West Sussex Landscape Sensitivity and Capacity Study for Potential Mineral and Waste Sites

Prepared for West Sussex County Council by Land Use Consultants

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LUC SERVICES

Environmental Planning Landscape Design Landscape Management Masterplanning Landscape Planning Ecology Environmental Assessment Rural Futures Digital Design Urban Regeneration Urban Design

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1. Introduction

- 1.1 Land Use Consultants (LUC) was commissioned by West Sussex County Council (WSCC) to carry out a landscape sensitivity and capacity assessment of potential mineral and waste sites in the county as part of the preparation of the West Sussex Minerals and Waste Core Strategy Development Plan. This main report and a report appended to it, Annex 1: Waste Sites, sets out the findings of this study which will form part of the evidence base supporting the preparation of the Minerals and Waste Core Strategy.
- 1.2 The landscape of West Sussex is valued as a natural, historical and cultural resource and includes the South Downs National Park, and two AONBs, Chichester Harbour and High Weald, landscapes of national importance. Given the significant short term and long term impacts mineral development can have on the landscape, there is a clear need to balance demands for securing future mineral resources with that of protecting and conserving the special landscape character and resources of the county, including ensuring the objectives of the South Downs National Park are met.
- 1.3 This study was intended to provide guidance relevant to landscape and visual matters regarding the 'long list' sites (Background Paper 5 Version 2) which are being considered through the West Sussex Minerals and Waste Core Strategy. The main report focuses on the sensitivity of the potential sharp sand and gravel, soft sand, sandstone, chalk and clay sites.
- 1.4 The appended report, Annex I, focuses on the landscape sensitivity and capacity of the potential waste sites. The study of potential waste sites within the appended report follows a broadly similar methodology to that of the mineral study, but takes into account the characteristics of the waste development facilities.

Purpose of the study

- 1.5 The primary purpose of the review of landscape sensitivity and capacity to mineral development is to inform the preparation of the Core Strategy Development Plan. The aims of the study, as identified in the brief, are as follows:
 - to provide an assessment of the landscape and the potential for it to accommodate the mineral workings (i.e. its sensitivity and capacity); and
 - to provide guidance on the extent to which each site might be able to accommodate mineral development without having a significant detrimental impact on the character of the area taking into account current practices of design and mitigation.
- 1.6 A key consideration is the need for the study to meet the Tests of Soundness identified in PPS12 and provide a transparent, robust and defensible evidence base for the MWDF. The method of approach to this study is set out in Section 2 and draws on key guidance and best practice as set out in the following:

- Scottish Natural Heritage and the Countryside Agency (2002) Landscape Character Assessment;
- Scottish Natural Heritage and the Countryside Agency (2002a) Topic Paper 6: Techniques and Criteria for Judging Capacity and Sensitivity; and
- The Landscape Institute and Institute of Environmental Management and Assessment (2002b) Guidelines for Landscape and Visual Impact Assessment (Second Edition).

Report Structure

1.7 The report is structured as follows:

Main Report: Mineral Sites

- **Section 2:** Methodology;
- Section 3: Sensitivity Assessment
- Section 4: Summary of Findings;
- Section 5: Conclusions and Recommendations.
- 1.8 The main report is supported by the following figures:
 - Figure I Site Locations;
 - **Figure 2** Topography;
 - Figure 3 National Character Areas;
 - Figure 4 West Sussex Landscape Character Areas;
 - Figure 5 Landscape Designations;
 - **Figure 6** Cultural Heritage Designations;
 - Figure 7 Conservation Designations;
 - Figure 8 Tranquillity;
 - Figure 9 Intrusion.

2. Methodology

- 2.1 The approach to assessing sensitivity to minerals workings used in this study builds on current thinking on techniques and criteria for judging landscape sensitivity and capacity as documented in *Topic Paper 6*¹ which accompanies the guidance published by the Countryside Agency and Scottish Natural Heritage². There is currently no agreed method for evaluating sensitivity or capacity of different types of landscape. The methodology therefore builds on LUC's experience from previous and ongoing studies of a similar nature and was developed in consultation with WSCC and the National Park Authority.
- 2.2 The following diagram indicates the main project stages.

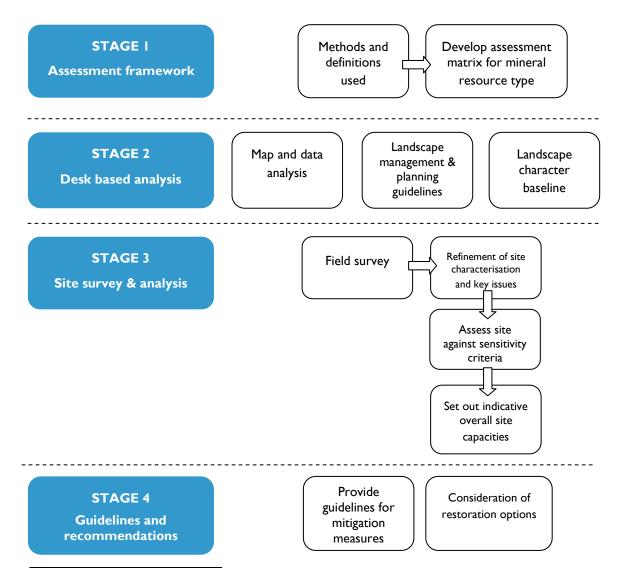


Diagram I: Project Stages

¹ The Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment Guidance for England and Scotland. Topic Paper 6: Techniques and Criteria for Judging Capacity and Sensitivity.

² Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment: Guidance for England and Scotland CAX 84.

Method and Definitions of Landscape Sensitivity

2.3 Landscape sensitivity is a measure of the resilience of the landscape to change. *Topic Paper 6: Techniques and Criteria for Judging Sensitivity and Capacity* differentiates between two definitions of landscape sensitivity:

I) Overall Landscape Sensitivity

This refers to the inherent sensitivity of the landscape itself, "irrespective of the type of change that may be under consideration", embracing a combination of:

- a. the sensitivity of the landscape resource (in terms of both its character as a whole and the individual elements contributing to character);
- b. the visual sensitivity of the landscape, assessed in terms of a combination of factors such as views, visibility, the number and nature of people perceiving the landscape and the scope to mitigate visual impact.

This concept is most relevant for work at a strategic level such as in the preparation of regional and sub-regional spatial strategies.

2) Landscape sensitivity to a specific type of change

This refers to the sensitivity of the landscape to a particular type of change or development. It should be defined in terms of the interactions between the landscape itself, the way that it is perceived and the particular nature of the type of change or development in question.³

- 2.4 In this study, landscape sensitivity is based on the second of these terms. The study makes a series of judgements about the sensitivity of each individual site to specific types of mineral development alongside making comment on likely landscape and visual effects. These judgements should be taken as being indicative of the likely effects, and are not intended to be a substitute for detailed consideration of the effects of individual development proposals if required as part of planning applications. These should be addressed on a case-by-case basis as part of defined planning procedures. It is likely that some but not all sites will require Environmental Impact Assessment which should include landscape and visual impact assessment.
- 2.5 The following definition of sensitivity, as set out in the brief, has been applied in this study:

Sensitivity is the extent to which the character of the landscape is susceptible to change as a result of proposed mineral workings.

2.6 Sensitivity has been assessed based on a series of criteria, which were developed to highlight specific landscape and visual characteristics which are most likely to be affected by the development types under examination. The

³ Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment Topic Paper 6, pp.3-4

criteria are based on current good practice as described in *Topic Paper 6*, and relate to the physical landscape, visual amenity, cultural features, and perceptual characteristics. Further information about the criteria is presented in **Section 2** and **Table 2.1**.

Definitions of Landscape Capacity

- 2.7 Landscape capacity, as discussed in *Topic Paper 6*, is a term used to describe the ability of the landscape to accommodate different amounts of change or development of a specific type without fundamentally changing its key characteristics. Broadly it reflects:
 - the sensitivity of the landscape resource and its visual amenity;

Diagram 2: Diagram reflecting *Topic Paper 6*: Summary of factors to consider in judging landscape capacity for a particular type of change⁴.

• the value attached to the landscape or specific elements in it.

Landscape Character Sensitivity Landscape Visual Sensitivity Landscape Value Landscape Value

- 2.8 Landscape capacity refers to the resilience or robustness of the landscape and the degree to which it can accommodate specific types and levels of change without significant effects on its overall character, key attributes or quality. The term does not refer to an absolute limit to the amount of change that can be accommodated, as no such firm thresholds can be established beyond which change would be 'unacceptable'. In assessing landscape sensitivity and capacity within this study, judgements as to acceptability of specific development proposals are not made, as these judgements need to be weighed up in the overall planning balance.
- 2.9 As Topic Paper 6 notes, a valued landscape, whether nationally designated or not, does not automatically, and by definition, have high sensitivity. Similarly, "landscapes with high sensitivity do not automatically have no, or low capacity to accommodate change, and landscapes of low sensitivity do not automatically have high capacity to accept change"⁵.

⁴ Based on Figure 1b within The Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment Guidance for England and Scotland. Topic Paper 6: Techniques and Criteria for Judging Capacity and Sensitivity, page 5

⁵ The Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment Guidance for England and Scotland. Topic Paper 6: Techniques and Criteria for Judging Capacity and Sensitivity, page 14

Landscape Value

2.10 The definition of landscape within the **European Landscape Convention** (ELC), adopted and promoted by the Council of Europe, is all embracing:

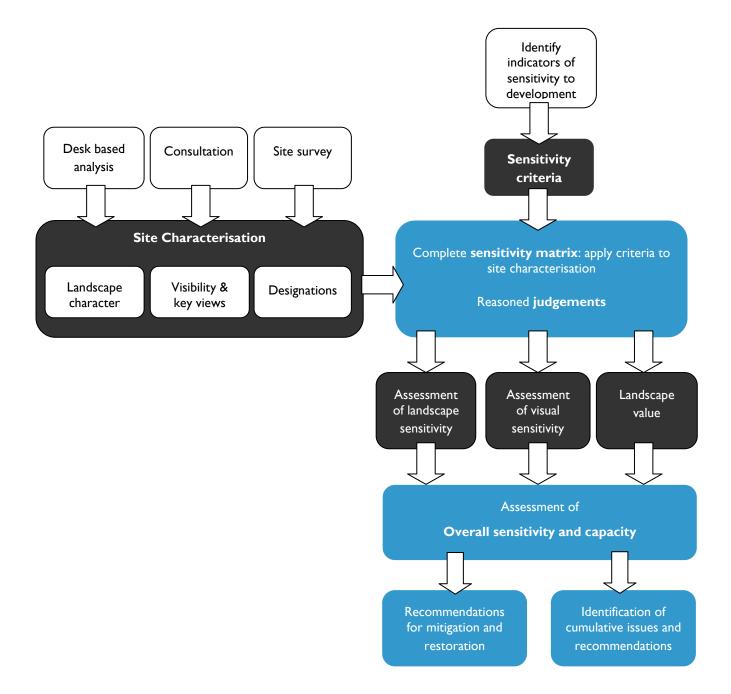
"Landscape means an area, as perceived by people, whose character is the result of the action and interaction of natural and/or human factors".

- 2.11 The Convention is important in that it recognises that all landscapes matter, be they ordinary, degraded or outstanding. There is however also recognition that value is also ascribed to landscapes, and *Topic Paper 6* identifies the need for judgements about landscape capacity to reflect that certain landscapes are valued by society for different reasons⁶.
- 2.12 For the purposes of this study, consideration has been given to the implications of proposed change for the key characteristics and special qualities identified for formally designated areas. The landscape management plans for the Chichester Harbour AONB, the High Weald AONB and the South Downs National Park, as well as the relevant planning guidelines, have informed the study and the development of the assessment criteria. Those criteria related to the key qualities of the designated landscape have been given more weight in the assessment process.
- 2.13 In this study **landscape value** reflects local and national landscape designations as well as other factors such as:
 - natural heritage designations;
 - cultural heritage designations (such as scheduled monuments and conservation areas); and
 - recreational resources, including long distance paths.

These factors, whilst not directly linked to landscape, nevertheless indicate the different ways the landscape may be valued by local residents and visitors, and have been included in the study to take account of broader amenity, cultural and historical features or elements that may be affected by development. Other factors indicating landscape value include landscape quality and condition, intactness, apparent historic time-depth and perceptual qualities such as tranquillity and remoteness are also taken into account.

⁶ The Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment Guidance for England and Scotland. Topic Paper 6: Techniques and Criteria for Judging Capacity and Sensitivity, page 12





Mineral Development and Sensitivity Indicators

The key features, or attributes, of each type of mineral development were established, in terms of their potential effects on the landscape. Based on these attributes, a number of landscape characteristics were identified, which act as corresponding indicators of potential landscape sensitivity. Key potential impacts for each of the different types of development are listed in **Appendix 2**.

Assessment Criteria

2.14 Criteria for determining landscape sensitivity were established based on the attributes of the landscape identified as being most likely to be affected by development. A five point scale, setting out the criteria indicating higher to lower sensitivity, was used against which the attributes of each individual site could be set out.

	LOWER SENSITIVITY \leftarrow						
LANDSCAPE CRITERIA							
Landform	Simple, large scale, predominantly flat	Simple, large to medium scale, predominantly flat to undulating	Occasional variety but lacking strong complexity	Complex with topographical variety	Very complex with strong topographical variety		
Land cover	Simple, large- scale pattern (large conifer plantations, arable fields), and/or regularly disturbed, fragmented landcover	Largely simple, some disturbance, largely fragmented landcover and landuse	Some variety, limited disturbance, a degree of consistency in pattern of landuse and landcover	Varied pattern with some intricacy, largely undisturbed and coherent landcover, some historic landuse pattern evident	Intricate, varied pattern, undisturbed consistent patterns of land cover or land use, historic field patterns		
Scale	Large scale, featureless	Medium to large scale	Medium to small scale with occasional human scale indicators	Small scale with human scale indicators	Very small scale, intricate with human scale indicators		
Enclosure	Enclosed	Mostly enclosed, some open areas	Some enclosure	Generally open, enclosed in places	Open, exposed		
Condition	Low level of intactness with landscape elements in poor state of repair	Some intactness with some elements in poor state of repair	Generally intact with elements in reasonable state of repair	Intact and elements in good state of repair	High level of intactness and very good state of repair		

Table 2.1 Sensitivity Matrix

	LOWER SEN	SITIVITY ←	`		SITIVITY
Typicality and rarity	No rare features or weak association with key characteristics of the landscape	Few rare features or some association with key characteristics of the landscape	Some rare features and attributes or largely corresponding to key characteristics	Rare features and attributes, strong correspondence with key qualities	Rare features of regional importance or representative of key characteristics and qualities
Tranquillity including noise and lighting	Not tranquil, much human activity, noise and light	Limited tranquillity	Some human activity reducing sense of tranquillity, some lighting	Relatively tranquil, no lighting	Tranquil, little human activity, noise or lighting
Remoteness	Presence or proximity to human activity or modern development or industrial structures e.g. utility, infrastructure	Close to some visible signs of human activity and modern development	Some sense of distance and remoteness, human activity and modern development largely absent	Perception of remoteness, sense of distance from human influences	Strong sense of remoteness; physically remote or perception of being remote
VISUAL CRITER	IA				
Skylines	No relationship to skyline	Limited relationship to skyline	Some relationship to skyline with some complexity and interruption	Relationship to prominent skylines that is largely simple or with some variety and interruption	Strong relationship to prominent, simple and undeveloped skylines
Views and landmarks	Contains no landmarks and is not a feature in local views	No or limited landmarks or limited significance in local views	Locally important landmarks or views	Some important landmarks, or significant views	Landscape includes important landmarks or is important in views across a wide area
Intervisibility	Self contained, restricted intervisibility	Occasional views to adjacent landscapes	Intervisibility with some neighbouring landscapes	Intervisibility and strong links to neighbouring landscapes	Extensively intervisible, part of wider landscape
Visual Receptors	Low number of viewers from properties and transport routes	Local transport routes, limited numbers of residents	Some visibility from main transport routes and a number of residents	Frequent properties and views from main transport routes	Higher visibility from main transport routes and large number of properties
LANDSCAPE VA	ALUE CRITERIA				
Landscape designations	No or limited intervisibility or relationship with a locally or nationally designated landscape	Some intervisibility and relationship with a locally or nationally designated landscape	Located in close proximity to a designated landscape with some intervisibility and relationship with it	Located within or in close proximity to a designated landscape, some significant intervisibility and association with the wider designated area	Located within a nationally or locally designated landscape with a strong association with the wider designated area

	LOWER SEN	SITIVITY ←	`		SITIVITY
Natural heritage	No landscape conservation designations	Limited extent of nature conservation areas and areas of ancient woodland	Some nature conservation designations	Nature conservation designations over a significant area	Statutory nature conservation designations over an extensive area
Historic environment and settings	No significant historic features	Historic features but not relating to landscape	Some historic features relate to landscape	Some prominent historic features	Historic features are prominent in the landscape
Recreation	Little or no recreational use	Low level informal or local recreational use	Locally significant recreational use or attraction	Well used for recreation, greater than local attraction	Important for recreation for locals and visitors

- 2.15 It should be noted that for each site the relevant importance of the criteria varies and the assessment does not consist of a rigid scoring system, rather the sensitivity of each site was assessed through professional judgement guided by performance against the criteria. As the *Guidelines for Landscape* and Visual Impact Assessment note, there are "complex relationships between the different components of the landscape".⁷ For different sites, falling within different landscape character areas with a range of specific issues, different criteria are considered more or less important. Those criteria which relate to the 'key qualities' in the designated landscapes (ie the South Downs National Park and the two AONBs), are afforded greater weight.
- 2.16 Where sites lie close to designated landscapes this is taken into account. In areas where intervisibility is with a protected landscape, the intervisibility criterion is afforded greater weight in the balance of judgement.
- 2.17 For each site, therefore, sensitivity and capacity depends on a range of factors which have been carefully balanced through seeking to make transparent, professional judgements, rather than a rigid scoring system.
- 2.18 This study has used a five-point scale to record sensitivity, outlined in **Table** 2.2 below.

⁷ Landscape Institute and Institute for Environmental Management and Assessment, *op. cit.* Section 7.45

Sensitivity score	Definition				
High	Key characteristics of the landscape are highly vulnerable to change. The nature of the development would result in a significant change in character.				
Medium-High	Key characteristics of the landscape are vulnerable to change. There may be some limited opportunity to accommodate development without changing landscape character. Great care would be needed in locating mineral/waste sites.				
Medium	Some of the key characteristics of the landscape are vulnerable to change. Although the landscape may have some ability to absorb some development, it is likely to cause some change in character. Care would be needed in locating mineral/waste sites.				
Medium-Low	Few of the key characteristics of the landscape are vulnerable to change. The landscape is likely to be able to accommodate development with only minor change in character. Care is still needed when locating mineral/waste sites to avoid adversely affecting key characteristics.				
Low	Key characteristics of the landscape are robust and would not be adversely affected by development. The landscape is likely to be able to accommodate development without a significant change in character. Care is still needed when locating mineral/waste sites to ensure best fit with the landscape.				

Table 2.2 Definitions of sensitivity

Desk Studies

Desk based review of sensitivity

2.19 An initial desk-based assessment of sensitivity was undertaken, informed by other relevant studies including landscape assessments particularly where these included analysis of landscape sensitivity. Landscape characterisation underpins the approach to landscape sensitivity assessment. The landscape character of the wider study area within which each site fell was considered, drawing on the existing landscape character assessment for the WSCC Landscape Strategy⁸ and the West Sussex and Land Management Guidance

⁸ A Strategy for the West Sussex Landscape, Consultant's Technical Report (2003) by Chris Blandford Associates

⁸ West Sussex County Council (2003) A Strategy for the West Sussex Landscape, Consultant's Technical Report

Sheets. Where relevant this was supplemented with information from the South Downs Integrated Landscape Character Assessment⁹, the High Weald AONB Management plan, and the Chichester Harbour AONB Landscape Character Assessment¹⁰.

- 2.20 The West Sussex Character Project divides the county into 42 landscape character areas within the National Character Area framework. **Figure 4** shows the sites assessed in relation to the location of landscape character areas.
- 2.21 The initial review also identified what was important and why in relation to designated landscapes through drawing on information contained within the *Management Plan for South Downs*, Chichester Harbour AONB and the High Weald AONB Management Plans and the relevant parts of the *South Downs National Park Planning Guidelines*¹¹. **Figure 5** shows the designated landscapes across the study area. The assessment also draws on information contained within the protected area landscape character assessments and management plans¹² as well as the West Sussex Historic Landscape Character (HLC) project¹³.
- 2.22 The desk top research exercise also included a review of GIS data and map studies, including topography (Figure 2), cultural heritage features (Figure 6), national and international conservation designations (Figure 7), tranquillity (Figure 8) and intrusion (Figure 9).

Zone of Theoretical Visibility (ZTV) Analysis

- 2.23 Evaluation of the theoretical extent to which the individual sites will be visible across the study area was undertaken by establishing a 'Zone of Theoretical Visibility' (ZTV), using specific computer software designed to calculate the theoretical intervisibility between the development and its surroundings. ReSoft Windfarm and Arcmap GIS computer software was used to generate the ZTV.
- 2.24 These programmes calculate areas from which the site, modelled to a maximum height of 5m above ground level, is potentially visible. This used digital contour information to identify those locations from which each potential mineral site is, in theory, visible. The analysis is based on bare ground topography ie. without tree cover, buildings etc. with the following categories of woodland (using the National Inventory of Woodland and Trees (NIWT)) factored into the calculation of the ZTV of the mineral sites, assuming a tree height of 15m):
 - Broadleaved;

⁹ Land Use Consultants for the South Downs Joint Committee (2005) South Downs Integrated Landscape Character Assessment

¹⁰ Chichester Harbour Conservancy and Countryside Agency (2005) Chichester Harbour AONB landscape character assessment

¹¹ South Downs Joint Committee (2007) South Downs Planning Guidelines

¹² High Weald AONB Joint Advisory Committee (2009), The High Weald Area of Outstanding Natural Beauty Management Plan 2004: a 20-year strategy

¹³ Full HLC baseline data has not been included in this study. This data can be obtained directly from the WSCC Historic Environmental Records Office.

- Coniferous; and
- Mixed.
- 2.25 The ZTV therefore does not allow for the screening or filtering effect of coppice woodland, shrubs, field boundaries or buildings. It should also be noted that the programme uses point height data, rather than continuous data, and assumes straight line topography between data points, and is not able therefore to take account of small scale topographic features. As it uses a 'bare ground' model, with additional account taken only of large woodland blocks, the maps produced represents a 'maximum potential visibility' scenario, which is likely to be a worst case scenario and much more limited on the ground. ZTV mapping provides a valuable measure of the extent of visibility, the nature of areas from which sites could be visible, identifying for example, sensitive areas, viewpoints, settlements etc which could be affected, and the implications for landscapes of different character and sensitivity.
- 2.26 The ZTVs are theoretical and actual visibility is very much reduced over that shown on the ZTV. This is particularly relevant to the sites on the coastal plain. The ZTVs indicate a blanket of visibility, whereas actual visibility would be intermittent and related to the direction of travel, activity of the receptor and availability of viewpoints (eg roads, PROW, properties). The ZTVs do not measure or assess the degree of impact on the view, but merely identify areas of further investigation.
- 2.27 The ZTVs for each site assessed are presented in **Appendix 3**.

Consultation

2.28 Following the initial desk based review of sensitivity and generation of ZTVs for each site, consultation was undertaken with the South Downs National Park Authority and West Sussex County Council to identify specific issues of sensitivity related to each of the sites in relation to the management objectives for the Park and key viewpoints to be considered for to specific sites. Appendix I provides a summary of information and comments received.

Site Assessments

- 2.29 Field survey work was carried out in October 2010 to test the findings of the desk-based studies. Each site and the surrounding area was visited, including key viewpoints identified through consultation with the South Downs National Park Authority and West Sussex County Council. The emphasis of the work was as follows:
 - to test the findings of the landscape sensitivity analysis;
 - to test the desk-based analysis of intervisibility based on the ZTV, considering the screening and filtering effect of trees and woodland on the ground;
 - to assess the overall sensitivity of the landscape to the mineral working proposal in question;

- to examine the extent to which landscape and visual effects could be mitigated through design, siting, advance planting or other measures and to provide guidance on these measures; and
- to consider, where appropriate, potential restoration and after use.
- To consider the value of the landscape eg. intactness etc.
- 2.30 Field survey forms were used, comprising three main sections:
 - consideration of key features and characteristics of the landscape of the site and immediate surroundings;
 - analysis of the landscape in terms of the characteristics and qualities with a bearing on its sensitivity to the specific mineral working proposal, including intervisibility with surrounding areas and sensitive features present within the site;
 - a brief assessment of potential mitigations measures appropriate to the site and its location in the wider landscape.
- 2.31 The site survey forms, together with the information and analysis from the desk based work, formed the basis of the assessment, where the sensitivity criteria were applied to each site. Completed assessment sheets are presented in full in **Appendix 2**.

3. Sensitivity Assessment

- 3.1 The assessment tables are included in full in **Appendix 2** and include detailed maps and photographs taken during site visits. Each table includes a summary of the key qualities of the landscape character area within which the site falls, drawing on the key qualities and guidance set out in the Landscape Strategy for West Sussex, the South Downs Integrated Landscape Character Assessment and the High Weald AONB where appropriate. For each site, an assessment table summarises:
 - Landscape sensitivity;
 - Visual sensitivity;
 - Landscape value;
 - Overall landscape capacity (also taking account of cumulative issues);
 - Mitigation opportunities; and
 - Options for restoration following extraction.
- 3.2 The following tables detail the findings of the sensitivity assessment of the 32 sites.

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/CH/IA Woodmancote	Low	Low-Medium	Low	Low-Medium
M/CH/IB Common Road West	Low	Medium-High	Low	Low-Medium
M/CH/IC Common Road East	Low	Medium-High	Low	Low-Medium
M/CH/ID Slades Field	Low	Medium-High	Low	Low-Medium
M/CH/2A Densworth North	Medium	Medium	Medium-High	Medium-High
M/CH/2B West Stoke Road East	Medium	Medium	Medium	Medium
M/CH/2C West Stoke Road West	Medium	Medium	Medium-High	Medium
M/CH/2C Huntersrace Lane North	Low-Medium	Low-Medium	Medium-High	Medium

Table 3.1: Sharp Sand and Gravel Sites

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/CH/3 Land Adjacent To Valdoe Quarry	Medium-High	High	Medium-High	High
M/CH/4A Copse Farm	Low	Medium	Low	Low
M/CH/4C Shopwyke North	Low-Medium	Low-Medium	Low	Low-Medium
M/CH/4B Shopwyke South	Low-Medium	Low-Medium	Low	Low-Medium
M/CH/4D Madam Green Farm West	Low-Medium	Low-Medium	Low	Low-Medium
M/CH/4E Withies Farm West	Low-Medium	Low-Medium	Low	Low-Medium
M/CH/4F Brick Kiln Farm	Low	Low-Medium	Low	Low
M/CH/4I Withies Farm East	Medium	Low-Medium	Low	Low-Medium
M/CH/6 Land at Redvins	Medium	Medium-High	Medium-High	Medium-High

Table 3.2: Soft Sand Sites

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/CH/7B East of West Heath Common	High	Medium	Medium-High	High
M/CH/8A Minsted West	Medium	Medium	Medium-High	Medium-High
M/CH/8C Severals West	Medium	Medium	High	Medium-High
M/CH/8D Severals East	Medium	Medium-High	High	Medium-High

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/CH/9A Hawkhurst Farm	Medium-High	High	Medium-High	High
M/CH/10A Duncton Common	Medium	Medium	Medium-High	Medium
M/CH/10C Coopers Moor	Medium-High	Medium	Medium-High	Medium-High
M/CH/II Horncroft	Medium-High	Medium	Medium-High	Medium-High
M/HO/2 Chantry Lane Extension	Medium	Medium	Medium	Medium
M/HO/4A Ham Farm	Medium	Medium-High	Medium	Medium

Table 3.3: Chalk Site

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/HO/5 Shoreham Cement Works	High	High	High	High

Table 3.4: Clay Sites

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/HO/6A Rudgwick Extension West	Medium-High	Medium	Medium	Medium
M/HO/6B Rudgwick Extension East	Medium	Low-Medium	Low-Medium	Medium
M/MS/I Land adjacent to West Hoathly Brickworks	Medium	Medium	Medium-High	Medium-High

Table 3.5: Sandstone Site

	Landscape Character Sensitivity	Visual Sensitivity	Landscape Value	Overall Sensitivity
M/MS/2 Philpotts Quarry	Medium	Medium	Medium-High	Medium-High

4. Summary of Findings

4.1 The following section provides a summary of the results of the assessment of landscape and visual issues at each of the 32 sites, providing a judgement of the overall sensitivity and capacity of each.

GRAVEL AND SHARP SAND

4.2 The 17 sites assessed fall within the Upper Coastal Plain character types. The sites are predominantly distributed around Chichester in the southwest of West Sussex.

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/CH/IA Woodmancote	The more open eastern area of the site has greater intervisibility with the surrounding areas, including the road network and a public footpath crossing it. Development would not compromise the tranquillity and sense of remoteness of the South Downs National Park, despite its proximity. Due to the topography of the site, development is unlikely to visually intrude on surrounding areas and there is potential to further limit visibility into the site.	Low- Medium	Moderate
M/CH/IB Common Road West	Given the relatively flat landform, there is potential to provide appropriate screening around the site, which is currently open and highly visible. This will help prevent views into the site from the surrounding area. Views into the southern parts of the site from the wooded slopes of the South Downs to the north would potentially still be possible even with screening, but at this distance views would be largely unaffected. There is considerable scope for the improvement of the current condition of landscape features, visual amenity and habitat value in conjunction with the development of the site.	Low- Medium	Moderate- High
M/CH/IC Common Road East	The site is currently open and highly visible, set within a wider area that is flat and largely open to the north and east. However, there are opportunities for providing appropriate screening around the site, to prevent visibility from the surrounding area, from Funtington and from other surrounding settlements. Views to the southern parts of the site from the wooded slopes of the South Downs to the north would potentially still be possible even with screening, but effects on views would be unlikely to be significant, given that the context is a well settled area, already influenced by human activities. There is considerable scope for the improvement of the current condition of landscape features, visual amenity and habitat value in conjunction with the development of the site.	Low- Medium	Moderate- High

Table 4.1: Summary of Sharp Sand and Gravel Site Assessments

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/CH/ID Slades Field	The site is currently open to the north and east and highly visible from the wider landscape from these directions, being set within a wider area at the foot of the slopes that is flat and largely open. There are however opportunities for providing appropriate screening around the site and phasing the development to reduce impacts on the surrounding area, from Funtington and other settlements in the vicinity. Views into parts of the site from the wooded slopes of the South Downs to the north would potentially still be available even with screening, but changes to views would largely not be significant, given the site lies within the context of a well settled area already influenced by human activities.	Low- Medium	Moderate - High
M/CH/2A Densworth North	Although low lying, generally flat, with views into the area being restricted by existing vegetation, there are sensitive features such as earthworks, the Devil's Ditch, and habitats in the immediate vicinity, that reduce the capacity of the site to accommodate development of this nature. Mineral workings in this location have the potential to adversely affect these features, and the small to medium size of the site and its shape may limit the potential to mitigate against these. Some reinforcement planting would be required to improve upon the screening of the site prior to any extraction.	Medium- High	Low- Moderate
M/CH/2B West Stoke Road East	Although low lying and generally flat, with views into the area from the north being restricted by existing vegetation, the site is open to the south and southwest and visible from these areas, including West Stoke Road on approaches to West Stoke, and from the boundary of the National Park. There are also sensitive features such as earthworks, the Devil's Ditch, and habitats in the immediate vicinity that reduce the capacity of the site to accommodate development of this nature. Mineral workings in this location have the potential to adversely affect these features, and the small to medium size of the site and its shape may limit the potential to be planned and executed carefully.	Medium	Low- Moderate
M/CH/2C West Stoke Road West	As it is low lying and generally flat, views into the area can be more effectively screened by perimeter vegetation or mounding than would be the case for a sloping site, although some reinforcement planting would be required to improve upon this prior to any extraction. While development of mineral workings in this location has the potential to affect the sensitive features such as earthworks, the Devil's Ditch, and habitats in the immediate vicinity, appropriate siting and screening could reduce adverse impacts. There are opportunities to improve the habitat value and restore and strengthen the character and landscape features of the site as part of a programme of restoration.	Medium	Moderate

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/CH/2D Huntersrace Lane North	Low lying and generally flat, views into the area can be effectively screened by perimeter mounding or vegetation, with advanced planting prior to any extraction. Whilst there is limited intervisibility with the South Downs National Park to the north, there remains some potential for development to be visually intrusive in views from local surrounding areas, reducing the capacity of the site. There are opportunities for the improvement of the current condition of landscape features and habitat value in conjunction with the development of the site and as part of a programme of restoration.	Medium	Moderate- High
M/CH/3 Land adjacent to Valdoe Quarry	The open and highly visible nature of the site in long views along the foot of the South Downs and from popular viewpoints and The Trundle in the north, together with its proximity to East Lavant decreases the capacity of the site to accommodate mineral extraction. Whilst there is potential for providing screening at the edges of the site along the road to the south, development of the west of the site would extend its influence into more sensitive areas close to the settlement.	High	Low
M/CH/4A Copse Farm	Given the relatively flat landform, there is potential for providing appropriate screening around the site, which is currently relatively well screened in the southern part, to reduce views into the site from the surrounding area. It is judged that overall the capacity of the site for accommodating mineral extraction without significant adverse effects on the character and visual amenity of the site itself and surrounding areas increases. There is scope for the improvement of the current condition of landscape features and habitat value in conjunction with the development of the site.	Low	Moderate- High
M/CH/4B Shopwyke North	The partial visibility of the site from the surrounding landscape, and its close proximity to residential and non- residential properties increases its overall sensitivity to extraction. There is however potential for providing appropriate screening around the site, to reduce views into the site from the surrounding area due to the flat landform. There is considerable scope for the improvement of the current condition of landscape features, visual amenity and habitat value in conjunction with the development of the site.	Low- Medium	Moderate- High
M/CH/4C Shopwyke South	The site has some recreational value related to the footpath that follows part of the eastern perimeter and the eastern section is of slightly higher sensitivity due to the presence of the ponds and surrounding vegetation. The high level of visibility available from the surrounding open landscape increases its sensitivity to extraction, though there is considerable scope to reduce visibility into the site from the immediate vicinity through screening or filtering of views with vegetation.	Low- Medium	Moderate- High

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/CH/4D Madam Green Farm West	It has some recreational value related to the public right of way that follows the eastern perimeter and the high visibility of the site in the surrounding landscape makes it of slightly higher sensitivity. While development of mineral workings in this location has the potential to be visually intrusive to surrounding areas, there is scope to reduce visibility into the site from the immediate vicinity through screening or filtering of views with vegetation.	Low- Medium	Moderate- High
M/CH/4I Withies Farm East	Given the relatively flat landform and the existing structure of trees and hedgerows around the site, there is potential to further reduce views into the site from the surrounding area. There are some of features that will constrain the siting of extraction and associated infrastructure, such as the streams located at the perimeter. There is scope for the improvement of the current condition of landscape features, visual amenity and habitat value in conjunction with the development of the site.	Low- Medium	Moderate
M/CH/4F Brick Kiln Farm	The open nature of the surrounding area, its proximity to heavily used roads and nearby residential properties results in large numbers of visual receptors and a high degree of visibility. However, due to the flat landform there is potential to reduce views into the site from the surrounding area. It is a site already modified by development, with existing disturbance from busy roads, and located within the context of former large scale gravel workings, which are now restored to a complex of artificial lakes. There is considerable scope for the improvement of the current condition of landscape features, visual amenity and habitat value in conjunction with the development of the site.	Low	High
M/CH/4E Withies Farm East	Given the flat landform, the location of the site within a network of fields largely away from publicly accessible routes and areas, there is potential to reduce the visibility of the site from receptors in the wider area. There are some features that will constrain the siting of extraction and associated infrastructure, such as the streams located at the perimeter, particularly in the southern part. There is reduced capacity in the southern area of the site, due to the scale of the field and the presence of the water channel and surrounding trees. There is scope for the improvement of the current condition of landscape features, visual amenity and habitat value in conjunction with the development of the site.	Low- Medium	Moderate- High
M/CH/6 Land at Redvins	Due to the location of the site, at the transition between the coastal plain and the Downs, and its proximity to Goodwood Park, a significant and popular visitor destination, the site considered to be of medium to high sensitivity overall. There are also features of higher sensitivity within the site, such as the mature trees and the areas of ancient woodland and the public right of way in the east. Development of this nature has the potential to	Medium- High	Low- Moderate

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
	affect the character of the surrounding area at the southern fringe of the South Downs National Park. The proximity to Goodwood Park is also a factor reducing the capacity of the site. However, as low lying and generally flat land, views into the area can be screened by perimeter vegetation (or mounding), and advanced planting would be beneficial prior to any extraction. There is some scope for locating development in the southwest, away from sensitive features such the copses and the conservation area at Halkner in the northeast.		

SOFT SAND

- 4.3 The 10 sites assessed fall within the Western Scarp Footslopes (WGI) character areas, and are dispersed across the belt of Wealden Greensand which extends between Petersfield, to the northwest of West Sussex, towards Steyning in the southeast.
- 4.4 With the exception of M/HO/4A Ham Farm, all the sites lie within the South Downs National Park and this is largely reflected in the high sensitivity and broadly low capacity of the landscape to accommodate soft sand workings.

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/CH/7B East of West Heath Common	Although low lying and generally flat, with views into the area restricted by existing vegetation, the site has a secluded quality and an intricacy of landscape pattern and elements. Given the proximity of the existing extraction site to the northwest, there is potential for cumulative effects on the special qualities of the wider character areas within the Park. There are also sensitive features such as a Moat to the south, and habitats in the immediate vicinity. Mineral workings in this location have the potential to adversely affect the fabric and settings of these features so mitigation would need to be planned and executed carefully. Access to the site is likely to require careful consideration, including potential impacts on views from the surrounding network of small lanes and tracks and localised effects of traffic movement and noise.	High	Low
M/CH/8A Minsted West	Whilst surrounding woodland and forestry limit intervisibility with the wider area to an extent, the site lies in close proximity to a local nature reserve to which it is linked by number of paths and bridleways, and which contributes to the recreational value of the wider area. The potential effects of development on the tranquillity of the area and intervisibility with the upper slopes of the chalk escarpment increase the sensitivity of the site. Although broadly enclosed, with views into the area restricted by existing vegetation, the site has a secluded and tranquil quality which reduces the capacity of the landscape to accommodate development of this nature without adverse impacts on the character of the surrounding area. With the proximity of the existing extraction site to the north, there is potential for cumulative effects on the special qualities of the wider Wealden Farmland and Heathland Mosaic character area within the South Downs National Park.	Medium- High	Low- Moderate
M/CH/8C Severals West	Although comprising large areas of plantation forest, restricting views into the area and enabling the visual containment of extraction activities within existing tree cover, the site has areas of ancient woodland which reduces the overall capacity of the landscape to accommodate development of this nature without adverse impacts on the habitat value and tranquil character of the area. Whilst the woodland and forestry limit intervisibility with the surrounding area to an extent, the site forms a link between Midhurst Common, to the east, and the Steadham Common to the west, traversed by dense network	Medium- High	Low- Moderate

Table 4.2: Summary of Soft Sand Assessments

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
	of paths and bridleways, including the Serpent Trail. The site therefore contributes significantly to the recreational value of the wider area. With the proximity of the existing extraction site to the northwest, there is potential for cumulative effects on the special qualities of the wider Wealden Farmland and Heathland Mosaic character area within the South Downs National Park.		
M/CH/8D Severals East	Whilst the woodland and forest limit intervisibility with the surrounding area to an extent, the site forms a link between Midhurst Common, to the east, and Steadham Common to the west, traversed by dense network of paths and bridleways, including The Serpent Trail. The site therefore contributes significantly to the recreational value of the wider area. The potential effects of development on the areas of ancient woodland, the tranquillity and sense of remoteness of the area and the recreational value of the area increase the sensitivity of the site. Although predominantly comprising plantation forest, restricting views into the area and enabling the visual containment of extraction activities within existing tree cover, areas of broadleaf trees reduce the overall capacity of the landscape. The southern part of the site narrows considerably, reducing scope to locate extraction away from sensitive landscape features in adjacent areas of woodland and heathland. With the proximity of the existing extraction site to the northwest, there is potential for cumulative effects on the special qualities of the wider Wealden Farmland and Heathland Mosaic character area, within the South Downs National Park.	Medium- High	Low- Moderate
M/CH/9A Hawkhurst Farm	The sloping nature of the site and its visibility across a broader area of the South Downs National Park and the presence of the water courses and mature vegetation reduces the capacity of the site to accommodate development without adverse impacts on the character, visual amenity, and habitat value of the surrounding area. Planting would not reduce visibility of the upper slopes to the north from the South Downs, whilst on the lower slopes the enclosure provided by existing woodland and hedgerows, means these areas have a slightly greater capacity to accommodate workings, with reduced visibility from surrounding areas. However the water courses and presence of mature trees and vegetation at the perimeter to the south and east, within this lower area, reduces overall capacity.	High	Low
M/CH/10A Duncton Common	The site predominantly comprises plantation forest, restricting views into the area and enabling the visual containment of extraction activities within existing tree cover. The site is however tranquil in character and occasional broadleaf trees and the water courses reduce the overall capacity of the landscape to accommodate development of this nature without adverse impacts on the habitat value. The development of the site has the potential to affect the amenity and recreational value of the adjacent areas, as it forms a link between areas to the east and west of high recreational value. There may however be scope to re-route the Serpent Trail and the	Medium	Low- Moderate

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
	bridleways that form this important link. With the proximity of the existing extraction site to the northeast, there is potential for cumulative effects on the special qualities of the wider Wealden Farmland and Heathland Mosaic character area, within the South Downs National Park, and the potential for this to become visually intrusive in views from Duncton Viewpoint and the chalk ridge to the south.		
M/CH/10C Coopers Moor	Although comprising predominantly woodland, restricting views into the area and enabling the visual containment of extraction activities within existing tree cover, the scale of the site, which narrows to the west, reduces the scope to mitigate against adverse impacts on the more sensitive features within the site, such as the mature broadleaf trees and the water courses. The site is also tranquil in character and overlooked by higher ground to the south, which means adequate screening of views from the ridge may not be achieved by retaining and enhancing trees and vegetation around the perimeter. These factors reduce the overall capacity of the landscape to accommodate development of this nature without adverse impacts on the habitat value and visual amenity. With the proximity of the existing extraction site to the northeast, there is potential for cumulative effects on the special qualities of the wider Wealden Farmland and Heathland Mosaic character area, within the South Downs National Park, and the potential for this type of development to visually intrude into views from Duncton Viewpoint and the chalk ridge to the south.	Medium- High	Low- Moderate
M/CH/I I Horncroft	The site comprises areas of woodland and enclosed arable farmland, restricting views into the area and enabling the visual containment of extraction activities within existing tree cover. The more sensitive features within the site include mature broadleaf trees within the woodland to the east and around the perimeter as well as the water courses through and adjacent through the site. Although parts of the site are clearly a 'working' landscape, being arable, it has a strong sense of tranquillity and of being removed from modern human influences. It is also overlooked by higher ground to the south, with some potential visibility from the wider area to the west and north, which means adequate screening of views, particularly of the upper slopes of the ridge, may not be achieved by retaining and enhancing trees and vegetation around the perimeter. The proximity of the site to the area of Open Access to the west has the potential to give rise to impacts on the recreational value of the wider area. These factors reduce the overall capacity of the landscape to accommodate development of this nature without adverse impacts on the habitat value and visual amenity, with the potential for this type of development to be visually intrusive in views from the chalk ridge of the downs to the south.	Medium- High	Low- Moderate
M/HO/2	The restricted views into the area will enable the visual	Medium	Moderate

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
Chantry Lane Extension	containment of extraction activities within existing tree cover. The entrance to the site would result in visual intrusion and create a cumulative effect with that of the sand site opposite (Sandgate Park). The small to medium scale of the arable farmland and the structure of trees around the perimeter, which link in with tree belts and woodland in the wider area, reduce the capacity of the site to accommodate development without eroding the pattern and structure of the farmland. However, the landscape of the immediate area is clearly 'worked', with a limited sense of tranquillity due to the proximity of the fringes of Storrington. Extending the existing workings may give rise to cumulative impacts, with the potential for increasing the intrusiveness of the existing pit, particularly in relation to views from the south and east towards Storrington. It is overlooked by higher ground to the south, with some potential visibility from the wider area to the east and south, and adequate screening of views, particularly from the upper slopes of the scarp and Downs, may not be achieved by retaining and enhancing trees and vegetation around the perimeter.		
	accommodating mineral extraction. There is potential for the landscape features and habitat value of the area to be enhanced and improved upon in conjunction with the development of the site.		
M/HO/4A Ham Farm	Given the relatively flat landform and a degree of containment provided by the existing structure of hedgerows and tree cover, there is the potential for providing appropriate screening of the site from the surrounding farmland and views from the A283 to the south. However, the visibility of the site across a broader area of the South Downs National Park and the presence of the water courses and mature vegetation reduces the capacity of the northern and eastern parts of the site to accommodate development. Also, additional planting would not reduce visibility of the upper slopes to the north from the South Downs.	Medium	Moderate

CHALK

4.5 The single site assessed, M/HO/5, falls within the **Downland Adur Valley** (SD5) character area, within the South Downs National Park, and this is largely reflected in the high sensitivity of the site.

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/HO/5 Shoreham Brickworks	The distinctive profile of the site and its visibility across a broader area of the South Downs National Park reduces the capacity of the site to accommodate development without further impacts on the character, visual amenity, and habitat value of the valley sides. These are already modified by the large scale, stark and widely visible white quarry faces of the Shoreham Cement Works. The potential for the extension of the working faces to the southwest means there is some capacity to accommodate workings, and potentially to improve upon the existing appearance of the quarry.	High	Low- Moderate

Table 4.3: Summary of Chalk Assessment

CLAY

4.6 The three sites assessed fall within the Low Weald Hills (LW4) character area, at the northern boundary of West Sussex. M/MS/I Land Adjacent to West Hoathly Brick Works is located within the High Weald AONB, and the two sites of M/HO/6, though not within a designated area, form part of an intricate, intimate wooded landscape of the Low Weald. This is largely reflected in the high sensitivity and broadly low capacity of the sites to accommodate the proposed claypit extensions.

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/HO/6A Rudgwick Extension West	The location of the site across the rounded ridge and the presence of mature trees around and within the site reduces the capacity of the site to accommodate development without eroding the character and pattern of the landscape of the surrounding area. Planting would not reduce visibility of the slope from the surrounding hills and ridges to the south, whist the removal of trees at the southern boundary in order to extend excavation is likely to increase the intrusiveness of the workings in views from the wider landscape to the south. Whilst the site does not fall within a designated landscape, the site is of recreational value, with the Sussex Border Path and Downs Link passing in close proximity. It is therefore judged that the overall capacity of the site for accommodating mineral extraction is decreased.	Medium	Low - Moderate

Table 4.4: Summary of Clay Assessments

M/HO/6B Rudgwick Extension East	The sloping nature of the site and the presence of mature vegetation reduces the capacity of the site to accommodate development without adverse impacts on the character and habitat value of the surrounding area. Planting would not reduce visibility of the upper slope from the surrounding hills and ridges to the north, whist small scale of the site means that mitigation through siting workings within the lower southern areas, which have a slightly greater capacity to accommodate workings, is likely to be difficult. The proximity of the properties and listed building to the south are also likely to limit the capacity of the site further. The site is of some recreational value although it does not fall within a designated landscape.	Medium	Low- Moderate
M/MS/I Land Adjacent to West Hoathly Brickworks	The subtle complexity of the landscape structure of the site and the adjacent areas of ancient woodland as well as its intervisibility with a wider area of the High Weald AONB reduces the capacity of the site to accommodate development without some erosion of the character and habitat value of the surrounding area. However the low-lying topography allows scope for the mitigation of visual intrusion by planting to reduce visibility from the hills to the northwest. A degree of enclosure is provided by existing woodland and hedgerows, and the lower area to the northwest of the area has a slightly greater capacity to accommodate workings, with reduced visibility from the road and the village to the south and southeast. There is also the potential for cumulative impact on the key characteristics and special qualities of the High Weald AONB landscape in relation to the extension of the existing workings further eastwards.	Medium- High	Low- Moderate

SANDSTONE

4.7 The single site assessed, M/MS/2 Philpotts Quarry, falls within the **High Weald (HWI)** character area, at the northern boundary of West Sussex and is located within the High Weald AONB.

Site	Summary of key landscape, visual and landscape value sensitivities and issues	Overall Sensitivity	Overall Capacity
M/MS/2 Philpotts Quarry	Due to the site being predominantly enclosed by woodland and existing vegetative screening, visibility across a broader area of the High Weald and the West Hoathley conservation area is greatly reduced. However, the scale and intricacy of the surrounding landscape, including the areas of broadleaf woodland, the distinctive landform and the proximity of the Historic Park and Garden reduces the capacity of the site to accommodate development without adverse impacts on the character and habitat value of the surrounding area. It is also closely related to the recreational value of the wider area, with the High Weald Landscape Trail following the southern boundary. There are potential cumulative effects related to the extension the development towards sensitive areas in the west and further disturbing the tranquillity and sense of remoteness, as well as the recreational value of the area.	Medium- High	Low- Moderate

Table 4.5: Summary of Sandstone Assessment

GUIDELINES FOR RESTORATION

- 4.8 Generic guidelines for restoration options relating to each site are summarised in **Table 4.6** below. Details of recommendations for each site are provided in the complete assessment sheets in **Appendix 2.**
- 4.9 For all sites, long term restoration should aim to maximise the habitat value and where appropriate to improve the historic and landscape character by restoring and enhancing hedgerows and woodland structure. Restoration should be carried out in accordance with a management plan which should be drawn up through the planning application process.

Site	Woodland	Agricultural land	Heathland	Riparian scrub and woodland
M/CH/IA Woodmancote				
M/CH/IB Common Road West				
M/CH/IC Common Road East				
M/CH/ID Slades Field	-			
M/CH/2A Densworth North	-			
M/CH/2B West Stoke Road East				
M/CH/2C West Stoke Road West				
M/CH/2D Huntersrace Lane North				
M/CH/3 Land adjacent to Valdoe Quarry				
M/CH/4A Copse Farm				
M/CH/4B Shopwyke North				
M/CH/4C Shopwyke South				
M/CH/4D Madam Green Farm West				
M/CH/4E Withies Farm West				
M/CH/4F Brick Kiln Farm				
M/CH/4I Withies Farm East				
M/CH/6 Land at Redvins	_			
M/CH/7B East of West Heath Common				

Table 4.6: Summary of Restoration Options

Site	Woodland	Agricultural land	Heathland	R iparian scrub and woodland
M/CH/8A Minsted West				
M/CH/8C Severals West				
M/CH/8D Severals East				
M/CH/9A Hawkhurst Farm				
M/CH/10A Duncton Common				
M/CH/10C Coopers Moor				
M/CH/II Horncroft				
M/HO/2 Chantry Lane Extension				
M/HO/4A Ham Farm				
M/HO/5 Shoreham Brickworks				
M/HO/6A Rudgwick Extension West				
M/HO/6B Rudgwick Extension East				
M/MS/I Land Adjacent to West Hoathly Brickworks				
M/MS/2 Philpotts Quarry				

5. Conclusions and Recommendations

- 5.1 The findings of the assessment of sensitivity and capacity of the individual sites are detailed in the site assessment sheets contained in **Appendix 2**. These are summarised in Chapter 4 of this report.
- 5.2 Cumulative issues are relevant to a number of the sharp sand and gravel and soft sand sites. The recommendations for phasing provided as part of the assessments are broadly based on the existing screening by landform, or filtering by vegetation, and the ability of sites to be effectively screened from view. It is assumed a sufficient amount of time will be allowed for advanced planting to mature. The sites located within the open and flat Upper Coastal Plain area (groups M/CH/1, M/CH/2 and M/CH/4), are most likely to give rise to cumulative impacts due to the high degree of intervisibility and the open character of the landscape in this area. Advice on the phasing of extraction has been provided in the assessment sheets within **Appendix 2** where potential cumulative issues have been identified. Large sites should where possible be divided into smaller areas, to developed in sequence with advanced planting and ongoing restoration of worked areas integrated into the phasing to minimise visual intrusion.
- 5.3 Guidelines for restoration are broadly based on the landscape guidelines and managements plans, where these highlight specific aims for particular areas. The recommendations made for the individual sites are closely linked to their location, the presence of heathland, agricultural land and woodland in the immediate surroundings and the potential relationship the site could have with areas of high habitat value. For all sites, the main aim of restoration should be to restore, enhance and improve the landscape pattern, visual amenity, and habitat value of the site. Where possible, improved access and recreational opportunities should be sought as part of the process of restoration.

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GLOSSARY OF TERMS

Area of Outstanding Natural Beauty - AONB

Natural England, the body responsible for designating Areas of Outstanding Natural Beauty (AONBs) define them as "areas of high scenic quality that have statutory protection in order to conserve and enhance the natural beauty of their landscapes"¹⁴. There are currently 33 AONB designations within England.

Historic Landscape Characterisation - HLC

An English Heritage programme developed over twenty years ago which provides an assessment of the historical types and component parts of the landscape, which contribute to its wider landscape character. The principles of HLC are now being extended to other characterisation programmes, for example in towns and regional HLC overviews, as well as to other countries in the UK.

Landscape Character

A distinct and recognisable pattern of elements that occurs consistently in a particular type of landscape. It reflects particular combinations of geology, landform, soils, vegetation, landuse and human settlement. It creates the particular sense of place of different areas of the landscape.

Landscape Character Assessment – LCA

An established technique used to understand and describe the character of a landscape in a consistent and comprehensive way. Within the current national Landscape Character Assessment Guidance 15, the purposes of LCAs are defined as a means to "help us to understand, and articulate, the character of the landscape. It helps us identify the features that give a locality its 'sense of place'".

It uses statistical analysis and application of structured landscape assessment methodologies. LCAs are carried out at different scales, providing more detailed descriptions and analysis at a local level within the national framework of **National Character Areas** (see below).

Landscape Condition

Based on judgements about the physical state of the landscape, and about its intactness, from visual, functional, and ecological perspectives. It also reflects the state of repair of individual features and elements which make up the character in any one place.

Landscape Effects

Change in the elements, characteristics, character, and qualities of the landscape as a result of development.

¹⁴ Natural England, Areas of Outstanding Natural Beauty [website]

http://www.naturalengland.org.uk/ourwork/conservation/designatedareas/aonb/default.aspx

¹⁵ Countryside Agency and Scottish Natural Heritage (2002) Landscape Character Assessment: Guidance for England and Scotland

Landscape Elements

A component part of the landscape, such as trees, woodland and ponds.

Landscape Features

Prominent eye-catching elements, e.g. wooded hill tops, and church spires, drumlin hills, scarp slopes, dramatic landscape topography.

Landscape Patterns

Spatial distributions of landscape elements combining to form patterns, which may be distinctive, recognisable and describable e.g. hedgerows and stream patterns.

Landscape Qualities

Term used to describe the aesthetic or perceptual and intangible characteristics of the landscape such as scenic quality, tranquillity, sense of wildness or remoteness. Cultural and artistic references may also be described here.

Landscape Resource

The combination of elements that contribute to landscape context, character, and value.

Landscape Value

The relative value or importance attached to a landscape or view (often as a basis for designation, or reflected by a given designation attributed to an area) which expresses national or local consensus, because of its quality, including perceptual aspects such as scenic beauty, cultural associations or other conservation issues. A given designation does not imply value across the whole of the designated area, or that there are not similarly high quality landscapes elsewhere – it reflects areas which have been recognised by people and where protection is enforced through policy

Mitigation

Measures including any process, activity, or design to avoid, reduce, remedy or compensate for adverse environmental impact or effects of a development. This can include inbuilt mitigation which is designed into and embedded in the proposal itself (for example to avoid sensitive areas, improve views etc), and additional mitigation measures such as earth mounding or planting.

National Character Areas

England has been divided into areas with similar landscape character, which are called National Character Areas (NCAs); previously known as Joint Character Areas (JCAs). Further information is available at http://www.naturalengland.org.uk/ourwork/landscape/englands/character/default.aspx

National Parks

Extensive designated areas of countryside which have statutory protection to conserve and enhance their natural beauty, wildlife and cultural heritage and to promote opportunities for the public understanding and enjoyment of their special qualities.

Scale Indicators

Landscape elements and features of a known or recognisable scale such as houses, trees and vehicles that may be compared to other objects where the scale of height is less familiar, to indicate their true scale.

Sense of Place (genius loci)

The essential character and spirit of an area: genius loci literally means 'sprit of the place'.

Time depth

The 'imprint' of the past on the present day landscape as a result of long term interaction between human activity and natural processes. Time depth enhances our appreciation of how landscapes have changed through time or survived through continuity.

Tranquillity

A perceptual description applied to landscape that is perceived to be relatively more natural, peaceful, and quiet when compared to other areas, which may be visually developed or noisy.

Visual amenity

Value of a particular place in terms of what is seen by visual receptors, taking account of all available views and the total visual experience. It is the assembly of components, which provide an attractive setting or backcloth for activities, to which value is attached in terms of what is seen.

Visual Sensitivity

The sensitivity of visual receptors such as residents or recreational users of an area, to visual change proposed by development.

ZTV – Zone of Theoretical Visibility

Area or zone of visual influence or theoretical visibility of the development within the study area for the visual assessment, generated by a computerised model of the development and a digital terrain model of the landscape.

APPENDIX 1 CONSULTATION SUMMARY

The South Downs National Park (SDNP) joint committee provided a list of key viewpoints and views from the SDNP in relation to each of the sites which were then visited during the field survey. These are summarised in the table below.

Site	Key viewpoints
M/CH/I, M/CH/2 and M/CH/4	Seven Points / The Trundle
M/HO/5 Shoreham Cement Works, M/CH/7B, M/CH/8, M/CH/9, M/CH/11	South Downs Way/from Harting Downs and Sections of the A24 in the east of the study area
M/CH/7B West Heath Common	Treyford Hill/Harting Down
M/CH/8A Minsted West	Bepton Down
M/CH/10A Duncton Common	Duncton Viewpoint
M/CH/11 Horncroft	Bury Hill

The SDNP provided information and guidance on the visibility of the sites from viewpoints in the National Park, proximity and potential impacts of sites on the Devil's Ditch SAM and other archaeological sites, conservation areas and historic parks and gardens.