



GLP LTD AND BARRATT HOMES

PROPOSED DEVELOPMENT ON LAND OFF COWM TOP, CASTLETON

MINERAL RESOURCE ASSESSMENT

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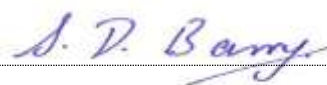
GLP LTD AND BARRATT HOMES

PROPOSED DEVELOPMENT ON LAND OFF COWM TOP, CASTLETON

MINERAL RESOURCE ASSESSMENT

PREPARED & APPROVED BY

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DRAWINGS

ST17862-001- REV B Superficial geology
ST17862-002- REV B Solid geology

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EXECUTIVE SUMMARY

This report has been prepared to support an outline planning application by GLP Ltd and Barratt Homes for proposed development on land off Cowm Top, Castleton, which is located to the north east of Manchester. The site has been reviewed in relation to the policies of The Greater Manchester Joint Minerals Plan.

The site comprises approximately 20 ha of agricultural land. The generalised small scale mineral safeguarding map for the area in the Minerals Local Plan indicates that the site is in a Mineral Safeguarding Area for sand and gravel. However, inspection of the more detailed geological map at 1:50,000 scale shows that the superficial deposit on the site is actually diamicton (previously called till or boulder clay), which is not a safeguarded mineral. The solid geology is Carboniferous Coal Measures comprising brick clay and coal. Both of these minerals are designated for safeguarding.

The quantity of coal and brick clay underneath the proposed development site is too small to be worked by opencast methods and the minerals have already been indirectly sterilised by previous residential development to the west of the proposed development site. For this reason, the Coal Measures underneath the proposed development site will never be worked and consequently it is not an economically viable mineral resource. The superficial deposit is diamicton which is not a safeguarded mineral.

Since the diamicton is not a safeguarded mineral resource and there is no realistic prospect that the coal and brick clay in the Coal Measures Formation will ever be worked, the safeguarded mineral resource is of no commercial value. The site therefore meets the requirements of criterion 2 of the mineral safeguarding policy, so the proposed development would be acceptable in a Mineral Safeguarding Area.

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1 INTRODUCTION

- 1.1 This report has been prepared in accordance with instructions from GLP Ltd and Barratt Homes prepare a Mineral Resource Assessment report in support of an outline planning application for proposed development on land off Cowm Top, Castleton. The site is located to the north east of Manchester. The site boundary is shown edged red on the attached drawing ST17862-001-REV B, which also shows the superficial geology of the site.

2 GEOLOGY

- 2.1 Geologically, a distinction is made between “superficial deposits” and “solid geology”. Superficial deposits such as sand and gravel are found at, or close to, the surface. The solid bedrock beneath the superficial deposits is called the “solid geology”.

Superficial geology

- 2.2 The British Geological Survey (BGS) geological map at 1: 50,000 scale, an extract of which is shown on drawing no. ST17862-001- REV B, shows that the entire site is covered by a superficial deposit of diamicton (previously called boulder clay). The diamicton is composed of an unsorted mixture of rock debris, sand, gravel, silt and clay and it is not considered by the minerals industry to be a commercial mineral resource.

Solid geology

- 2.3 An extract of the BGS online geological map at 1:50,000 scale is shown on drawing ST17862-002- REV B and it indicates that the solid geology on the site is the Pennine Lower Coal Measures Formation. This formation is safeguarded as it contains brick clay and shallow coal.

3 MINERAL SAFEGUARDING POLICY

- 3.1 The relevant mineral planning policies are contained in The Greater Manchester Joint Minerals Plan, which was developed by ten Greater Manchester Councils including

Rochdale Metropolitan Borough Council. It was adopted on 26th April 2013 and is due for review by 31st December 2027.

3.2 Policy “M8 - Prior Extraction of Mineral Resources Within Mineral Safeguarding Areas”, which is attached in full at Appendix 1, states that proposals for non-mineral development within the Mineral Safeguarding Areas that do not allow for prior extraction of minerals will only be permitted where:

1. The need for the development outweighs the need to extract the mineral;
or
2. It can be clearly demonstrated that it is not environmentally acceptable or economically viable to extract the mineral prior to non-mineral development taking place; or
3. It can be clearly demonstrated that the mineral is either not present or of no economic value or too deep to extract in relation to the proposed development; or
4. The development is limited or temporary and would not prevent mineral extraction taking place in the future.

Compliance with the adopted safeguarding policy

Criterion 2

- 3.3 The proposed development site is in a mineral safeguarding area for brick clay, coal and sand and gravel. The coal and brick clay cannot easily be extracted and mineral recovery would need to be done by means of either a large opencast mine or a colliery. Both options would be highly intrusive and are not environmentally acceptable in an urban setting. The deposit of coal and brick clay is too small to be worked via opencast methods and would never be permitted in an urban setting due to the proximity of houses to the west of the of the proposed development site. Consequently, extraction of the coal and brick clay is not environmentally acceptable nor economically viable.
- 3.4 A sand and gravel deposit is mapped as being present on the small scale Greater Manchester Joint Minerals Plan safeguarding map but the more detailed BGS geological plan at 1:50,000 scale shows that the superficial material on the site is in fact diamicton. Several trial pits and boreholes were constructed during construction of the industrial buildings to the north of the site and their logs are available on the BGS website. Borehole SD81SE-423 is located approximately 30m north of the site

boundary and its log is attached at Appendix 2. It shows that the diamicton is a clayey silty sand. Clay and silt are contaminants in sand and gravel, and the technical description in the log indicates that the proportion of fines (clay and silt) is too high for the material to be used as an aggregate, so it would not be regarded as a mineral resource. Consequently, the diamicton is not an economically viable mineral resource.

4 CONCLUSIONS

- 4.1 The proposed development site is located within a mineral safeguarding area for sand and gravel, coal and brick clay. The quantity of coal and brick clay in the Coal Measures Formation underneath the proposed site is too small to be extracted by opencast methods and the site is surrounded by constraints such as residential properties and roads. Consequently, there is no realistic prospect that the coal and brick clay would ever be worked so it is not an economically viable mineral resource.
- 4.2 The site is in a Mineral Safeguarding Area for sand and gravel. However, the safeguarding plan is produced at a very small scale, so it is unavoidably generalised. Inspection of the more detailed BGS geological plan at scale 1:50,000 shows that the superficial deposit on the site is actually diamicton, not sand and gravel. Diamicton is not a mineral resource and is not safeguarded.
- 4.3 Since the diamicton is not a safeguarded mineral resource and there is no realistic prospect that the coal and brick clay in the Coal Measures Formation will ever be worked, the safeguarded mineral resource on the site is of no commercial value and in any event its extraction would be environmentally unacceptable. The site therefore meets the requirements of criterion 2 of the mineral safeguarding policy, so the proposed development would be acceptable in a Mineral Safeguarding Area.

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Appendix 1

Policy M8 - Prior extraction of Minerals within Mineral Safeguarding Areas

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Policy 8

Prior Extraction of Mineral Resources

Within Mineral Safeguarding Areas

All non-mineral development proposals within the Mineral Safeguarding Area (see maps 4, 5, 6 & 7) should extract any viable mineral resources present in advance of construction. Proposals for prior extraction of minerals will be permitted provided the proposal is in accordance with Policy 2 Key Planning and Environmental Criteria.

Proposals for non-mineral development within the Mineral Safeguarding Areas that do not allow for the prior extraction of minerals will only be permitted where:

1. The need for the development outweighs the need to extract the mineral; or
2. It can be clearly demonstrated that it is not environmentally acceptable or economically viable to extract the mineral prior to non-mineral development taking place; or;
3. It can be clearly demonstrated that the mineral is either not present or of no economic value or too deep to extract in relation to the proposed development; or;
4. The development is limited ⁽¹⁰⁾ or temporary and would not prevent minerals extraction taking place in the future.

Exemptions

This policy does not apply to the following:

- i. Applications for Householder development
- ii. Applications for extension to commercial developments similar in scale to householder developments
- iii. Applications for Conservation Area Consent
- iv. Applications for Listed Buildings Consent
- v. Applications for Advertisement Consent
- vi. Applications for Tree Works
- vii. Prior notifications (telecommunications; forestry' agriculture; demolition); or
- viii. Certificates of Lawfulness of Existing or Proposed Use or Development (CLEUDs and CLOPUDs)

Outside Mineral Safeguarding Areas

10 limited being proposals which retain existing infrastructure, such as foundations, buildings and utilities

All non-mineral development proposals outside the Mineral Safeguarding Areas where the potential for prior extraction to take place has been identified⁽¹¹⁾ should seek to extract any viable mineral resources present in advance of construction. Proposals for prior extraction of minerals will be permitted provided the proposal is in accordance with Policy 2 'Key Planning and Environmental Criteria'.

Proposals for non-mineral development outside the Mineral Safeguarding Areas as referred to in footnote¹¹ that do not allow for the prior extraction of minerals will only be permitted where they accord with points 1 to 4 above.

Justification

- 4.10** The policy aims to take a balanced approach to protecting minerals resources in Greater Manchester against the need to attract investment and urban regeneration to a primarily built up area.
- 4.11** The exclusion of the urban area does not mean that prior extraction of minerals is wholly unsuitable in this location, but recognises the fact that there have been few instances of developers seeking to extract minerals in the past. Identifying locations within the urban area where such development could occur was also considered but due to lack of qualitative and quantitative evidence of mineral resources without borehole data, this was considered to be an unviable option.
- 4.12** Applications which come forward within the urban area which may be suitable for prior extraction of minerals will be considered by the relevant authority on a case by case basis.
- 4.13** Proposals for non-minerals development within an MSA are only required to meet one of the 4 criteria identified in Mineral Safeguarding Areas.

Prior Extraction Requirements

- 4.14** Where prior extraction is proposed, applicants will be required to provide details of the tonnages of minerals extracted, once the scheme has been completed. Account will be taken of whether a partial working of the deposit would be appropriate, together with the potential use of the mineral within the proposed development. The Local Planning Authority will also require restoration of the site to allow proposed development to proceed and that the restoration time scales do not delay primary development.
- 4.15** A prior extraction scheme for mineral extraction must contain a level of detail commensurate with those submitted for a minerals extraction scheme. This should include details on:

11 Either through Site Allocation DPDs, other Local Plan Documents or by the developer

Appendix 2

Borehole Log SD81SE-423

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SD81SE 423 8922 1065

STRATA SURVEYS LIMITED		CABLE PERCUSSION RECORD SHEET				Borehole No. BH3			
Job No. 8908		Location Junction 20 Project, Rochdale				Sheet 1 of 2			
		Client: Modus Properties Ltd				Project Ref.:			
		Equipment and methods: Light Cable Percussion				Drilled by: G.W.			
		Coasting Diameter (mm) 150				Ground level 183.00 m AOD			
		Casing Depth (m) 11.50				Coordinates: N Date 23-10-96			
Casing Depth (m)	Water Depth (m)	Field Records	SAMPLES / TESTS			Description	Depth Thickness (m)	Reduced Level (m AOD)	Strata Legend
			Depth (m) from	to	SAMPLE Type & No				
0.50	NIL		0.50	0.95	S 1	13	0.40	182.600	
			1.00	1.60	D 1		(1.60)		
1.50	NIL		1.50	1.95	S 2	10	2.00	181.600	
			2.00	2.00	D 2				
2.50	NIL		2.50	2.95	S 3	10	2.30	179.700	
			3.00	3.95	U 1	63	(3.00)		
3.50	NIL		4.00	4.00	D 3				
4.50	NIL		4.50	4.95	S 4	5.0	5.30	177.700	
			5.00	5.00	D 4				
5.50	NIL		5.50	5.95	S 5	15	(5.70)		
			6.00	6.43	D 5	18			
7.00	NIL		7.00	7.43	S 6	27			
			8.00	8.95	D 6	18			
8.50	NIL	-(23-10)-	8.50	8.95	S 7	27			
			9.00	9.43	D 7	18			
10.00	NIL		10.00	10.43	S 8	18			
			10.50	10.95	D 8				

Remarks

2) No groundwater encountered during drilling

Scale 1:50

Logged by: G.L. Date: 26/11

Checked by:

Approved by:

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Drawings

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