

4.0 Site Description

4.1 The village of Crossways has a population of just over 2,000³, is located in the District of West Dorset and lies 6km east of the county town of Dorchester. The train line between Weymouth and London Waterloo lies immediately north of the village and the nearest station is Moreton Station which lies close to the B3390, 1km northeast of Crossways.

4.2 There are a number of aggregate quarries in the vicinity of Crossways, both previously and currently operated:

- Moreton Pit 250m east of the village. This site has temporary permission for extraction of sand and gravel, expiring on 31/12/2018 (Reference 300317) and various consents for recycling and waste management. It is operated by G Crook & Sons.
- Elliot's Pit (also known as Old Heath Farm) 350m south east of the village. Quarrying has ceased at this location and the site is restored and has recently been developed as a solar farm with an installed capacity of 5MW
- Warmwell Airfield Quarry 250m west of the village. Quarrying has ceased at this location and the site has been restored.
- Warmwell Quarry is a 203ha site 750m west of the village operated by Aggregate Industries. The most recent permission for this site (Reference 1/D/2008/2365) is a temporary permission (until 31/12 2016) relating to extraction of sand and gravel from areas which had been previously worked.
- Woodsford Quarry This 150ha site stretches approximately 2.5km east to west 650m north of Crossways and is operated by Hills Quarry Products Ltd. Planning Permission was granted in December 2007 (Reference 1/E/2005/0742) for extraction of sand and gravel for a 20 year period. Prior landscaping works including bund

³ 2010 Mid Year Population Estimate of 2,115 <http://www.dorsetforyou.com/405261>



construction and advance screening planting was undertaken by the operator prior to implementing planning permission in order to minimise potential visual impact to nearby properties, including those in the north of Crossways.



5.0 Planning Appraisal

Statutory and Local Designations

- 5.1 There are no national or local landscape, nature conservation or cultural heritage designations within or adjacent to the General's land.

Nearby Sensitive Receptors

- 5.2 As described in Section 1, the General's land is located south of Warmwell road and extends east to west for much of the length of the village. The nearest sensitive receptors are Summer Farm and Crossways Village Hall both located within the study area, a number of residential properties south of Warmwell Road located immediately north of the northern boundary, business premises within the Hybris Business Park and the caravan site immediately to the west (Warmwell Country Touring Park).
- 5.3 The Village Hall is located on Moigne Combe Road and hosts a number of village clubs and is also the home of Crossways Playgroup. This pre-school can take up to 24 children each school day during the school term. The Village Hall is located in open countryside in the western part of the study area. There is no visual screening surrounding the site (Photographs 1 & 2, Appendix 1), such that it would be exposed to noise, dust and visual impacts if the surrounding area was developed for aggregate quarrying. There is a band of mature trees along the opposite side of the adjacent road (Photograph 3, Appendix 1), though this would be unlikely to provide adequate screening.
- 5.4 There is also a band of mature trees between the Warmwell Country Touring Park and the western site boundary, some of the caravan pitches being less than 20m from the site boundary. The impact to amenity resulting from the development of an aggregate quarry adjacent to this caravan site would be likely to have a negative impact on their business.
- 5.5 The Hybris Business Park however would be likely to be reasonably sheltered from aggregate quarrying within the study area. It is



surrounded by a high embankment which is planted with mature trees and other vegetation. There are no views out to the General's land from the Business Park (Photographs 5 and 6) and amenity impacts would also be reduced by this embankment.

Quarry Stand-Off/Buffer zones

5.6 In the mineral industry many planning authorities impose a blanket minimum 100m stand-off between mineral development and some sensitive receptors such as individual or small groups of houses. Some authorities seek to apply larger buffers and some authorities have no written policy but rely upon environmental impact assessment to identify the most suitable stand-off. Were a typical 100m buffer to be applied between sensitive receptors and any potential extraction area, the area available for extraction would considerably decrease (Figure 3). In particular in the **western** part of the General's land, the area available for quarrying would be so small as to be unviable for quarrying, and the areas available for quarrying in the **southern** and **eastern** parts of the General's land would be 3.5ha and 10.5ha respectively..

Figure 3: Area potentially available for quarrying after applying 100m buffer to sensitive receptors



- 5.7 However, Appendix 1 "Proposed Minerals Site Assessment Criteria" of the Pre- Submission Draft of the Minerals Core Strategy sets out a number of proposed minerals site assessment criteria of which C18 asks "Does the proposal have any impact on sensitive human receptors". This criterion states that "**Significant Adverse Impact**" would occur when the site proposal is adjacent to a sensitive receptor, whereas "**Less Significant Impact**" would occur when the site proposal is within 250m of a sensitive receptor.
- 5.8 This emerging policy document indicates that Dorset County Council considers that a stand-off distance of 250m between mineral extraction and sensitive receptors is appropriate to avoid 'Significant Adverse Impact'. If a 250m buffer were to be applied to the village as a whole⁴ and to particularly sensitive individual receptors (such as the pre-school), the area of the General's land available for mineral extraction would reduce to approximately 2.2ha in the southern part and 8ha in the eastern part (Figure 4).

Figure 4: Area potentially available for quarrying after applying 250m buffer to Crossways Village and particularly sensitive receptors



⁴ 250m buffer applied to Crossways, particularly sensitive receptors, although a 100m buffer applied to isolated residential properties



5.9 It may be that these areas are appropriate for extraction prior to development for housing as indicated by the strategic housing allocation identified in Policy CRS1 of the draft Local Plan, whether as a operational quarry, or as a borrow pit for the housing development. Whether this is an appropriate course of action would depend on the economic viability of extraction at this site, which would itself depend on the quality and depth of the sand and gravel resource in this location. As a very rough guide after allowing for margins and extraction losses and making assumptions⁵ about the depth of mineral, between 200,000 and 300,000 tonnes of sand and gravel could be available from the eastern area. This represents a marginal volume which may be difficult to justify when compared to planning & EIA costs; the construction of a new access and also haulage costs to a processing plant and as such the site may not be viable for mineral extraction. Reliable information on the quantity and quality of the available mineral resource present should be obtained by undertaking ground investigations of this area.

Site Access

5.10 Access onto the site could potentially be gained from Moigne Combe Road, where there is an existing access point. However Crossways Village Hall is located immediately adjacent to this road. With the exception of a boundary fence there is no screening between Crossways pre-school's play area and the road. Use of the road by quarry vehicles would be likely to have an effect on the amenity of people using the village hall, in particular pre-school children. Consideration should also be given to the possible road safety implications of siting a quarry access so close to the village hall and pre-school. There is no fence or gateway separating the village hall car park from Moigne Combe road. A change to the type and concentration of vehicles using this road could potentially increase conflict between different road users, such that siting a quarry access on this road would be inappropriate.

⁵ Based on 8 hectares developable area; 20% extraction losses; that the resource is between 2m and 3m deep and 1.6 tonnes sand/gravel per m³



- 5.11 Alternatively access to the site could be obtained from Moreton Road. There is no existing access point, but if suitable visibility splays were provided, then creation of a road access here might be achieved (with the agreement of the County Highways and Minerals Planning Authorities).
- 5.12 If limits were placed on the number of type of vehicles using Moreton Road, then it is possible that the site could be accessed via Redbridge Road, using an existing track (on third party land) across the intervening land and purpose built junction on to Redbridge Road. Quarry vehicles would then cross Moreton Road to access the site. This access and track were previously used for Elliot's Pit, although the land is now developed as a solar farm so its use by quarry vehicles has historic precedence.
- 5.13 The southern part of the General's land could be accessed from the east (i.e. from the Moreton Road). A haul road could be constructed potentially allowing prior extraction of minerals before development for housing and community infrastructure. Whilst the internal haul road could pass within 50m of the south east corner of the Hybris Business Park, the surrounding embankment and vegetation would help shield businesses from any potential amenity impacts. The potential viability of this option would however depend on the depth and quality of the aggregate resource. Although as previously described, the size of this southern area, and the shape of the area, outside of the buffer zone would lead one to conclude that mineral working here would be marginal, particularly if a 250m buffer zone is applied to the village hall.



6.0 Conclusion

6.1 This assessment of the suitability for mineral extraction of the land proposed to be allocated within the ownership of Major General Bond has demonstrated that it is possible that the eastern and southern parts of the General's land may be appropriate for extraction. This conclusion is tempered by two caveats:

- Firstly, establishing a new quarry from a "green field" site which is not an extension of an existing quarry and has significant sensitive receptors in the area is likely to be not commercially viable;
- Secondly, should the Mineral Planning Authority raise safeguarding issues consideration should be given either to offer the removal of the mineral, or part of the mineral deposit, prior to carrying out any building development and to phase the built development working from west to east to facilitate that, or to propose that the area is used solely as a borrow pit to facilitate the building development.

6.2 It is recommended that ground investigations of these areas be undertaken in order to clarify the depth and quality of the sand and gravel resource and hence to identify the potential economic viability of mineral extraction from this area prior to development in line with Policy CRS1 of the Draft Pre-submission Local Plan.

6.3 It is further recommended, with regard to land lying to the north of Crossways, that the planning authority is advised that whilst it may be suitable for development there would be strong reasons to delay the timing of any development until Woodsford Gravel Pit has been completed. In similar situations, operational quarries have successfully objected to proposed residential development in close proximity to their boundaries which would increase potential for complaints on amenity grounds.

