

Application Number: **17/1022/CNT**  
Date Registered: 13/04/2017  
Parish: Leigh on Mendip  
District: Mendip  
Member Division: Mendip Central and East  
Local Member: Cllr Philip Ham  
Case Officer: Maureen Darry / Clive Conroy  
Contact Details: [cjconroy@somerset.gov.uk](mailto:cjconroy@somerset.gov.uk)  
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Description of Application: **Proposed deepening of the quarry extraction area, replacing the asphalt plant and extending the end date at Halecombe Quarry**  
Grid Reference: 370015 - 147431  
Applicant: Tarmac Trading Limited  
Location: QuarryPlan (GB) Ltd

## **1 Summary of Key Issues and Recommendation**

1.1 The proposed development relates to the deepening of the quarry extraction area, replacing the asphalt plant and associated facilities, retention of the concrete batching plant and reopening of road access to Rookery Farm extending the end date at Halecombe Quarry (a full description is provided at Section 4.1). The main issues for consideration relate to:

- The Need for/Principle of Development;
- Hydrology/Hydrogeology;
- Ecology/Biodiversity and
- Impact on Amenity.

**It is recommended that planning permission be GRANTED subject to the Applicant entering into a Section 106 agreement based on the Heads of Terms included at Appendix 1; and imposition of conditions set out in Section 12 and that authority to undertake any minor, non-material editing, which may be necessary to the wording of those conditions, be delegated to the Strategic Commissioning Manager, Economy and Planning Policy**

## **2 Site Description**

- 2.1 Halecombe Quarry lies approximately 0.5 kilometres to the east of the village of Leigh-on-Mendip and 3 kilometres to the south-west of Mells, in the Mendip District Council administrative area.
- 2.2 The Site is divided into two main areas by the Halecombe Brook, which passes through a culvert and flows from west to east, passing to the south of the main quarry entrance. The area to the north west of the Brook comprises the existing asphalt plant and main extraction area, whilst the area to the southeast is referred to as Rookery Farm.
- 2.3 A 20m high screening bund has been constructed along the western and southwestern boundaries of the quarry. This is an established landscaped feature spanning the valley associated with the Halecombe Brook, with the watercourse being directed through the culvert beneath the bund.

### **3 Site History**

- 3.1 The earliest planning permission relating to Halecombe dates from 1948 and since then there have been a number of consents for extensions or alterations at the site. At the present time the development of the quarry and associated site activities are controlled by planning permission (reference 101393/014), which was granted in September 2002, subject to 45 planning conditions.
- 3.2 More recent planning permissions were granted in March 2014 (2013/1481) for deepening of limestone extraction within the Rookery Farm part of Halecombe Quarry (eastern part) and for minor alterations to the operation of the site (ref: 101393/014/NMA). The Rookery Farm permission allowed for the construction of a balancing lake (the "Rookery Lake"), for utilisation as a water storage area. Stored water will be used for potential onward supply for increasing levels (augmentation) of various local water features identified as part of the monitoring scheme operated at the site.
- 3.3 At the time the planning application was submitted, works within the Rookery Farm area had so far progressed to a depth of some 147 metres Above Ordnance Datum (AOD). The final landform will comprise a two bench extraction, providing storage for some 245,000 m<sup>3</sup> of water.
- 3.4 The Quarry is currently permitted to work to a depth of 68mAOD with a requirement for extraction to be completed by 31 December 2021 and for restoration to be completed by 31 December 2023.

### **4 The Proposals**

- 4.1 This is an application for full planning permission by Tarmac (the Applicant) to deepen the quarry to its maximum extent by extracting limestone beneath the asphalt plant and developing a further four quarry benches (60m) down to 10mAOD. This final proposed level is comparable to other quarries in the area such as Whatley Quarry and Torr Works where the base of extraction is permitted to 0mAOD and 3mAOD respectively. The full description of the planning application is set out below:

*“The deepening of Halecombe Quarry by the extraction of limestone, the replacement of the existing asphalt plant with a new asphalt plant and associated facilities, retention of the concrete batching plant and the reopening of the access road to Rookery Farm together with the relinquishment of the existing planning permissions and an extension of the end date for the whole quarry and all quarrying activities to 31 December 2044 with restoration to be completed by 31 December 2046”*

- 4.2 At the present time the consented reserves of limestone at Halecombe Quarry amount to 6.5 million tonnes (mt). However, the majority of these reserves cannot be worked as they lie beneath the asphalt plant and it is necessary to remove the plant in order to exploit them. The readily accessible reserves are only sufficient for less than one year of production (approx. 600,000 tonnes).
- 4.3 The proposed depth increase would provide an additional 10 million tonnes (mt) of limestone. The total amount of reserves at Halecombe would therefore be increased to around 16.5 mt, sufficient for 24 years of production at the current rate of 700,000 tonnes per year. The current, permitted extraction rate is no greater than 1 mt per annum or an annual average 900,000 tonnes. No further deepening of the quarry would be possible as there is insufficient space to widen the excavation.
- 4.4 There would be no lateral increase in the extent of the quarry, only a deepening of the quarry floor. There are no proposals to alter the rate of limestone extraction, any of the quarry operations or the working hours at the site.
- 4.5 Similarly, there would be no alteration to the approved concept restoration scheme apart from a larger landscaped lake with a greater depth of water. All other aspects of the restoration scheme would remain unchanged.
- 4.6 The Applicant is applying for the current end date for limestone extraction (31 December 2021) to be extended to 31 December 2044 to allow for the additional reserves to be worked. Final restoration is proposed to be completed by 31 December 2046.
- 4.7 It is also proposed to reopen the historic access road between Rookery Farmhouse and Limekiln Lane following the renovation of the property. Rookery Farmhouse is to be used as the quarry offices and a small conference facility. The access would be used by light vehicles only and would avoid vehicles having to travel through the operational quarry area.
- 4.8 The new asphalt plant would be located to the south of the Halecombe Brook, which would be culverted to allow the new plant and associated development work to be carried out. The new asphalt plant would be a modern, high efficiency plant with a greatly increased capability to use recycled material, although the overall output would be the same as the existing plant.
- 4.9 The existing asphalt plant is only able to incorporate approximately 20% recycled asphalt planings (RAP) into new asphalt products. This level of recycling is primarily limited by the fact that recycled material is fed into the asphalt mix in an unheated form. The new asphalt plant has been designed to

include an enhanced materials dryer to heat recycled material before being added to the product mix. This would enable more than 40% recycled material to be included in some products, twice the current level.

## **Phasing**

4.10 The proposed phasing as set out in Volume 2 of the Environmental Statement (ES) has been amended slightly to take into account the time lapse since the application was submitted in early 2017.

### Phase 1

Current – year 1

Maximum extraction to 85mAOD

Phase 1 comprises the ongoing extraction of mineral as permitted within the current planning permission.

- Mineral to be extracted in a westerly direction to 85mAOD.
- Trimming of tips to south of Rookery Farm extraction void and removal of fill from plant area, material added to the Eastern Tip and partially restored.
- Preparation of Rookery Farm access track.
- Development of Rookery Farm extraction area including completion for restoration batters along north margin.

### Phase 2

Years 1 – 16

Maximum extraction to 70mAOD

Phase 2 includes new development such as the asphalt plant installation and culverting the Halecombe Brook although extraction would not progress any lower than the currently permitted level. Due to the variety of elements within this phase. Phase 2 has been split into three sub-phases (Phases 2A, 2B and 2C).

### Phase 3

Years 16 – 18

Maximum extraction to 55mAOD

- Mineral extraction to continue vertically with the quarry deepened to a level of 55mAOD.
- Sump maintained in base of void for water management purposes.
- Processing and stockpiling of mineral to take place within the quarry void, with surplus materials being transported, processed and stockpiled between the new asphalt plant and the sewage works.

#### Phase 4

Years 18 – 20

Maximum extraction to 40mAOD

- Mineral extraction to continue vertically with the quarry deepened to a level of 40mAOD.
- Sump maintained in base of void for water management purposes.
- Processing and stockpiling of mineral to take place within the quarry void, with surplus materials being transported, processed and stockpiled between the new asphalt plant and the sewage works.

#### Phase 5

Years 20 – 22

Maximum extraction to 25mAOD

- Mineral extraction to continue vertically with the quarry deepened to a level of 25mAOD.
- Sump maintained in base of void for water management purposes.
- Processing and stockpiling of mineral to take place within the quarry void, with surplus materials being transported, processed and stockpiled between the new asphalt plant and the sewage works.

#### Phase 6

Years 22 – 24

Maximum extraction to 10mAOD

- Mineral extraction to continue vertically seeing the quarry deepened to a level of 10mAOD.
- Sump maintained in base of void for water management purposes.
- Processing and stockpiling of mineral to progressively move out of the quarry void being transported, processed and stockpiled between the new asphalt plant and the sewage works.

### **Legal Agreements**

4.11 There are three separate legal agreements (planning obligations under Section 106 of the Town and Country Planning Act 1990, as amended) currently in force which relate to Halecombe Quarry. The legal agreements were produced to accompany planning consents granted in 1992, 2000 and 2002.

4.12 The agreements dealt with a variety of matters which were not appropriate to be covered by planning conditions. These included off-site road improvements, revocation of previous planning permissions, investigation of Rookery Farm prior to demolition etc. A number of these matters have been completed or

superseded and it is appropriate to consolidate all the relevant matters in a single new agreement, which would cover the entire Halecombe Quarry site. The existing legal agreements would then be revoked along with the relevant planning permissions. This is proposed by the Applicant and there are no compensation implications.

- 4.13 The new legal agreement would also include details of the proposed Local Community Fund and a HGV routing protocol to address issues raised during the public engagement process.

### **Community Fund**

- 4.14 The Applicant proposes to establish a Community Fund to provide facilities and services for the benefit of communities within the local parishes of Leigh on Mendip, Coleford, Mells and Whatley. Contributions to the Community Fund would be related to the level of activity at the quarry and the distribution of monies would be carried out on a democratic basis.

- 4.15 Tarmac would contribute 2 pence per tonne for all material the company sold from the Halecombe Quarry site. This funding would be provided for the life of the quarry, equivalent to approximately £14,000 per year at an output of 700,000 tonnes per year and over £360,000 throughout the lifetime of the quarry. The contributions would need to be incorporated into a new legal agreement.

- 4.16 It is proposed that a Management Committee would be established to determine how the funds are to be spent. The Committee would comprise representatives from each parish council, Tarmac and Somerset County Council. Local precedent for such funds has been set at sites such as Stancombe Quarry (North Somerset). The detailed and legal mechanism for establishing such a fund is set out in Section 10.7 of the Report.

## **5 THE APPLICATION**

- 5.1 Plans and documents submitted with the planning application are:

### Plans

Site Location Plan: M15.126.D.001 (17.02.2016)

Context Plan: H076/00145 (Feb 2017)

Current Situation (survey undertaken 05/09/2016): H076/00134 (March 2017)

Asphalt Plant Layout Plan: HAL/555 (07/03/17)

Plant Elevations: HAL/549 (08/03/17)

Block Phasing: H076/00135 (March 2017)  
Phase 1: H076/00136 (March 2017)  
Phase 2A: H076/00137A (October 2018)  
Phase 2B: H076/00138 (March 2017)  
Phase 2C: H076/0139 (March 2017)  
Phase 3: H076/00140 (March 2017)  
Phase 4: H076/00141 (March 2017)  
Phase 5: H076/00142 (March 2017)  
Phase 6: H076/00143 (March 2017)  
Concept Restoration: H076/00144 (March 2017)  
Maximum Extraction: H076/00147 (March 2017)  
Plans & Elevations of two storey welfare facilities and control room: HAL/554  
(07/03/17)  
Plan & Elevation of Drivers Welfare Facilities: HAL/553 (21/09/16)  
Plan & Elevations of IBC Storage Building: HAL/552 (21.09.16)  
Plan & Elevations of Covered Aggregate Storage Bays: HAL/551 (21/09/16)  
Bat Corridor: M15.126.D.028 (March 2017)  
Figure 1: Access Details Lime Kiln Lane (June 2016).

## Documents

Volume 1 Non-Technical Summary March 2017  
Volume 2 Environmental Statement (including Appendices 1-3) March 2017  
Volume 3 Technical Reports Part A March 2017  
Volume 3 Technical Reports Part B March 2017  
Volume 4 Planning Application Statement (including Appendices 1-3) March 2017  
Hydrogeological Cumulative Impact Note dated 22 June 2018  
Letter from QuarryPlan dated 11 September 2018  
Phased Development Note (revised October 2018)

## **6 Environmental Impact Assessment (EIA)**

6.1 The Town and Country (Environmental Impact Assessment) (England and Wales) Regulations 2017 refers to various types of development in Schedules 1 and 2. Development proposals falling within Schedule 1 are regarded as “EIA development” and trigger EIA procedures.

6.2 The planning submission is accompanied by an Environmental Impact Assessment (EIA) because the planning application area is over 25 hectares in extent and it is mandatory that an EIA is carried out for quarry proposals of such size, as required by Schedule 1 part 19.

6.3 The County Council set out the extent of the environmental aspects to be assessed within the EIA in a Scoping Opinion issued in July 2015 including landscape and visual impact, ecology, geology, the water regime, cultural heritage, noise, air quality, blasting, social and economic aspects, highways and public rights of way.

## **7 The Environmental Statement**

7.1 The Environmental Statement (ES) accompanies the planning application and is the collation of the results of the EIA following the evaluation of the significance of the predicted environmental effects arising from the proposed development.

7.2 The ES aims to provide an objective report on the potential environmental effects and is considered in several stages:

- A description of the baseline environmental conditions against which changes can be assessed.
- A description of the details of the proposed development.
- The identification of the potential environmental effects.
- The design of measures able to mitigate the environmental effects.
- An analysis of the effectiveness of the mitigation measures.
- The assessment of any residual effects.

7.3 The result of these stages is a detailed evaluation of the impacts of the development which should be sufficient to guide the decision maker in making the appropriate decision.

7.4 A number of specific environmental aspects have been identified for in depth study in the Somerset County Council Scoping Opinion including landscape and visual impact, ecology, geology, the water regime, cultural heritage, noise, air quality, blasting, social and economic aspects, highways and public rights of way. In addition the Scoping Opinion requested that the development should be assessed in terms of planning policy framework, cumulative impacts with other quarry operations and development projects and also to consider alternatives to the proposals.

7.5 During determination of this application it has become apparent that the impact on hydrology and hydrogeology is the most critical of all the impacts assessed. This is not meant to diminish importance of other impacts, which are addressed in Section 10. However, given the complex nature of the hydrology and hydrogeological context and in order to assist Members, the baseline conditions and descriptive element of the Hydrogeological and Hydrological Impact

Assessment (HHIA) are set out below. Comments of the Strategic Commissioning Manager are set out in Section 10, along with assessment of other key impacts.

- 7.6 A HHIA was prepared by BCL Consultant Hydrogeologists Limited (BCL), on behalf of the Applicant. The full HHIA is contained within the ES.
- 7.7 The HHIA was informed by the formal Scoping Opinion and through subsequent discussion with the Environment Agency (EA). These consultations highlighted the need for consideration of the risks posed to groundwater and surface water resources in the locality (including dependant ecological sites) and assessment of flood risk. The HHIA involved the correlation and examination of hydrogeological and hydrological data supplied from a wide range of sources, including over 20 years of site-specific groundwater elevation and surface water flow data collected from within, and local to, the Site itself, as well as recent extensive hydrogeological assessment reports completed for the locality. These data were used to define a conceptual model for the area encompassing the quarry, which has subsequently been used to assess the potential impacts relating to the proposed deepening below currently permitted levels.

## **Baseline**

### *Topography*

- 7.8 The quarry is located upon the southern flank of the River Mells valley, on the northern aspect of the east to west oriented ridge forming the Mendip Hills. In the vicinity of the quarry, the River Mells valley comprises a relatively steeply sided, generally west to east oriented valley.
- 7.9 The Mendip Hills extend from Weston-Super-Mare in the northwest to Frome in the southeast. They comprise Carboniferous, Devonian and Silurian age strata arranged into a series of east-west oriented periclinal (elongated domes). The Site is located within the eastern region of the Mendip Hills, on the northern flank of the Beacon Pericline.
- 7.10 The approximate basal elevation of the Mells Valley at Coleford is 114mAOD. Immediately south of the River Mells, land levels rise gradually for approximately 250 metres (m) to an elevation of some 120mAOD, before rising more steeply for a further 750m towards Halecombe Quarry. The general level attained at Halecombe Quarry is 160mAOD. The land continues to rise to the south and southwest reaching a maximum elevation in the vicinity of Cranmore Tower (approximately 285mAOD) some 1.25km west-southwest the Site.

### *Hydrology*

- 7.11 Halecombe Quarry lies entirely within the surface water catchment of the River Mells. The River Mells flows from west to east within the valley to the north of the Site (some 1.25km at the closest approach) and discharges to the River Frome some 7km to the east.
- 7.12 In the area to the north, east and west of the Site a series of six springs emerge on the southern flank of the Mells Valley, forming minor tributary watercourses to the main river. Drainage from the southern flank of the valley is supplemented by a series of field drains, installed to convey runoff from relatively poor draining soils during wetter periods.
- 7.13 A profiling exercise undertaken along a 7km section of the River Mells in the vicinity of the Site, indicates the river is gaining from groundwater discharged via the series of discrete springs emergent from the Carboniferous Limestone (the economic mineral of the quarry), with no significant input of groundwater through the underlying Coal Measures.
- 7.14 The Site is subdivided by the Halecombe Brook. This flows from west to east, rising on Old Red Sandstone strata to the south of Leigh-on-Mendip and crossing as surface flow onto the Carboniferous Limestone within the quarry landholding. The Halecombe Brook continues to the east of the Site entering Mells Park and through Finger Valley. The watercourse joins with the River Mells in the area upstream of the bridge at Mells Green.
- 7.15 During summer periods, flow within the upstream section of the Halecombe Brook is lost into one of two sinks within the base of the watercourse up and down stream of the quarry entrance (Halecombe and Finger Swallets). During winter periods this loss is reversed with flow continuing into Finger Valley.

### *Springs*

- 7.16 Extensive hydrological investigations have been carried out in the vicinity of Halecombe Quarry to identify the presence of springs and other water dependant features that may be impacted by quarrying operations.
- 7.17 A number of the springs emergent to the northwest of the quarry are Tufa bearing. Tufa formation is associated with hard-water springs, where groundwater rich in calcium bicarbonate comes to the surface. On contact with the air, carbon dioxide is lost from the water and a hard deposit of calcium carbonate (tufa) is formed.
- 7.18 The Tufa bearing springs are Whitehole Farm, Bectorwood, Hurdlestone and Leigh Wood East. The methods for assessment and monitoring for Tufa

deposition is subject of an ongoing programme of investigation undertaken by Hanson Aggregates in relation to the monitoring programme required for the nearby Whatley Quarry.

### *Regional Hydrogeology*

- 7.19 The Site is located within the Carboniferous Limestone sequence forming the northern flank of the Beacon Hill Pericline (a dome-shaped formation of stratified rock with its slopes following the direction of folding). The strata in the vicinity of the Site dip steeply to the north at some 70 degrees, resulting in unit outcrop as east - west oriented linear bands.
- 7.20 The central core of the Pericline comprises the Portishead Beds of the Old Red Sandstone. The primary permeability of this unit is generally low but the secondary permeability tends to be higher due to the presence of faults, fractures, joints and coarse grained layers. Storage within the Portishead Beds is significant with regard to the hydrogeological system, this being observed as a steady (perennial) release of water at springs, with little seasonal variation.
- 7.21 The principle aquifer within the HIAA study area is the Carboniferous Limestone. This is separated from the Portishead Beds by the Lower Limestone Shales. The Lower Limestone Shales possess higher clay content and are of lower permeability than both the Carboniferous Limestone and Portishead Beds, and act as a barrier to groundwater flow between the two units. The presence of the lower permeability strata and structural configuration of the subsurface units, serve to isolate the limestone aquifers comprising the northern and southern limbs of the pericline.
- 7.22 The Lower Limestone Shales possess higher clay content and are of lower permeability than both the Carboniferous Limestone and Portishead Beds, and act as a barrier to groundwater flow between the two units. The presence of the lower permeability strata and structural configuration of the subsurface units, serve to isolate the limestone aquifers comprising the northern and southern limbs of the Pericline.
- 7.23 The Carboniferous Limestone aquifer has both low primary porosity and permeability. The occurrence of groundwater within the aquifer and the ability for transmission of flow is therefore dependent upon the development of secondary permeability - the network of fractures, joints and bedding planes formed through the unit. Where these have been exposed to rapidly percolating rainfall (weakly acidic with dissolved carbon dioxide), points of weakness within the aquifer can be enhanced to form an area of irregular limestone rock in which erosion has produced features such as fissures (a split or crack in the rock forming a long

narrow opening), conduits (enlarged fractures) and caves. These are collectively known as karstic features.

7.24 Groundwater within the Portishead Beds provide an important source of allogenic recharge (recharge that has originated as rainfall on different strata to that which it is recharging) to the Carboniferous Limestone, with spring flows arising at the contact between the sandstone and Lower Limestone Shales, flowing over the shale outcrop and into sink holes (colloquially known as 'slockers') formed on the southern boundary of the limestone aquifer. The low infiltration capacity of the Portishead Beds also results in a relatively rapid response to rainfall runoff and high flows to these karstic features.

7.25 The movement of water through the limestone aquifer and between conduit and fracture components is characterised by constant change (dynamic), with conduits either losing or gaining water, dependant on groundwater elevation and input flow conditions.

#### *Local hydrogeology*

7.26 Groundwater levels in the vicinity of the Site have been recorded within an extensive network of 15 piezometers since 1990.

7.27 The variation in groundwater levels recorded within the Site piezometers demonstrates a relatively large range and rapid variation within the Carboniferous Limestone aquifer encompassing the Site. This is typical of limestone terrain, where the primary porosity and storage of the aquifer are low, with groundwater held within the secondary porosity fracture system. The seasonal range in groundwater levels within the Carboniferous Limestone varies between monitoring points but is generally around 35m.

7.28 The water level within the Rookery Farm area of the Site has historically been maintained between 154 and 156.5mAOD. More recently, extraction works have commenced to excavate a void within Rookery Farm to create a water storage area (the Rookery Lake). Once completed, water will be pumped to the lake from the main quarry void, with subsequent discharge of excess water to the adjacent Halecombe Brook. The water held within the lake is intended to provide a supply for augmentation water for any springs included within the hydrometric monitoring scheme for the Site, should assessment deem it necessary.

7.29 The general piezometric gradient occurs from west to the east through the Carboniferous Limestone aquifer (along strike of bedding). The piezometric gradient to the east is expected to occur for both maximum and minimum groundwater elevation conditions.

- 7.30 Superimposed upon the aforementioned general piezometric gradient are components of flow from south to north, induced by the input of water from the slockers (Park Corner and Halecombe/Finger Valley) on the southern margin of the aquifer and discharges from the springs to the north.
- 7.31 The effects of the quarry dewatering programme undertaken at Whatley Quarry are also observed as a general steepening in the piezometric surface towards the eastern boundary of the study area (Whatley Quarry sump level at some 41MOD).
- 7.32 The Carboniferous Limestone encompassing the Site forms an east-west oriented linear aquifer. The aquifer is bound to the south by the presence of the Lower Limestone Shales and to the north by the Millstone Grit and subsequent Coal Measures strata. Recharge to the Carboniferous Limestone occurs as both autogenic (recharge derived from precipitation falling directly onto the aquifer) and allogenic (recharge that has originated as rainfall on different strata to that which it is recharging).
- 7.33 Groundwater flow within the limestone aquifer occurs through both conduit and fracture systems. The conduit flow pathway is rapid (slocker to spring response within hours), whilst the fracture pathway is significantly slower (tens of days), providing storage within the aquifer and a more delayed baseflow supply to emergent springs.
- 7.34 The various water features surveys and assessments undertaken in the locality have identified the key springs located within the groundwater catchment encompassing the Halecombe site. These are Hurdlestone, Whitehole Farm, Leigh Wood East & West, Soho Farm and Finger/Cobby Wood.

*Unsaturated thickness (depth to groundwater)*

- 7.35 Under maximum groundwater elevation conditions, the unsaturated thickness of the aquifer to the west of the Site ranges between some 15 and 20m. Under minimum groundwater elevation conditions, the unsaturated thickness to the west of the Site varies between some 74 and 78m. Unsaturated thickness is reduced in the area immediately to the east of the Site to some 10 - 12m under maximum conditions and 28-32m under minimum groundwater elevation conditions. The reduction is expected in part attributable to the proximity of the losing reach of the Halecombe Brook, serving to locally recharge the aquifer east of the Site.
- 7.36 For the purposes of the HIAA the base of the limestone aquifer is considered to be equivalent to the depth of karst development. The development of conduit and fracture systems through the limestone is dependent upon the ability for water to

move through the subsurface and hence is effectively controlled by the lowest potential level of outlet flow (spring flows) from the aquifer.

7.37 The aforementioned lowest springs in the groundwater system encompassing the Site are located at Hapsford and Oldford, some 5.5km to the east at the closest approach and an elevation of some 55-60mAOD. Due to the distance involved the HIAA considers that it is unlikely that significant karst development will extend below 55mAOD at the Site. However, in order to present a worst case scenario the HIAA groundwater ingress calculations assumed that the active aquifer extends to the full depth of extraction (10mAOD).

#### *Abstractions*

7.38 Tarmac holds a licence to make abstraction for general use (medium loss) from the main sump at Halecombe Quarry. This is fed by groundwater held within the Carboniferous Limestone. Two other licences are located on the northern limb of the Beacon Hill Pericline. These are held by Hanson and Mr and Mrs Patch.

7.39 The Hanson abstraction is made from a reach of the Whatley Brook at Whatley Quarry for use as process water. The Whatley Brook rises on the southern flank of the Beacon Hill Pericline and flows onto the northern outcrop of limestone at the Whatley Quarry boundary. The watercourse then loses flow to groundwater for the downstream reach into the main River Mells. Flow within the Whatley Brook is also augmented by discharge from the Whatley Quarry dewatering operation.

7.40 The abstraction made by Mr and Mrs Patch is taken at Whitehole Spring. The licence relates to a commercial abstraction for water bottling taken at the spring source. Whitehole Spring is fed by groundwater held within the limestone aquifer forming the northern limb of the Beacon Hill Pericline. Tracer testing has shown water emerging at Whitehole Spring is primarily linked to flows entering Pitten Street Slocker, located some 750m to the south.

#### *Source Protection Zones/CAM*

7.41 The Site is located within SPZ3 (total catchment) for two water supply abstractions made to the east of the site at Oldford and Egford. A second SPZ is defined to the west of the Site for abstraction made at Stoke Bottom Springs.

7.42 The Site lies within the Bristol Avon and North Somerset Streams Catchment Abstraction Management Strategy area (CAMS).

7.43 Within the above strategy document, groundwater and surface water abstraction is treated as one, with the abstraction status applied to groundwater resource

management units based on the status of the downstream surface water assessment points. For the catchment encompassing the Site the relevant assessment point is the Vallis gauging station on the River Mells.

- 7.44 The current status for the Vallis assessment point is "restricted water available" for licensing. This means consumptive licensing is available but with "Hands off Flow" restrictions.
- 7.45 Quarry dewatering is exempt from licensing but this is proposed to change, requiring dewatering activities to become licensable. Dewatering activities will require a Transfer Licence (movement of water from one source to another within the same catchment). Any loss in groundwater resource would be expected to be compensated by enhanced flow within the surface water environment at the downstream assessment point.

### **Water Management During Extraction**

- 7.46 The current level of working within the main extraction area occurs below the watertable. A programme of dewatering is operated, with abstracted water being discharged via two consented discharge points to the Halecombe Brook.
- 7.47 Water management for the proposed deepening will be a continuation of the current system. A combination of groundwater and rainfall runoff is currently captured within a main sump installed into the basal sinking of the extraction area and a second sump installed within the Rookery area. Water is discharged from both sumps under EA consent to the Halecombe Brook.
- 7.48 The increase in depth of working beneath the water table will require an associated increase in dewatering discharge. The HIAA has calculated the potential increase in discharge rate for workings to the currently permitted depth (68mAOD) and for the proposed maximum depth (10mAOD).
- 7.49 The proposed additional extraction would not involve the removal of any existing surface watercourses or other features. The closest watercourse to the development is Halecombe Brook and it is proposed to culvert the Brook through the plant area and reinstate it as an open water channel along the existing course following restoration.
- 7.50 Groundwater levels recorded in the vicinity of the Brook show the watercourse to be perched some 15m above the watertable, with flows being gradually lost from the watercourse into the underlying limestone aquifer. The HIAA considers that any increase in drawdown resultant from the proposed extraction is not expected to result in any additional negative effect. Furthermore, the culverting for a section

of the watercourse through the plant area would serve to reduce loss of water from the Brook.

- 7.51 Two sets of calculations have been undertaken for the purposes of the HIAA; i. mass balance calculations using collected site discharge, rainfall and groundwater elevation data and ii. groundwater ingress calculations. For extraction to the currently permitted maximum level of working (68mAOD) the calculations indicate a potential range in required discharge rates of between 58 and 102l/s. For the proposed deepening to 10mAOD this increases to between 191 and 248l/s.
- 7.52 The current level of dewatering at Whatley Quarry is similar to that required for the extraction at Halecombe Quarry to the currently permitted depth (68mAOD). Under this scenario the predicted upper rates of discharge (102l/s) are comparable with the required discharge from Whatley (300l/s), taking into account the approximately three times larger surface area/exposure of limestone aquifer at the latter site.
- 7.53 The HIAA considers that although both sets of the aforementioned ingress calculations have limitations, they are considered adequate for the purposes of the assessment to provide representative upper limits for potential ingress volumes.
- 7.54 Once the Rookery Lake is completed dewatering from this area will cease and all discharge from the quarry will be routed via the formed waterbody, for subsequent discharge of excess water to the adjacent Halecombe Brook. Rainfall across the extraction area will be directed to a basal sump, with water only being able to leave the extraction area via the aforementioned pumping arrangements.
- 7.55 The current EA consented discharge arrangements for the Site allow a maximum of 16,000m<sup>3</sup>/day (185l/s). Assuming the Rookery discharge has ceased prior to extraction below the 68mAOD level and provision of adequate sump storage within the lowest sinking, the currently permitted rates should be adequate to cover all but the lowest phases of extraction.

### **Water Management Following Restoration**

- 7.56 The extraction area within the restoration landform will present a closed catchment for incident rainfall, with any water being held within the restored void, creating a lake. The water level of the restoration lake will find a natural level in continuity with the surrounding groundwater environment and is expected at some 140mAOD. Superimposed upon this level will be the effect of rainfall ingress to the restored Site and the natural fluctuation resulting from seasonal variation in groundwater levels.

- 7.57 Runoff from the area encompassing Rookery Farm will be directed into the ephemeral ponds and main Rookery Lake, where it will be allowed to dissipate to groundwater.
- 7.58 The quarry deepening and extraction of reserves beneath the current asphalt plant will involve the removal of limestone from both above and below the watertable. The quarry deepening below the currently permitted depth will require an increase in the depth of dewatering.
- 7.59 The piezometric gradient indicates general groundwater flow within the Carboniferous Limestone from west to east, with northern components of flow induced by the input of water to sinkholes at the southern outcrop boundary with the Lower Limestone Shales and discharges from springs towards the River Mells on the northern boundary.
- 7.60 The presence of groundwater within the limestone aquifer is dependent upon the development of enhanced secondary permeability (fracture and conduit) systems. Such features are formed by movement of water through the rock and hence are ultimately controlled by the ability of water to leave the aquifer and elevation of outfall points. The principle aquifer in the study area is the Carboniferous Limestone. This is separated from the Portishead Beds by the Lower Limestone Shales. The Lower Limestone Shales possess higher clay content and are of lower permeability than both the Carboniferous Limestone and Portishead Beds, and act as a barrier to groundwater flow between the two units. The presence of the lower permeability strata and structural configuration of the subsurface units, serve to isolate the limestone aquifers comprising the northern and southern limbs of the pericline.
- 7.61 In the vicinity of the Site the development of such features is not expected to extend significantly below 55mAOD. Below this level the bulk permeability of the limestone is expected to be reduced, with significantly reduced groundwater movement.
- 7.62 Groundwater movement within the upper section of the limestone occurs within either the slower moving fracture system or more rapidly via conduits. Tracer testing of the conduit system has shown links between various sinkholes and spring flows in the locality, none of which is expected to pass through or beneath the Site and hence are not expected to be directly intercepted by the proposed development.
- 7.63 The currently permitted extraction will intercept the easterly movement of water across a significant proportion of the cross-sectional area of the active aquifer.

Under the prevailing situation, any intercepted flow would either emerge as natural discharge to Finger and Cobby Wood Springs or, more likely, be intercepted within the much larger and deeper quarry void and dewatering operation at Whatley Quarry. Any intercepted groundwater flow will be discharged to the Halecombe Brook where it will serve to mitigate for any loss in flow at the downstream springs.

7.64 Following restoration of the Site the large natural fluctuation in groundwater levels within the immediately adjacent limestone aquifer would be expected to reduce, as a result of the increase in storage offered by the quarry void. The HIAA concludes that any such effect is expected to be localised and the proposed deepening of extraction would not result in any significant change in water level response, when compared to the waterbody that would be formed in the extraction void made to currently permitted levels. In this regard, the proposed development will not result in any significant alteration in long- term effects observed in the locality.

#### **Potential for Impact on Groundwater Resources**

7.65 The HIAA states that during the extraction period a localised reduction in groundwater resources would be caused through the dewatering although this reduction is expected to be temporary, with groundwater levels largely recovering to predevelopment elevations for all but in the immediate vicinity of the Site following completion of extraction.

7.66 The majority of the proposed extraction is located below the watertable within the limestone aquifer i.e. extraction from the saturated zone. A limited section of the Site (the area beneath the current plant area) is located above the watertable at some 160mAOD.

7.67 Removal of the unsaturated zone has the potential to reduce aquifer storage, as rainfall would no longer be held in temporary storage during its passage through the unsaturated zone to the watertable. Therefore, the removal of the unsaturated zone reduces the volume of the temporary storage and water resources held within the aquifer.

7.68 The HIAA considers that the reduction in temporary storage will be compensated through the retention of runoff from the restored Site within the former extraction void. Accumulating water retained within the restored landform would be allowed to recharge the surrounding saturated limestone aquifer. With the aforementioned controls for runoff and cessation of pumping from the Site as a whole, the HIAA considers that the proposed development will have negligible long-term impact upon the availability and distribution of groundwater resources in the locality,

when compared to the already permitted extraction and proposed restoration for the Site.

### **Local Springs**

- 7.69 Seven springs are located in the vicinity of the Site, identified as being linked to groundwater resources within the limestone aquifer encompassing the Site and forming the northern limb of the Beacon Hill Pericline.
- 7.70 Soho Spring is the closest spring to the quarry, with emergent flow related to groundwater transfer along the Luckington Fault, which passes close to the western section of the existing quarry void. Flows at the spring were accepted as being affected by Wimpey Hobbs Limited (a previous operator of the Site) at an early stage in the extraction operation at Halecombe Quarry - prior to progression of works beneath the watertable. It is of note that no long-term pre-quarrying flow data is understood to be available to confirm evidence of impact.
- 7.71 The 2002 planning permission for the Site includes a requirement for supply of between 1.4 and 4l/s of augmentation water to Soho Spring. Works to enable the augmentation have been completed with a pipeline installed to allow for periodic supply of water to the head of the spring from the quarry dewatering operation.
- 7.72 The Leigh Wood Springs are thought to be seasonal (ephemeral) fed by a minor localised conduit system and are only active during the winter period when groundwater levels are elevated.
- 7.73 However, Whitehole Farm Spring is considered to be a permanent (perpetual) feature rising at a lower elevation than the Leigh Wood Springs. Tracer testing shows the Spring to be primarily fed by the year round flow into Pitten Street Slocker. The Spring emerges at an elevation of some 155mAOD.
- 7.74 The HIAA considers that comparison of the spring elevation with the predicted groundwater elevations for the area to the west of the Site (estimated to vary seasonally between 125 and 185mAOD) suggests the conduit connection to Whitehole Spring occurs above the extant watertable within the main fracture system of the limestone for the majority of a given year i.e. the conduit would be expected to be losing to the main watertable for the majority of time.
- 7.75 Input to Pitten Street Slocker is buffered at the surface with flow periodically exceeding the capacity of the conduit system and backing up to form a pond. Within the aquifer, transfer of water between the conduit and encompassing fracture system is dynamic, with expected loss from the conduit during high flows and transfer back into the conduit as flows reduce. Both the foregoing factors

result in a general delayed and less peaky response at the emergent Whitehole Spring.

7.76 Each of the identified springs emerge at elevations above the prevailing minimum groundwater levels expected within the up gradient limestone aquifer. Despite this, flows are recorded at the lower level springs (Whitehole, Bectorwood and Hurdlestone) on a perennial basis. The HIAA suggests flows are sustained via a higher level conduit system, which during the summer period becomes perched above the watertable sustained within the main fracture system.

7.77 The HIAA concludes, based on the above, that any increased drawdown within the main fracture system, even if extending sufficient distance from the Site to intersect the relevant conduit system, is considered unlikely to cause significant reduction in springflows during the most sensitive summer period. In comparison to the potential for impact relating to the currently permitted depth and extent of working.

#### **Potential for Derogation of Groundwater & Surface Water Quality**

7.78 Potential exists for groundwater and surface water quality derogation as a result of spillages of potential contaminants (oils, lubricants and solvents) within the proposed working areas. It is important to recognise that the likelihood or consequences of such an occurrence are no greater than currently prevail at the Site, or, indeed, the numerous similar operations sited throughout the region.

7.79 It should be recognised that quarrying is a historical activity at the Site. Workings within the proposed extension will be carried out in an equivalent manner, and within the same hydrostratigraphic environment, as the current operations. Therefore, neither the potential scale, nor likelihood of occurrence, of a derogation of groundwater quality will significantly increase as a result of the proposed deepening extension.

7.80 A number of the springs to the northwest of the Site are Tufa bearing. Mitigation for these springs requires special consideration to ensure provision of suitable water quality to allow for continued Tufa production.

7.81 The key parameters identified for Tufa production have been identified during previous assessments. The baseline assessment reports identify the differing chemical composition of the runoff ingress to Pitten Street Slocker (the primary connection to the spring), with that emerging at Whitehole Spring. This indicates the recharged water undergoes significant changes in chemistry as it flows through the subsurface.

7.82 The changes in water quality were identified as an increase in dissolved calcium carbonate and a decrease in potassium.

7.83 The HIAA advises that comparison with water quality data collected from the Rookery and main quarry sumps within the Site compare favourably with the parameters specified above for ingress water at Pitten Street Slocker (appendix 6). A similar comparison was made for water held within the main quarry sump at Whatley quarry within the original assessment. The water from both sites would need to go through similar changes in composition to that recorded for the current water entering Pitten Street Slocker, to emerge as the prevailing water quality at Whitehole Spring. Findings from the above mentioned assessments indicate the sump dewatering supplies as potentially suited to providing an augmentation supply for recharge to the western section of the aquifer via Pitten Street Slocker.

### **Potential for impact upon existing abstractions**

7.84 Three water abstractions are made in the locality dependant on groundwater held within the Carboniferous Limestone forming the northern limb of the Beacon Hill Pericline.

7.85 The first abstraction is made by the Applicant within the Site boundary. This will be continued for the duration of the Site operations, with abstraction supplied from the dewatering operation.

7.86 The second is made by Hanson at Whatley Quarry. The abstraction is made from Whatley Brook as it flows onto the outcrop area of the Carboniferous Limestone from the region to the south. The Whatley Brook is considered sufficiently distant (1.5km) and hydraulically isolated from the Site (Whatley Quarry void is situated between the watercourse and Site) for the potential for impact to be negligible.

7.87 The third abstraction relates to a commercial water bottling operation undertaken at Whitehole Spring. This is located some 1.5km to the west of the Site at the closest approach.

7.88 Whitehole Spring is included within the monitoring scheme operated in the vicinity of the Site. This includes for assessment of flows against historic levels, with contingent mitigation should trigger levels be breached, indicating a reduction in baseflow. The programme of monitoring would be continued for the duration of the proposed development.

7.89 All other identified abstractions (licenced and private water supplies) are located outside the defined groundwater catchment area for Halecombe Quarry and are considered sufficiently hydraulically isolated from the proposed development.

7.90 The HIAA concludes that the proposed development is not expected to result in negative impact at the aforementioned protected abstraction points.

## **8 Regulation 25 Consultation**

8.1 A supplementary “Note” was provided, post submission, by the Applicant’s hydrogeological consultant dated 22 June 2018. This followed a request from your officers, at a meeting with Applicant in May 2018, to specifically address the cumulative impact of deepening Halecombe and Whatley Quarries at the same time.

8.2 Subsequently a letter from the Applicant’s agent, dated 11 September 2018, was submitted to the Council. This included a proposed planning condition that restricted quarrying to the current quarry floor level of 85mAOD until a Section 106 Agreement relating to Bath Hot Springs had been entered into in a similar format to the Whatley Quarry agreement; and until mitigation measures (such as pipework, boreholes or recharge features), were installed ready for use to mitigate impacts on Whitehole Farm Spring (or other springs included under the monitoring scheme if necessary).

8.3 The Note and Letter were accordingly submitted as further information under the provisions of Regulation 25 of the EIA Regulations 2017 to supplement the Environmental Statement previously submitted. The further information was formally advertised and subject to consultation in accordance with the Regulations.

8.4 Although the additional information only related to hydrogeological matters, all parties previously consulted have been re-consulted. In the consultation responses set out in Section 9 below, Regulation 25 responses are listed separately. For the avoidance of doubt if no response is listed then that particular consultee did not respond.

## **9 Consultation Responses Received**

### External Consultees

#### **9.1 Mendip District Council**

##### **No objection: Comments**

No objections are raised subject to the Minerals and Waste Planning Authority (SCC) being satisfied that the proposals would not have an adverse impact upon

flood risk, local ecology, the landscape, the amenity of local residents, the setting of heritage assets, public right of way and highway safety.

## 9.2 Leigh on Mendip Parish Council

### **No objection: Comments**

It is recommended that the application is approved as the economic and community value to the Parish outweighs any limited environmental concerns. However this recommendation is conditional upon a satisfactory S106 legal agreement. The legal agreement covers items which significantly affect the Parish. Certain aspects of the "Proposed Heads of Terms for a Legal Agreement Relating to Halecombe Quarry Deepening" are rejected and there are other items which will need to be added and clarified in the final S106 agreement, as follows:-

#### 7 Long Term Management Scheme

As previously discussed at Halecombe Liaison meetings, the timings for the Restoration & Aftercare Plan and the Management Plan are unclear in the 2002 agreement and need to be clarified.

S106 (2002) 4th Schedule paras 2.1, 2.3, 3 & 4 refer.

(2.1) Within 12 months of agreement (19Sep2002) submit the "Restoration & Aftercare Plan" to SCC for approval

(2.3) Within 3 months of approval of the "Restoration & Aftercare Plan" establish the Reclamation Steering Group , to meet at least ANNUALLY.

(3) Within 6 months of approval of the "Restoration & Aftercare Plan" submit the "Management Plan"

(4) Within 21 days of approval of the "Management Plan" establish the Management Steering Group, to meet at least ANNUALLY

In all cases the time for approval from submission is not defined.

#### 8 Long Term Management Fund (1)

Clause 5.1 of the fourth schedule of the 2002 agreement states "..an account held in joint names of the Council and the Company ..." However the Council was unable to operate a joint account and it was agreed that the funds are to be held in a SCC account reserved for S106 monies. The new agreement should therefore recognise this change and, due to the longevity of this fund, include words to ensure that the fund is expressly protected from any changes to the status of SCC or its policies.

### 8 Long Term Management Fund (2)

Any early cessation of contributions to this fund would result in a high risk of the fund losing value due to inflationary effects and thereby being insufficient for the long term management of the site. Cessation of contributions could be extended by approximately 22 years (depending on when the 8 million tons is reached). During this time inflation could easily half the real value of the fund. Although interest is accumulated within the SCC account, this rate of interest is poor and has historically been well below inflation rates. It is therefore vital that some limited contribution is made to maintain the value of the fund until the end of the Aftercare Period (December 2056) when the Long Term Management begins. It is likely that the future costs of managing the site will increase due to more stringent safety and environmental conditions.

### 8 Long Term Management Fund (3)

The details of the existing fund were agreed in letters between SCC and Tarmac Ltd, dated 16th May 2016. It is recommended that these details are subsumed into the latest legal agreement.

### 10 Local Community Fund (1)

This scheme is welcomed by the Parish Council and we are grateful for past contributions to the parish. However it is strongly recommended that Leigh on Mendip has the first option on 70% of the available funds for requests meeting the Community Fund Criteria. Justifications are:-

- Halecombe Quarry is almost fully contained within the parish of Leigh on Mendip and has a close working relationship with the parish.
- Leigh on Mendip has historically benefited from financial, material and personal contributions to the village community from Halecombe quarry owners and employees.
- Both parishes of Whatley and Mells have other local quarries which provide support to the parishes. Neither provide any support to Leigh on Mendip.

### 10 Local Community Fund (2)

(Annex para. 1) Criteria - It is recommended that the Community Fund Criteria includes contributions to "Social and Community Support" for young, old and vulnerable in a rural community.

### 10 Local Community Fund (3)

(Annex para. 2) Funding - Clarify the source of the "Aggregates Index".

### 10 Local Community Fund (4)

(Annex para. 3) Funding Requests - It is recommended that any funding should be spent within 12 months of the donation taking place or at the discretion of the committee. Projects can often take more than 6 months and need early committed funding.

### 11 Routeing Protocol for HGVs (1)

This agreement is welcomed by the Parish Council.

### 11 Routeing Protocol for HGVs (2)

Correction - third para "...requiring all HGVs to turn left when exiting Halecombe Quarry..." should be "...requiring all HGVs to turn right when exiting Halecombe Quarry..."

### 11 Routeing Protocol for HGVs (3)

The routeing relates to A361 access only. Should A37 access via Old Wells Road be included?

### Successor Companies

It is assumed that S106 (2002) para 11.4 applies to the responsibilities of Tarmac stated in paras. 4 & 9 of the proposed Heads of Terms.

The Applicant's Agent has responded to these points at Section 10.8.

## **9.3 Environment Agency**

### **No objection: Comments**

It is recommended that the developer provides evidence to show that the Bath Hot Springs will not be affected by this proposal. We will then review any documentation and comment accordingly.

### Regulation 25 Response

### **No objection subject to conditions**

Although we are happy at this stage to agree the broad principles as set out by the proposed planning conditions (4, 5 and 6) and legal agreement clause in your

letter of the 19<sup>th</sup> October 2018 (2017/1022/CNT); subsequent email correspondence with [redacted] and further amendments as discussed in telephone conversations this is subject of us having the further opportunity to comment on the final draft wording of the updated Section 106 (3<sup>rd</sup> edition) as to be amended by this Proposed Legal Agreement Clause. For clarity, we have presumed the bullet points to be in summary only and rather than the actual wording of the agreement.

We have the following suggested changes below in *BLUE* and with further comments *BLUE* and some ~~strikethrough~~ of your original text below.

(Note: For the purposes of printing blue comments are in grey)

Proposed Planning Condition 4 (verbal comms 30/10/18 14:00 hrs. between Clive Conroy & [redacted] regards the Condition numbering)

*There shall be no extraction of limestone below 68 metres Above Ordnance Datum (apart from the provision of a quarry drainage sump) until an investigation into the impact of quarrying at Halecombe Quarry on the Bath Hot Springs System has been carried out by the operator. The investigation shall assess if there has been, ~~or will not be~~, or may be any demonstrable harm adverse effect to the Bath Hot Springs System.*

*The investigation shall include, although not limited to:*

- *Implement measures to monitor flow, temperature, total heat output, water levels and groundwater levels of the Bath Hot Springs System.*

*The findings of such an investigation shall be submitted to the MPA for consideration, in consultation with the EA and BANES, at least 24 months prior to progressing below 68mAOD. If, in the opinion of the MPA, such an investigation fails to demonstrate that there ~~has been would not be~~ will not be, or may not be any demonstrable harm adverse effect to the Bath Hot Springs System by quarrying at Halecombe Quarry, and together with arrangements and remedial measures on the basis of that would mitigate any adverse effect the MPA shall give notice to the operator of this opinion within 3 months of receipt of the investigation findings.*

Comment: We think there should be free sharing and disclosure of information about dewatering at Halecombe Quarry and fluctuations on flow, temperature and water levels of the Bath Hot Springs System at all times and with all parties.

Comment We think it is also desirable the Bath Hot Springs System to be further investigated and for additional monitoring boreholes to be provided).

*The operator shall submit a revised Concept Restoration Plan within 6 months of the date of the notice served by the MPA, showing the final quarry floor at 68mAOD. Thereafter the site shall be restored in accordance with the requirements of Condition 46.*

Proposed supplementary Planning Condition 5 (verbal comms 30/10/18 14:00 hrs. between Clive Conroy & regards the Condition numbering)

If the operator has demonstrated to the satisfaction of the MPA, *in consultation with the EA and BANES* that there has *not* been, *will not be or may not be any ~~no demonstrable harm~~ adverse effect* to Bath Hot Springs System, under the requirements of Condition 4, a further investigations shall be carried out, in accordance with *the same* criteria outlined in Condition 4, for each subsequent bench drop; these being 55m, 40m and 25m. *There will also be further submissions to the MPA for consideration, in consultation with the EA and BANES, of an Annual Water Monitoring Statement for the Bath Hot Springs System to also be carried out (if progressing below 68mAOD).*

*The annual reports will be provided to include, although not limited to:*

- *All data collected to monitor flow, temperature, total heat output, water levels and groundwater levels of the Bath Hot Springs System for the reporting period (the hydrometric year October to September).*
- *Assessment of the occurrence of adverse effects upon the Bath Hot Springs System that may have occurred during the reporting period.*
- *Details of any mitigation / remedial measures implemented during the reporting period.*
- *A discussion of data quality issues, status of installed monitoring equipment and recommendations regarding improvements to the monitoring measures.*

*A further review of monitoring, quarry abstraction rates and safeguard conditions for Bath Hot Springs System to be undertaken every five years or at least 24 months prior to extraction of limestone below the next bench drop, whichever comes first.*

*The findings of such investigations shall be submitted to the MPA for consideration, in consultation with the EA and BANES, at least 24 months prior to progressing below each bench.*

Comment: We think there should be free sharing and disclosure of information about dewatering at Halecombe Quarry and fluctuations on flow, temperature total heat output, water levels and groundwater levels of the Bath Hot Springs System at all times and with all parties.

Comment We think it is also desirable the Bath Hot Springs System to be further investigated and for additional monitoring boreholes to be provided.

*If, in the opinion of the MPA, in consultation with the EA and BANES such investigations fails to demonstrate that there has not been, will not be or may not be any ~~demonstrable harm~~ adverse effect to the Bath Hot Springs System by quarrying at Halecombe Quarry, and together with arrangements and remedial measures on the basis of that would mitigate any adverse effect the MPA shall give notice to the operator of this opinion within 3 months of receipt of the investigation findings.*

*The operator shall then submit a revised Concept Restoration Plan within 6 months of the date of the notice served by the MPA, showing the final quarry floor at the level*

*that quarrying ceased. Thereafter the site shall be restored in accordance with the requirements of Condition 46.*

Proposed supplementary Planning Condition 6 (verbal comms 30/10/18 14:00 hrs. between Clive Conroy & regards the Condition numbering)

This proposed Condition below, we feel is also important. The precedent for this same principle has already been incorporated into the 2012 Planning Permission for the nearby Torr Quarry.

Limit the quarry's maximum dewatering abstraction rate subject to a review with the Environment Agency. It is proposed that initially if the dewatering rates are in excess of 15,000 m<sup>3</sup>/day over a continuous period of eight weeks ("the event") then the operator shall undertake a detailed hydrogeological review of operations. This to establish the cause of the increased dewatering rates and the findings of such a review and any recommendations as to reduction of the same (including monitoring and control mechanisms) shall be submitted to an approved by Somerset County Council in consultation with the Environment Agency with four weeks of "the event". The agreed measures shall be implemented and maintained in full.

#### Proposed Legal Agreement Clause

Further we wish to also refer you to our two previous letters to Mrs L Horner dated 17 May 2017 and 4<sup>th</sup> September 2017 and in which we requested that provision via bespoke Planning Conditions is included for water resources. We would want to see (1 – 4) incorporated into the Proposed Legal Agreement Clause.

1. Given the scale and duration of the proposed deepening and dewatering we are concerned that adequate monitoring and mitigation measures may not be in place for the protection of surface water. In particular, we are concerned with the maintenance of surface water flows in the Halecombe Brook, surrounding springs, abstractions and protected rights. Prior to deepening or dewatering of the quarry beyond a depth of 68 mAOD a full review of the actual operational effectiveness of the Rookery Lake augmentation scheme is undertaken. Any update or changes will then need to form part of a new Water Management Scheme agreed with the Environment Agency.
2. Additional safeguards are put in place to protect all surrounding groundwater resources of the quarry and in recognition of the cumulative impacts as associated with the quarrying and dewatering at the nearby Whatley Quarry. This could take the form of a groundwater level at for example Borehole Q (The Hare Warren) or a new borehole at Serpentine Plantation. In either case impacts could be mitigated by maintaining the water level / flow in the Halecombe Brook effectively using this as a recharge feature. Further, the proposal in the application to increase the number of groundwater observation boreholes to the west of the quarry is also endorsed by the Environment Agency. Any update or changes will then need to form part of a new Water Management Scheme agreed with the Environment Agency.
3. A review of the quarry's existing 'water resources monitoring scheme' within

12 months of the planning permission having been granted. This to include for a meeting between Somerset County Council, Tarmac, Environment Agency and other interested parties. In particular, this meeting to explore the existing water resources mitigation measures and arrangements for Halecombe Quarry and Hanson's Whatley Quarry and consider if they are adequate now given the proposed further deepening of Halecombe Quarry.

4. A further review of monitoring conditions abstraction rates and safeguard conditions should be undertaken every five years.

## 9.4 Natural England

### **No objection: Comments**

#### **European designated sites**

The site is approximately (sic) from the Mells Valley Special Area of Conservation (SAC) which is designated at a European level as it contains a maternity roost thought to comprise approximately 12% of the UK greater horseshoe bat population.

The application includes measures designed to ensure that the proposals do not result in an adverse effect on the integrity of the SAC, using the Habitat Evaluation Procedure to calculate replacement Greater Horseshoe bat habitat.

The consultation documents provided by your authority do not include information to demonstrate that the requirements of Regulations 61 and 62 of the Habitats Regulations have been considered by your authority, i.e. the consultation does not include a Habitats Regulations Assessment. We advise that the council undertakes a Habitats Regulation Assessment screening assessment to ascertain whether a likely significant effect on the Mells Valley SAC can be ruled out from this development.

#### **National designated sites**

The site is approximately (sic) from Asham Wood SSSI (part of the Mendip Woodlands SAC) and from Edford Wood & Meadows SSSI. Based on the plans submitted, Natural England considers that the ground conditions in these sites are unlikely to change as a result of the proposed development and therefore the development is not likely to result in significant adverse effects on these sites.

Following receipt of the HRA prepared by your officers Natural England responded by email dated 24 July 2017 as follows:

*Overall Natural England agree with the report's conclusions. If the measures recommended in section 11 are secured, the proposals are unlikely to result in significant effects on Mells Valley and Mendips Woodland SACs. There are however a couple of details in the report which our site officer Bob Corns has asked to be amended please.*

*In both sections 9 and 10 Fairy Cave is referred to as the main Greater Horseshoe bat roost in Mendip. However Fairy Cave in Fairy Cave Quarry is known as a Lesser Horseshoe bat roost. Balch Cave, also in the Fairy Cave Quarry, is the main GHB roost with 50+ individuals.*

*Bob has been quoted as saying other roosts are not known on Mendip (section 10) but he contends that this is an oversimplification of the situation. We have a fairly comprehensive survey of caves on Mendip undertaken some years ago which identified a number of caves as being used for hibernation by GHB's but none, apart from Wookey Hole to the level of Balch Cave. Bob has also made the additional comment that Mendip Woodlands SAC (in this case Asham Wood SSSI) has been impacted by quarrying in that we have records showing that acid loving bryophytes are no longer present in the wood. The likely reason for this is the deposition of limestone dust from the surrounding quarries. This is however historical and the assertion that the future Halecombe activity will not impact the woodland is, Bob believes, the correct one.*

#### Regulation 25 Response

##### **No objection**

Natural England has no comment on the additional information that has been provided.

#### **9.5 Historic England**

##### **No objection**

On the basis of the information available to date, we do not wish to offer any comments. We suggest that you seek the views of your specialist conservation and archaeological advisers, as relevant.

It is not necessary for us to be consulted on this application again, unless there are material changes to the proposals. However, if you would like detailed advice from us, please contact us to explain your request.

#### Regulation 25 Response

##### **No objection**

Thank you for your letter of 19 September 2018 regarding further information on the above application for planning permission. On the basis of this information, we do not wish to offer any comments. We suggest that you are guided by the views of your specialist conservation and archaeological advisers.

It is not necessary for us to be consulted on this application again, unless there

are material changes to the proposals. However, if you would like detailed advice from us, please contact us to explain your request.

#### **9.6 South West Heritage Trust (Archaeology)**

##### **No objection**

As far as we are aware there are limited or no archaeological implications to this proposal and we therefore have no objections on archaeological grounds.

##### Regulation 25 Response

##### **No objection**

As far as we are aware there are limited or no archaeological implications to this proposal and we therefore have no objections on archaeological grounds.

#### **9.7 Bath and North East Somerset Council (BANES)**

##### **Objection**

Bath and North East Somerset Council are disappointed not to have been consulted earlier on this proposal (or indeed at all for either of the other applications you have listed) our understanding was that the Somerset County Council would formally consult on applications relating to quarrying activities on the Mendip Hills because of the potential hydraulic links between the this area and the Bath Hot Springs. We would ask that such arrangements be reinstated.

Bath and North East Somerset Council object most strenuously to these proposals as the quarry in question is on the northern side of the Mendips and lies close to Whatley Quarry where works that are subject to an existing s106 agreement are currently on-going. If this application were to be approved prior to the completion and restoration of the Whatley Quarry it would be virtually impossible to identify the quarry responsible in the event that dewatering activities cause damage to the continued flow of the Bath Hot Springs.

##### Regulation 25 Response

##### **Objection (part)**

Bath & North East Somerset Council have no objection to the proposal to relocate the existing asphalt plant and extract stone to the currently permitted depth of

68m AOD - it is understood that this will provide 10 – 15 years reserves during which time any impacts of dewatering at Whatley may become clearer.

The second part of the proposal suggests limiting the depth to 85m AOD (although consent is already held to extend to 68m AOD) until an S. 106 Agreement can be drawn up in a similar format to the Whatley Quarry agreement. This proposal does not satisfy our original objections. A key aspect of the Whatley Quarry s. 106 Agreement is that it accepts the precautionary principle - there is a potential for dewatering to depths below the artesian head of the Hot Springs (29m AOD) to cause damage to the flow of the springs. Whilst no adverse impacts have been detected to date quarrying activity has yet to reach 0m AOD hence the impacts are not yet known. Allowing a second quarrying operation to concurrently extend to similar depths before the impact from works on the first are fully understood is not acceptable as it would make monitoring and enforcement of conditions virtually impossible. The Council would expect to be able to consider the impacts of a completed Whatley Quarry before agreeing to a second dewatering operation to similar depths.

## **9.8 The Springs Foundation**

### **Objection**

We strongly object to this application with particular regard to the potential impact on the world famous Bath Hot Springs as it would appear from the documents and Environmental Statements supporting this application that the Bath Hot Springs have not been taken into consideration.

The Hot Springs of Bath are extremely important and significant rising at the heart of the UNESCO World Heritage Site City of Bath – one of the few cities in the world to be given such status - as the city of Bath came into existence around and because of the Hot Springs. It is therefore of extreme necessity that the Hot Springs are properly protected from all and any threats to their continued well-being which of course naturally includes flow and recharge capabilities.

The deep hydrogeology of the inflow paths and their hydrogeological relationships are complex and not fully understood. One of the most widely accepted models for the origins of the Bath Hot Springs is the Mendips Model and therefore a precautionary principle would be prudent to be applied to such works as the deepening of Halecombe Quarry, which could have an impact on them. In addition, the age of the water and time it takes to travel to emerge at the Hot Springs is a potent factor to be taken in to account. So much so that in the 1996 a Section 106 Agreement was signed between Bath and North East Somerset

District Council, Whatley Quarry, the Environment Agency and Somerset County Council in order to mitigate potentials for risk to the Bath Hot Springs from Whatley Quarry.

As you will no doubt be aware, Halecombe Quarry is situated in close proximity to Whatley Quarry and thus as has previously been identified any risk to the Bath Hot Springs must be investigated and assessed and procedures put in place such that a Section 106 Agreement might provide.

So why have any potential impacts to the Hot Springs and their recharge area not been taken into account in this application when there is already a Section 106 Agreement in place for the nearby Whatley Quarry? This raises the awkward question as to who would be responsible in the event an adverse impact were to occur to the flow quality of the Hot Springs if this application for Halecombe Quarry were allowed to proceed?

Therefore, it would seem that the documents submitted for this application to deepen Halecombe Quarry are incomplete, since as previously stated, no mention appears to have been made in the supporting documents as to the potential risk or impact to the Bath Hot Springs and therefore no mention made of any mitigating measures and monitoring systems to be put in place in order to protect the Bath Hot Springs from any such potential threat or risk.

In conclusion, we assert that this proposed deepening of Halecombe Quarry could be potentially detrimental to the integrity of the whole of the Bath Hot Springs' hydrogeological system. We therefore strongly object to this application since any threat or risk to the continued well-being and safety of the Hot Springs of Bath and their hydrogeological system is unacceptable.

We urge that the Precautionary Principle approach be taken and that this application is refused.

We would be obliged if you would please acknowledge receipt of this email and that our objections to this Application are duly noted.

## **9.9 The Garden Trust**

### **No objection subject to Conditions**

The Gardens Trust did not respond to the original consultation but did respond to the Regulation 25 Consultation as follows:

Thank you for consulting The Gardens Trust (GT) in its role as Statutory Consultee with regard to proposed development affecting a site included by Historic England (HE) on their Register of Parks & Gardens, as per the above application. We have liaised with our colleagues in the Somerset Gardens Trust.

We do not feel that deepening of the Quarry will have a direct impact upon the significance of Mells Park historic landscape. However, we would concur with the comments of Managing Agent, Mr Stephen Ellam, that there need to be some conditions and monitoring methods imposed to prevent the problem of dust affecting the health of the screening tree belt separating the Quarry from Mells Park. Should the health of the trees be negatively affected and the Quarry became more visible, then the setting of the RPG would be adversely threatened; a situation I am sure none of us would wish to see.

### INTERNAL CONSULTEES

#### 9.10 Ecology

##### **No objection subject to Conditions**

I have reviewed the various submitted ecology reports produced by Andrews Ecology between December 2015 and March 2017 and have the following comments and recommendations.

##### Designated and Non Statutory Sites

There are two Special Areas of Conservation (SAC) that although not within the application site boundary that are potentially affected by the proposed development. One the Mells Valley SAC is designated for its Greater Horseshoe bat population, which have been radio tracked using habitat on the eastern edge of the quarry, and the Asham Wood component of the Mendip Woodlands SAC designated for its lime /maple woodland, which may be affected by deposition of dust arising from the extraction process. The assessment of the application on these features are considered in a 'test of likely significant effect' (TOLSE), which I attach, and the resulting requirements to ensure the integrity of these sites need to be subject to either a condition or then a s106 agreement.

**A 20m long, 5m wide, and 1m deep butyl-lined shallow trough that will be demand-fed by a piped pump from the Rookery lagoon will be constructed in year 3, to feed slowly over a weir into a soakaway. The trough will have shallow margins in order that any grounded bat can swim to the side and escape. The northern bank will abut a shrub-vegetated screening bund, and the southern bank will be planted with a range of native shrubs in order to provide a sheltered and darkened corridor. However, the ends of the trough will remain open in order that bats have an unobstructed flight-path along the full length.**

**Reason: To ensure the integrity of a European site**

**Details of the junction to Rookery Farm from Limekiln Lane demonstrating that commuting bats would not be affected by the creation of the access shall be submitted to and approved by the Local Planning Authority prior to any hedgerow removal occurring**

**Reason: To ensure the integrity of a European site**

**The submitted 'Control of Dust Scheme' as set out in the Appendices of the Air Quality Assessment Technical Report for Proposed quarry deepening, construction of new asphalt plant and time extension Halecombe Quarry (Quarry Plan, November 2016) will be strictly applied to the permission for its duration unless otherwise modified and approved in writing by the Local Planning Authority**

**Reason: To ensure the integrity of a European site and In the interests of the ecology, residential and visual amenities of the area.**

Asham Wood Site of Special Scientific interest (SSSI) is 390 metre to south of the application and is designated for being a large and diverse ancient woodland. Asham Wood is considered within the TOLSE. Edford Wood and Meadows SSSI is located 550 metres to the north west and designated for ancient semi-natural woodland and unimproved pasture. The Ecological Impact Assessment (EclA) (Andrews Ecology, March 2017) states that Edford Woods & Meadows SSSI is not cited for any aquatic features. However, the citation states that 'The ground flora is luxuriant, very species-rich and includes a large number of species normally found only in ancient woodlands. The diversity of species is enhanced by the transition from very wet soils in the valley bottom to dry, well drained ground on the upper slopes and by a variation in soil acidity, following the change in geological strata.' The Mells Stream flows through Edford Wood, Therefore part of the site is dependent on the maintenance of the current hydrological regime. The proposed extraction will involve the removal of limestone from both above and below the water table and will require an increase in the depth of dewatering. Groundwater movement within the upper section of the limestone occurs within either the slower moving fracture system or more rapidly via conduits. Tracer testing of the conduit system has shown links between various sinkholes and spring flows in the locality, none of which is expected to pass through or beneath the Site and hence are not expected to be directly intercepted by the proposed development.

The results of assessment carried out the Hydrological & Hydrogeological Impact Assessment carried out by Tarmac (September, 2016) indicate any increased drawdown within the main fracture system, even if extending sufficient distance from the Site to intersect conduit systems, is considered unlikely to cause

significant reduction in spring flows during the most sensitive summer period, in comparison to the potential for impact relating to the already permitted depth and extent of working. The SSSI is also not linked hydrologically to the quarry.

Few detailed studies on the effects of dust deposition on ecology have been performed. Impacts on plants as a result of dust can result in both physical (i.e. blocking or damage to stomata, shading) and cumulative effects (i.e. drought stress). Chemical effects on plants or the soil are more significant, and may cause changes in soil chemistry, which in itself may result in a change in the type of plant communities present. However, the soil type surrounding a mineral site will likely reflect the mineral type being extracted and dust may therefore cause no significant effects, although designated areas with high ecological value may be more sensitive to change. Assessments of dust emissions as a result of quarrying operations in the UK have shown quarries to be an insignificant contributor to background dust concentrations (Air Quality Expert Group 2005). A study by Andrews Ecology into the potential effects of offsite limestone dust deposition at Torr Quarry in Somerset concluded that limestone dust has a negligible impact upon calcareous habitats, and this is wholly positive. Edford Woods is located to the north-west of the site, where the wind in its direction is relatively infrequent. Quarrying and associated activities in closer proximity than those currently proposed have previously been considered and approved as being acceptable. The SSSI is unlikely to experience any impact from dust emissions arising from the proposed development as a consequence of the prevailing climatic conditions, separation distance, landform screening, difference in topographic heights and the continued use of established mitigation measures and management controls. The Guidance on the Assessment of Mineral Dust Impacts for Planning published by the Institute of Air Quality Management (IAQM 2016) suggests the Zone of Influence in respect of dust and ecologically sensitive sites is a maximum 400m radius.

There are several non-designated sites of ecological importance within a 1km radius of the site boundary, in the form of Local Wildlife Sites (LWS) of which several are located close to the site, particularly Hare Warren to the east, which lies in the direction of relatively frequent winds. Again previous quarrying and associated activities have been considered and approved in the vicinity of these LWS. The LWS are unlikely to experience any additional impact from dust emissions arising from the proposed development due to the mitigating effects of the existing landform screening, difference in topographic heights and the continued use of established operational measures and management controls. The ecological report confirms that the local flora and fauna would not suffer adverse impact unless dust levels became excessive.

Halecombe Quarry has a substantial screen bank with a variety of trees and shrubs, which is over 20 metres in height in places, around the boundaries of the

site that effectively limits potential dust transmission and screens the site from view. There is an existing Dust Management Scheme in place which ensures that dust arising from operational activities is contained within the quarry site and does not create an impact beyond the site. The scheme was approved by Somerset County Council in July 2003 as a requirement of condition 20 of planning permission, reference 101393/014, and was maintained as the acceptable Dust Management Scheme in the Rookery extraction planning permission, reference 2013/1481, granted in March 2014. An updated 'Control of Dust Scheme' is set out in the Appendices of the Air Quality Assessment Technical Report for Proposed quarry deepening, construction of new asphalt plant and time extension Halecombe Quarry (Quarry Plan, November 2016) and I have recommended that this be applied through condition above in relation to the Mendip Woodlands SAC.

### Habitats and Flora

The greater proportion of the application site supports active quarry workings comprising bare earth bunds, aggregate mounds, un-seeded tip slopes and 18 structures including Rookery Farmhouse. The remainder of the site comprises a mixture of semi-natural, plantation and recently-felled coniferous woodland, scrub, scattered trees, neutral, improved and poor semi-improved grassland, tall ruderal, two lagoons, two sewage treatment tanks, the Halecombe Brook and both mature and recently-planted hedgerows. Most habitat losses will be as a result of the culverting of the Halecombe Brook, and the reinstatement of the historic access road to Rookery Farmhouse, both of which will be compensated for during the development through the creation of the green corridor, drinking pond and hedgerow planting on either side of the access road. Other losses are as a result of tipping and overburden removal during various phases. Over the phases of the proposed development habitats that would be lost include broadleaved plantation woodland (0.06ha), dense scrub (2.83ha), and hedgerow (0.18ha), none qualifying as s41 Priority Habitats. Woodland planting on the western slopes would occur in Phase 2b and on completion there will be an overall significant net gain in habitat extent for four s41 Priority Habitats, and a non-significant net gain in a further two following restoration is predicted.

The application site is subdivided by the Halecombe Brook. This arises to the south of Leigh-on-Mendip, passing through the quarry site and enters into Mells Park. The watercourse joins the main River Mells in the area upstream of the bridge at Mells Green. During summer periods flow within the upstream section of the Halecombe Brook passes into one of two sinks within the base of the watercourse. To facilitate the relocation of the asphalt plant it is proposed to culvert an additional section of the Halecombe Brook for a length of some 350m. This will link into the existing culvert as it emerges from under the screening bund on the western boundary of the Site. The culverting works will require an

application for Land Drainage Consent made to Somerset County Council. Its current importance lies in its role in supporting the movement of species across the quarry site. This is considered further in the following section on bats.

The occurrence of Ploughman's-spikenard, a Somerset Notable plant species, would be lost due to the development. However, it is listed as 'frequent' in the County by Green, Green & Crouch (1997) in 'The Atlas Flora of Somerset'. Consideration could be given to translocating specimens to a suitable habitat type within the application site.

A scheme for the restoration of the quarry is submitted with the application. This is likely to prove, once established, to be an overall gain for biodiversity. To ensure this enhancement a condition should be applied committing the applicant to the scheme as set out in the submitted Concept Restoration plan (Tarmac, dwg. H076 / 00144. March 2017). In addition an Ecological Management Plan also needs to be conditioned which covers the existing habitats for the duration of the permission and for the management of the restored site. This may be worded as follows:

**A Landscape and Ecological Management Plan (LEMP) shall be submitted to, and be approved in writing by, the local planning authority prior to Phase 2a of the permission. The content of the LEMP shall include the following.**

- a) **Description and evaluation of features to be managed.**
- b) **Ecological trends and constraints on site that might influence management.**
- c) **Aims and objectives of management.**
- d) **Appropriate management options for achieving aims and objectives.**
- e) **Prescriptions for management actions.**
- f) **Preparation of a work schedule (including an annual work plan capable of being rolled forward over a five-year period).**
- g) **Details of the body or organization responsible for implementation of the plan.**
- h) **On-going monitoring and remedial measures.**

**The LEMP shall also include details of the legal and funding mechanism(s) by which the long-term implementation of the plan will be secured by the developer with the management body(ies) responsible for its delivery. The plan shall also set out (where the results from monitoring show that conservation aims and objectives of the LEMP are not being met) how contingencies and/or remedial action will be identified, agreed and implemented so that the development still delivers**

**the fully functioning biodiversity objectives of the originally approved scheme. The approved plan will be implemented in accordance with the approved details.**

### Bats

Extraction in the Rookery area would be completed in year 2 of the development and the replacement of the asphalt plant would occur in years 6 to 8 (Phase 2B). Following the removal of the existing asphalt plant the reserves underlying the current plant site would be extracted between years 9 and 20 (Phase 2C). Extraction would then progress to the lower benches within the main quarry area during years 21 onwards (Phases 3 to 6).

The Halecombe Brook has potential as a commuting / foraging route for bats. However, it has high levels of artificial lighting in its central and eastern sections. It is proposed that this stream would be culverted between phase 2a and 2b and potentially there would be no wildlife corridor for, in theory, a period of between 1 and 14 years before the planned mitigation is implemented. Detectors deployed along Halecombe Brook recorded use by common and soprano pipistrelle commuting and feeding along the Brook; and serotine bats using the corridor to cross the quarry site. Myotis species were identified very occasionally accessing it drink from the guttered section or possibly foraging along the stream but none crossed the site. Brown long-eared, lesser horseshoe and greater horseshoe bats did not use Halecombe Brook as a commuting route but did use it access the guttered section, probably to drink, at its western end. The Brook was considered to be of high conservation value to lesser horseshoe bats due to constant usage in May and September. Loss of Halecombe Brook would therefore potentially cause loss of a commuting corridor to both pipistrelle and serotine species although all three of these species are capable of crossing open spaces for two or three hundred metres prefer to use commuting structure. In mitigation for loss of the corridor it proposed to:

1. The asphalt plant will be constructed c. 100 m to the south-east of its current location and its layout and that of the associated infrastructure and ancillary buildings will be arranged along an alignment broadly following the route of the culverted Halecombe Brook.

2. A 'green corridor' will be created by the construction of a timber acoustic fence alongside the dryer drum (to reduce any noise emanating from this source), with the back wall of the aggregate store and the feeder canopy finished in traditional profile sheeting (of a suitable colour). A post and rail fence will then be constructed on the other side to provide a walkway for pedestrians, with suitable tree planting which will continue to the west. Tree planting will also be continued on the western and southern margins of the mobile crushing plant.

3. In operation, all lighting and noise will be kept to the southern side of the plant during the hours of darkness, leaving a corridor that is darkened, quiet and sheltered right across the quarry.

4. To ensure success, methods for vegetation, structural and environmental monitoring will be set within an overarching Ecological Management Plan (see above). This will include bat surveillance in order to assess the success of this innovative proposal.

It was considered that whilst the Halecombe Brook was demonstrated not to currently act as a flight-path for greater horseshoe bats that the enhancement in the form of a sheltered unlit corridor created across the quarry could provide a net benefit for the population of greater horseshoe-bats notified within the Mells Valley SAC. Its loss has been identified in the TOLSE as not having a significant effect. Therefore I would recommend that the proposal be conditioned:

**A 'green corridor' will be created as shown in Tarmac drawing H086 'Bat Corridor' through the construction of a timber acoustic fence alongside the dryer drum (to reduce any noise emanating from this source), with the back wall of the aggregate store and the feeder canopy finished in traditional profile sheeting (of a suitable colour). A post and rail fence will then be constructed on the other side to provide a walkway for pedestrians, with suitable tree planting which will continue to the west. Tree planting will also be continued on the western and southern margins of the mobile crushing plant. This will be constructed within three months of the culvert being installed, protected from any subsequent construction activity and maintained for the duration of operations.**

**Reason: In the interests of European protected species.**

Monitoring of the corridor will be included in the Landscape and Ecological Management Plan. This will include bat surveillance in order to assess the success of this innovative proposal.

In addition, the culverting of the Halecombe Brook and the subsequent loss of a source of drinking water to several bats species will be mitigated for by the enhanced provision of a source within the Rookery Farmhouse grounds. This will replicate the existing concrete section of the Halecombe Brook currently exploited by the bats in the form of a 20m long, 5m wide, and 1m deep butyl-lined shallow trough that will be demand-fed by a piped pump from a clean water-lagoon in the quarry at one end, and feed slowly over a weir into a soakaway. This will ensure that (unlike the Halecombe Brook) the drinking water is permanent throughout the year, but still remains clean and free of vegetation. The trough will have shallow margins in order that any grounded bat can swim to the side and escape. The

northern bank will abut a shrub-vegetated screening bund, and the southern bank will be planted with a range of native shrubs in order to provide a sheltered and darkened corridor. However, the ends of the trough will remain open in order that bats have an unobstructed flight-path along the full length. In order that the water-source is available to all the bats that currently exploit the Halecombe Brook, the bund will be connected to the farmhouse, and the enhanced linear landscape elements associated with the access road, and thereon to the flight-paths on Limekiln Lane. To ensure success, methods of vegetation and aquatic habitat monitoring and management will be set out within an overarching Ecological Management Plan. Overall, the surface area of the drinking water resource will remain unchanged. However, as the Halecombe Brook typically runs dry in late summer each year, and the compensatory water-source will be permanent (i.e. year-round) there will be a significant benefit in terms of the duration the source of drinking water is available to all seven bat species concerned. This is conditioned as for the requirement for the integrity of the greater horseshoe bat feature of the Mells Valley SAC as set out above.

Rookery Farmhouse hosts colonies of lesser horseshoe and brown long-eared bats and has historically been visited by greater horseshoe bats. It is proposed to reinstate the access road to Rookery Farm.

In mitigation for the potential that the reinstatement of the historic access road to Rookery Farmhouse might result in any severance impact, and thereby an isolation effect upon the bat colonies roosting in the farmhouse roof, the road will be enhanced to provide an increased level of protection and continuity. It is proposed to plant hedgerows on both sides of the 3.5m wide road. The hedge will be composed of an even mix of native species with standard trees set every 20m. Hedgerow monitoring and management will be set out within an overarching Ecological Management Plan (conditioned as part of the requirements in the 'Test of Likely Significant Effect' above) to achieve c. 3 m height and 3 m width. Common lime standards will be pollarded to achieve 6-8 m height. This is illustrated in Figure 14 on the Ecological Impact Assessment (Andrews Ecology, 2017) shows the design of the planting on both sides of the access road. This needs to be conditioned to ensure the continued use of Rookery Farmhouse by lesser horseshoe bats:

**On completion of the access to Rookery Farm native species hedgerows incorporating standard trees every 20 metres will be planted either side of the road as illustrated in Figure 14 of the Ecological Impact Assessment as illustrated in the Figure 14 on the Ecological Impact Assessment (Andrews Ecology, 2017). Once planted it will be managed in strict accordance with the approved Ecological Management Plan.**

**Reason: In the interests of the favourable conservation status of European protected species.**

Tony Serjeant, the former County Ecologist, agreed with Andrews Ecology that the following would also need to be considered within the EclA:

1. *Assessment of whether or not there will be increased artificial lighting in the vicinity of Rookery Farmhouse, which might potentially impact upon roosting horseshoe and long-eared bats who are intolerant of artificial light.*

No lighting impact assessment was carried out by the applicant (save for lux sampling in respect of bat habitat along Halecombe Brook by Andrews Ecology). Large halogen security lights are typically in operation even when the site is closed, and these result in a lux of 5.4 over the western of the two road bridges for a distance of c.50m and render the eastern end of Halecombe Brook unsuitable for light sensitive bat species. This is borne out in the results of survey by static bat detectors as described above. Currently this does not affect the use of Rookery Farmhouse by roosting lesser horseshoe and brown long-eared bats. Nonetheless, an unpublished paper (Andrews, Taton & Latham. 2011. A comparison of the spatial range of three bat detectors) includes a plan of the flight route of lesser horseshoe and brown long-eared bat exiting from Rookery Farmhouse where they pass through light spill from the east on the vegetated bund used as flight structure for about 20 metres. However, the re-location of the new asphalt plant, south of the bat corridor, and its associated lorry access roads and parking would be within 100 metres of the Farmhouse. Presumably this area would be lit for security and operational reasons and affect the area towards the Farm. Nonetheless, light spill is likely to be contained by the topography, vegetation and walling between the source and farmhouse although in my opinion is not entirely certain. The applicant notes that '*Comment was made on the visibility of lighting at night from outside the quarry. Individual lights were not visible but it was suggested that there was a general "glow" above the site. Prior to operating the new asphalt plant a scheme of lighting would be provided for approval by Somerset with the intention to minimise night time "glow".*' Given this I would recommend that the following be conditioned:

**Prior to occupation, a "lighting design for bats" for shall be submitted to and approved in writing by the local planning authority. The strategy shall:**

**a) identify those areas/features on site that are particularly sensitive for bats and that are likely to cause disturbance in or around their breeding sites and resting places or along important routes used to access key areas of their territory, for example, for foraging; and**

**b) show how and where external lighting will be installed (including the provision technical specifications) so that it can be clearly demonstrated that areas to be lit will not disturb or prevent the above species using their territory or having access to their breeding sites and resting places.**

**All external lighting shall be installed in accordance with the specifications and locations set out in the design, and these shall be maintained thereafter in accordance with the design. Under no circumstances should any other external lighting be installed without prior consent from the local planning authority.**

**Reason: Reason: In the interests of the favourable conservation status of European protected species**

*2. Assessment of whether or not there will be any atmospheric discharge from the new asphalt plant such as fumes or steam that will blow across to Rookery Farmhouse or the commuting route, which might potentially impact upon commuting horseshoe and long-eared bats, who fly at low-levels, hugging linear vegetation when they travel between their roosts and hunting grounds.*

The replacement asphalt plant is located south of the proposed bat corridor following the route of the Halecombe Brook is sheltered for most part by buildings and vegetation but exposed at the access roads. Dust deposition may affect the quality of habitat and hence its ability to support species preyed upon by bats. No foraging activity for either brown long-eared bats or lesser horseshoe bats were recorded along the Brook. Lesser horseshoe bats however, were thought to obtain drinking water from this source which would be lost through culverting but this is mitigated by provision elsewhere. The proposed asphalt plant would need to operate under a permit and the accepted dust management scheme in the Rookery extraction planning permission, reference 2013/1481, granted in March 2014 which I have recommended above be also conditioned for this application if approved.

*3. Assessment of the noise impacts resulting from the new asphalt plant such as continuous noise, sudden hisses as pressure is released and vibration, which might potentially impact upon roosting horseshoe bats who are acutely noise sensitive.*

Currently there is some blasting to the east of the Rookery Farmhouse. This will cease but the proposed asphalt plant would be located within 100 metres to the north of the roost. I disagree that horseshoe bats are acutely noise sensitive whilst roosting. Human presence is far more likely to result in disturbance. For example both lesser and greater horseshoe bats roost near the entrance to the public caves at Wookey Hole and are subject to loud music and commentary

played for the benefit of visitors to the attraction. Nor are they particularly sensitive to vibration as has been shown in quarrying operations in at Whitecleeve in Devon. Pups that have fallen from their roost due to vibrations are recovered by their mothers from the floor and taken back to their resting places. The Ecological Impact Assessment considered that the proposed noise levels would not increase over those currently experienced in the quarry. Noise levels for the existing and proposed asphalt plant is given in the noise assessment are not high at just over 50dB at 100 metres. Therefore along with the topography it is provisionally considered that roosting bats would be no more affected than from existing noise events within the house. An review by Mike Highfield, the County's acoustics specialist may confirm the applicant's assessment.

### Badgers

A survey for badgers was carried out by Andrews Ecology in February 2016 which recorded five badger setts within the Application Site and within 20 m of the boundary comprising one well-used main sett (c. 20 m to the south of the Application Site boundary), one well-used annex sett (c. 11 m to the south of the Application Site boundary), one well-used subsidiary sett and two well-used outlier setts, as well as a large badger latrine and path. The Ecological Impact Assessment concluded that, 'No badger setts will be destroyed as a result of the development. Furthermore, there are no grounds to predict that any badger sett will be damaged, nor any badger(s) disturbed as a result of the proposed development.' I agree with this conclusion.

### Birds

A survey of the Halecombe Brook was performed by Andrews Ecology in June 2016 concluded that the stream banks of the brook did not hold any suitable nesting habitat for kingfisher and none of the vegetation held any evidence to suggest the presence of any nesting bird species at that time. Although it is unlikely that the proposed quarry works are likely to affect nesting birds the creation of an access road from Limekiln Lane to Rookery Farm is likely to remove hedgerow, and judging from aerial photographs trees. I would therefore recommend that the following is conditioned. This then will also cover any incidental removal of vegetation within the quarry itself.

**No removal of hedgerows, trees or shrubs shall take place between 1st March and 31st August inclusive, unless a competent ecologist has undertaken a careful, detailed check of vegetation for active birds' nests immediately before the vegetation is cleared and provided written confirmation that no birds will be harmed and/or that there are appropriate measures in place to protect nesting bird interest on site. Any such written confirmation should be submitted to the local planning authority.**

### **Reason: In the interest of nesting wild birds**

Provided the above recommendations for conditions are applied I have no objection to the application.

#### **9.11 Conservation**

##### **No objection: Comments**

As requested in our comments on this scheme in 2015 the blasting report, part of the EIA, considers the impact on local historic structures, particularly on Rookery Farmhouse located within the quarry. This report does not refer to Grade II listed Registered Mells Park boundary walls along the west boundary of the Quarry close to the blasting site. However this wall is no longer a concern due to its distance from the blasting site and the fact that it has since been repaired.

Given that there is a deepening of the existing excavation area and the planning conditions regarding blasting issued in 2014 remain in force we note the report's conclusion that the intervening distances between Rookery Farm and the proposed quarry development are more than adequate to allow keeping the environmental impacts within agreed guidance levels.

The assessment of landscape and historic setting for Rookery Farm establishes that the restoration work to the farmhouse and the immediate curtilage including formal gardens are nearing completion. A viewing of the interior of the restored Rookery Farm House during the site visit confirmed that the interior plasterwork is stable.

We support the re-instatement of the track along the lines of the historic track shown on the First Edition and later OS maps and agree that re-connecting the buildings with Limekiln Lane and the wider landscape independent from the quarry's operation to be beneficial to its setting.

The increased height and re-location of the Asphalt Plant close to the farm will dominate and dwarf the listed buildings during the extended operational period. The asphalt tower will be ca 25 meters higher than the ridge of Rookery farm according to the figures in the provided drawings. It would be helpful if the elevation drawing was amended to include the south side of the quarry including Rookery Farm. Nevertheless, this negative impact is temporary, a matter of degree and compatible with the use of Rookery Farm as quarry offices for this period. The long-term outlook for the listed building is positive.

The Landscape and Visual Impact Assessment considers in detail the impacts on the wider surroundings including Mells Park, adjacent to the application site. The park is generally well screened by the belt of mature trees and internal woodland which the site visit confirmed. The proposal does not affect Park House or its

immediate curtilage. We concur with the assessment that the visual impact of the re-sited and higher Asphalt plant is higher compared to the present impact and due to the height increase the geographical impact area is somewhat enlarged but it is not new and only moderately increases the present effect of the quarries operation.

A note on the Plant Elevation drawing states that the colour scheme for the new asphalt plant is to be agreed with Somerset. We consider the colour of the existing plant to effectively mitigate impact and recommend matching this colour for the new plant.

## 9.12 Transport Development

### **No objection subject to Conditions**

The development proposal appears to be a continuation of the existing activities on the site for a further 23 years, with no change in HGV movement in terms of additional trips generated on a daily / weekly basis . The planning application was supported by a Transport Statement (The Hurlstone partnership October 2016) which sets out the highway and transportation aspects of the proposal. The document has been reviewed and both the methodology and the conclusions are acceptable by the highway authority in terms of traffic movement and trip generation.

The proposal also includes the introduction of an access point along Limekiln Lane. It would appear that this is an historic access that has been abandoned over the last few years. Figure 1 Access Details shows that the new access will provide over 2.4m x 90m of visibility in either direction. Limekiln Lane is a classified un-numbered road that is subject to the national speed limit (60mph) and on reviewing the recorded PIA's (Personal Injury Accidents) there appear to be none within 500m of the proposed access. Due to the alignment and geometry of Limekiln Lane in all probability the 85%ile of vehicle speeds will be less than 60mph and therefore the proposed visibility splays as shown on Figure 1 Access Details Lime Kiln Lane showing visibility splays over 90m in either direction is deemed to be acceptable. This new access will be for the sole use of those using the sites offices and will only be used by cars, light vehicles and only HGV's servicing the office. It will not be used for HGV quarry traffic. Such movement as proposed is acceptable.

The submitted plan Figure 1 Access Details Lime Kiln Lane details the proposed access which cuts across a wide highway verge. The access in terms of width and kerb radii is acceptable. However, the applicant should be made aware that a highway licence / agreement will be required to undertake the works on the

highway. No gates are shown on the submitted plan but any gates erected shall be hung to open away from the highway and set back a minimum of 10m.

Therefore, in conclusion there are no highway objections to the proposal subject to the following conditions being attached to any permission granted.

1. The proposed access shall be constructed in accordance with details shown on the submitted plan, Figure 1 Access Details Lime Kiln Lane. Once constructed the access shall be maintained thereafter in that condition at all times.
2. Any entrance gates erected shall be hung to open inwards, shall be set back a minimum distance of 10metres from the carriageway edge and shall thereafter be maintained in that condition at all times.
3. The gradient of the access way shall not at any point be steeper than 1 in 10 for a distance of 10 metres from its junction with the public highway. This part of the access shall be maintained at that gradient thereafter at all times.
4. Provision shall be made within the site for the disposal of surface water so as to prevent its discharge onto the highway, details of which shall have been submitted to and approved in writing by the Local Planning Authority. Such provision shall be installed before (trigger point) and thereafter maintained at all times.
5. The proposed access over at least the first 10metres of its length, as measured from the edge of the adjoining carriageway, shall be properly consolidated and surfaced (not loose stone or gravel) in accordance with details which shall have been submitted to and approved in writing by the Local Planning Authority. Once constructed the access shall thereafter be maintained in that condition at all times.
6. At the proposed access there shall be no obstruction to visibility greater than 600millimetres above adjoining road level within the visibility splays shown on the submitted plan. Figure 1 Access Details Lime Kiln Lane Such visibility splays shall be constructed prior to the commencement of the development hereby permitted and shall thereafter be maintained at all times.

**Note:**

Having regards to the powers of the Highway Authority under the Highways Act 1980 the applicant is advised that the creation of the new access will require a Section 184 Permit. This must be obtained from the Highway Service Manager for the Mendip Area at The Highways Depot, Glastonbury, Tel No 0845 345 9155. Application for such a permit should be made at least four weeks before access works are intended to commence.

## 9.13 Scientific Services (Noise)

### No objection subject to Conditions

#### 1 Introduction

Request was made on 13/3/17 to consider the noise and vibration impact associated with an application to deepen Halecombe Quarry by the extraction of limestone, with replacement of existing asphalt plant with a new asphalt plant and associated facilities and the retention of the concrete batching plant. The application also included the reopening of an access road to Rookery Farm and the extension of the end date for the entire quarry to 31 December 2044 with restoration to be completed by December 2046.

Earlier advice has been provided to Laura Horner on 18/6/15 in response to an EIA scoping request. This prompted telephone discussions with Paul Cockcroft of WBM on 2/9/15 who has provided a report to support this application.

The proposed impacts of the site are assessed against current advice within NPPF1, its associated PPGN2 and NPSE3 and will include the consideration of the following aspects:

- whether or not a significant adverse effect is occurring or likely to occur;
- whether or not an adverse effect is occurring or likely to occur and
- whether or not a good standard of amenity can be achieved.

#### 2 Summary of findings

The application and supporting documents would in my view indicate that there would be no justification to object to the proposal on the grounds of unacceptable noise or vibration impact. This view recognises the potential to slightly exceed the current night-time noise limit at Knapp Hill Farm and the Traveller Encampment during a 6-month period when new asphalt plant is expected to undergo commissioning prior to the shutdown of existing plant.

In my view there are a number of minor points that may need further clarification so as to fully understand the quarry development and these include the apparent appearance of fixed RAP processing plant and some uncertainty in the location of processing plant during phase 6 final working.

I have proposed wording to several noise and vibration conditions.

#### 3 General Details

The Non-Technical Summary indicates that the applicant seeks to extend the operational end date for extraction from 2021 to 2044 but that there are no proposals to alter working methods or time periods of operations. The operator

seeks to increase the permitted depth of working by 60m. The present working depth of 68m AOD will reduce to a depth similar to that at Whatley and Torr and plans appear to indicate a sump base at 4m AOD. It is described that this intension may change (see 7.4 NTS) if significant groundwater seepages are encountered during development as these will dictate review of the proposed design/dewatering options. From my recollection there was similar consideration with the workings of the Whatley Quarry with additional consideration of any effect on the Bath Springs.

The specialist reports supporting this application include Blasting Vibration by Rocblast, Noise by WBM and transport by The Hurlstone Partnership. The NTS summarised the investigation of blasting and concluded that the current Somerset vibration limit can be met throughout the working area. In my view it may however have wrongly indicated that minimal adverse comment would arise if blast vibration was to approach a 9mm/s ppv limit. The predicted noise levels arising from development indicate compliance with existing planning limits at all of the assessment locations, for daytime and night-time periods. There is potentially one 6 month exception when the new asphalt plant is commissioned and may marginally exceed the night-time limit at Knapp Hill Farm and the traveller encampment. Any temporary operations would also fall below the NPPF upper limit.

The HGV traffic movements to/from Halecombe Quarry are unlikely to change significantly from those currently permitted. The Hurlstone report suggests traffic predominantly arises during Monday to Friday and Saturday mornings but that the night-time provision of surfacing materials for road maintenance may also arise. The Hurlstone report suggests daily HGV movements may total 274 vehicles and that the majority will use the Bulls Green Link Road. At present the most significant traffic noise impact is to those occupying the traveller encampment however, it would seem logical to assume these impacts must have been acceptable to those occupying this area. The proposed creation of a new access slightly west of the historic driveway to Rookery Farm would provide a second access to the refurbished office space and a meeting room and therefore likely to lead to a slight reduction in light traffic impacts at the travellers encampment. I note that the NTS identified (3.2.3) that deviation from intended HGV routing might be a cause of unexpected noise impacts as identified at public meetings. The operator proposes that this can be addressed in the new legal agreement and by the effective enforcement of a driver routing protocol. The Draft Heads of Terms item 11 provides detail of the protocol.

#### **4 Description of phased extraction and plant location**

Phase 1 will start the dismantling of the non-operating primary crusher and concrete works and commence with working of eastern benches. Mobile

processing plant will be located at ~98m AOD in western area with face operations eventually at 85m AOD and the extraction of the Rookery Farm void will be completed. As such processing operations will be better screened than during earlier quarry operations with the upper western and southern ridge height of 182-184m AOD and northern and eastern ridge height of 178-170m AOD indicating at least 70m of barrier screening for mobile plant.

During the 3 years of Phase 2A the old concrete plant and crusher footing will be removed as extraction descends to 85m AOD. During the 3 years of Phase 2B the new asphalt plant will be installed and commissioned and the weigh bridge relocated. The mobile processing plant relocates from a northern location to an eastern location at ~86m AOD and quarry development progresses towards the south and east with a final depth of 70m AOD. Phase 2C will last 14 years and will complete the extraction of the 8Mt reserve released by the removal of old processing plant.

Phase 3 lasts 2 years and indicates mobile plant to be at 70m AOD with final base working at 55m AOD. The plant moves to the eastern area at Phase 4 that lasts 3 years and indicates mobile plant to be at 58m AOD with base working to 40m AOD. Phase 5 lasts 3 years and reduces plant height to 40m AOD with base working reducing to 25m AOD. Phase 6 lasts 2 years and reduces plant height to 16m AOD with base working reducing to 10m AOD with sumps reduced to 4m AOD. I note in the WBM noise report (6.2 para 4) that processing plant is described as being located at 160m AOD and to the west of the new asphalt plant.

## **5 Consideration of Noise**

The noise report by WBM provides details of an evening assessment of site noise levels (September 2015) and confirms the compliance of operations at that time with planning conditions. The noise emissions for the new asphalt plant in a new location have been based on (one assumes) equivalent plant that has been assessed elsewhere and found to result in a noise level of 52dB(A) at 100m. While the details of the new plant are not described it is shown in plans to be fully enclosed within a building with a height of 37m and stack height of 39m. In my view it would seem not unreasonable to accept that the newer plant could operate at noise levels 5dB lower than the noise emissions of the older, more exposed existing plant.

The modelling of noise from the new asphalt plant has assumed five point sources of noise at various heights (40m,40m,28m,16m,4m) each with a sound power of 93dB(A). This will provide the same overall sound power as that determined from a measurement by WBM of existing similar plant elsewhere and would improve the consideration of noise beyond the quarry boundary.

The noise predictions do not discuss nor consider the noise that might be associated with Recycled Asphalt Planing (RAP) Plant and I am uncertain if this forms a significant component of daytime or even night-time noise. The plant associated with RAP is not described in the text of the Environmental Statement (ES 1 vol 2) or the Planning Statement but it would appear on Phase 2c plans as fixed plant located near to the sewage works. Earlier phasing shows a similar process label, but no fixed plant associated with it. Description of the Asphalt plant indicate that it can double the use of recycled planings and as such the appearance of fixed plant may be to accommodate the increased processing of RAP prior to its use within the new asphalt plant. As such this may form a new noise source when the new plant becomes operational and this might require some further clarification by the operator.

The noise predictions would suggest compliance with existing day and night noise limits in all instances except during the 6 month commissioning period of the new asphalt plant. At this time both asphalt plants may run and the consequence is therefore predicted to exceed the night-time limit at Knapp Hill Farm and the traveller encampment. At other times the new asphalt plant would not be expected to exceed the 35dB(A) planning limit. In reality the presence of typical prevailing winds from the southwestern quadrant would be expected to minimise the occasions of these exceedances.

The WBM report indicates that there will be over-tipping on several existing boundary tips, including a western screen bund, an area to the south of Rookery Farm and in an area to the east near to the traveller encampment. The western tip will be constructed in a single campaign over an 8 week period. In all cases except the traveller encampment, temporary bouts of noise remain at, or below 55dB(A) and well within the PPGN limits of 70dB(A). The worst case instance of noise is at the south-eastern tip and the impact on the traveller encampment may then reach 69dB(A).

## **6 Consideration of Blasting**

The report prepared by Rocblast (May 2016) indicates the closest property to blasting will be Green Gables (Green Shutters) at 180m and other properties are considerably further from blasting. Consideration is not given to the traveller encampment, but in my view this would not appear necessary based on the blast design restrictions that would be applied to protect Rookery Farm and the existence of planning limits on vibration at the encampment.

The report presents a regression curve based on blast measurement data assessed during 2014-2016 at the quarry. This plot provides a 95% confidence line that would predict scaled distances of  $>21\text{m/kg}^{1/2}$  and  $>12\text{m/kg}^{1/2}$  to ensure the corresponding to PPV limits of 9mm/s and 15mm/s respectively are not

exceeded. The report does not describe the details of existing blast design applied to the face heights proposed in new workings but indicates that the operator will not face difficulty in design. The report suggests a requirement to reduce explosive MIC to approximately 73kg when close to Green Shutters. At closest working to the village (310m) I calculate the acceptable MIC could rise to 218kg.

In my view the previous success of blast designs to meet a 9mm/s limit (as confirmed by the data used for the regression curve with highest vibration level of 8.5mm/s) would support the view that continued working would be possible within the design limits of 9mm/s ppv to 95% confidence.

## **7 Conclusions**

It would appear that WBM noise predictions are detailed and include the primary noise sources expected for this operation. I am uncertain about the presence of, what appears to be, RAP plant however, I would not anticipate that any processing plant would make a significant contribution to overall noise from the site.

The effect of this proposal on surrounding residential development would in my view be unlikely to exceed that of earlier bouts of quarrying provided similar planning conditions are in place. Prediction of the noise arising under these restrictions would in my view fall into the NPPF description that 'Noise can be heard, but does not cause any change in behaviour or attitude. Can slightly affect the acoustic character of the area but not such that there is a perceived change in the quality of life'. As such PPGN would indicate 'No specific measures required'. As such I would not consider there grounds for planning refusal.

The operator's intension would appear to be, to adopt existing planning conditions and these noise limits are within the range appropriate under the NPPF. Guidance would suggest that the temporary operations that may be undertaken, and that result in impacts well below the permitted 70dB(A), could extend beyond an 8 week annual restriction with the prior agreement of the planning authority.

The NPPF provides no planning guidance on blasting impacts. In my view the vibration impacts of the development can be contained and regulated by revised blasting conditions and a requirement to develop a traceable blast design curve. The progressive input of actual blast measurements combined with blast designs made to a 95% confidence of not exceeding a 9mm/s ppv limit will safeguard all residential locations. Although not discussed by the report prepared by Rocblast, it would appear from previous operations that such a limit would not put an unreasonable restriction on blast design.

Air over-pressure has become less of an impact with improvements in blast design. The complexities in determining its magnitude, and the effects weather might have on determining where these levels will appear greatest, make monitoring difficult. Portable vibration monitors can generally measure peak air over-pressure however, the requirements to monitor vibration at the foundations of the nearest dwelling will mean AOP results can be influenced by reflected sound and may not be at the location of greatest AOP.

Recognising these difficulties SCC has generally required that operators adopt good blast design and best current practice in minimising AOP. All aspects of the blast design are recorded and a planning condition can therefore allow retrospective examination of records during the investigation of any AOP triggered complaints. Additionally the presence of high AOP is an indication of inefficient blasting and this financial incentive provides further confidence that the operators would desire to minimise AOP where possible.

## **8 Recommendations**

The 2002 planning consent (101393/014) covering the application area and the 2014 Rookery Farm consent (2013/1481) include conditions that can be adapted to suit this application and I therefore propose the following:

### **Time Restriction**

There shall be no crushing, drilling, screening, face working or face loading operations except between the following times:

- 06:00-20:00 Monday to Friday
- 06:00-12:00 Saturday

Operations classified as temporary (bund formation, tipping, surface stripping and restoration) are permitted between the times:

- 09:00-17:00 Monday to Friday excluding Bank Holidays

The listed operations shall not take place on Sundays, Bank Holidays or National Holidays Reason: To protect the amenity of local residents and minimise noise disturbance to the surrounding area

### **Control of Blasting Times**

Other than in emergencies, no blasting shall take place except between the following times:

- 13:00 – 14:00 hours and 16:00 – 17:00 Monday to Friday

There shall be no blasting on Saturdays, Sundays, Bank Holidays or Public Holidays. The operator shall inform the Minerals Planning Authority within two working days if blasting was required to take place outside these times.

Reason: In the interests of the residential amenities of the locality.

### **Control of Blasting Impact**

No blasting shall take place unless it has been designed in accordance with an agreed Scheme of Blast Monitoring & Design at Halecombe Quarry that ensures a 95% confidence of not exceeding the peak particle vibration limits of:

- 9mm/s at the foundation of any temporary or permanent dwelling not in the ownership of the operator; and,
- 15mm/s at the foundation of Rookery Farmhouse.

The operator within 6 months shall submit and obtain planning authority agreement on a 'Scheme of Blast Monitoring & Design at Halecombe Quarry'. This shall specify the details of:

- the blast design process using the blast regression curve detailed in the report provided by Rocblast dated May 2016;
- the procedure to maintain and provide blast design records to the planning authority upon request;
- the review and update process to be applied to the blast design curve throughout quarry development;
- the procedures to be adopted to minimise air over-pressure impacts;
- the procedure to investigate vibration and address blast related complaints;
- the equipment used and procedure to monitor every blast event in at least two locations. These locations in the first instance will be selected from the purpose made monitoring locations at either Leigh-on-Mendip First School, Green Shutters or Rookery Farm but may also include any residential location under investigation;
- the procedure to inform the planning authority on occasions when vibration limits are exceeded.

Reason: In the interests of confirming appropriate blast design to safeguard residential amenities and to protect the historic features of the Listed Rookery Farm and Mells Park walls.

### **Reduction of Noise from Mobile Plant**

All mobile plant used in association with the development hereby permitted shall be effectively silenced to manufacturer's specifications and all noise control

measures shall be maintained to their design specification for the duration of the development hereby permitted.

All mobile plant used in association with the development shall adopt broadband reverse warning alarms or adopt other visual warning devices.

Reason: In the interests of the residential amenities of the area.

### **Control of Noise from Extraction or Processing**

Noise from operations associated with the development when expressed as a free-field Leq(1 hour) shall not combine with noise associated with other permitted activities within the Halecombe Quarry site to exceed the following specified levels at the following locations:

During the daytime hours of 06:00-20:00

- 45dB(A) at Bellfields or The Old Vicarage;
- 46dB(A) at Knapp Hill Farm;
- 48dB(A) at Green Shutters or Soho Cottage;
- 50dB(A) at the Traveller encampment at Park Corner.

During the evening, night-time hours of 20:00-06:00

- 35dB(A) at all of the above locations

Reason: In the interests of the residential amenities of the area.

### **Control of Noise from Temporary Operations**

The MPA shall be informed 2 working days prior to the intention to undertake temporary operations as defined within Technical Guidance to the NPPF (31). The total duration of temporary operations shall be recorded by the operator and shall not accumulate to exceed a total of 8 weeks in any one calendar year unless prior agreement has been provided by the planning authority. Temporary operations shall not exceed a free-field Leq(1 hour) noise level of 70dB(A) at any residential location.

Reason: In the interests of the residential amenities of the area.

### **Response to Noise and Vibration Complaints**

The operator shall adopt measures to:

- Record the full details of any noise complaints arising from activities in the permitted site and the outcome of investigations and any implementation of any preventative measures when found necessary;

- Undertake noise monitoring sufficient to demonstrate compliance with planning limits upon request by the Minerals Planning Authority, or when complaint investigation indicates noise may be at, or above planning limits; and,
- Maintain the records of noise complaints for at least a period of 12 months and provide access to such records within 2 working days of a request from the Minerals Planning Authority.

Reason: In the interests of the residential amenities of the area.

## 9.14 Planning Policy

### No objection: Comments

#### SUMMARY

The application is for the deepening of Halecombe Quarry along with the replacement of the asphalt plant, reopening of the Rookery Farm access and the extension of the end date for limestone extraction. The following comments highlight relevant national policy and guidance, the local planning policy position and brief concluding remarks from the planning policy team.

#### NATIONAL POLICY AND GUIDANCE

Relevant paragraphs from the revised National Planning Policy Framework (NPPF) include (but are not limited to):

- Paragraph 11, which sets out how plans and decisions should apply a presumption in favour of sustainable development
- Paragraph 205, which includes the statements that:
  - When determining planning applications, great weight should be attributed to the benefits of mineral extraction, including to the economy;
  - Mineral Planning Authorities should ensure that there are no unacceptable adverse impacts on the natural and historic environment, human health or aviation safety, and take into account the cumulative effect of multiple impacts from individual sites and/or from a number of sites in a locality.
- Paragraph 207, which states that Minerals Planning Authorities should plan for a steady and adequate supply of aggregates by:
  - ensuring that large landbanks bound up in very few sites do not stifle competition; and using landbanks of aggregate minerals reserves principally as an indicator of the security of aggregate minerals supply.

- Paragraph 208, which states that Mineral Planning Authorities should plan for a steady and adequate supply of aggregates (including via the maintenance of landbanks).

The Planning Practice Guidance, with regards to aggregate landbanks, states that:

- Aggregate landbanks are an essential component of planning decision-making;
- they are the basis on which the level of provision of new areas for aggregate extraction should be calculated when preparing local mineral plans;
- they are an important means of assessing when a mineral planning authority should review the current provision of aggregates in its area; and consider whether to conduct a review of allocation of sites in its local minerals plan; and
- for decision-making, low landbanks may be an indicator that suitable applications should be permitted as a matter of importance to ensure the steady and adequate supply of aggregates.

#### LOCAL PLANNING POLICY

Policy SMP3 of the Somerset Minerals Plan (adopted February 2015) states that: “Planning permission for the extraction of crushed rock will be granted subject to the application demonstrating that:

- a) the proposal will deliver clear economic and other benefits to the local and/or wider communities; and
- b) the proposal includes measures to mitigate to acceptable levels adverse impacts on the environment and local communities.

National policy and guidance do not specify that a large landbank should be a reason to refuse planning permission. The Planning Practice Guidance describes the role of the landbank in forward planning as being for: evidence in preparing Mineral Plans; reviewing the current provision and whether to allocate new sites; and in areas with low landbanks, may indicate that suitable applications should be permitted.

#### **Concluding remarks**

The principle of deepening the quarry, to enable the existing resource to be extracted, is acceptable from a policy perspective - if supported by adequate justification on the benefits of the proposal and evidence that adverse impacts will be appropriately mitigated.

It is also noted that, the applicant's proposals would support the maintenance of Somerset's crushed rock landbank. Data for the latest Local Aggregate Assessment (2016) has shown that sales of crushed rock have exceeded the sub-regional apportionment figure for the first time. Demand for crushed rock continues to increase, with Somerset continuing to be the biggest supplier in the south of England.

## 9.15 **Lead Local Flood (LLFA) Authority**

**No objection.**

### 9.15.1 Air Pollution

#### **No Objection: Comment**

I have now viewed and considered the supporting documents relating to this application, the dust mitigation scheme in particular, and have no objections.

## 9.16 **Public Consultation**

9.16.1 The following representations have been received in respect of the proposal:

Whitehole Springs **Objects** on the following grounds:

- Lowering of the water table by quarrying operations will cause the spring to dry up and result in losing the bottling plant business.

9.16.2 One other representation raised concerns in respect of limestone dust from the quarry contaminating the River Mells; and dust being deposited on the Mells Park Estate.

#### Regulation 25 Responses

9.16.3 The Solicitor acting on behalf of the owners of Whitehole Springs **objects** to the proposal on the following grounds:

- The springs called Whitehole Spring and T2 as well as other springs have completely dried up over the past months
- Quarrying activities at Halecombe have in the past affected the water table and the springs significantly and the fact that there are many springs now drying up further provides evidence of this fact
- There is enormous environmental impact caused by the quarry as it is, never mind the quarry deepening further

- It has severely disrupted Whitehole Farm's commercial interest in the bottling of spring water
- It is causing severe environmental harm to the streams and rivers in the area and to the whole ecology of the valley.
- Terms of the existing section 106 agreement are not being adhered to.

9.16.4 The Mells Estate has raised the following concerns:

- water quality of the stream running from the quarry down Finger Valley through the Mells Park Estate - would be better if the water ran continuously rather than stop and start.
- improvements are required as the stream often runs white with the limestone dust.
- the road, trees and bushes to the East of the quarry entrance are covered in limestone dust - again highlighting that further dust suppression measures are required.

## **10 Comments of the Strategic Commissioning Manager:**

10.1 This application relates to the deepening of the extraction area, replacing the asphalt plant, associated facilities, retention of the concrete batching plant, re-opening of road access to Rookery Farm and extending the end date of quarrying to 31<sup>st</sup> December 2044 and requiring restoration by 31<sup>st</sup> December 2046 at Halecombe Quarry.

### **10.2 The Development Plan**

10.2.1 Regard is to be had to the development plan for the purpose of this determination, which must be made in accordance with the plan unless material considerations indicate otherwise. Relevant policies may be found in the Somerset Mineral Plan (SMP), adopted February 2015 and the Mendip District Local Plan 2006-2029 (MDLP), adopted December 2014. Also taken into account is the National Planning Policy Framework (NPPF), published in July 2018.

### **10.3 Need/Principle of the Development**

10.3.1 Halecombe Quarry is identified in the adopted Somerset Minerals Plan (SMP) as an active aggregate site. The application does not involve any lateral extension to the site and therefore the boundaries of the site will remain unchanged. The existing land-use is therefore established and whilst the proposals involve extending the life of the quarry, there would be no change to quarry activities, quarry output or working hours. The proposed depth increase

would provide an additional 10 million tonnes (mt) of limestone. The total amount of reserves at Halecombe Quarry would therefore be increased to 16.5 mt, sufficient for 24 years of production at a rate of 700,000 tonnes per year. No further deepening of the quarry would be possible thereafter as there is insufficient space to widen the excavation.

10.3.2 Paragraph 205 of the NPPF states:

*“When determining planning applications, great weight should be given to the benefits of mineral extraction, including to the economy”.*

10.3.3 The NPPF, at Paragraph 207, also requires that minerals planning authorities should plan for a steady and adequate supply of aggregates by (amongst other things):

*“f) maintaining landbanks of at least 7 years for sand and gravel and at least 10 years for crushed rock, whilst ensuring that the capacity of operations to supply a wide range of materials is not compromised”*

10.3.4 SMP Policy SMP2: Crushed rock supply and landbank states that:

*The Mineral Planning Authority will make provision for a rolling 15 year landbank of permitted reserves of both Carboniferous Limestone and Silurian Andesite throughout the Plan Period based on the findings of the Local Aggregate Assessment.*

10.3.5 The permitted reserves of crushed rock in Somerset at the end of 2016 were approximately 377 mt. The annual figure for sales of crushed rock derived from the South West Aggregate Working Party (SWAWP) Annual Report 2016, based on the 10 year rolling average (covering the period 2007- 2016), is 11.02 mt per year. The 10 year sales average is considered to remain the most appropriate figure to use when calculating the level of provision.

10.3.6 The landbank derived from this level of provision is approximately 34 years, which is in excess of that needed to comply with national policy and local policy.

10.3.7 Somerset has substantial reserves of crushed rock distributed unevenly across a number of quarry sites. At present, Halecombe Quarry has only one year of accessible reserves left. The proposal will result in an additional 10mt of aggregate, which would represent a modest increase in the overall permitted reserves in the County. The landbank (based on 2016 figures)

would be increased by about 1 year. It is considered that this level of provision would not be in conflict with policy SMP2.

10.3.8 Policy SMP3: Proposals for the extraction of crushed rock requires that:

*Planning permission for the extraction of crushed rock will be granted subject to the application demonstrating that:*

- a) the proposal will deliver clear economic and other benefits to the local and/or wider communities; and*
- b) the proposal includes measures to mitigate to acceptable levels adverse impacts on the environment and local communities.*

10.3.9 The existing quarry is a significant employer and makes a substantial financial contribution to the economy. The quarry also provides an essential supply of crushed rock, asphalt and previously ready mixed concrete to the wider community.

10.3.10 Halecombe Quarry also brings a significant financial benefit to the economy through salaries, taxes, business rates, purchases and payments to key suppliers. According to the Applicant, over the last five years, the quarry has contributed almost £30 million to the economy, with over £10 million of this expenditure being made locally.

10.3.11 The Quarry employs 25 people directly and 35 people are indirectly employed.

10.3.12 The proposed development has been subject to an Environmental Impact Assessment (EIA) in accordance with the Town and Country Planning (Environmental Impact Assessment) Regulations 2017 to determine potential impacts. With the adoption of the proposed mitigation measures (as set out in the following Sections) it is concluded that the development would not result in any significant adverse impacts on the environment or local communities.

10.3.13 It is therefore considered that the proposal would comply with the requirements of SMP Policy SMP3.

#### 10.4 **Hydrology and Hydrogeology (the Water Regime)**

10.4.1 The relevant policies in respect of water resources are SMP Policy DM4: Water Resources and Flood Risk; SMP Policy DM5: Mineral extraction below the water table; and MDLP Policy DP8: Environmental Protection.

10.4.2 SMP Policy DM4 states:

*Planning permission for mineral development will be granted subject to the application demonstrating that the proposed development will not have an unacceptable adverse impact on:*

- a) *the future use of the water resource, including:*
  - i. *the integrity and function of the land drainage and water level management systems;*
  - ii. *the quality of any ground or surface water resource, where the risk of pollution and/or adverse impact on the resource would be unacceptable;*
- b) *the environmental value and visual amenity of the water resource; and*
- c) *drainage and flood risk to people, property or business.*

#### 10.4.3 SMP Policy DM5 states:

*Proposals for mineral extraction from below the water table will only be permitted if:*

- a) *they do not generate unacceptable adverse impacts on the water environment or other water interests;*
- b) *monitoring will ensure early warning is given of any potentially unacceptable adverse impact and the applicant will be responsible for taking the necessary remedial action before the effects of the adverse impact become irreversible;*
- c) *water abstraction and mitigation measures do not give rise to unacceptable environmental impacts.*

#### 10.4.4 In addition, NPPF paragraph 170 states that planning policies and decisions should contribute to and enhance the natural and local environment by (amongst other things):

*“preventing new and existing development from contributing to, being put at unacceptable risk from, or being adversely affected by, unacceptable levels of soil, air, water or noise pollution or land instability. Development should, wherever possible, help to improve local environmental conditions such as air and water quality, taking into account relevant information such as river basin management plans; “*

#### **Background**

#### 10.4.5 A Hydrogeological and Hydrological Impact Assessment (HHIA) was prepared by BCL Consultant Hydrogeologists Limited (BCL), on behalf of the Applicant. The full HHIA is contained within the ES and the baseline and descriptive elements are set out in Section 7 of this Report.

### **Water management during extraction**

- 10.4.6 The current level of working within the main extraction area occurs below the watertable. A programme of dewatering is operated, with abstracted water being discharged via two consented discharge points to the Halecombe Brook.
- 10.4.7 Water management for the proposed deepening will be a continuation of the current system. A combination of groundwater and rainfall runoff is currently captured within a main sump installed into the basal sinking of the extraction area and a second sump installed within the Rookery area. Water is discharged from both sumps under EA consent to the Halecombe Brook.
- 10.4.8 The increase in depth of working beneath the water table will require an associated increase in dewatering discharge. The HIAA has calculated the potential increase in discharge rate for workings to the currently permitted depth (68mAOD) and for the proposed maximum depth (10mAOD).
- 10.4.9 The proposed additional extraction would not involve the removal of any existing surface watercourses or other features. The closest watercourse to the development is Halecombe Brook and it is proposed to culvert the Brook through the plant area and reinstate it as an open water channel along the existing course following restoration.
- 10.4.10 The presence of groundwater within the limestone aquifer is dependent upon the development of enhanced secondary permeability (fracture and conduit) systems. Such features are formed by movement of water through the rock and hence are ultimately controlled by the ability of water to leave the aquifer and elevation of outfall points. The principle aquifer in the study area is the Carboniferous Limestone. This is separated from the Portishead Beds by the Lower Limestone Shales. The Lower Limestone Shales possess higher clay content and are of lower permeability than both the Carboniferous Limestone and Portishead Beds, and act as a barrier to groundwater flow between the two units..
- 10.4.11 In the vicinity of the Site the development of such fracture and conduit features is not expected to extend significantly below 55mAOD. Below this level the bulk permeability of the limestone is expected to be reduced, with significantly reduced groundwater movement.
- 10.4.12 It is therefore likely that the impact on the local water regime from dewatering would significantly diminish once extraction has progressed below 55mAOD.

10.4.13 The HIAA concludes, based on the above, that any increased drawdown within the main fracture system, even if extending sufficient distance from the Site to intersect the relevant conduit system, is considered unlikely to cause significant reduction in springflows during the most sensitive summer period, in comparison to the potential for impact relating to the currently permitted depth and extent of working.

10.4.14 The implication of this conclusion in the HIAA is that any adverse impact on the local springs would have already occurred before the quarry extraction reaches 68mAOD (the current permitted extraction limit).

### **Hydrometric Monitoring Scheme**

10.4.15 A scheme of hydrometric monitoring (the Scheme) is currently operated to allow assessment of any potential impacts associated with the ongoing extraction operation.

10.4.16 The Scheme requirement for monitoring is contained within a supplemental Section 106 agreement (S106), to the existing planning permission governing workings at the quarry (i.e. for extraction to 68mAOD).

10.4.17 The principles and reporting requirements of the Scheme are laid out within the S106, with the Scheme having been in operation in its current form since 1993. The purpose of the Scheme is the protection of the water resources in the vicinity of the quarry. In particular, the Scheme exists to provide protection for local springs and baseflow to the River Mells.

10.4.18 The Scheme presents various mechanisms for the identification of “trigger values” for the springs that may be affected by dewatering operations at Halecombe Quarry. The “trigger values” may best be described as the minimum acceptable flow rate for any individual spring. If trigger values are breached, specifications for augmentation of the affected spring are given by the Scheme.

10.4.19 The Scheme allows for data downloads and assessment of the surface water monitoring points to be conducted on a weekly basis during March, April, May, September, October and November. It is during these periods that water levels are changing most rapidly and expected impacts will be most clearly seen. Monthly data collection is undertaken at all other times of the year.

10.4.20 To aid mass-balance assessment, abstraction volumes from the quarry sumps in both the main extraction area and Rookery Farm (and subsequent discharge to the Halecombe Brook) are recorded. All dewatering discharge is

currently made to the Halecombe Brook with the exception of water piped to provide an augmentation supply to Soho Spring.

10.4.21 Data collection for both groundwater and surface water monitoring points would continue following cessation of quarrying operations, until groundwater levels have returned to equilibrium (albeit that the groundwater regime may continue to be affected by the operations at the adjacent Whatley Quarry).

10.4.22 The assessment criteria were originally derived for inclusion within the monitoring scheme for Whatley Quarry. The Applicant has adopted the assessment methodology such that both sites now operate under the same assessment protocols. A summary is provided below.

10.4.23 Should the annual review deem that impact has occurred, effective mitigation measures are to be installed within 12 months. The springs defined under the Scheme for which mitigation may be required are detailed at Table 1 below.

Name of water feature	Type
River Mells and any of its feeder springs)	-
Bectorwood	Perennial (perpetual)
Hurdlestone	Perennial
Whitehole Farm	Perennial
Leigh Wood (East and West)	Ephemeral (transitory)
Soho Farm	Ephemeral
Finger and Cobby Wood	Ephemeral

10.4.24 The S106 agreement allows for the inclusion of any further (currently unmonitored) features for mitigation. Proposals for mitigation of such sites must be presented within 12 months of an impact being observed. Implementation of mitigation for such sites must occur within a further 12 months.

10.4.25 Derivation of a trigger mechanism for the perennial springs at Whitehole Farm, Bectorwood and Hurdlestone has been undertaken using the Base Flow Index (BFI) method. The BFI has been calculated using 15 minute flow data (i.e. a flow reading taken at 15 minute intervals).

10.4.26 Base flow is the part of streamflow originating from groundwater discharge. During rainfall the majority of flow in a watercourse is derived from surface runoff. During extended dry periods the streamflow tends to be maintained by base flow.

10.4.27 The defined BFI calculated for each of the perennial springs is given in Table 2 below.

<b>Name</b>	<b>Baseline Baseflow Index value</b>
Bectorwood	0.57
Hurdlestone	0.63
Whitehole Farm	0.79

10.4.28 If the calculated annual BFI for a spring during any given hydrometric year is 50% or less than the BFI Value, the spring is deemed to have been impacted. In the event that a spring is deemed to have been affected, augmentation is to be provided through a combination of either a purpose installed borehole or a pumped supply from the dewatering operation at the Site.

10.4.29 For all assessed springflows, if a trigger value is breached, Tarmac are required to undertake augmentation to pre-defined standards within 12 months of the breach being identified.

10.4.30 The 2015 permission allows for construction of a 245,000m<sup>3</sup> water storage lake within the Rookery Farm section of the Site. This has been designed to enable rapid and reliable provision of augmentation water for distribution to any affected springs if/when required. The Rookery Lake is currently under construction and is due to be completed in 2019.

10.4.31 The Applicant has an immediate commitment to augment the spring flow at Soho Farm. The required augmentation volume is between 1.4 litres/second (120m<sup>3</sup>/day) and 4 litres/second (346m<sup>3</sup>/day). The augmentation supply will ultimately be provided from the Rookery Lake. The Applicant has recently installed the pipework to allow for augmentation supply and at the request of the EA are seeking to provide an interim supply from the dewatering operation.

10.4.32 For the remaining springs a flow chart detailing the method for calculating the required augmentation for each spring is detailed at Appendix 9 of the HIAA. In the event that augmentation measures are instigated, the Scheme requires weekly assessment of augmentation volumes to determine ongoing requirements at the affected spring.

10.4.33 The Scheme requires that augmentation arrangements made during the period of quarrying shall continue after cessation of quarrying until groundwater rebound has occurred fully. The mechanism employed to

describe the volume and rate of augmentation required at each site is such that following cessation of dewatering at the quarry, it is expected that augmentation sites will receive a phased reduction in discharge

**Potential Local Impact**

- 10.4.34 As set out above there are measures already in place to effectively monitor any impact on the localised water regime. These measures would continue under any new permission and form part of a consolidated Section 106 Agreement.
- 10.4.35 The objection and concerns relating to Whitehole Spring are noted. However, claims that the spring has “dried up” because of quarrying operations have not been substantiated. Most parts of England have experienced the driest summer for 40 years and so water levels are atypical.
- 10.4.36 Indeed, the EA Monthly situation report for the Wessex Area in September states that “*the total rainfall received between June and September was the lowest received in the area for those four months since 1965*”. The EA records indicate that in this part of Somerset rainfall levels only reached around 60% of the “norm” over the summer months.
- 10.4.37 An “early” BFI calculation was carried out by the Applicant’s Hydrologist in September of this year and confirms that the flows are not currently in breach of the trigger level at Whitehole Farm. This was run to include all data to the end of August and shows a BFI value of 0.75 (Oct17-Aug18). This compares to the historic Baseline BFI value of 0.79 and the agreed trigger level of 0.39 (50% of the Baseline BFI value).
- 10.4.38 Historical and recent monitoring has therefore not indicated that dewatering from Halecombe Quarry has had any direct impact on Whitehole Farm Spring.
- 10.4.39 The completion of the Rookery Lake will allow for continuous water discharge of clean water. This would address the concerns of the Mells Estate regarding coloration of the Brook.
- 10.4.40 Moving forward, the proposed legal agreement clause would mean that the extraction would not go any deeper than 85m AOD until any mitigation measures are implemented. Therefore, current levels of dewatering would not increase beyond existing levels for the immediate future. In this case, therefore, it is unlikely that the flows of local springs would be affected at all, given that no substantive evidence has been provided to indicate that dewatering has adversely affected any of the springs in the locality.

## **Bath Hot Springs**

- 10.4.41 Bath exists because of the emergence of three natural springs in the heart of the city, which deliver over 1 million litres of mineral-rich water every day. Uniquely in the UK, the mineral water is hot and rises to the surface at a constant temperature of at least 45° C. These springs have been, and continue to be, at the centre of economic, social and cultural developments in the City.
- 10.4.42 Bath was charged with responsibility for the Hot Springs in a Royal Charter of 1591 granted by Elizabeth I – this duty has passed to Bath & North East Somerset Council. The springs are further protected by the 1982 County of Avon Act.
- 10.4.43 The temperature and flow and pressure of the springs has been monitored for many years by the local authority (firstly Bath City Council, and currently Bath and North East Somerset Council). The data is used for monitoring the potential impact on the Springs of any development within the City of Bath. The monitoring system also provides essential data for ongoing research into the origins of the Springs. Bath is approximately 18km (11 miles) north of Halecombe Quarry.
- 10.4.44 Further information on the geology of the hot springs Dr Rameus Gallois' paper entitled *The Geology of the Hot Springs at Bath Spa, Somerset*. An extract is set out below:

*“The source of the Bath hot springs is known from geochemical studies to be rain that fell on the Carboniferous Limestone outcrop several thousand years ago, and was geothermally heated at depths of at least 2500 m on its path to the springs. Bath lies on the eastern edge of a complexly folded and faulted Variscan structure, on the edges of which the Carboniferous Limestone has extensive outcrops and beneath which groundwater is sufficiently deeply buried to reach temperatures in excess of 64°C. However, these factors alone do not explain why the hot springs are confined to such a small (20 x 80 m) area. Their formation appears to have been dependent on a combination of geological events, including the formation of karst in the Triassic and the melting of permafrost in the Pleistocene, that is unique to this one small area at Bath.*

*Groundwater movement through the limestone aquifer occurs as both rapid transfer via a relatively small number of conduits (enlarged fractures), or as slower movement through the more diffuse narrower fracture system. The springs are primarily fed by the conduit system, which in turn receives input*

*both as slow release from the fracture system and more rapid input via a series of sinkholes formed along the southern boundary of the limestone”.*

- 10.4.45 The relationship between the strategic hydrogeology in this part of the county and Bath Hot Springs is therefore complex and not fully understood. It is acknowledged that the objections from the Bath Hot Springs Foundation and subsequently from BANES reflect this situation and their concerns about any potential impact on the Springs.
- 10.4.46 As stated above there are existing measures in place under a legal agreement dating from 1996 to monitor hydrogeological impact of dewatering from Whatley Quarry; and the possibility of the Appellant entering into a similar agreement was subject to discussions with the Applicant's agent. Unfortunately, the data from this monitoring has not been made available and without the ability to study and review the data and its effectiveness the Applicant was not willing to enter into such agreement.
- 10.4.47 There are remaining permitted reserves that lie beneath the existing asphalt plant, which is located at 160mAOD. These reserves cannot be extracted due to the presence of the plant.
- 10.4.48 In addition the existing permitted depth limit of 68mAOD cannot be reached practically without enlarging the quarry into the area beneath the asphalt plant, which would obviously first require it to be removed. In any event the area beneath the asphalt plant would be required to hold the stocks (which are currently held on the quarry floor) in order to free up the space to extract to the permitted depth of 68mAOD.
- 10.4.49 As a result of ongoing discussions, and recognising the critical situation the quarry is now in, with reserves depleted to less than 12 months production, discussions with the Applicant's agent has resulted in the additional information, provided in a letter and subject of the Regulation 25 consultation. However, following the objection from BANES in response to the Regulation 25 consultation, it is apparent that entering into a Section 106 agreement similar to Whatley quarry would necessitate BANES being a signatory. Notwithstanding the Applicant's position on entering into an Agree, it highly unlikely BANES' would agree to being a signatory.
- 10.4.50 As a consequence, numerous discussions have taken place with the Applicant and the EA to agree appropriately worded conditions and legal obligations. The proposed new conditions (No. 4 & 5), and the proposed clause in the

legal agreement (see Appendix 1) would achieve the same aims as the “Regulation 25” condition, but in a different way.

10.4.51 The quarry would therefore only be allowed to progress beyond the current permitted level of 68mAOD if the Applicant demonstrates that there has been no impact on Bath Hot Springs. This would still give the quarry about 11.5mt of extractable reserves, equivalent to around 16 years of working at current output rates.

10.4.52 In order to further protect local groundwater resources, it is also now proposed to include an additional clause within the new legal agreement which prevents the extraction below 85mAOD, the current depth of the quarry (the figure referred to in the Regulation 25 consultation) until the operator has undertaken an assessment of dewatering down to the next bench level. This process would then be repeated for each bench drop (i.e. every 15m).

10.4.53 This approach is considered to be a logical and sensible compromise in allowing the quarry to access already permitted reserves, whilst at the same time being prevented from extracting below the permitted 68mAOD level, without first demonstrating that there would be no impact on Bath Hot Springs.

10.4.54 The EA has agreed to this approach and this is reflected in their response of 30 October 2018 (see Section 9.3 above).

10.4.55 Members are reminded that BANES stated in their Regulation 25 response that they “*have no objection to the proposal to relocate the existing asphalt plant and extract stone to the currently permitted depth of 68m AOD - it is understood that this will provide 10 – 15 years reserves during which time any impacts of dewatering at Whatley may become clearer*”.

### **Cumulative Impact**

10.4.56 A supplementary “Note” entitled *Consideration of Cumulative Effects on the Water Environment* was provided by the Applicant’s hydrogeologist (dated 22<sup>nd</sup> June 2018) regarding cumulative impact of the deepening of Halecombe and the adjacent Whatley Quarry. This was subject to the Regulation 25 Consultation referred to above. The following paragraphs precis the Note.

10.4.57 The current level of dewatering at Whatley Quarry is similar to that required for the extraction at Halecombe Quarry to the currently permitted depth (68mAOD). Under this scenario the predicted upper rates of discharge (102l/s) is not dissimilar to the required discharge from Whatley (300l/s), taking into

account the approximately three times larger surface area/exposure of limestone aquifer at the latter site.

- 10.4.58 Both quarries would require ongoing programmes of dewatering to facilitate the basal level of extraction. The cumulative effects from each operation would depend on the timing of those operations and relative levels of extraction at each site. Notwithstanding this, it is expected that the worst-case potential cumulative effects would be recorded if both operations are extended to the full depth at the same time (Whatley Quarry to 0mAOD and Halecombe Quarry to 10mAOD).
- 10.4.59 As stated in the HIAA, groundwater movement within the limestone aquifer occurs from west to east. As both quarries are operating within a common aquifer unit, in relative close proximity, any *increase* in dewatering rate at one site is expected to be balanced by a *reduction* at the other. In this manner, groundwater movement through the aquifer intercepted at Halecombe Quarry when working the deepest levels of extraction would have otherwise been expected to be abstracted at the deeper Whatley Quarry, which is located down hydraulic gradient.
- 10.4.60 The groundwater ingress calculations presented within the HHIA for the maximum depth of working at Halecombe Quarry, can therefore be expected to result in a proportionate reduction in the required level of pumping for working the deeper levels of extraction at Whatley Quarry (and vice versa).
- 10.4.61 It cannot therefore be assumed that there would be *pro-rata* impact from both quarries deepening at the same time. As Whatley is already at 41mAOD (well below the 55m where the geology changes) any significant impact would already have happened. Even if Halecombe was to “catch up” so both were at similar depths then any increase in dewatering rate at one site is expected to be balanced by a reduction at the other.
- 10.4.62 In addition, the Halecombe Brook forms an upstream tributary to the River Mells and hence will serve to mitigate for any reduction in groundwater discharge to the River Mells/River Frome from the Carboniferous Limestone aquifer downstream of Whatley Quarry.
- 10.4.63 It should also be pointed out that with the continued operation of the monitoring programme and proposed improvements, both the springs and subsequent levels of baseflow within the River Mells would remain protected. As such, any cumulative effects/impacts of the combined dewatering operations at Whatley and Halecombe Quarries would be recorded and where possible mitigated.

10.4.64 The Note concludes that the review has not identified any significant changes to the HHIA as previously presented and therefore the findings and recommendations presented within the original report remain unchanged.

### **Conclusions**

10.4.65 A comprehensive HIAA has been undertaken to assess the potential for the proposed deepening of the existing quarry, relocation of the existing asphalt plant and subsequent restoration works, to impact upon the water environment.

10.4.66 The HIAA has involved the correlation and examination of hydrogeological and hydrological data from a wide range of sources including some 25 years of site-specific groundwater elevation and surface water flow data collected in the locality and recent regional hydrogeological assessment reports completed for the locality. These data have been used to define a conceptual model for the area encompassing the quarry, which is subsequently used to assess the potential impacts relating to the proposed workings.

10.4.67 The HIAA concludes that the deepening works, when taking into account monitoring and mitigation measures incorporated into the proposed development has minimal potential to cause negative impact in the locality in comparison to the already permitted depth of extraction. This is based on the quarry deepening to 10m AOD. It is considered that with the interim depth restriction, the proposed extraction to 68mAOD would be highly unlikely to have any detrimental impact on the water regime.

10.4.68 In the longer term, with the continued operation of the monitoring programme, both the springs and subsequent levels of baseflow within the River Mells would remain protected and as such, any Cumulative Effects of the combined dewatering operations at Whatley and Halecombe Quarries would be monitored and addressed.

10.4.69 The EA has been consulted as the competent authority on these matters. In addition to their formal responses to the original application and the Regulation 25 consultation, active engagement has taken place with the EA to provide the best advice to Members and ensure the future protection of the groundwater resources, whilst at the same time allowing the quarry to access permitted reserves.

10.4.70 Subject to the imposition of the proposed depth limit condition above (and recommended conditions by the EA) if Members are minded to grant permission, it is considered that hydrological and hydrogeological impact from

the proposed development would not be detrimental to local groundwater resources and would therefore comply with SMP Policy DM4: Water Resources and Flood Risk; SMP Policy DM5: Mineral extraction below the water table; and MDLP Policy DP8: Environmental Protection.

## 10.5 **Ecology/Biodiversity**

10.5.1 The relevant policies are SMP Policy DM2: Biodiversity and geodiversity; and MDLP Policy DP5: Biodiversity and Ecological Networks and DP6: Bat Protection.

10.5.2 SMP Policy DM2 states that planning permission for mineral development will be granted subject to the application demonstrating that:

- a) *the proposed development will not generate unacceptable adverse impacts on biodiversity and geodiversity; and*
- b) *measures will be taken to mitigate to acceptable levels (or, as a last resort, proportionately compensate for) adverse impacts on biodiversity and geodiversity. Such measures shall ensure a net gain in biodiversity where possible. The Habitat Evaluation Procedure will be used in calculating the value of a site to species affected by the proposal where the conservation value of the habitat is considered to be replaceable and mitigation techniques have been proven.*

10.5.3 MDLP Policy DP5 requires that proposals must ensure the protection, conservation and where possible enhancement of internationally, nationally or locally designated natural habitat area and species.

10.5.4 MDLP Policy DP6 requires application for development within the Bat Consultation Zone to undertake a test of significance under the Habitat Regulations. Halecombe Quarry Lies within the North Somerset and Mendip Bats Special Area of Conservation (SAC).

10.5.5 In addition, Paragraph 170 of the NPPF advises that:

*Planning policies and decisions should contribute to and enhance the natural and local environment by:*

- a) *protecting and enhancing valued landscapes, sites of biodiversity or geological value and soils (in a manner commensurate with their statutory status or identified quality in the development plan);*

*d) minimising impacts on and providing net gains for biodiversity, including by establishing coherent ecological networks that are more resilient to current and future pressures;*

10.5.6 As part of the EIA process a Preliminary Ecological Appraisal of the site was carried out and Protected Species surveys were performed for common dormouse, badger and bat.

10.5.7 The results of the Preliminary Ecological Appraisal and Protected Species surveys were used to produce an Ecological Impact Assessment, (EclA) undertaken in accordance with relevant guidelines.

10.5.8 The EclA recognises that a significant negative residual effect at the Site level alone is anticipated in terms of habitats that might be exploited by three UK Biodiversity Action Plan (BAP) Priority Species of invertebrate and one species of bird that is listed under Schedule 1 of the Wildlife & Countryside Act 1981. However, the significant net gains of habitat for four UK BAP Priority Habitats, two Somerset Local BAP Priority Habitats, one Mendip Local BAP Priority Habitat, two plant species, two invertebrate species, seven bird species, three roosting bat species and three foraging bat species outweigh these losses.

10.5.9 The EclA considered that by implementing appropriate ecological mitigation, compensation, enhancement and safeguarding strategies within an overarching Ecological Management Plan, the development would not result in any significant change to the integrity of any Statutory or non-Statutory Wildlife Site or to the conservation status of valued ecological receptors (with the exception of those mentioned above at Site Level alone) present within the 'zone of influence' both on-site and off-site.

10.5.10 In simple terms, the site currently holds 36.68ha of four UK BAP Priority Habitats, 0.18ha of one Somerset Local BAP Priority Habitat and 10.84ha of two Mendip Local BAP Priority Habitats. The restored site would hold 42.68ha of seven UK BAP Priority Habitats, 18.01ha of three Somerset Local BAP Priority Habitats and 21.72ha of two Mendip Local BAP Priority Habitats. The envisaged restoration scheme would therefore result in a significant net increase in biodiversity associated with the site and the wider area. This would meet the objectives of the development plan and the NPPF by contributing to, and enhancing the natural and local environment, by providing a net gain in habitat provision.

## **Bats**

- 10.5.11 The Halecombe Brook has potential as a commuting / foraging route for bats. However, it has high levels of artificial lighting in its central and eastern sections. It is proposed that the Brook would be culverted between extraction phases 2a and 2b. As a result there would potentially be no wildlife corridor for, in theory, a period of between 1 and 14 years before the planned mitigation is implemented.
- 10.5.12 Detectors deployed along Halecombe Brook recorded use by common and soprano pipistrelle commuting and feeding along the Brook; and serotine bats using the corridor to cross the quarry site. Myotis species were identified very occasionally accessing it drinking from the guttered section or possibly foraging along the stream but none crossed the site. Brown long-eared, lesser horseshoe and greater horseshoe bats did not use Halecombe Brook as a commuting route but did use it access the guttered section, probably to drink, at its western end.
- 10.5.13 The Brook was also considered to be of high conservation value to lesser horseshoe bats due to constant usage in May and September. Loss of Halecombe Brook would therefore potentially cause loss of a commuting corridor to both pipistrelle and serotine species. Although all three of these species are capable of crossing open spaces for two or three hundred metres they prefer to use commuting structure. In mitigation for loss of the corridor and to mitigate against artificial lighting impacting upon bats, the County Ecologist has recommended conditions as set out in his consultation response relating to the creation of a "Bat Corridor" and a lighting design scheme for bats.
- 10.5.14 Subject to the imposition of the relevant conditions, should Members be minded to approve the application, it is considered that the impact on bats would be adequately mitigated and the proposals would comply with SMP Policy DM2 and MDLP Policies DM5 and DM6.
- 10.5.15 In order to ensure that there is no potential for a breach in conservation legislation, the safeguarding strategies and restoration scheme would be set out within a detailed Ecological Management Plan to be submitted to the Mineral Planning Authority. This is one of the recommended conditions by the County Ecologist.
- 10.5.16 The County Council, as the appropriate authority, has carried out an assessment of likely significant effect on a European site, under the Conservation of Habitats and Species Regulation, 2010 (Habitat Regulations Assessment). This has concluded that:

*“It is the conclusion of Somerset County Council that the proposed extension to Halecombe Quarry, which also includes replacement of existing asphalt plant with a new asphalt plant and associated facilities, retention of the concrete batching plant and the reopening of the access road to Rookery Farm and restoration, is unlikely to cause a significant effect to the integrity of Mells Valley and the Mendip Woodlands SACs provided the following is conditioned or subject to a s106 agreement:*

- A 20m long, 5m wide, and 1m deep butyl-lined shallow trough that will be demand-fed by a piped pump from the Rookery lagoon will be constructed in year 3, to feed slowly over a weir into a soakaway. The trough will have shallow margins in order that any grounded bat can swim to the side and escape. The northern bank will abut a shrub-vegetated screening bund, and the southern bank will be planted with a range of native shrubs in order to provide a sheltered and darkened corridor. However, the ends of the trough will remain open in order that bats have an unobstructed flight-path along the full length.*
- Details of the junction to Rookery Farm from Limekiln Lane demonstrating that commuting bats would not be affected by the creation of the access shall be submitted to and approved by the Local Planning Authority prior to any hedgerow removal occurring*
- The submitted ‘Control of Dust Scheme’ as set out in the Appendices of the Air Quality Assessment Technical Report for Proposed quarry deepening, construction of new asphalt plant and time extension Halecombe Quarry (Quarry Plan, November 2016) will be strictly applied to the permission for its duration unless otherwise modified and approved in writing by the Local Planning Authority”.*

10.5.17 The three conditions from the HRA recommended for inclusion in any permission are reproduced in the Ecology consultation response as set out in paragraph 9.10 above.

10.5.18 Natural England responded that “If the measures (conditions) recommended in Section 12 are secured, the proposals are unlikely to result in significant effects on Mells Valley and Mendips Woodland SACs” (see paragraph 9.4).

10.5.19 In conclusion the proposed development has been the subject of a full ecological assessment, in which the impacts of the proposal have been assessed and appropriate mitigation measures recommended, where necessary in order to avoid unacceptable impacts. The proposed restoration

scheme has been predicted to result in a net increase in biodiversity associated with the site and the locality.

10.5.20 Subject to the imposition of conditions as proposed by the County Ecologist, should Members be minded to approve the application, it is considered that the proposal complies with SMP Policy DM2, and MDLP Policies DP5 and DP6 and the NPPF.

### **Impact on Amenity**

10.5.21 SMP Policy DM8 states :

*Planning permission will be granted for mineral development subject to the application demonstrating:*

- a) that the proposed development will not generate unacceptable adverse impacts on local amenity;*
- b) measures will be taken to mitigate to acceptable levels (and where necessary monitor) adverse impacts on local amenity due to:*
  - i) Vibration;*
  - ii) Dust and odour;*
  - iii) Noise; and*
  - iv) Lighting*
- c) how the applicant intends to engage with local communities during the operational life of the site.*

10.5.22 MDCLP Policy DM8 states that development will be required to demonstrate that it does not give rise to unacceptable adverse environmental impacts on (*inter alia*):

- *Ambient noise levels*
- *Air quality*
- *Residential amenity*

10.5.23 In addition the Revised NPPF at Paragraph at paragraph 204 states:

*In considering proposals for mineral extraction, minerals planning authorities should:*

- b) ensure that there are no unacceptable adverse impacts on the natural and historic environment, human health or aviation safety, and take into*

*account the cumulative effect of multiple impacts from individual sites and/or from a number of sites in a locality;*

*c) ensure that any unavoidable noise, dust and particle emissions and any blasting vibrations are controlled, mitigated or removed at source<sup>66</sup>, and establish appropriate noise limits for extraction in proximity to noise sensitive properties;*

10.5.24 This section considers the impact of blasting noise and dust creation/deposition as a result of mineral extraction and associated operations.

10.5.25 **Blasting:** Blasts at Halecombe Quarry have been monitored at varying distances in order to be able to determine how quickly the blast vibration subsides at this site. This data has been interpreted in terms of the current Halecombe Quarry blast vibration criterion in order to be sure that all future vibration levels would conform to such a limit.

10.5.26 The investigation concludes that the current vibration limit, which is in line with current government planning guidance, can be met throughout the working area and as a consequence any adverse impact due to blast induced vibration would be expected to be minimal throughout the working of the site.

10.5.27 **Noise:** A noise assessment has been carried out for the proposed deepening of the extraction area at Halecombe Quarry, the new location for replacement asphalt plant and extended end date for operations at the site.

10.5.28 The receiver locations are those identified for previous noise assessments and included in existing planning conditions for the control of noise levels associated with planning permissions for the site.

10.5.29 The new location for the replacement asphalt plant is approximately 150 metres to the south east of the current asphalt plant. The hours of operation for the site are to remain as set out in the existing planning permissions.

10.5.30 Attended sample measurements have been undertaken for a weekday night-time at five locations in order to describe the existing noise climate and to determine the operational asphalt plant noise levels for each of these locations.

10.5.31 The measured and calculated site noise levels comply with the existing site noise limits contained in the existing planning conditions at all of the

assessment locations, for daytime and night-time periods and temporary operations.

10.5.32 The Acoustics Officer has raised no objection to the proposals on noise and vibration grounds and has concluded that:

*“The application and supporting documents would in my view indicate that there would be no justification to object to the proposal on the grounds of unacceptable noise or vibration impact. This view recognises the potential to slightly exceed the current night-time noise limit at Knapp Hill Farm and the Traveller Encampment during a 6-month period when new asphalt plant is expected to undergo commissioning prior to the shutdown of existing plant”.*

10.5.33 He has, however, recommended a suite of conditions which relate to general working hours; control of blasting times; control of blasting impact; reduction of noise from mobile plant; control of noise from extraction or processing; control of noise from temporary operations and Response to Noise and Vibration Complaints.

10.5.34 **Air Quality:** Halecombe Quarry has a substantial screen bank with a variety of trees and shrubs, which is over 20 metres in height in places, around the boundaries of the site. It has the dual purpose of limiting potential dust transmission and screens the Site from view.

10.5.35 There is an existing Dust Management Scheme in place which aims to ensure that dust arising from operational activities is contained within the quarry site and does not create an impact beyond the Site. The scheme was approved by Somerset County Council in July 2003 as a requirement of Condition 20 of planning permission, reference 101393/014, and was maintained as the acceptable Dust Management Scheme in the Rookery extraction planning permission, (reference 2013/1481), granted in March 2014. An updated ‘Control of Dust Scheme’ is set out in the Appendices of the *Air Quality Assessment Technical Report for Proposed quarry deepening, construction of new asphalt plant and time extension Halecombe Quarry (QuarryPlan)*, November 2016).

10.5.36 Dust emissions were monitored as a part of the air quality assessment in the EIA at various locations within the existing quarry. The levels of dust being produced at Halecombe Quarry were well below the accepted nuisance level of dust deposition of 200mg/m<sup>2</sup> per day. The Assessment considers that the potential for increased nuisance dust impacts arising from the continued operation and development of the quarry is considered to be negligible at the

nearest existing residential receptors due to the mitigation measures and operational controls already in place.

10.5.37 There is not anticipated to be any increase in the level of fine particulates generated from quarry plant or vehicular transport associated with the site. The new asphalt plant would be a modern design and would need to fully comply with an environmental permit from Mendip District Council before being able to operate. The environmental permit would require that dust and particulates were controlled and contained.

10.5.38 Therefore the potential for dust nuisance or air quality deterioration to occur as a result of the proposed development is considered to be minimal, particularly with the continued implementation of existing mitigation measures and operational controls.

10.5.39 The concerns of the Mells Estate on fugitive dust emissions are noted. However, it is considered that with of a condition relating to compliance with the revised dust management scheme and ensuring (by condition) that all HGV vehicles leaving the site use the wheel wash, dust emissions should not be significant. The redevelopment of the asphalt plant, weighbridges, HGV access areas etc. will result in a much improved surface for HGVs to travel on which will be easier to clean and to maintain. This will result in less potential for dust generation from HGV movements. It is also relevant that the deeper the extraction area is below existing ground levels then the less likely it is that dust from the quarry should escape onto adjoining land. The coloration of the Brook happened 3 years ago.

10.5.40 The competent authority in respect of air quality is Mendip District Council, and they have raised no objections to the proposals.

10.5.41 Subject to the imposition of the conditions recommended by the Acoustic Officer, and conditioning of the dust management plan, should Members be minded to approve the application, it is therefore considered that the development complies with the NPPF; SMP Policy DM8 and MDLP Policy DM8.

## 10.6 **Other Environmental Issues**

10.6.1 **Flood Risk:** The relevant policies in respect of flood risk are SMP Policy DM4: Water Resources and Flood Risk and MDLP Policy DP23: Managing Flood Risk.

- 10.6.2 A Flood Risk Assessment (FRA) has been conducted to accompany the planning application. The entirety of the proposed development is located within Flood Risk Zone 1 (FRZ1; i.e. lands with a risk of flooding with a return period of less than once every thousand years). Given the FRZ status, the proposed mineral extraction is deemed an “Appropriate Activity” in the NPPF.
- 10.6.3 Assessment has also been made of the flood risk that may be posed elsewhere within the catchment as a result of the proposed extraction. During the extraction phase, any abstracted water would be discharged in accordance with the prevailing consented rates and hence is not considered to represent an increase in flooding risk.
- 10.6.4 The Halecombe Brook is to be culverted through the relocated plant area. The FRA recommends the culvert is appropriately sized (to allow for passage of flows resultant from the 1 in 100 year return period storm) to prevent any upstream retardation of flow and hence increase in localised flood risk.
- 10.6.5 The restored Site is designed to retain incident rainfall within the extraction landform, and allow dissipation to groundwater. The landform would also include sufficient balancing storage to prevent the need for discharge off site.
- 10.6.6 The FRA concludes that the quarry would not increase flood risk in the locality as a result of the proposed operations or restoration.
- 10.6.7 The conclusions of FRA indicate that no additional mitigation measures are necessary with regard to flooding related matters.
- 10.6.8 The Environment Agency has raised no objection to the proposed development in respect of Flood Risk. The Lead Local Flood Authority has also raised no objection to the proposals.
- 10.6.9 It is therefore considered that the the proposed development complies with SMP Policy DM4 and MDLP Policy DP8.
- 10.6.10 **Landscape and visual amenity:** The relevant policies are SMP Policy DM1: Landscape and Visual Amenity and MDCLP Policy DP4: Mendip’s Landscapes. SMP Policy DM1 aims to ensure proposals will not generate unacceptable adverse impacts on landscape and visual amenity. MDLP DP4 states that proposals for development that would, individually or cumulatively, significantly degrade the quality of the local landscape will not be supported.
- 10.6.11 Halecombe Quarry is not located within a statutory protected area such as National Park or Area of Outstanding Natural Beauty. The proposal to deepen

the quarry excavation avoids landscape impact that could arise from a lateral extension. A landscape and visual impact assessment has been undertaken as part of the EIA on the proposed location for the asphalt plant, and this demonstrates that there would be no unacceptable adverse impact.

10.6.12 The proposed development would not involve the introduction of new and uncharacteristic features into the landscape as the proposed extraction is a deepening of the permitted void, rather than an extension in the quarry footprint. The proposals include variations to a number of the existing components within the site, including the new asphalt plant, which would be a taller structure. While it is proposed that this structure would be larger than the existing, due to the undulating topography, the extent of woodland cover and the frequency of intervening features within the landscape, it is not considered that the effects on landscape character or visual amenity would be significantly detrimental. With respect to the eastern tip, this feature would be progressively restored providing additional structural woodland to the boundary of the quarry at Park Corner.

10.6.13 In overall terms, it is considered that the proposed development can be integrated into the local landscape without causing significant detriment to the landscape character, quality or visual amenity of the locality. It is also considered that the restoration scheme would provide an enhanced visual setting and amenity asset.

10.6.14 It is therefore considered that the proposals would comply with SMP Policy DM1 and MDLP Policy DP4.

10.6.15 **Historic Environment:** The relevant policies are SMP Policy DM3:Historic Environment and MDCLP Policy DP3: Conservation.

10.6.16 No new areas of land would be disturbed by the proposed development. However, the proposed re-location of the asphalt plant is closer to Rookery Farmhouse, a Grade II Listed Building. A full assessment of the potential impact on the setting of Rookery Farm has been conducted as part of the EIA and concludes that there would not be unacceptable adverse impact from the relocation of the asphalt plant.

10.6.17 South West Heritage has advised "*The Landscape and Visual Impact Assessment considers in detail the impacts on the wider surroundings including Mellis Park, adjacent to the application site. The park is generally well screened by the belt of mature trees and internal woodland which the site visit confirmed. The proposal does not affect Park House or its immediate curtilage. We concur with the assessment that the visual impact of the re-sited*

*and higher Asphalt plant is higher compared to the present impact and due to the height increase the geographical impact area is somewhat enlarged but it is not new and only moderately increases the present effect of the quarries operation”.*

10.6.18 In Respect of Rookery Farm SWH advises that “*The increased height and re-location of the Asphalt Plant close to the farm will dominate and dwarf the listed buildings during the extended operational period. The asphalt tower will be circa 25 meters higher than the ridge of Rookery farm according to the figures in the provided drawings. ... Nevertheless, this negative impact is temporary, a matter of degree and compatible with the use of Rookery Farm as quarry offices for this period. The long-term outlook for the listed building is positive”.*

10.6.19 It is therefore considered that there would not be an unacceptable adverse impact from the relocation of the asphalt plant on the setting of listed assets and the proposals would comply with SMP Policy DM3: Historic Environment and MDLP Policy DP3: Conservation.

10.6.20 **Transport:** The relevant policies are SMP Policy DM9: Minerals Transportation and MDLP Policy DP9: Transport Impact of New Development.

10.6.21 Access from the site to the main road network (A361) is via the Bulls Green Link Road, which Tarmac funded in the late 1990s to address previous concerns about heavy goods vehicle movement on less suitable roads.

10.6.22 The impact of heavy goods vehicle movements on the highway has previously been undertaken and output limits established by planning condition, which limits annual output to 1million tonnes or 900,000 tonnes averaged over any 3 year period. This condition would be carried forward to any new permission.

10.6.23 There are no proposals to alter the level of permitted output from the quarry, the site access for heavy goods vehicles, the type of delivery vehicle or the routes delivery vehicles use.

10.6.24 In terms of the working quarry, the proposed development would simply represent a continuation of the existing activities other than the proposal to reopen and reintroduce the historic access to Rookery Farm for light vehicles only, in order to avoid staff and visitors travelling to/from the offices having to pass through the working quarry.

10.6.25 Other than this minor change to the existing access arrangements, in terms of day to day activities, vehicle movements, output, working hours etc. the

proposed development would simply remain as existing but would continue for longer into the future.

- 10.6.26 Traffic and collision data provided by Somerset County Council revealed the local road network has enough capacity to safely accommodate the development traffic.
- 10.6.27 The impact of the proposed development was assessed against the national planning policy transport test and was found to be acceptable.
- 10.6.28 The County Highway Officer has raised no objection to the application subject to the imposition of conditions relating to the new access off Limekiln Lane.
- 10.6.29 Should Members be minded to approve the application, subject to the proposed conditions it is therefore considered that the proposal complies with SMP Policy DM9 and MDCLP Policy DP9.
- 10.6.30 **Rights of Way:** The relevant policy is SMP Policy DM6: Public Rights of Way.
- 10.6.31 There are existing rights of way around the perimeter of the current quarry site. These rights of way would not be affected by the deepening and would not need to be diverted or stopped up.
- 10.6.32 The re-establishment of the access between Rookery Farm and Limekiln Lane would cross the existing right of way running around the southern boundary of the quarry. In addition there are temporary works proposed to increase the height of parts of the boundary screenbank. These works would not interrupt existing rights of way although they would occur in close proximity.
- 10.6.33 With regard to the new access to Rookery Farm, the construction works would require a minor, temporary diversion of the right of way whilst the works were being undertaken. Following completion of the access road the right of way would be reinstated. Appropriate signage would be installed on both the right of way and on the access track warning users of the presence of the right of way/access track as necessary.
- 10.6.34 There would be no right of way diversions required for the works on the boundary screenbanks. Appropriate signage would be installed to inform rights of way users and quarry operatives accordingly. The restoration scheme would include rights of way enhancements including further viewpoints with explanatory information and new rights of way around the Rookery Farm area.
- 10.6.35 Accordingly there would be no conflict with SMP Policy DM6.

## 10.7 Legal Agreement/Community Fund

10.7.1 The Applicant is proposing to consolidate the existing legal agreements relating to the site, the proposed Heads of Terms for which are set out in Appendix 1 to this Report. The previous Agreements are dated 1992, 2000 and 2002 and cover matters relating to:

- Protection of water resources (2000).
- Revocation of planning permission 101393/015 and previous legal agreements.
- Use of the quarry in perpetuity (2002).
- Aftercare period of 10 years (2002).
- Restoration and aftercare scheme (2002).
- Reclamation and Management Steering Groups (2002).
- Long term management scheme for the quarry and for Rookery Farm (2002).
- Long term management fund (2002).
- Footpath provision (2002).

10.7.2 In addition the consolidated Agreement will include provision for revocation of previous planning permissions at the site, make provision for a heavy goods vehicle routeing protocol and for a Community Fund.

10.7.3 The circumstances in which planning obligations may be taken into account in determining applications for planning permission after 6 April 2010 are found in Regulation 122(2) of the Community Infrastructure Regulations 2010:

*“A planning obligation may only constitute a reason for granting planning permission for the development if the obligation is –*  
*(a) necessary to make the development acceptable in planning terms;*  
*(b) directly related to the development; and*  
*(c) fairly and reasonably related in scale and kind to the development.”*

10.7.4 The Council has previously secured a variety of obligations under Section 106 of the Town and Country Planning Act 1990, as amended. Since the previous Agreements were signed, the Community Infrastructure Regulations 2010 have come into force.

- 10.7.5 Legal advice has been sought on the implications of the Community Infrastructure Regulations to ensure that the proposed provisions of the consolidated Agreement meet the tests of the Regulations.
- 10.7.6 Planning judgement has been exercised and It is considered that the requirements of the extant Agreements remain relevant and necessary. The proposed Heads of Terms are deemed acceptable and pull forward and update the obligations in the three extant legal agreements. This assists in ensuring the necessary monitoring and mitigation and accordance with the development plan and national policy.
- 10.7.7 The Applicant has proposed the establishment of a Community Fund, which has been under discussion with the Local Liaison Group, a group of local and statutory body representatives, for over two years.
- 10.7.8 It is recognised that the quarry has been in operation for a number of years and the proposed deepening would significantly extend its life. While there are no proposed changes to the operating patterns or HGVs associated with site, the Community Fund has been proposed by the Applicant as recompense to local communities for extending the life for the duration proposed.
- 10.7.9 The precedent for such funds is set elsewhere, including at the Applicant's site at Stancombe in North Devon.
- 10.7.10 The basic premise is that Tarmac will contribute 2 pence per tonne for limestone sold from the Halecombe Quarry. Monies would be paid on a quarterly basis in the same manner as the Company has historically paid into a restoration fund.
- 10.7.11 Legal advice has been sought on the establishment and mechanism for securing such a fund in the context of the CIL Regulations. Members are advised that the provision of a Community Fund, on the basis proposed by the Applicant, is not material to the determination of the application. As a consequence, the purpose of the Fund does not meet the tests of the CIL Regulations. However, it is wholly appropriate to include provision for the Fund in the consolidated S.106 but as a contractual undertaking and not a legal obligation.
- 10.7.12 While Members should be aware that a contractual obligation does not bind successors in title, a formal contract would be in place with the Applicant for the duration of their involvement. In the unlikely event that another operator

were to take over the quarry, it is highly likely that commitment to the Community Fund would be honoured.

*Response to Leigh on Mendip PC Comments*

10.7.13 The Applicant's agent has responded to the comments/queries of Leigh on Mendip Parish Council (see Section 9.2) as follows:

*Long Term Management Scheme*

10.7.14 *The 2002 planning permission required a detailed restoration and aftercare scheme to be submitted within 12 months and then a Restoration Steering Group to be established thereafter.*

10.7.15 *However, it was soon realised that due to restoration being 20 years away the preparation of detailed schemes in 2003 was premature and the Steering Group wouldn't actually have anything to discuss.*

10.7.16 *Tarmac didn't progress the schemes or Steering Group and Somerset accepted that it would not request them.*

10.7.17 *It would probably be sensible to condition the requirement for detailed restoration/aftercare schemes much closer to the anticipated quarry end date as more certainty would be possible.*

10.7.18 *I have certainly seen several recent planning permissions requiring detailed schemes to be submitted 5 years prior to the end date and perhaps that could be incorporated at Halecombe with a requirement for the Steering Group to be established within say 12 months of the schemes being approved.*

*Long Term Management Fund (1)*

10.7.19 ***The suggestion that the new S106 should recognise that the restoration monies are held in a Somerset CC account rather than in a joint names account is correct and can be agreed.***

*Long Term Management Fund (2)*

10.7.20 *The potential for the fund to lose value due to inflation during the period between the cessation of contributions and the commencement of expenditure is noted (assuming there is an actual discrepancy between the Fund account interest rate and inflation). I imagine that this was always a possibility although it has never been a concern previously.*

10.7.21 *However, a decision was made by Somerset County Council that the monies should be held in their sole account rather than a joint account with Tarmac*

*and the rate of interest applicable to the Somerset account is nothing that Tarmac can influence.*

10.7.22 *It is not known what rate of interest the Somerset account enjoys.*

10.7.23 *Tarmac cannot really be held liable for additional monies if there is a discrepancy between the rate of inflation and the interest payable on the Somerset account.*

10.7.24 *Tarmac do not agree to the suggestion made by the parish.*

*Long Term Management Fund (3)*

10.7.25 ***The details regarding the Restoration Fund contained within the letters of 16 May 2016 can be referred to in the S106 if necessary.***

*Local Community Fund (1)*

10.7.26 *The concerns of the parish are fully understood, however the other parishes have always taken an active part in the Halecombe Liaison committee and I imagine they would argue that HGVs travel through parts of their parishes and therefore there is an element of impact from Halecombe.*

10.7.27 *Leigh-on-Mendip have suggested that they receive 70% of the Fund monies.*

10.7.28 *It would not necessarily be sensible to set out a rigid division of funds at the start of this exercise, after all it depends on the merits of any request for monies.*

10.7.29 *The Stancombe Community Fund does not set out a division of monies between any of the three parishes involved even though the quarry sits largely in only one of the parishes.*

10.7.30 *In practice the Stancombe Fund operates in a very cooperative and mature manner and there has not been any evidence of monies being channelled to a particular parish.*

10.7.31 ***It would probably be better to allow the Fund to operate for 12 months and then review matters.***

*Local Community Fund (2)*

10.7.32 *The purpose of the Fund is not to provide monies for projects/services where there is already a legal obligation on local councils/education authorities to carry out such work.*

10.7.33 *The suggestion that the fund criteria should be enlarged to include "Social and Community Support" appears to be rather wide and too close to the local authorities social responsibilities.*

10.7.34 *Tarmac would not want to widen the criteria as suggested.*

10.7.35 *Again this has not been an issue at Stancombe.*

Local Community Fund (3)

10.7.36 *The Aggregates No. 3 Index is a commonly used index produced by the Building Cost Information Service of the Royal Institution of Chartered Surveyors and reflects the cost of aggregates.*

Local Community Fund (4)

10.7.37 ***The parish suggestion that monies should be spent within 12 months rather than 6 months as Tarmac originally proposed is acceptable.***

Routeing Protocol for HGVs (1)

10.7.38 *No comment*

Routeing Protocol for HGVs (2)

10.7.39 ***The parish are correct, reference should be to HGVs turning right on leaving Halecombe, not left as originally proposed.***

Routeing Protocol for HGVs (3)

10.7.40 *The A361 is the primary route from Halecombe and is the most appropriate for a routeing protocol to ensure HGVS use the Bulls Green Link Road (that Tarmac funded) to get to the A361 rather than use other roads.*

10.7.41 *The Old Wells Road was not referred to in any consultation during the preparation of the application and is a substantial road, being relatively wide and with good alignment despite it (now) being a C class road.*

10.7.42 *The Old Wells Road may be used by a small percentage of HGVs travelling to the A37 (northbound) as it avoids going through Shepton Mallet.*

10.7.43 *It is not considered necessary to expand the proposed Routeing Protocol.*

Successor Companies

10.7.44 *The S106 would be binding on successor operators of the quarry.*

10.7.45

10.7.46 In light of legal advice, the Applicant accepts that the legal obligations would be binding on successors but accepts the appropriate mechanism for the Community Fund is contractual.

10.7.47 In light of the issues raised by the Leigh on Mendip Parish Council and the response from the Applicant it is recommended that the provisions of the proposed legal agreement be amended accordingly with reference to the above matters highlighted in bold. The final details of how the Community Fund would operate should be left to the discretion of the Management Committee.

## **11. The Planning Balance**

11.1 The revised NPPF advises that Local Planning Authorities should approach decisions on proposed development in a positive and creative way and reiterates that applications for planning permission be determined in accordance with the development plan, unless material considerations indicate otherwise.

11.2 This application relates to the deepening of the extraction area, replacing the asphalt plant, associated facilities, retention of the concrete batching plant, re-opening of road access to Rookery Farm and extending the end date of quarrying to 31<sup>st</sup> December 2044 and requiring restoration by 31<sup>st</sup> December 2046 at Halecombe Quarry.

11.3 The site is recognised as an active aggregate quarry in the Somerset Minerals Plan. At current extraction rates, and given existing site constraints, there are less than 12 months reserves left at this site.

11.4 The overall objective of the proposal is to continue to operate within the existing quarry area, whilst not extending the site laterally.

11.5 The proposed development at this site would utilise the existing infrastructure and would not intensify the development above the current rates of extraction.

11.6 The proposed development has been subject to a thorough assessment as required by the Town and Country Planning (Environmental Impact Assessment) Regulations 2017 to determine potential impacts. The application has been subject to extensive consultation and engagement with consultees.

- 11.7 With the adoption of suitable mitigation measures and imposition of appropriate planning conditions it is considered that the development would not result in any significant adverse impacts on the environment or local amenity.
- 11.8 In respect of the Water Regime, which is the only element of the proposals subject to an objection, the HIAA concludes that the deepening works, when taking into account monitoring and mitigation measures incorporated into the proposed development has minimal potential to cause negative impact in the locality in comparison to the already permitted depth of extraction. This conclusion is based on the quarry deepening to 10m AOD. With the interim depth restriction, the proposed extraction to 68mAOD would be highly unlikely to have any detrimental impact on the water regime.
- 11.9 The development would also continue to provide the substantial economic benefits associated with the quarry. In addition, a Community Fund is proposed to provide financial assistance for appropriate local projects.
- 11.10 The proposal is in accordance with both the NPPF and the development plan and should therefore be supported.

## **12. Recommendation**

- 12.1 It is recommended that planning permission be GRANTED subject to the Applicant entering into a Section 106 agreement and other based on the Heads of Terms included as Appendix 1; and imposition of the following conditions and that authority to undertake any minor, non-material editing, which may be necessary to the wording of those conditions, be delegated to the Strategic Commissioning Manager, Economy and Planning Policy:**

### **1. Commencement**

The development hereby permitted shall be commenced within three years of the date of this permission.

Reason: Pursuant to Section 91(1) of the Town and County Planning Act 1990.

## **2. Notification of Commencement**

Within 7 days of the commencement of the development hereby permitted, the Mineral Planning Authority shall be notified in writing of the commencement of the development hereby permitted.

Reason: To enable the Minerals Planning Authority to monitor the development effectively.

## **3. Time limit**

This permission shall be limited to a period expiring on 31 December 2046 or such earlier date as required by the provisions of Condition 4 or 5.

There shall be no working of minerals on the Site after 31 December 2044 or such earlier date as required by the provisions of Conditions 4 or 5. The site shall be restored in accordance with the approved scheme, submitted to and approved in writing by the Mineral Planning Authority under Condition 48 within two years of the cessation of mineral workings.

Reason: To ensure that the site is restored to a satisfactory after-use within a reasonable period of time.

## **4. Excavation Depth Limit**

There shall be no extraction of limestone below 68 metres Above Ordnance Datum (apart from the provision of a quarry drainage sump) until an investigation into the impact of quarrying at Halecombe Quarry on the Bath Hot Springs System has been carried out by the operator. The investigation shall assess if there has been, will be, or may be any adverse effect to the Bath Hot Springs System.

The investigation shall include, although not be limited to:

- Implement measures to monitor flow, temperature, total heat output, water levels and groundwater levels of the Bath Hot Springs System.

The findings of such an investigation shall be submitted to the Mineral Planning Authority for consideration, in consultation with the Environment Agency and Bath and North East Somerset Council, at least 24 months prior to progressing below 68m AOD. If, in the opinion of the Mineral Planning Authority, such an investigation fails to demonstrate that there has not been, will not be, or may not be any adverse effect to the Bath Hot Springs System by quarrying at Halecombe Quarry, and if remedial measures would not mitigate any adverse effect, the Mineral Planning Authority shall give notice to the operator of this opinion within 3 months of receipt of the investigation findings.

The operator shall submit a revised Concept Restoration Plan within 6 months of the date of the notice served by the Mineral Planning Authority, showing the final quarry floor at 68mAOD. Thereafter the site shall be restored in accordance with the requirements of Condition 48.

Reason: In order to protect the integrity of groundwater resources and Bath Hot Springs.

Reason: In order to protect the integrity of groundwater resources and Bath Hot Springs.

## **5. Excavation Below 68mAOD**

If the operator has demonstrated to the satisfaction of the Mineral Planning Authority, in consultation with the Environment Agency and Bath and North East Somerset Council that there has not been, will not be or may not be any adverse effect to Bath Hot Springs System, under the requirements of Condition 4, further investigations shall be carried out, in accordance with the same criteria outlined in Condition 4, for each subsequent bench drop; these being 55m, 40m and 25m. There will also be further submissions to the Mineral Planning Authority for consideration, in consultation with the Environment Agency and Bath and North East Somerset Council, of an Annual Water Monitoring Statement for the Bath Hot Springs System to also be carried out (if progressing below 68mAOD).

The annual reports will be provided to include, although not limited to:

- All data collected to monitor flow, temperature, total heat output, water levels and groundwater levels of the Bath Hot Springs System for the reporting period (the hydrometric year October to September).
- Assessment of the occurrence of adverse effects upon the Bath Hot Springs System that may have occurred during the reporting period.
- Details of any mitigation / remedial measures implemented during the reporting period.
- A discussion of data quality issues, status of installed monitoring equipment and recommendations regarding improvements to the monitoring measures.

A further review of monitoring, quarry abstraction rates and safeguard conditions for Bath Hot Springs System to be undertaken every five years or at least 24 months prior to extraction of limestone below the next bench drop, whichever comes first.

The findings of such investigations shall be submitted to the Mineral Planning Authority for consideration, in consultation with the Environment Agency and Bath and North East Somerset Council, at least 24 months prior to progressing below each bench.

If, in the opinion of the Mineral Planning Authority, in consultation with the Environment Agency and Bath and North East Somerset Council such investigations fails to demonstrate that there has not been, will not be or may not be any adverse effect to the Bath Hot Springs System by quarrying at Halecombe Quarry, and if remedial measures would not mitigate any adverse effect, the Mineral Planning Authority shall give notice to the operator of this opinion within 3 months of receipt of the investigation findings.

The operator shall then submit a revised Concept Restoration Plan within 6 months of the date of the notice served by the Mineral Planning Authority, showing the final quarry floor at the level that quarrying ceased. Thereafter the site shall be restored in accordance with the requirements of Condition 48.

Reason: In order to protect the integrity of groundwater resources and Bath Hot Springs.

#### **6. Dewatering Limit**

If the dewatering rates are in excess of 15,000 m<sup>3</sup>/day over a continuous period of eight weeks (“the event”) then the operator shall undertake a detailed hydrogeological review of operations. This to establish the cause of the increased dewatering rates and the findings of such a review and any recommendations as to reduction of the same (including monitoring and control mechanisms) shall be submitted to an approved by the Mineral Planning Authority in consultation with the Environment Agency with four weeks of “the event”. The agreed measures shall be implemented and maintained in full.

Reason: In order to protect groundwater resources.

#### **7. Display of Planning Permission & Related Documents**

A copy of this planning permission and related documents (including the approved application details, plans and scheme of operations and any subsequent scheme submitted and approved under conditions attached to this permission) shall be made known to any person(s) given responsibility for the management, control or operation of activities at the site and copies of the said documents shall be available for inspection on site at all times

when personnel are operating at the site for the purpose of mineral extraction, maintenance or restoration.

Reason: To ensure those persons responsible for the site are aware of the terms of this permission.

#### **8. Completion in accordance with approved details**

The development hereby permitted shall be carried out in strict accordance with the approved plans, unless otherwise approved in writing by the mineral Panning Authority:-

##### Plans

Site Location Plan: M15.126.D.001 (17.02.2016)

Context Plan: H076/00145 (Feb 2017)

Current Situation (survey undertaken 05/09/2016): H076/00134 (March 2017)

Asphalt Plant Layout Plan: HAL/555 (07/03/17)

Plant Elevations: HAL/549 (08/03/17)

Block Phasing: H076/00135 (March 2017)

Phase 1: H076/00136 (March 2017)

Phase 2A: H076/00137A (October 2018)

Phase 2B: H076/00138 (March 2017)

Phase 2C: H076/0139 (March 2017)

Phase 3: H076/00140 (March 2017)

Phase 4: H076/00141 (March 2017)

Phase 5: H076/00142 (March 2017)

Phase 6: H076/00143 (March 2017)

Concept Restoration: H076/00144 (March 2017)

Maximum Extraction: H076/00147 (March 2017)

Plans & Elevations of two storey welfare facilities and control room:  
HAL/554 (07/03/17)

Plan & Elevation of Drivers Welfare Facilities: HAL/553 (21/09/16)

Plan & Elevations of Covered Aggregate Storage Bays: HAL/551  
(21/09/16)

Plan & Elevations of IBC Storage Building: HAL/552 (21.09.16)

Figure1: Access Details Lime Kiln Lane (June 2016)

Bat Corridor: M15.126.D.028 (March 2017)

##### Documents

Volume 1 Non-Technical Summary March 2017

Volume 2 Environmental Statement (including Appendices 1-3) March 2017

Volume 3 Technical Reports Part A March 2017

Volume 3 Technical Reports Part B March 2017

Volume 4 Planning Application Statement (including Appendices 1-3) March 2017

Hydrogeological Cumulative Impact Note dated 22 June 2018

Letter from QuarryPlan dated 11 September 2018

Phased Development Note (revised October 2018)

## **9. Asphalt Plant**

Prior to the construction of the proposed asphalt plant details of the colour scheme of the proposed structure shall be submitted to and approved by the Mineral Planning Authority. The asphalt plant building shall be constructed as approved.

Reason: In the interests of the amenity of the area.

## **10. Noise & Vibration Time Restriction**

There shall be no crushing, drilling, screening, face working or face loading operations except between the following times:

06:00-20:00 Monday to Friday

06:00-12:00 Saturday

Operations classified as temporary (bund formation, tipping, surface stripping and restoration) are permitted between the times:

09:00-17:00 Monday to Friday excluding Bank Holidays

The listed operations shall not take place on Sundays, Bank Holidays or National Holidays

Reason: To protect the amenity of local residents and minimise noise disturbance to the surrounding area.

## **11. Control of Blasting Times**

Other than in emergencies, no blasting shall take place except between the following times:

13:00 – 14:00 hours and 16:00 – 17:00 Monday to Friday

There shall be no blasting on Saturdays, Sundays, Bank Holidays or Public Holidays. The operator shall inform the Minerals Planning Authority within two working days if blasting was required to take place outside these times.

Reason: In the interests of the residential amenities of the locality.

## **12. Control of Blasting Impact**

No blasting shall take place unless it has been designed and carried out in accordance with an agreed Scheme of Blast Monitoring & Design at Halecombe Quarry that ensures a 95% confidence of not exceeding the peak particle vibration limits of:

- 9mm/s at the foundation of any temporary or permanent dwelling not in the ownership of the operator; and,
- 15mm/s at the foundation of Rookery Farmhouse.

The operator within 6 months of the commencement of the development hereby permitted shall submit and obtain written agreement from the Mineral Planning Authority on a 'Scheme of Blast Monitoring & Design at Halecombe Quarry'. This shall specify the details of:

- the blast design process using the blast regression curve detailed in the report provided by Rocblast dated May 2016;
- the procedure to maintain and provide blast design records to the planning authority upon request;
- the review and update process to be applied to the blast design curve throughout quarry development;
- the procedures to be adopted to minimise air over-pressure impacts;
- the procedure to investigate vibration and address blast related complaints;
- the equipment used and procedure to monitor every blast event in at least two locations. These locations in the first instance will be selected from the purpose made monitoring locations at either

Leigh-on-Mendip First School, Green Shutters or Rookery Farm but may also include any residential location under investigation;

- the procedure to inform the planning authority on occasions when vibration limits are exceeded.

Reason: In the interests of confirming appropriate blast design to safeguard residential amenities and to protect the historic features of the Listed Rookery Farm and Mells Park walls.

### **13. Reduction of Noise From Mobile Plant**

All mobile plant used in association with the development hereby permitted shall be effectively silenced to manufacturer's specifications and all noise control measures shall be maintained to their design specification for the duration of the development hereby permitted.

All mobile plant used in association with the development shall adopt broadband reverse warning alarms or adopt other visual warning devices.

Reason: In the interests of the residential amenities of the area.

### **14. Control of Noise From Extraction or Processing**

Noise from operations associated with the development when expressed as a free-field Leq (1 hour) shall not combine with noise associated with other permitted activities within the Halecombe Quarry site to exceed the following specified levels at the following locations:

During the daytime hours of 06:00-20:00

- 45dB(A) at Bellfields or The Old Vicarage;
- 46dB(A) at Knapp Hill Farm;
- 48dB(A) at Green Shutters or Soho Cottage; and
- 50dB (A) at the Traveller encampment at Park Corner.

During the evening, night-time hours of 20:00-06:00

- 35dB (A) at all of the above locations.

Reason: In the interests of the residential amenities of the area.

### **15. Control of Noise From Temporary Operations**

The Mineral Planning Authority shall be informed 2 working days prior to the intention to undertake temporary operations as defined within Technical Guidance to the NPPF (31). The total duration of temporary operations shall be recorded by the operator and shall not accumulate to

exceed a total of 8 weeks in any one calendar year unless prior agreement has been provided by the planning authority. Temporary operations shall not exceed a free-field Leq (1 hour) noise level of 70dB (A) at any residential location.

Reason: In the interests of the residential amenities of the area.

#### **16. Response to Noise and Vibration Complaints**

The operator shall adopt measures to:

- Record the full details of any noise complaints arising from activities in the permitted site and the outcome of investigations and any implementation of any preventative measures when found necessary;
- Undertake noise monitoring sufficient to demonstrate compliance with planning limits upon request by the Minerals Planning Authority, or when complaint investigation indicates noise may be at, or above planning limits; and,
- Maintain the records of noise complaints for at least a period of 12 months and provide access to such records without charge within 2 working days of a request from the Minerals Planning Authority.

Reason: In the interests of the residential amenities of the area.

#### **17. Control Of Dust**

The development hereby permitted shall be carried out in strict accordance with the Control of Dust Scheme as set out in the Appendices of the Air Quality Assessment Technical Report for Proposed quarry deepening, construction of new asphalt plant and time extension Halecombe Quarry (Quarry Plan, November 2016).

Reason: To minimise dust and airborne materials escaping from the site as a result of the operations hereby permitted, to ensure the integrity of a European site and in the interests of local amenity.

#### **18. Control of Artificial Lighting**

Within 6 months of the date of this permission a scheme for the control and mitigation of lighting pollution and glare shall be submitted to the Mineral Planning Authority for the approval in writing. The approved scheme shall be implemented in full for the duration of the development hereby permitted.

Reason: To protect the amenity of the locality and to minimise the nuisance and disturbance to neighbours and the surrounding area

#### **19. HGV Access**

There shall be no HGV vehicular access to the quarry except by the access onto Sonners Hill as shown on Drawing No: H076/00134.

Reason: In the interests of highway safety and local amenity.

#### **20. Rookery Farm Access**

The proposed Rookery Farm access shall be constructed in accordance with details shown on the submitted plan, Figure 1: Access Details Lime Kiln Lane (June 2016). Once constructed the access shall be maintained thereafter in that condition at all times.

Reason: In the interests of highway safety.

#### **21. Rookery Farm Entrance gates**

Any entrance gates erected shall be hung to open inwards, shall be set back a minimum distance of 10 metres from the carriageway edge and shall thereafter be maintained in that condition at all times.

Reason: In the interests of highway safety.

#### **22. Rookery Farm Gradient of Access**

The gradient of the access way shall not at any point be steeper than 1 in 10 for a distance of 10 metres from its junction with the public highway. This part of the access shall be maintained at that gradient thereafter at all times.

Reason: In the interests of highway safety.

#### **23. Rookery Farm Access Surfacing**

The proposed access over at least the first 10 metres of its length, as measured from the edge of the adjoining carriageway, shall be properly consolidated and surfaced (not loose stone or gravel) in accordance with details which shall have been submitted to and approved in writing by the Mineral Planning Authority. Once constructed the access shall thereafter be maintained in that condition at all times.

Reason: In the interests of highway safety.

**24. Rookery Farm Visibility Splay**

At the proposed access there shall be no obstruction to visibility greater than 600 millimetres above adjoining road level within the visibility splays shown on the submitted plan, Figure 1 Access Details Lime Kiln Lane. Such visibility splays shall be constructed prior to the use of the new access from Rookery Farm onto Lime Kiln Lane and shall thereafter be maintained at all times.

Reason: In the interests of highway safety.

**25. Lorry Sheeting**

All loaded Lorries leaving the quarry shall be sheeted to secure their loads except for vehicles less than 3.5 tonnes gross vehicle weight, part loaded large articulated lorries and lorries carrying stones in excess of 500 mm.

Reason: In the interests of highway safety, to minimise dust dispersion and to protect the environment.

**26. Wheel cleaning**

The wheel cleaning facilities at the site shall be retained and maintained for the duration of quarrying activities. No vehicle leaving the site via the Somers Hill access shall enter the public highway unless their wheels and chassis have been cleaned to prevent the deposition of detritus from the site on to the public highway. Any detritus from the site deposited on the highway shall be removed immediately and in any event at the end of each working day.

Reason: In the interests of highway safety and local amenity.

**27. Disposal of Surface Water**

Provision shall be made within the site for the disposal of surface water so as to prevent its discharge onto the highway, details of which shall have been submitted to and approved in writing by the Local Planning Authority. Such provision shall be installed before the new access from Rookery Farm onto Lime Kiln Lane is completed and thereafter maintained at all times.

Reason: In the interests of highway safety.

## **28. Safeguarding of Watercourses and Drainage**

The development hereby permitted shall be carried out in strict accordance with the approved 'Control of Surface Water Management Scheme', dated January 2003. The approved scheme shall be implemented in full for the duration of the development hereby permitted.

Reason: To prevent the increased risk of flooding.

## **29. Water Discharge**

Prior to being discharged into any watercourse, surface water sewer or soakaway system, all surface water drainage from impermeable parking areas, roadways or hardstandings for vehicles shall be passed through an oil interceptor designed and constructed to have a capacity and details compatible with the site being drained. Roof water shall not pass through the interceptor. Repair, maintenance and fuelling of plant and machinery shall where practical only take place on an impervious surface drained to an interceptor and the contents of the interceptor shall be removed from the site completely.

Reason: To minimise the risk of pollution of the water environment

## **30. Storage of fuels**

Any new or amended facilities for the storage of oils, fuels or chemicals shall be sited on an impervious base and surrounded by integral impervious bund walls, details of which shall be submitted to and approved in writing by the Mineral Planning Authority before any works commence. The volume of the bunded compound should be at least equivalent to the capacity of the tank plus 10%. If there is multiple tankage, the compound should be at least equivalent to the capacity of the largest tank or the combined capacity of interconnected tanks, plus 10% or 25% of the total volume, whichever is the greater. All filling points, vents, gauges and site glasses must be located within the bund. There shall be no working connection outside the bunded area. Associated pipe work should be located above ground where possible and shall be protected from accidental damage. All filling points and tank overflow pipe outlets shall be detailed to discharge downwards into the bund. The drainage system of the bund shall be sealed with no discharge to any watercourse, land or underground strata.

Reason: To prevent pollution of the water environment.

### **31. Stability**

The operator shall work in accordance with the design parameters in the 'Halecombe Quarry Geotechnical Assessment', report (reference 09-059-R-001) dated February 2009 and prepared by KEY GS on the likely stability of the proposed mineral excavation at Halecombe Quarry", to be updated in a biennial review, or more frequently as may be required by the Mineral Planning Authority.

Reason: To ensure the long term stability of the excavation, restoration and after-use.

### **32. Stability of final excavation**

The applicant shall submit a stability assessment of the final excavation and restoration proposals, taking into account the period of water recharge, by the designated competent person, to the Minerals Planning Authority within three months of the completion of Phase 6 and the results of the assessment shall be reviewed with the Minerals Planning Authority.

Reason: To ensure the long term stability of the excavation, restoration and after-use.

### **33. Monitoring and Reporting**

For each calendar year, and for a minimum of the following calendar year, the following information shall be retained on site and made available at all reasonable times to the Minerals Planning Authority upon request:

- A general introduction stating company aims and the relevant planning documents;
- The relevant limiting conditions;
- Other measures, either planning or self-imposed, employed to reduce impact;
- The objectives of the monitoring scheme;
- The methods by which monitoring is undertaken;
- The times at which monitoring occurs;
- The information gathered and its presentation;
- The actions resulting from monitoring;
- The actions resulting from public complaint;
- An up-to-date survey of the quarry.
- The depth of extraction

The information retained and provided upon request shall address the following:

- Weather - a log of daily weather conditions to be incorporated in the analyses of impacts;
- Blasting - to include results of the vibration and air overpressure monitoring;
- Noise - to include the measured LAeq 1 hour (free field) level in dB(A), date and time of measurement, description of site activity, and details of measuring equipment;
- Dust monitoring;
- Light monitoring;
- Water resource monitoring;
- Stability - to include results of the inspection and assessment of excavated slopes and tips where the 1999 Quarry Regulations have required this.

The effectiveness of the mitigation and monitoring shall be reviewed with the Minerals Planning Authority on an annual basis, with the exception of stability, which shall be reviewed biennially.

Reason: In the interests of the residential and visual amenities of the area, to safeguard the ecology and water environment of the locality and to protect the landscape character of the area.

#### **34. Permitted Development Rights**

Notwithstanding the provisions of Part 19 and 21 of the Town and Country Planning (General Permitted Development) (England) Order 2015, or any order amending or replacing that Order, no fixed plant or machinery, buildings, structures, erections or private ways shall be erected, extended, installed or replaced at the site, except within the area outlined by a dashed black line on Drawing No. H076/00137A.

Reason: In the interests of the visual amenities of the area

#### **35. Plant and Machinery**

The details of the mobile plant to be used in the final phase of the development as set out in letter dated 28th April 2006 and enclosures from Mr Andrew Cadell and approved by the Minerals Planning Authority on 26th July 2006 shall be implemented in full for the duration of the development hereby permitted.

Reason: To protect the amenity of the locale and to minimise the nuisance and disturbance to neighbours and the surrounding area.

### **36. Output Limit**

The annual output of stone from the quarry shall not exceed 1 million tonnes in any one calendar year, or an annual average of 900,000 tonnes over any three-year period.

Reason: To minimise possible nuisance and disturbance to adjoining properties and nearby residents, and in the interests of highway safety and the amenities of the surrounding area.

### **37. Production Figures**

Production figures for each year shall be submitted in writing to the Mineral Planning Authority before 31 January of each subsequent year.

Reason: To ensure that the Mineral Planning Authority can monitor the output of the site.

### **38. Hedges and Trees**

Unless otherwise agreed in writing by the Mineral Planning Authority all hedges and trees along and, within, the boundary of the site, not directly affected by the operations, shall be retained, maintained and protected from damage throughout the duration of the operations. No stripping of soils, excavation and deposition of materials shall be carried out, within 5m of such hedgerows or beneath the canopies of trees. Any hedgerow or tree that may be seriously damaged, removed or die during the course of, or as a result of the operations hereby permitted, shall be replaced with a plant of similar type during the next planting season, or as may be agreed with the Mineral Planning Authority.

Reason: In the interests of visual amenity and wildlife conservation.

### **39. Landscaping Scheme**

The revised programme and detailed scheme of landscaping entitled, 'Landscaping Scheme for Halecombe Quarry' dated 30th August 2007 and submitted under covering letter of the same date by Mr Andrew Cadell and approved by the Mineral Planning Authority on 24th October 2007 shall be implemented in full for the duration of the development hereby permitted.

Trees, shrubs and hedges planted in accordance with the approved scheme shall be maintained and any that may be seriously damaged, removed or die during the course of, or as a result of, the operations hereby permitted, shall be replaced with a plant of similar type during the

next planting season, or as may be agreed with the Mineral Planning Authority.

Reason: In the interests of visual amenity and wildlife conservation.

#### **40. Rights Of Way**

The three public (definitive) footpaths FR8/23, FR8/24 and FR10/1, the proposed permissive footpaths to link with existing paths, and the route of proposed footpaths as shown on the Concept Restoration Plan (H76/00144) shall be maintained in a safe and stable condition.

Appropriate measures shall be taken to ensure the safety of users of the PROWs during construction of the Rookery Farm Access and site bunding.

Reason: To ensure the safety of persons using the Right of Way network in the interests of the amenities of the area.”

#### **41. Bat Trough**

A 20m long, 5m wide, and 1m deep butyl-lined shallow trough that will be demand-fed by a piped pump from the Rookery lagoon will be constructed within 3 years of the commencement of the development hereby permitted, to feed slowly over a weir into a soakaway. The trough will have shallow margins in order that any grounded bat can swim to the side and escape. The northern bank will abut a shrub-vegetated screening bund, and the southern bank will be planted with a range of native shrubs in order to provide a sheltered and darkened corridor. However, the ends of the trough will remain open in order that bats have an unobstructed flight-path along the full length.

Reason: To ensure the integrity of a European site.

#### **42. Commuting Bats**

Details of the junction to Rookery Farm from Limekiln Lane demonstrating that commuting bats would not be affected by the creation of the access shall be submitted to and approved by the Mineral Planning Authority prior to any hedgerow removal occurring.

Reason: To ensure the integrity of a European site.

#### **43. Landscape and Ecological Management Plan**

A Landscape and Ecological Management Plan (LEMP) shall be submitted to, and be approved in writing by, the Mineral Planning Authority prior to mineral workings being carried out in Phase 2A of the permission. The content of the LEMP shall include the following:

- a) Description and evaluation of features to be managed.
- b) Ecological trends and constraints on site that might influence management.
- c) Aims and objectives of management.
- d) Appropriate management options for achieving aims and objectives.
- e) Prescriptions for management actions.
- f) Preparation of a work schedule (including an annual work plan capable of being rolled forward over a five-year period).
- g) Details of the body or organization responsible for implementation of the plan.
- h) On-going monitoring and remedial measures.

The LEMP shall also include details of the legal and funding mechanism(s) by which the long-term implementation of the plan will be secured by the developer with the management body(ies) responsible for its delivery. The plan shall also set out (where the results from monitoring show that conservation aims and objectives of the LEMP are not being met) how contingencies and/or remedial action will be identified, agreed and implemented so that the development still delivers the fully functioning biodiversity objectives of the originally approved scheme. The approved plan will be implemented in accordance with the approved details.

Reason: To ensure the integrity of a European site and in the interests of the ecology, residential and visual amenities of the area.

#### **44. Green Corridor**

A 'green corridor' will be created as shown in Tarmac drawing H086/ 'Bat Corridor' through the construction of a timber acoustic fence alongside the dryer drum (to reduce any noise emanating from this source), with the back wall of the aggregate store and the feeder canopy finished in traditional profile sheeting (of a suitable colour). A post and rail fence will then be constructed on the other side to provide a walkway for pedestrians, with suitable tree planting which will continue to the west. Tree planting will also be continued on the western and southern margins of the mobile crushing plant. The fence will be constructed within three months of the culvert being installed, protected from any subsequent construction activity and maintained for the duration of operations.

Reason: In the interests of European protected species.

#### **45. Hedgerow Planting**

Within 6 months of the completion of the access to Rookery Farm, native species hedgerows incorporating standard trees every 20 metres will be planted either side of the road as illustrated in Figure 14 of the Ecological Impact Assessment as illustrated in the Figure 14 on the Ecological Impact Assessment (Andrews Ecology, 2017). Once planted it will be managed in strict accordance with the approved Ecological Management Plan.

Reason: In the interests of the favourable conservation status of European protected species.

#### **46. Lighting design for bats**

Prior to the operation of the new asphalt plant, a “lighting design for bats” shall be submitted to and approved in writing by the Mineral Planning Authority. The strategy shall:

- a) identify those areas/features on site that are particularly sensitive for bats and that are likely to cause disturbance in or around their breeding sites and resting places or along important routes used to access key areas of their territory, for example, for foraging; and
  - b) show how and where external lighting will be installed (including the provision technical specifications) so that it can be clearly demonstrated that areas to be lit will not disturb or prevent the above species using their territory or having access to their breeding sites and resting places.
- All external lighting shall be installed in accordance with the specifications and locations set out in the design, and these shall be maintained thereafter in accordance with the design. Under no circumstances should any other external lighting be installed without prior consent from the Mineral Planning Authority.

Reason: In the interests of the favourable conservation status of European protected species

#### **47. Soils**

All areas of the site left undisturbed, and all topsoil, subsoil and soil making material mounds shall be kept clear of noxious weeds throughout the development.

Reason: In the interests of amenity and wildlife conservation.

#### **48. Restoration of the Site**

The site shall be restored and managed for nature conservation, quiet recreation, agriculture and water storage in accordance with the Concept

Restoration Plan (H76/00144) (or any revised Plan required under Conditions 4 or 5); and a scheme to be submitted for the approval in writing of the Mineral Planning Authority by 31 December 2040 or at least 12 months before final restoration works are undertaken. The scheme shall include details of the following:

- Purpose, aims and objectives for the after use of the site;
- Details of the proposed final landform and phased progression of workings towards this form;
- Extent and location of proposed works shown on appropriate scale plans;
- Method statement for ground forming and soil preparation, to include details of the overburden, sub and top soils to be used in reclaiming the site, the ripping of any compacted layers of final cover to ensure adequate drainage and aeration so that the material is suitable as a rooting medium;
- The drainage of the reclaimed land, including the formation of suitably graded contours to promote natural drainage and the installation of artificial drainage if required;
- Timing of reclamation operations in relation to phased working of the site;
- Review of nature conservation opportunities and constraints for the working, to include consideration of the establishment of limestone grassland, native broadleaf woodland, hazel coppice and artificial bat caves;
- Description of target habitats and range of species appropriate for the workings;
- Selection of appropriate strategies for maintaining or introducing target habitat or species;
- Techniques and practices for establishing habitats, species and earth heritage features;
- Sources of soil forming materials, plant stock and other species introduction including details of grass seed mixes, tree and hedgerow species, spacing, protection and management measures to provide for the use of native tree and hedgerow species and a suitable grass seed mix for the establishment of limestone grassland;
- The boundaries of the lake to be left on the conclusion of working and details of the battering down of the restored banks of the lake in accordance with Plan 'Concept Restoration Plan' (H076/00144);
- The removal of all quarry plant and machinery;
- Provision of public access;

- Provision of security measures and fencing requirements;
- Provision of an Annual Work Plan identifying the previous years' work and proposals for restoration works in the forthcoming year;
- The personnel responsible for the work;
- Proposals for monitoring the success of works carried out;
- Prescriptions and programme for aftercare works, requiring that such steps as may be necessary to bring each phase of the land reclaimed to the required standard including details of: replacement planting where plants have failed, control of undesirable species, application or incorporation of ameliorants or fertilisers, depending upon soil analyses, tree pruning and selective thinning;
- Establishment of a reclamation steering group to oversee the implementation of the approved scheme.

The Site shall be restored no later than 31 December 2046. In the event that Notice is served by the Mineral Planning Authority under Conditions 4 or 5, the Site shall be restored within 24 months of the date of notice.

Reason: To ensure that the site is left in a condition capable of beneficial after-use and in the interests of the residential amenities and ecology of the area.

#### **49. Completion of Restoration**

On completion of the restoration works in accordance with the approved scheme required under Condition 48 the operator shall seek the confirmation of completion from the Minerals Planning Authority in writing.

Reason: To confirm when the aftercare period commences.

#### **50. Restoration on cessation of Mining Operations**

In the event of there being a permanent cessation of mining operations prior to the completion of the approved maximum extraction plan (H076/00147), a scheme and programme for the final restoration and aftercare of the site shall be submitted within six months of such cessation to the Minerals Planning Authority for approval in writing. Such a scheme shall incorporate the principles embodied in the scheme approved under Condition 48. The scheme shall be implemented as approved.

Reason: To ensure that the site is left in a condition capable of beneficial afteruse and in the interests of the residential amenities and ecology of the area.

## INFORMATIVES

1. Having regards to the powers of the Highway Authority under the Highways Act 1980 the applicant is advised that the creation of the new access will require a Section 184 Permit. This must be obtained from the Highway Service Manager for the South Somerset Area at The Highways Depot, Mead Avenue, Houndstone Business Park, Yeovil, Somerset, BA22 8RT, Tel No 0845 345 9155. Application for such a permit should be made at least four weeks before access works are intended to commence.
2. Culverting works will require an application for that Land Drainage Consent made to Somerset County Council.
3. The Applicant will need to apply to the County Council to temporarily divert the Right of Way near to Rookery Farm.

## Relevant Development Plan Policies

1. The following is a summary of the reasons for the County Council's decision to grant planning permission.
2. In accordance with Section 38(6) of the Planning and Compulsory Purchase Act 2004 the decision on this application should be taken in accordance with the development plan unless material considerations indicate otherwise. **The decision has been taken having regard to the policies and proposals in:-**
  - The Somerset Minerals Plan, adopted February 2015
  - The Mendip District Local Plan Part 1: Strategy and Policies 2006-2029, adopted December 2014

The proposal is in accordance with the Development Plan and in particular the following policies: -

### Somerset Minerals Plan adopted February 2015

#### **SMP2: Crushed rock supply and landbank –**

The proposal will result in an additional 10mt of aggregate, which would represent a modest increase in the overall permitted reserves in the County.

The landbank (based on 2016 figures) would be increased by about one year. It is considered that this level of provision would not be in conflict with the policy.

**SMP3: Proposals for the extraction of crushed rock -**

The quarry is a significant employer and makes a substantial financial contribution to the economy. The quarry also provides an essential supply of crushed rock, asphalt and previously ready mixed concrete to the wider community. With the adoption of the proposed mitigation measures the development would not result in any significant adverse impacts on the environment or local communities. It is therefore considered that the proposal would comply with the requirements of the policy.

**DM2: Biodiversity and geodiversity –**

The proposed development has been the subject of a full geological and ecological assessment, in which the impacts of the proposal have been assessed and appropriate mitigation measures recommended, where necessary in order to avoid unacceptable impacts. The proposed restoration scheme has been predicted to result in a net increase in biodiversity associated with the site and the locality.

Subject to the imposition of conditions as proposed by the County Ecologist, it is considered that the proposal complies with this policy.

**DM4: Water resources and flood risk –**

The FRA concludes that the quarry would not increase flood risk in the locality as a result of the proposed operations or restoration and that no additional mitigation measures are necessary with regard to flooding related matters. The Environment Agency has raised no objection to the proposed development in respect of Flood Risk. The Lead Local Flood Authority has also raised no objection to the proposals. It is therefore considered that the proposed development complies with the policy in respect of Flood Risk.

**DM5: Mineral extraction below the water table –**

Subject to the imposition of conditions and relevant legal agreement clauses it is considered that hydrogeological impact from the proposed development would not be detrimental to local groundwater resources and would therefore comply with the policy.

**DM8: Mineral operations and the protection of local amenity –**

Subject to the imposition of the conditions recommended by the County Acoustic Officer in respect of noise and blasting controls; and conditioning of the dust management plan, which forms part of the ES, it is considered that the development complies with this policy.

Mendip District Local Plan Part 1: Strategy and Policies 2006-2029

**DP3: Conservation**

Rookery Farm is a listed building. The increased height and re-location of the Asphalt Plant close to the farm will dominate and dwarf the listed buildings. However, this negative impact is temporary, a matter of degree and compatible with the use of Rookery Farm as quarry offices for this period. The long-term outlook for the listed building has been considered along with setting. It is considered that there would not be an unacceptable adverse impact from the relocation of the asphalt plant on the setting of listed assets and the proposals would comply with this policy.

**DP4: Mendip's Landscape**

A landscape and visual impact assessment has been undertaken as part of the EIA on the proposed location for the built element, the new asphalt plant, and this demonstrates that there would be no unacceptable adverse impact. The proposed development would not involve the introduction of new and uncharacteristic features into the landscape as the proposed extraction is a deepening of the permitted void, rather than an extension in the quarry footprint. The extent of woodland cover and the frequency of intervening features within the landscape, it is not considered that the effects on landscape character or visual amenity would be significantly detrimental. The proposal is deemed to comply with this policy.

**DP5: Biodiversity and Ecological Networks –**

The envisaged restoration scheme would result in a significant net increase in biodiversity associated with the site and the wider area. The County Council, as the appropriate authority, has carried out an assessment of likely significant effect on a European site, under the Conservation of Habitats and Species Regulation, 2010 (Habitat Regulations Assessment). This concluded that the proposed development would be unlikely to cause a significant effect to the integrity of Mells Valley and the Mendip Woodlands SACs, provided that certain conditions are imposed. Subject to the imposition of these conditions it is considered that the proposal would comply with this policy,

**DP6: Bat Protection –**

The County Ecologist has recommended conditions relating to the creation of a "Bat Corridor" and a lighting design scheme for bats. Subject to the imposition of these conditions, it is considered that the impact on bats would be adequately mitigated and the proposals would comply with this policy.

**DP8: Environmental Protection –**

Subject to the imposition of the conditions recommended by the County Acoustic Officer in respect of noise and blasting controls; and conditioning of the dust management plan, which forms part of the ES, it is considered that the development complies with this policy.

**DP9: Transport Impact of New Development –**

In terms of the working quarry, the proposed development would simply represent a continuation of the existing activities other than the proposal to reopen and reintroduce the historic access to Rookery Farm for light vehicles

only, in order to avoid staff and visitors travelling to/from the offices having to pass through the working quarry. There would be no additional impact as a result of the development and it is considered compliant with this policy.

The County Council has also had regard to all other material considerations including the NPPF and Planning Practice Guidance (PPG).

Relevant paragraphs from the revised National Planning Policy Framework (NPPF) include (but are not limited to):

- Paragraph 11, which sets out how plans and decisions should apply a presumption in favour of sustainable development
- Paragraph 205, which includes the statements that:
  - When determining planning applications, great weight should be attributed to the benefits of mineral extraction, including to the economy;
  - Mineral Planning Authorities should ensure that there are no unacceptable adverse impacts on the natural and historic environment, human health or aviation safety, and take into account the cumulative effect of multiple impacts from individual sites and/or from a number of sites in a locality.
- Paragraph 207, which states that Minerals Planning Authorities should plan for a steady and adequate supply of aggregates by:
  - ensuring that large landbanks bound up in very few sites do not stifle competition; and using landbanks of aggregate minerals reserves principally as an indicator of the security of aggregate minerals supply.
- Paragraph 208, which states that Mineral Planning Authorities should plan for a steady and adequate supply of aggregates (including via the maintenance of landbanks).

The Planning Practice Guidance, with regards to aggregate landbanks, states that:

- Aggregate landbanks are an essential component of planning decision-making:
- they are the basis on which the level of provision of new areas for aggregate extraction should be calculated when preparing local mineral plans;
- they are an important means of assessing when a mineral planning authority should review the current provision of aggregates in its area; and

consider whether to conduct a review of allocation of sites in its local minerals plan; and

- for decision-making, low landbanks may be an indicator that suitable applications should be permitted as a matter of importance to ensure the steady and adequate supply of aggregates.

### **3. Statement of Compliance with Article 35 of the Town and Country Development Management Procedure Order 2015**

In dealing with this planning application the County Planning Authority has adopted a positive and proactive manner. The Council offers a pre- application advice service for minor and major applications, and applicants are encouraged to take up this service. This proposal has been assessed against the National Planning Policy Framework, Minerals Local Plan and Local Plan policies, which have been subject to proactive publicity and consultation prior to their adoption and are referred to in the reasons for approval. The County Planning Authority has sought solutions to problems arising by liaising with consultees, considering other representations received and liaising with the applicant/agent as necessary.

## APPENDIX 1

### PROPOSED HEADS OF TERMS FOR A LEGAL AGREEMENT RELATING TO HALECOMBE QUARRY DEEPENING

There are a variety of items to be included within the new legal agreement which would be required to accompany the Halecombe Quarry Deepening planning permission. A number of these items have been part of previous legal agreements completed in 1992, 2000 or 2002 and the relevant parts are listed below. The previous agreements should be referred to.

1. Protection of water resources (2000).
2. Revocation of planning permission 101393/015 and previous legal agreements.
3. Use of the quarry in perpetuity (2002).
4. Aftercare period of 10 years (2002).
5. Restoration and aftercare scheme (2002).
6. Reclamation and Management Steering Groups (2002).
7. Long term management scheme for the quarry and for Rookery Farm (2002).
8. Long term management fund (2002).
9. Footpath provision (2002).

Each of the individual items is referred to in more detail below and specific sections of previous legal agreements have been identified that can be incorporated into a new agreement.

In addition Tarmac is proposing to establish a **Local Community Fund** and a **Routeing Protocol for HGVs**. The Local Community Fund would contribute monies to a fund that would provide finances for local projects of benefit to the local community. The financial contributions would be at the rate of 2 pence per tonne of limestone sold from the quarry.

#### **1. Protection of water resources**

The protection of water resources is primarily set out in the Second Schedule and Third Schedule of the 2000 Agreement. These schedules should remain in force and can be repeated subject to a number of minor alterations as follows:

##### **Second Schedule**

Clause 2(iii) – alter the planning condition reference to Rookery Farm balancing lake.

Clause 2(iv) – alter the location of the augmentation lake from Tweed Farm to Rookery Farm. Delete the reference to Vobster Breach Colliery.

Clause 2(v) – alter the planning condition reference to Rookery Farm balancing lake.

Clause 2(vi) – alter the planning condition reference to Rookery Farm balancing lake.

Clause 2(vii) – delete as no longer relevant.

Clause 2(ix) – alter the planning condition reference to Rookery Farm balancing lake.  
Clause 2(x) – alter the planning condition reference to Rookery Farm balancing lake.  
Clause 2(xi) – delete as no longer relevant.

- Additional clause in respect of preventing extraction below 85mAOD, the current depth of the quarry (the figure referred to in the Regulation 25 consultation) until the operator has undertaken an assessment of dewatering down to the next bench level. This process would then be repeated for each bench drop (i.e. every 15m).

### **Third Schedule**

#### Part I

Clause 2(b) – the frequency of making data available to the Environment Agency is referred to as weekly although this has been agreed with the Environment Agency as a monthly period and should be amended.

#### Part 2

Two large reports prepared in the 1990's by Entec are included as Annex 5. The reports assessed the water chemistry of springs where tufa deposits (calcium carbonate) occur and established a baseline chemical quality in table 4.1.

It is not necessary to include the entirety of these reports within the new agreement. Instead the reports can be referred to and table 4.1 could be included if required.

### **Technical Note 1**

#### 1 Definitions

Within the definition of Perennial Spring(s) the springs at Bectorwood and Hurdlestone should also be referred to.

#### 3 Determining that a perennial spring has been affected

Steps 1, 2 and 3 should be replaced as they constituted an interim solution and the ongoing work referred to has been completed. The following revised steps have been agreed with the Environment Agency:

- Step 1 - At the end of each hydrometric year (October-September) define the Baseflow Index (BFI) for the reporting period.
- Step 2 - Compare the reporting period BFI with the relevant Baseline BFI in table 2.
- Step 3a - If the reporting period BFI is greater than 50% of the Baseline BFI no impact will be deemed to have occurred.
- Step 3b - If the reporting period BFI is less than 50% of the Baseline BFI, the spring will be deemed to have been affected.

The table below should also be added as Table 2:

<b>Table 2</b>		
<b>Triggers for Perennial Springs</b>		
Spring	Baseline BFI value	50% of Baseline BFI value
Whitehole Farm	0.79	0.39
Bectorwood	0.57	0.28
Hurdlestone	0.63	0.31

**Technical Note 2**

Table 2 should be replaced with the Table 3 on the following page and references to Table 2 should be changed to Table 3.

The last sentence of the last paragraph should be deleted as it is irrelevant.

**Table 3**

**Table for determining Prescribed Flow at each spring for any given value of flow at Midford (all flows in MI/d)**

Site ID	Bectorwood		Hurdlestone		Whitehole Farm Spring		Leigh Wood West		Leigh Wood East		Finger Spring/Cobby Wood	
	Prescribed Flows	Midford Flow	Prescribed Flows	Midford Flow	Prescribed Flows	Midford Flow	Prescribed Flows	Midford Flows	Prescribed Flows	Midford Flow	Prescribed Flows	Midford Flow
Step 1	0.063	73	0.063	70	0.063	16	0	66	0	66	0	66
Step 2	0.125	88	0.125	171	0.125	28	0.063	962	0.125	191	0.250	72
Step 3	0.250	137	0.250	419	0.250	54	<b>0.070</b>		0.250	281	0.500	95
Step 4	0.500	232	<b>0.300</b>		0.500	117			0.500	446	1.000	139
Step 5	<b>0.580</b>				0.750	196			<b>0.500</b>		1.500	187
Step 6					1.000	293					<b>2.420</b>	
Step 7					1.250	408						
Step 8					<b>1.360</b>							

Maximum Prescribed Flows (shown in **Bold**) are the value of Q<sub>20</sub> or Q<sub>50</sub> as listed below.

The values shown in this Table have been determined for the periods shown below.

	<b>Target Flow</b>	<b>Data Period</b>
Bectorwood	Q <sub>20</sub>	Oct 93 – Sep 95
Hurdlestone	Q <sub>20</sub>	Oct 94 – Sep 00
Whitehole	Q <sub>20</sub>	Oct 91 – Sep 00
Leigh Wood West	Q <sub>20</sub>	Oct 93 – Sep 00
Leigh Wood East	Q <sub>20</sub>	Oct 93 – Sep 00
Finger Spring/Cobby Wood	Q <sub>50</sub>	Oct 90 – Sep 00

All data presented after ENTEC. March 2001.

## **2. Revocation of planning permission 101393/015 and previous legal agreements**

Permission 101393/015 refers to the Tweed Farm balancing lake which is no longer required. The planning permission can be revoked as all planning controls are included in the new Halecombe Quarry Deepening permission.

Planning permission 101393/014 dated 19 September 2002 which relates to extraction within the main quarry void is effectively superseded as the quarry development is fully addressed within the current application. In addition planning permission 2013/1481 dated 28 March 2014 which relates to extraction in the Rookery Farm area is also superseded as the development in Rookery Farm is similarly addressed within the current application. Both these applications could be revoked as part of the approval of the current application.

The three existing legal agreements can be replaced with a single new agreement and therefore these existing legal agreements can be revoked.

## **3. Use of the quarry in perpetuity**

This requirement is to be retained as set out in clause 5 of the 2002 Agreement.

## **4. Aftercare period of 10 years**

The aftercare period of 10 years was included in the 2002 agreement and remains appropriate for the restoration proposed and should be retained. Tarmac's involvement in the management of the site will finish at the end of the 10 year aftercare period or when the company no longer has a legal interest in the site if that were to be earlier.

The definition of the Aftercare Period contained within the Fourth Schedule of the 2002 Agreement is appropriate.

## **5 Restoration and aftercare scheme**

These schemes are still required and should be retained as set out in clause 2.1 of the Fourth Schedule of the 2002 agreement subject only to an amendment to refer to the scheme being provided prior to extraction within the last phase of quarry operations, or if quarrying ceases permanently prior to that phase being extracted within 6 months of such cessation.

## **6 Reclamation and Management Steering Groups**

The two steering groups proposed in clauses 2.3 and 4 of the 2002 Agreement are likely to be very similar in terms of their membership and remit. There is also benefit

in having the same group members being involved in both the restoration/aftercare and the long term management of the site.

It is therefore proposed to have a single steering group to oversee the reclamation of the quarry and its subsequent management and to call the group the Restoration Management Steering Group.

## **7 Long term management scheme for the quarry and for Rookery Farm**

The long term management schemes referred to in the 2002 Agreement need to be retained, however they should be combined into a single scheme. Clauses 3 and 6 of the Fourth Schedule of the 2002 Agreement are suitable for this, although the text should be amended to acknowledge that Rookery Farm is a residential building and can be used as such once its use as quarry offices have ceased.

## **8 Long term management fund**

The fund is referred to in the 2002 Agreement and is necessary to ensure the costs of the site management are provided for. Clauses 5.1 and 5.2 of the Fourth Schedule of the 2002 agreement refer to the establishment of the management fund and should be repeated. The details of the fund have been accepted by Somerset and the fund is now in place.

The long term management fund was designed to generate monies whilst the quarry reserves (as at 2002) were being extracted. There is no requirement for more monies to be set aside if additional reserves of limestone were to be approved (ie the current deepening proposals) as there is no extra cost in the restoration management work for the restored site because the additional extraction is simply deepening the quarry void. It is therefore proposed that the contributions to the long term management fund are continued whilst the 8 million tonnes of existing limestone reserves are worked. Contributions to the fund would cease once 8 million tonnes had been worked.

## **9 Footpath provision**

The creation of new footpaths as set out in clauses 8, 9 and 10 of the 2002 Agreement is accepted. The footpaths were to be both permissive routes and those to be dedicated as public rights of way, they were previously identified on the restoration plan for the site. As the plan is to be superseded by the revised restoration scheme it is appropriate to identify the footpaths on the Concept Restoration plan.

The footpaths can be described as follows:

- Existing public footpaths are shown by purple dotted lines.

- New paths to be constructed within three months of restoration works being completed and to be available for dedication as public footpaths following the aftercare period are shown with blue dotted lines.
- Proposed permissive footpaths to be provided within three months of restoration works being completed are shown by yellow dotted lines.

The construction and maintenance of the footpaths would be the responsibility of Tarmac until its legal interest in the site ceases or the relevant footpaths become adopted by Somerset County Council at the end of the 10 year aftercare period.

## **10 Local Community Fund**

During the community engagement work undertaken as part of the Deepening application it was apparent that the local community were interested in benefitting from the success of the quarry. There are a number of local community organisations and worthy causes in the local parishes that are in need of support and funding. Historically support has been provided from the quarry to a variety of groups however support cannot be given to all groups and it is not the intention to favour one group over another.

It is proposed to establish a Community Fund to provide facilities and services for the benefit of communities within the parishes of Leigh on Mendip, Coleford, Mellis and Whatley. Contributions to the Community Fund would be related to the level of activity at the quarry and the distribution of monies would be carried out on a democratic basis.

Tarmac would contribute 2 pence per tonne for all material the company sold from the Halecombe Quarry site. This funding would be provided for the life of the quarry, equivalent to approximately £14,000 per year at an output of 700,000 tonnes per year and over

£360,000 throughout the lifetime of the quarry. The contributions would need to be incorporated in the new legal agreement.

A Management Committee would be established to determine how the funds are to be spent. The Committee would comprise representatives from each parish council, from Tarmac and from Somerset County Council.

Suggested text for the legal agreement relating to the Local Community Fund is provided in the Annex below.

## **11 Routeing Protocol for HGVs**

The feedback during the Community Engagement exercise carried out for the proposed development highlighted concerns over HGVs using minor roads rather than using the Bulls Green Link Road to access the A361 which is the recognised

HGV distributor road. Tarmac do not want HGVs using inappropriate roads and are committed to the use of the Bulls Green Link Road unless delivering in the immediate locality in which case alternative routes may be necessary.

A routeing agreement is proposed which would identify the appropriate HGV route between the quarry and the A361 as well as monitoring and enforcement action to be undertaken by Tarmac.

The routeing protocol would be issued to all HGV drivers visiting the site and would consist of simple instructions requiring all HGVs to turn left when exiting Halecombe Quarry and follow the signs to the A361. The weighbridge operator would confirm when drivers departed the site if alternative routes were to be used for deliveries in the immediate area.

Signage would be installed at the exit to the quarry informing drivers of the route to be taken and funding would be provided to install signage along the route to the A361. Tarmac would commit to undertake periodic spot checks on local roads to ensure compliance with the routeing protocol.

To ensure that the routeing protocol was adhered to disciplinary action would be taken against drivers who were caught in breach of the routeing protocol. On the first breach of the routeing protocol HGV drivers would receive a warning and on a subsequent breach drivers would be banned from visiting the quarry. It is considered that this would be sufficient deterrent to ensure minor roads were not used unless required for deliveries in the immediate area.

## **ANNEX**

### **SUGGESTED TEXT FOR HALECOMBE QUARRY COMMUNITY FUND**

#### **1. Background**

##### **Issue**

Halecombe Quarry is located within Leigh-on-Mendip parish council area.

There are a number of local community organisations and worthy causes in the local parishes that are in potential need of support in terms of funding or the provision of assistance. Historically support has been provided by the Quarry Operator to a variety of local groups on an ad-hoc basis.

##### **Aim**

It is proposed to formalise the means by which the Quarry Operator (the Operator) contributes to local community organisations and worthy causes.

## **Proposals**

It is proposed to establish a Community Fund to provide facilities and services for the benefit of communities within the parishes of Leigh-on-Mendip, Coleford, Mells and Whatley. Contributions to the Community Fund would be related to the level of sales of limestone from the Quarry and the distribution of monies would be carried out on a democratic basis by a Management Committee comprising of members of the local parishes and the Quarry Operator (currently Tarmac Limited) who would have the casting vote.

Through the Section 106 Agreement for the Halecombe Quarry Deepening permission the Operator would contribute 2 pence per tonne for all limestone the Operator sold from Halecombe Quarry site. This funding would be provided for the life of the Quarry.

The fund monies would be held by Somerset County Council (the Council) and payments would be made from the fund by the Council.

## **Community Fund Criteria**

The Community Fund will seek to support projects within the parishes of Leigh-on-Mendip, Coleford, Mells and Whatley that improve the lifestyles of the residents within the parishes.

Projects that have clear benefits in terms of education, recreation, nature conservation and sustainability will be supported subject to the availability of funds.

## **2. Funding**

The Operator would contribute 2 pence per tonne for all limestone the Operator sold from the Halecombe Quarry site.

Monies would be paid by the Operator to the Council who would hold the money on behalf of the Operator and would issue cheques in payment of approved funding as agreed by the Management Committee. The Operator would pay monies to the Council on a quarterly basis who would hold the monies in an interest bearing account. Interest arising from the monies held by the Council would be credited in full to the fund.

The contributions would commence on 1 January 2017 and would continue for the duration of quarrying at the site.

The 2 pence per tonne contribution would be indexed annually (upward only) in January each year in line with increases in the Aggregates Index in the 12 months to September in the previous year.

At the end of every 5 years the level of monies accrued in the Community Fund would be reviewed and if there was to be a surplus of over £20,000 the Management Committee would decide whether to allocate up to £5,000 to the necessary upkeep of each of the respective parish halls.

### **3. Funding Requests**

Requests are to be made electronically or by hard copy via the parish clerks on an agreed pro forma (see attached form) setting out the details of the request.

Requests must be for clear and deliverable community benefits within the area of the four parishes and cannot be for the benefit of individuals or profit making organisations.

Requests can be made for a financial contribution or a contribution in materials from the quarry. The supply of materials is to be at a commercial rate and the Operator would provide an itemised list of products, prices and delivery costs at the beginning of each calendar year.

Funding can be made in relation to a part or the whole of any request. Funding requests of £5,000 or less would be given priority.

Any funding is to be spent within a maximum of 6 months of the donation taking place. Funding must be used for the project it was requested for.

Funding requests must be supported by a detailed breakdown of how the monies were to be used and the Operator reserves the right to request details of expenditure such as receipts.

Requests received in the previous 6 months are to be circulated electronically by the Operator to all members of the Management Committee at the beginning of March and September.

The Operator reserves the right to provide any additional funding to groups or organisations that do not meet the Community Fund Criteria.

### **4. Management Committee**

It is proposed to establish a Management Committee to oversee the distribution of funds. The Management Committee should consist of the following members:

- Two representatives from each of Leigh-on-Mendip, Coleford, Mells and Whatley parish councils.
- Two staff from the Operator.
- One representative of Somerset County Council.

Each parish representative must be a member of the parish council.

The Chairman of the committee would be a designated representative of the Operator.

The Management Committee would review the Fund Criteria after 12 months to determine if the Criteria needed to be amended. The decision on any amendments to the Fund Criteria would be made solely by the Operator.

### Committee Meetings

Meetings would be held towards the end of March and September each year to coincide with the regular Quarry Liaison meetings.

The Operator would circulate all funding requests received during the previous 6 months to members of the Management Committee at the beginning of March and September, a minimum of two weeks in advance of the Committee meetings.

The Council would provide to the members of the Management Committee and the Operator an auditable reconciliation statement showing income (including any interest which has accrued) and expenditure and the balance standing to the fund twice a year in time for the meetings of the Management Committee.

A brief update on progress with projects that had received funding during the previous six months would be provided by the representative from the particular parish/area concerned.

At each meeting the Operator would provide detail on the level of activity at the Quarry during the previous six months and the amount of money paid into the Community Fund.

The Operator would also summarise the funding requests that had been received. The merits of the funding requests would be discussed by the Committee members before voting on:

- Which requests were to receive funding in whole or in part.
- Which requests were to be rejected.
- If there was insufficient money available to fund all genuine requests, which requests were to be returned to the applicant who would be advised to reapply.

The reasons for each decision were to be recorded in the meeting minutes.

Leigh-on-Mendip, Coleford, Mells and Whatley parishes would each have two votes. The Somerset County Council representative would not have a vote.

The Operator as Chairman would have a deciding vote and would only vote if there was a tie in voting for any particular request.

Representatives should be in attendance in order to vote.

Following the Management Committee meeting confirmation of the Committee's decision regarding each funding request shall be made by the Operator to the applicant within seven days of the meeting including, where appropriate, the reasons for not funding any request in whole or in part.

The Council would issue a cheque in the agreed amount as directed by the Management Committee within seven days of the meeting.

In the event that the Council materially breaches or derogates from its obligations the Operator shall be entitled to take over administration of the Community Funding itself including the holding and distributing of the money.

The minutes of each Management Committee meeting is to be provided on the Quarry website within seven days of the meeting. A link is to be provided to the Quarry website on each parish website.

## **5. Cessation of Community Fund**

Contributions to the Community Fund will continue whilst the Quarry is operational, irrespective of changes to the Operator.

If quarrying is temporarily suspended the Community Fund will continue in operation until all Fund monies have been expended.

If quarrying ceases permanently any monies in the Community Fund would be divided equally between the four parishes.

# The Regulation Committee

Minutes of a meeting of the Regulation Committee held on Thursday 8 November 2018 at 14.00 in the Meeting Room, Taunton Library.

## Present

Cllr J Parham (Chairman)

Cllr J Clarke

Cllr S Coles

Cllr N Hewitt-Cooper

Cllr M Keating

Cllr M Pullin

Cllr N Taylor

**Other Members Present:** Cllr P Ham

The Chairman welcomed everyone to the meeting, outlined the meeting procedures, referred to the agendas and papers that were available and highlighted the rules relating to public question time.

1 **Apologies for Absence** – agenda item 1

Cllr M Caswell, Cllr A Kendall

2 **Declarations of interest** – agenda item 2

Reference was made to the following personal interests of the Members of the Regulation Committee published in the register of members' interests which were available for public inspection in the meeting room:

Cllr S Coles

Member of Taunton Deane Borough Council  
Member of the Devon and Somerset Fire  
and Rescue Authority

Cllr N Hewitt-Cooper

Member of Mendip District Council

Cllr J Parham

Member of Mendip District Council  
Member of Shepton Mallet Town Council

Cllr M Pullin

Mendip District Council

Cllr N Taylor

Member of Mendip District Council

Cllr Taylor declared a personal interest in agenda item 5 by virtue of being Chair of the Mendip Hills AONB Partnership Committee and a member of Somerset County Council's Mendip Quarries Advisory Group.

3 **Accuracy of the Minutes of the Meeting held on 6 September 2018 – agenda item 3**

The Chairman signed the Minutes of the Regulation Committee held on 6 September 2018 as a correct record.

4 **Public Question Time – agenda item 4**

(1) There were no public questions on matters falling within the remit of the Committee that were not on the agenda.

(2) All other questions or statements received about matters on the agenda were taken at the time the relevant item was considered during the meeting.

5 **Proposed Deepening of the Quarry Extraction Area, Replacing Asphalt Plant and Extending the End Date at Halecombe Quarry, Leigh on Mendip - agenda item 5**

(1) The Case Officer with the use of maps, plans and photographs outlined the application for the deepening of the quarry extraction area, replacing the asphalt plant and associated facilities, retention of the concrete batching plant, reopening of road access to Rookery Farm and extending the end date at Halecombe Quarry, Leigh on Mendip. The application was accompanied by an Environmental Statement following an Environmental Impact Assessment.

(2) The Committee were informed that:

- the main issues for consideration were the need for/principle of development; hydrology/hydrogeology, ecology/biodiversity, and impact on amenity
- site history - there had been a series of consents for extensions and alterations since the earliest planning permission in 1948 and permissions had been granted in 2014 for the deepening of limestone extraction within the Rookery Farm (eastern) part of the quarry that allowed for the construction of a lake for water storage
- the quarry was currently permitted to work to a depth of 68 metres Above Ordnance Datum (AOD) with a requirement for excavation to be completed by 31 December 2021. There were readily accessible reserves for less than one year of production.

(3) The current application sought to deepen the quarry to its maximum extent by extracting limestone beneath the asphalt plant and developing a further four quarry benches down to 10 metres AOD. The final proposed level was comparable to other quarries in the area such as the nearby Whatley Quarry and Torr Works. The proposed depth increase would raise the total amount of reserves to approximately 16.5 million tonnes, sufficient for 24 years of production at the current extraction rate of 700,000 tonnes per year. No further deepening of the quarry was possible as there was not enough space

to widen the excavation and apart from a deeper lake all other aspects of the existing restoration scheme would remain unchanged. The historic access road between Rookery Farmhouse and Limekiln Lane would be reopened to light vehicles to serve relocated quarry offices etc in the Farmhouse and the new, more efficient asphalt plant would be positioned to the south of the Halecombe Brook.

(4) The Case Officer reported on the responses listed in the report to the consultation on the planning application for Halecombe Quarry and the reconsultation on the Note from the applicant's hydrogeological consultant and a letter from the Applicant's agent submitted as further information under the provisions of Section 25 of the Environmental Impact Assessment Regulations 2017 to supplement the Environmental Statement previously submitted. The hydrogeology Note took into account the cumulative effect of deepening Halecombe and Whatley Quarries at the same time. Most consultees had raised no objections to the proposed development subject to the imposition of conditions or other comments but objections had been received from Bath and North East Somerset Council (BANES), The (Bath) Springs Foundation and the owner of Whitehole Springs. BANES had no objection to the proposed relocation of the asphalt plant and extraction of stone to the currently permitted depth of 68 metres AOD but considered that there is a potential for dewatering to depths below the artesian head of the Hot Springs (29m AOD) to cause damage to the flow of the springs. The Springs Foundation opposes the application, on the basis that the proposed deepening of Halecombe Quarry could be potentially detrimental to the integrity of the whole of the Bath Hot Springs' hydrogeological system.

(5) The Committees attention was drawn to the late papers received, which comprised:

- comments from the Environment Agency on the proposed conditions and heads of terms for the proposed legal agreement
- representations from Mrs M Stewart of The Springs Foundation reaffirming the Foundation's previous objection to the application and asking for consideration of the application to be deferred to enable further investigations to be made regarding the implications of the proposals for the Bath Hot Springs System and for other issues to be addressed
- a request from Mr M Williams, Principal Building Control Surveyor, BANES, asking for consideration of the application to be deferred to allow the Council more time to review the report and discuss potential mitigations
- formal representations from BANES via a letter from the Council's Team Manager, Development Management (received on the morning of 8 November 2018) highlighting significant concerns about: the possible impact of the proposed development on the Bath Hot Springs, in isolation or in conjunction with other quarries; this matter not having been assessed in the Environmental Statement; the need for the Hot Springs issues to be dealt with by way of a legal agreement rather than

through (overly complex) planning conditions; and asking that the application be deferred pending assessment of the impact of the development on Bath Hot Springs and the Environmental Statement being amended accordingly.

- Request for a postponement of the Committee meeting from Mells Park House

(6) The Case Officer responded to the objections and the representations in the late papers. Further to the objections received from BANES and The Springs Foundation, he highlighted the proposed imposition of a condition (no 4) on any planning consent prohibiting extraction of limestone below 68 metres AOD until an investigation into the impact of quarrying at Halecombe Quarry on the Bath Hot Springs System had been carried out by the quarry operator, to assess whether there had been, would or might be, any adverse effect on the System, with the findings being submitted to the Mineral Planning Authority. Failure to demonstrate no adverse impact would result in the quarry not being allowed to go below 68m AOD. Subsequent bench drops would be subject to further assessments, if condition 4 was complied with, under a separate condition (no. 5). (it was estimated that 10-15 years could elapse before extraction needed to be undertaken below 68 metres AOD to maintain production levels).

(7) In conclusion the Committee was informed that it was recommended that permission for the application be granted, subject to a legal agreement consolidating/replacing existing legal agreements and including an HGV routeing protocol and the establishment of a Community Fund for the benefit of Leigh on Mendip and other local parishes, and planning conditions. These would cover matters including: the time limit for the permission; excavation depth limit; excavation below 68 meters AOD; output limit; dewatering limit; surface water drainage; blasting/noise; dust; lighting; access; landscaping; restoration and ecology/biodiversity/environmental management.

(8) The Committee heard from Mr A Cadell, Estates Manager, Tarmac, who spoke in support of the application and raised a number of points including: the importance of accessing the remaining reserves at Halecombe Quarry; that it would take 25 years to work the remaining reserves; the proposed extensive safeguarding/mitigation measures; the significant investment required; that the plans had been submitted 18 months ago; and that there would be no requirement to deepen the quarry for 12 years if the asphalt plant were to be moved.

The Committee heard from Mr V Grey speaking on behalf of the quarry's workforce and in support of the application who raised a number of points including: there were 147 people directly employed by the quarry; the support the quarry offers to local villages; and the pride the quarry takes in being a good neighbour.

The Committee heard from Mr D Sparks, representing Leigh on Mendip Parish Council who pointed out that the Parish Council fully supported the

application, referring the satisfactory management/monitoring of the quarry's existing activities and the good relationships between the quarry, Parish Council and local residents. Mr Sparks added that the Parish Council would like to see the draft Section 106 agreement.

(9) The Committee also heard from Cllr P Ham, the divisional member who spoke in support of the application and raised a number of points including: the importance of Halecombe Quarry to the local economy; the delay in determining the application and the uncertainty that this had created for the quarry, its employees and contractors/suppliers; the measures being taken to assess any possible impact on, and protect, Bath Hot Springs; the role played by the quarry company in the local community and the benefits of the proposed Community Fund. Mr Ham also asked to see the draft Section 106 agreement before it was finalised.

(10) The Committee proceeded to debate during which Members discussed, and received legal advice where appropriate on, matters including: relevant planning considerations; the role of the Section 106 agreement and planning conditions and their enforcement; BANES' late representations; BANES' apparent unwillingness to share water management monitoring data; the restoration scheme following the expiry of the new consent sought by Tarmac and protection of the environment/habitat; cessation of the current Restoration Fund. The County Council's legal representative explained why BANES' objections in their late representations were not considered to be valid. The Case Officer confirmed that BANES had been unwilling to be a party to a similar legal agreement that exists for Whatley Quarry..

(11) The Committee concluded that the proposed development accorded with policy, had been subject to an Environmental Impact Assessment (including a Hydrogeological and Hydrological Impact Assessment - HHIA) and consultation/engagement with consultees and with the adoption of suitable mitigation measures and other safeguards would not result in any significant adverse impacts on the environment and local amenity. In respect of the water regime, which was the only element of the proposals subject to an objection, it was noted that the HHIA had concluded that the deepening works, when taking into account monitoring and mitigation measures, had minimal potential to cause negative impact in the locality in comparison to the already permitted depth of extraction.

(12) Cllr Hewitt-Cooper proposed the recommendations as detailed in the officer's report, subject to an amendment to provide for the local county councillor and Leigh on Mendip Parish Council to be consulted on the draft Section 106 agreement, and this was seconded by Cllr Keating.

(13) The Committee **Resolved** in respect of planning application no. 17/1022/CNT that planning permission be GRANTED subject to the applicant entering into a Section 106 agreement based on the Heads of Terms included at Appendix 1 and the conditions set out in Section 12 of the officer's report, and the local County Councillor and Leigh on Mendip Parish Council being

consulted on the draft S106 agreement.

The Committee **Further Resolved** that authority to undertake any minor non-material editing which may be necessary to the wording of those conditions be delegated to the Strategic Commissioning Manager, Economy and Planning Policy.

(The meeting closed at 15.23)