of extended working.

Summary of issues

1. Government guidance (MPG6) and the associated sub-regional apportionment for aggregates production require Bedfordshire to provide for a supply of aggregate minerals equivalent to 1.93 million tonnes per year. This figure is not fixed, however, and must be tested through the Development plan process. Average production rates over the last 3, 5 and 10 years are lower than the sub-regional apportionment (1.83, 1.86 and 1.80 million tonnes per year respectively). This may indicate that an annual landbank lower than the sub-regional apportionment may be a more actual reflection of actual demand.
2. The Bedfordshire aggregates landbank includes a significant proportion of building sands which are intermingled with silica sand deposits of the Greensand Ridge. This means that if a single aggregates landbank is maintained then it will include a higher proportion of building sands than is reflected in the actual split in production, with a corresponding reduction in provision for concreting aggregates. This may result in imports of concreting aggregates from surrounding counties, which may be balanced (at least in part) by export of building sand products.
3. Conversely, if the aggregates landbank is to be split into building sand and concreting aggregate fractions, so as to ensure that the local supply of concreting aggregate is maintained, then the landbank for building sand will be greater than that required under government policy. This is because the building sand reserves are effectively locked up with silica sand deposits, for which the landbank requirement is 10 years.
4. If the aggregates landbank is to be split, we need to identify the most appropriate breakdown (e.g. split into building sands and concreting aggregates), and the most appropriate proportions for each fraction. 10 alternative scenarios have been identified in this regard.
5. Any split in the aggregates landbank must be supported by accurate annual monitoring if the policy is to be successfully applied. This suggests that any split should be as simple as possible, and any policy for a split landbank must be supported by ongoing co-operation from industry for annual monitoring purposes.
6. Government guidance requires a 10 year landbank for silica sand “production” sites, but does not specify what these “production sites” are. We need to determine exactly what categories of silica sand merit protection via a 10 year landbank policy, taking into account the importance of particular silica sand products and the cumulative impacts of any increased provision.

Issue 4 Options

- 4.1** Should the landbank for aggregate minerals be split into sub-categories or left as a single landbank leaving the sub-regional market to take up any imbalance in local supply and demand for the sub-categories? If the landbank is to be split, should this be done on the basis of:
- A) Landbanks calculated using 2003 sales and split between concreting/building aggregate with Woburn & Quaternary sources for concreting aggregate (see Table 3);
 - B1) Landbanks calculated using apportionment with 50/50 split between concreting/building aggregate and with 18:82 split between Woburn & Quaternary concreting aggregate sources (as per 2003 sales) (see Table 3);
 - B2) Landbanks calculated using apportionment with 70/30 split between concreting/building aggregate and with 18:82 split between Woburn & Quaternary concreting aggregate sources (as per 2003 sales) (see Table 3);

- B3) Landbanks calculated using apportionment with 71/29 split between concreting/building aggregate and with 18:82 split between Woburn & Quaternary concreting aggregate sources (both as per 2003 sales) (see Table 3);
- C1) Sub-regional apportionment split by 3 yr average production (see Table 4);
- C2) Sub-regional apportionment split by 5 yr average production (see Table 4);
- C3) Sub-regional apportionment split by 10 yr average production (see Table 4);
- D1) Production levels and split by 3 year average production (see Table 5);
- D2) Production levels and split by 5 year average production (see Table 5);
- D3) Production levels and split by 10 year average production (see Table 5);
- E) Some other proportion, and if so, what?

4.2 Which particular grades of silica sand, and which production sites, may merit security of supply by application of the 10 year landbank policy?

Issue 5. Other minerals

- 4.46 Apart from aggregates and industrial sands, Bedfordshire also currently produces significant quantities of chalk and clay. In both cases, we believe that sufficient permitted reserves exist to satisfy demand for foreseeable future, and therefore there is no need to identify further reserves in the plan review.
- 4.47 Fuller's earth was produced in Bedfordshire until recently, but permission to work the only remaining reserve was refused at appeal in 2002. In the current MWLP there is therefore a policy presumption against any new extraction. We believe it to be appropriate to maintain this presumption in the plan review.
- 4.48 There are also some reserves of building stone in the area, but these are considered to be a minor matter as there are only limited resources of low quality stone, which are only likely to be of use for building restoration and repair. In light of this, there is no policy covering building stone in the current MWLP and we would currently deal with any planning applications to work building stone on their own merits. Part 2 of this paper, however, includes a nominated site for working of limestone at Pavenham (site MD18), and we need to consider whether it would be appropriate to include this site in the Minerals Site Allocations Plan.
- 4.49 There was little feedback on the above issues from the scoping consultation and we think that it is appropriate to carry these matters forward for wider consultation in this issues and options paper.
- 4.50 One matter raised, however, related to potential need for policy coverage for any new brickworks development in the county. The 1996 MWLP did contain a specific policy relating to new brickworks, but the adopted MWLP does not. At the present time, it is our understanding that the current brickworks at Stewartby may need to be redeveloped or closed in light of the new and more stringent emission limits of the IPPC (Integrated Pollution Prevention and Control) regime. We think that it is right to consider this matter in the context of the new Framework.

Issue 5 Options

- 5.1** Are the above assumptions relating to working of brick clay, fuller's earth and chalk correct, or should we be making specific provisions for these mineral classes? If the latter, what specific provisions are required?
- 5.2** Is it necessary and appropriate to identify the specific site at Pavenham proposed for the working building stone?
- 5.3** Should the minerals core strategy include specific policy relating to new brickworks in the area? If so, what matters should the policy address?
- 5.4** Should the Site Allocations Plan identify a specific preferred site, or sites, for new brickworks? (no such sites have been proposed by industry for inclusion in the plan). If so, should there be a presumption that any new works will be located on the site of the current Stewartby works?

Issue 6. Strategic approach to sites selection

- 4.51 We need to consider issues relating to the most appropriate means to identify sites to satisfy any need for minerals that we identify. This includes consideration of the most appropriate spatial strategy for minerals provision. We identified four main alternatives at the issues scoping stage:
 - 1. Extensions vs. new sites. Is it more desirable in principle to concentrate working at existing sites (where reserves exist), or to shift production to new sites? Is it appropriate to make this kind of general distinction as a basis for site selection?
 - 2. Concentration vs. dispersal. Is it desirable to concentrate mineral working in certain areas, or it is better to try and disperse sites? Is it appropriate to make this kind of general distinction as a basis for site selection?
 - 3. "Cherry-picking" vs. a longer term strategy. Should we attempt to come up with a long term strategy for site location at all, or should we simply "cherry pick" that best sites available at any given time?
 - 4. Should commercial competition be a consideration? (i.e. should we try to ensure that a number of mineral producers are active in the area, so as to foster competition?)
- 4.52 Feedback from the issues scoping consultation was generally unsupportive of these alternatives. There was a strong consensus that commercial competition should not be a factor in planning, whilst the first three matters should not be regarded as specific alternatives. Emphasis was given to the fact that specific mineral types occur, and can only be worked, in distinct geographical locations, and that this will be a key determinant in any spatial strategy.
- 4.53 In light of this feedback, we now propose a different approach, based on the particular geography of specific mineral reserves.
- 4.54 Concreting aggregates, particularly the coarse (gravel) fractions, are generally associated with river valley and fluvio-glacial deposits located in the Ivel and Ouse valleys. The 1996 MWLP included a presumption against mineral working in the upper Ouse valley (i.e. west of Bedford) as the local environment was considered to be more sensitive in this location. The 1996 MWLP therefore limited sand and gravel working to the Ivel and lower Ouse (i.e. west of Bedford) valleys. One option would be to re-instate this presumption in the new plans.
- 4.55 It may be, however, that by locating mineral working in the upper Ouse, a contribution could be made to flood defence by appropriate design of restoration schemes to include flood storage lakes. Thus a second option for sand and gravel sites would be to allow working of the upper Ouse valley.

- 4.56 Building sand and industrial sand deposits are concentrated in the Greensand Ridge formation, which runs from Leighton Buzzard through to Sandy and Potton with only a brief interruption where the ridge is cut by the Ivel valley. Current mineral workings are concentrated in the Leighton Buzzard / Heath and Reach and Potton areas, although past and present workings have been located in areas in between, for example at Clophill. The particular sands in the Greensand Ridge vary with location, with sands suitable for industrial purposes generally concentrated around Leighton Buzzard / Heath and Reach, where they are intermingled with sands suitable for building (“soft” sands) and concreting (“sharp” sands), whilst the deposits around Potton are more predominantly composed of soft sands.
- 4.57 In light of this, it may be possible to focus any future sand working in the Leighton Buzzard area, which would remove impacts and conserve resources in the Potton area but would increase intensity of impacts around Leighton Buzzard, and could result in increased transport. Conversely, any future sand working could be distributed between the Leighton Buzzard and Potton areas and possibly other areas of the Greensand Ridge. This would result in a wider distribution of supply, thus potentially reducing transport requirements, but would mean more areas being subject to impacts of mineral working. It may also allow a greater range of sand fractions to be worked.

Issue 6 Options

- 6.1 Should there be a presumption against mineral working in the upper Ouse valley (i.e. west of Bedford)?
- 6.2 Should future working of Greensand Ridge deposits be concentrated around Leighton Buzzard / Heath and Reach, or should it be distributed more widely to include Potton and other parts of the Ridge?
- 6.3 Should all sites be identified purely on the basis of their individual sustainability performance (determined via the sustainability appraisal), without reference to any broader locational strategy, in recognition of the over-riding fact that minerals can only be worked where they are found.

Issue 7. Other policies of the current MWLP

- 4.58 Whilst preparing the Minerals Core Strategy and Site Allocations Plans, we can also take the opportunity to review the other existing policies of the MWLP minerals chapter. These are:– M5 (rationalisation of reserves), M6 (requirements for mineral applications), M7 (import of materials for processing), M8 (borrow pits) and M9 (rail aggregates depots).
- 4.59 At present, we do not think that these policies will require significant (if any) change. All the policies are recent (adopted in January 2005), and we do not think there are any significant new factors that will mean they need to be modified.
- 4.60 The responses to the scoping consultation indicated a strong consensus that MWLP Policies M5 – M9 can be brought forward to the Development Framework without modification. Whilst we agree with this at this stage, we do consider that as the level of response to the scoping stage was fairly limited, the matter should be carried forward to the issues and options paper for wider consultation.

Issue 7 Options

- 7.1 Is it correct to assume that Policies M5, M6, M7, M8 and M9 of the current MWLP can be brought forward to the Minerals Development Framework without significant modification, or do these policies require modification? If the latter, what modifications are required?

Issue 8. Mineral consultation areas

- 4.61 Government guidance states that mineral planning authorities should define “mineral consultation areas” and that they should be consulted if any planning applications are made which may “sterilise” mineral resources within them (for example by building on top of mineral resources). The current MWLP sets out mineral consultation areas which are broadly defined to correspond with the extent of known mineral reserves, irrespective of whether or not their economic development potential is known. We think that we need to consider refining our definition of mineral consultation areas to give a greater focus on those areas where mineral deposits of proven economic value and industrial interest exist, and that this is an issue to consider in the preparation of the Minerals Development Plans.
- 4.62 The responses to the scoping consultation indicated general agreement that the mineral consultation areas should be reviewed in order to be more focussed. One way to do this would be to liaise with mineral operators and landowners in order to identify specific areas which merit protection under an MCA. Another possible approach would be to engage independent geological resource specialists to identify such areas.

Issue 8 Options

- 8.1** Should the mineral consultation areas be refined to give a more focussed coverage? If so should this be done by consultation with mineral operators and landowners, by engaging specialist geological resource services, by a combination of the two, or by some other approach?

Issue 9. Reservoirs

- 4.63 It is becoming increasingly common in parts of East England for applications to be made for water supply reservoirs, particularly for agricultural purposes, although none have been made in Bedfordshire and Luton in recent times. Such applications generally include a significant element of mineral extraction, and can make a material contribution to overall minerals supply. The current MWLP does not contain any specific policy coverage for reservoirs. We think that we need to consider possible inclusion of such policy as we prepare the Minerals Core Strategy and Site Allocations Plans.
- 4.64 The issues scoping generated a mixed response to this matter, which indicates that this is a matter that should be carried forward for consideration in the issues and options paper.
- 4.65 Another possibility would be to expand the scope of the current MWLP policy for borrow pits (Policy M8), so that it relates to a broader range of “windfall sites”, including reservoirs. Such a policy could state that windfall sites would be approved, provided that they offer environmental benefits.

Issue 9 Options

- 9.1** Should policy for reservoirs be included in the Minerals Core Strategy and Site Allocations Plans? If so, what matters should the policy address?
- 9.2** If a policy for reservoirs is necessary, should this be addressed by expanding the scope of the current MWLP borrow-pit policy M8, to create a wider “windfall site” policy? If so, what matters should this policy address?

Issue 10. Other matters

- 4.66 The scoping consultation included a question asking whether there were any other mineral matters not covered in the adopted MWLP which should be addressed in the new Framework. One matter raised in the responses related to the encouragement of mineral operators to maintain environmental management systems such as ISO 14001. We think that this appears worthy of further consideration, but that it would be best taken up in future review of the

“General Environment” section of the MWLP, as the matter is at least as relevant to waste operations as it is to mineral extraction.

Issue 10 Options

- 10.1** Should the Development Framework include a policy encouraging mineral operators to maintain an environmental management system? If so would this be appropriate for the Minerals Core Strategy or would it be better placed in a future review of the “General Environment” section of the MWLP? If such a policy is desirable, should it be advocational or should it set out a firm requirement such that all applicants must demonstrate that they have an environmental management system in place?
- 10.2** Are there any other mineral matters not covered by existing MWLP policy that we should be considering?

Issue 11. Market monitoring

- 4.67 Proper planning for minerals is dependent on robust monitoring, particularly of annual production and remaining mineral reserves. We are currently reliant on the voluntary co-operation of mineral operators to supply this information, and whilst the industry’s record in this regard is reasonably good, we cannot always rely on receiving full and timely information for all operators, particularly in relation to the detailed breakdown of production and reserves between the various mineral categories. Lack of information undermines our ability to plan. We believe that consideration needs to be given to obliging mineral operators to supply annual production and reserves data by way of attaching conditions to planning permissions, and that this is an issue that we should consider in the preparation of the Minerals Plans.
- 4.68 It should be noted that if the aggregates landbank is to be split, then it will be essential to obtain accurate annual data on production and reserves according to the particular split identified in the landbanks policy. Without this information, the policy would be impossible to monitor and hence unworkable.
- 4.69 The scoping consultation produced a very strong consensus from the minerals industry that such compulsion of reporting should not be contemplated, and that the necessary information is already available from the annual monitoring undertaken by the Regional Aggregates Working Party (RAWP).
- 4.70 Notwithstanding this, the County Planning Authority has experienced ongoing difficulties in securing robust monitoring data for minerals and waste activities.
- 4.71 Furthermore, the information collected by the RAWP survey does not include sufficient detail, or comprehensive coverage of all mineral types, both of which are essential for Development Plan formulation and monitoring. Also, the RAWP survey does not permit retention of detailed site data year on year, and thus precludes quality control of data between survey years.
- 4.72 In light of this, we consider that compulsion of site reporting by way of planning condition is a matter that ought to be taken forward in the minerals plans.

Issue 11 Options

- 11.1** Should the Minerals Core Strategy include a policy for all new mineral extraction consents to include a condition requiring mandatory annual reporting of sales and remaining reserves? If not, what other means can the Planning Authority use to ensure robust monitoring?

Site Allocations Plan

4.73 As part of the preparatory work on the Minerals Development Framework, we have issued a call for sites to industrial operators, trade associations and landowners.

4.74 From this call, 45 potential new sites have been proposed. These comprise:

- 34 sites with sand and gravel aggregate reserves. The total yield from 19 of these sites would be in the range of 24-27 million tonnes. 15 sites have no estimates of reserves at this time.
- 7 sites located on the Greensand Ridge, with industrial and other sand reserves totalling 15.5 – 17 million tonnes.
- A proposal to work chalk for “construction” purposes from Sundon and Houghton Regis quarries (unquantified)
- A proposal for limited working of building stone for local needs from a site in Pavenham
- A proposal for additional release of 12 million tonnes of clay reserves in the Marston Vale.

4.75 For the issues and options consultation, all nominated sites have been published in part 2 of this paper. Each site has an outline plan and an initial statement of issues pertaining to each site drawn from GIS constraint overlays.

4.76 The full portfolio of nominated sites is presented in part 2 of this issues and options paper.
