The need for a waste management centre in the Blandford area and review of existing site

1. Introduction

- 1.1 There is a need for a new household recycling centre (HRC) and waste transfer station (WTS) for Blandford with a higher capacity and modern facilities. This is due to both increasing demand and the existing site in Blandford being unfit for purpose. This report explains in detail the reasons behind the need for a replacement facility. The report then reviews the existing site and considers whether redevelopment on the site to provide the required facility is a potential option and whether expansion onto adjoining land is a potential option.
- 1.2 The need for such a facility has been considered throughout the preparation of the new Bournemouth, Dorset and Poole Waste Plan, having been identified in the Waste Plan Issues Consultation (December 2013).

2. The need for a combined waste management centre in the Blandford area

- 2.1 Local authorities have a legal requirement to collect and dispose of waste and provide places where householders can deposit their household waste free of charge. These services for the North Dorset area are currently delivered through:
 - a combined household recycling centre (HRC) and waste transfer station (WTS) in Blandford, located on the Blandford Heights Industrial Estate;
 - two depots (one in Shaftesbury which includes a vehicle workshop and one in Blandford, located at Wimborne Road); and
 - a household recycling centre in Shaftesbury.
- 2.2 A combined facility comprising a split level HRC and purpose built WTS is sought as a replacement for the existing facility in Blandford. Such a facility would keep plant and residents separate at the HRC and would not need to close when waste containers are being serviced. Access roads and design would seek to ensure no queuing on the highway. The HRC would serve Blandford, which is the main service centre in the southern part of the district, and surrounding villages. The WTS would serve North Dorset.
- 2.3 Dorset Waste Partnership (DWP) is seeking a location at Blandford for the WTS due to it being located central to the county, when considering its function of bulking waste collected from households in North Dorset for onward transfer.¹ A review of where best geographically to locate a WTS serving North Dorset was undertaken by DWP, whereby route optimisation scenario modelling was undertaken in two areas; Blandford, where the existing site is (and more central to the county) and Gillingham, where future housing growth is likely to be largest. It was found that the location at Blandford was best in terms of acting as a contingency site for other areas of Dorset should the current arrangements for waste disposal fail in these areas. The need for a WTS facility in the Blandford area was supported by the DWP Joint Committee of 13 June 2016.
- 2.4 Without a WTS in the Blandford area, the nearest alternative places to deliver waste collected in the area are directly to a treatment plant in Canford, Poole, or to a WTS in Sherborne. Both options would require additional refuse vehicles and additional refuse crews. With a vehicle and crew costing £150,000 per annum, this would likely increase costs for DWP by £1.5m per annum and would substantially increase distances household collected waste is transported by road. Additionally, DWP consider that their commercial waste collections would become uncompetitive.
- 2.5 There are environmental and financial benefits of co-locating the waste infrastructure. Materials deposited at the household recycling centre (refuse, wood waste, green waste) can be bulked in the transfer station for transport to third party delivery points with larger tonnages. There are therefore reduced vehicle movements both between sites (as they are co-located) and from the site.

¹ Residual waste transferred onwards to New Earth Solutions, Canford Magna, or Hampshire. Green waste transferred onwards to Eco, Parley. Recyclates transferred onwards to a Materials Recycling Facility in North Wales.

2.6 Financially, the capital cost of the build (access, welfare accommodation and services) and ongoing revenue costs of equipment and site management can be shared, providing better value for money and having a positive effect on viability. Running two separate facilities has a higher cost than a combined site as additional staff resource and plant is required. DWP estimate the additional annual cost of separate facilities is around £70,000 per annum.²

3. The need for additional capacity

- 3.1 The existing HRC and WTS, located in Blandford, currently averages approximately 92,600 one-way vehicle movements per year by car or small vans and 3000 one-way HGV movements per year. In 2016/17 the site received 5,353 tonnes of waste.
- 3.2 The HRC serves Blandford, the main service centre for the southern part of the District, and surrounding area. The population of Blandford is estimated at 12,420.3
- 3.3 New housing is planned for the Blandford area, which will need to be served by both the HRC and WTS. The North Dorset Local Plan Part 1 (adopted January 2016) notes that Blandford has expanded significantly in recent years and anticipates at least 1200 dwellings being built in Blandford between 2011 and 2031. This equates to around 21% of the total dwellings proposed for the district. Additional visitors to the HRC are therefore expected.
- 3.4 The WTS serves the wider District. The Local Plan makes provision for 5,700 dwellings between 2011 and 2031. This is through development planned at Blandford as outlined above, as well as at Gillingham, Shaftesbury, Sturminster Newton, Stalbridge and some villages. Increased tonnages of household waste will therefore need to be managed through the WTS (with increased HGV movements as a result).

4. Site requirements

4.1 Dorset Waste Partnership has estimated minimum site requirements for a new HRC/WTS to meet modern standards. This is set out in Table 1.

Table 1: Site requirements

Facility	Size	Notes
HRC only	5,000 to 6,000m ²	Based on Bridport HRC / Swanage HRC working areas
WTS only	3,410m ²	Based on Bridport WTS
WTS/HRC access roads and landscaping	Dependent on design	
Waste management centre (Combined HRC & WTS, excluding depot)	8,410 m ²	Based on Bridport WTS / HRC (excluding access roads)

² Based on the contracted costs of running a standalone HRC (Dorchester) and transfer station (Hybris).

³ Population of Blandford Forum, Langton Long and Blandford St Mary combined (2016 Mid-Year Estimates, ONS). See Dorset Statistics https://apps.geowessex.com/stats/AreaProfiles/Search

- 4.2 This is based on an assessment of facilities recently built at Bridport (combined waste management centre comprising HRC and WTS) and Swanage (HRC only), both of which are located in the Dorset AONB and were designed to occupy the minimum footprint for safe and efficient operation.
- 4.3 A new, combined waste management centre would ideally cater for up to 26 parked vehicles at any time for the HRC and would also provide space on the access road for vehicles waiting for spaces should they not be available.

5. The existing household recycling centre and waste transfer site

- 5.1 The HRC and WTS is located at the Blandford Heights Industrial Estate. The footprint of the existing site (excluding access road) is 0.29ha (2890m²). The site consists of an adapted grain store and an open yard area. The site is accessed from a private access road from Shaftesbury Lane, shared with neighbouring businesses. The road is approximately 100 metres in length and averages 6.5 metres in width with no footways.
- 5.2 The current facility has long been considered inadequate in terms of operations being restricted by the site footprint, traffic management, safety and efficiency. Additionally, the site does not have secure tenure. This is discussed in further detail below.

Figure 1 - Existing Blandford waste management centre



Household recycling centre

- 5.3 The HRC operates within a fenced area measuring 1040m². Containers are accessed using gantry steps for disposal of some material and a hatch for disposing of garden waste into the WTS. This is an old-style facility which is considered to pose safety risks and accessibility constraints. A split-level facility is preferable.
- 5.4 The site caters for a maximum of 14 vehicles at one time with traffic queueing onto the access road at busy times. Container changes require site closure and this results in traffic queuing on the access road and blocking access to neighbouring businesses on a daily basis. This also causes delay to the DWP household waste collection service because it results in an inability to access the transfer facility when traffic is queuing. It can also result in potentially dangerous manoeuvring by site users.

Waste transfer station

- 5.5 The WTS is located at the rear of the site, comprising an area of 1850m². This consists of a site office, weighbridge and a 'transfer barn' with a single access/exit. The operation of the transfer station is restricted with little storage of material possible.
- 5.6 Access is restricted to one vehicle at a time. Bulkers accessing the transfer barn use the access road to reverse into the transfer area and prevent any other activities taking place at the site until the bulker is loaded, weighed and leaves the site, taking on average 30 minutes to complete. There may be up to 5 bulkers removing waste in a day. No deliveries of waste are possible when bulkers are being loaded.
- 5.7 There is no provision for queueing due to the restricted width of the access road. A tipping window has therefore been introduced so waste can only be delivered between 11:00 and 15:00 to avoid conflicts between waste deliveries and bulkers arriving to collect material for onward transit. This results in vehicles waiting in laybys and other locations around Blandford for access to the site or diverting to other transfer stations (creating inefficiencies in the waste collection service). A recent study using downtime on 17 of the 27 North Dorset fleet has shown that 30 hours per month were lost by these vehicles due to this operational constraint.
- 5.8 Over the last few years the site has had to accommodate changes to the collection service including separation of various waste streams introduced through Recycle for Dorset. Overcrowding in the barn means that the different waste streams contaminate each other, leading to poorer quality recyclate and some rejected loads from contractors treating this material. Waste is also diverted to other sites due to the restricted size of the site.
- 5.9 The current facility has no fire suppression system and the facility contains large quantities of combustible materials. There is no space available for the provision of a water holding tank of adequate capacity to provide an effective fire suppression system. There is potential for a fire to cause damage to the building and close the facility (and the adjacent HRC) for a lengthy period, where there would be disruption to waste collection and disposal activities. The transfer building is also considered to be in a poor condition.
- 5.10 The drainage in the WTS is inadequate and ponding of leachate from the waste causes damage to the floor and odour nuisance to users of the HRC, site operatives and neighbouring businesses. It is considered that major engineering works would be required for any potential future development of the site.

Site ownership

5.11 The existing site of the HRC and WTS, along with the access road, are owned by SUEZ. The site has been leased by DCC/DWP since 2002, with the current 5-year lease due to expire in 2021. DWP has not been able to purchase the site, which was offered by SUEZ in 2016 at a cost which was considered by Dorset County Council's property services to exceed market value by some margin. The site is not currently available for sale and without neighbouring land available for sale, would not provide sufficient space for the development of a modern facility in any case (this is discussed in section 6).

6. Options for redevelopment on site or expansion onto adjoining land

- 6.1 The Waste Planning Authority has assessed the possibility of delivering the required facility on the existing site through redevelopment, or through expansion onto adjoining land.
- 6.2 Maintaining the status quo is not considered to be an option due to the issues with the existing facility, outlined in section 5. The current HRC does not comply with guidance from the HSE in terms of vehicle movements, and the current site would not comply with the conditions of a modern environmental permit. There is therefore a risk of site closure.
- 6.3 If the HRC were to close, residents would need to travel a significant distance for an alternative site at Wimborne, Shaftesbury or Sherborne HRCs all of which are very congested at peak times and would not be able to physically accommodate all the residents served by the current HRC.

Option 1 - Retaining one facility on site and relocating the other facility

- 6.4 Section 2 set out the benefits of providing a combined HRC and WTS facility (known as a waste management centre). Nevertheless, and given the presence of the Area of Outstanding Natural Beauty (AONB) around much of Blandford, the option of locating the two facilities separately should be considered.
- 6.5 The site requirements for a modern facility were set out in section 4. Table 1 shows that a HRC would require 5000-6000m², whilst a WTS would require at least 3,400m². Given that the existing site comprises 2890m², it is of insufficient footprint to accommodate a requirement of a combined waste management centre or a standalone HRC or WTS. It may be possible to accommodate a waste vehicle depot on the site taking into account site size only, however the Waste Plan has not sought to allocate land for such a facility.
- 6.6 If the WTS were to be moved from the site, this would alleviate some of the issues for users of the HRC on the access road as HGV movements would reduce. Although this may provide the opportunity to provide limited improvements for the users of the facility, redevelopment could not accommodate a modern HRC separating HGVs from residents using the facility due to site size and the limitations of the access road. There would therefore still be a requirement for regular site closures when containers are exchanged on site and this causes queuing on the access road, preventing access to neighbouring businesses. In addition, there would be no room in the site to accommodate queuing vehicles, and therefore the issues around the access road becoming blocked, and therefore affecting neighbouring businesses, would remain.
- 6.7 If the HRC were to be moved from the site, this would make little difference to the operation of the transfer station since the site footprint would not allow for an efficient design that included bulker loading at the same time as waste delivery, nor the installation of a fire suppression system. Access would also remain an issue.
- 6.8 Additionally, without security of tenure, the option to invest a large amount of capital is not viable.

Option 2 - Expansion onto neighbouring land

- 6.9 Two options for expansion of the existing site onto neighbouring land within Holland Way Industrial Estate, to provide a larger site for redeveloping a waste management centre, have been considered.⁴
- 6.10 Figure 2 shows the existing waste management centre outlined in red, and the two options considered for expanding the site.

⁴ Land around the existing site was included as a site option (Ref ND01 – Holland Way) in the Draft Waste Plan (2015).



Figure 2 – Blandford WMC Expansion Options

Land to the south-east of the existing site (the 'old grain store')

- 6.11 A parcel of land to the south-east of the existing site, measuring 7700m² and containing a disused grain store, would in theory provide sufficient space for the redevelopment of a combined waste management centre, including household recycling centre and waste transfer station. The site is shown edged in blue on Figure 2.
- 6.12 The option of retaining the household recycling centre on the existing site and relocating the waste transfer building onto the adjoining grain store site was previously considered.
- 6.13 For this option to be feasible, use of a private access to the east of the old grain store, directly onto Shaftesbury Road, would be required. This is because the existing access to the current facility is shared with other businesses and use of this access for an enlarged facility would exacerbate congestion. Securing the right of access would be required and a viable method of doing this has not been achievable. Furthermore, the exit road to the east of the old grain store is also privately owned and whilst access rights exist over it for the current use, legal advice has indicated that frontage land would have to be purchased from two other landowners to carry out improvements and for maintenance purposes. An attempt by DWP to negotiate purchase of the access rights failed as the landowners were unwilling to sell.
- 6.14 In 2017, DWP had further discussions with the landowners of this site. The old grain store site is now being redeveloped into smaller business units and is not for sale, either in whole or in part. The landowners have now also withdrawn permission for access through their site. This option is therefore not deliverable.

Land to the west, north-west and south-west of the existing site (Holland Estates' Land)

- 6.15 An option to expand into the adjoining, partially vacant, land to the west, north-west and south-west of the existing site has been investigated. This land is shown edged in orange in Figure 2. This land can be accessed via Holland Way, off Shaftesbury Lane.
- 6.16 This could only be accommodated by acquiring the land from Holland Estates. The current owner of this land, Holland Estates, has stated that it is not for available for sale. This option is therefore not deliverable.

7. Conclusion

- 7.1 It is not considered possible to provide a new combined waste management centre through redevelopment of the existing site or expansion of the existing site onto neighbouring land. The former would not enable the development of a fit for purpose facility (either a stand-alone or combined facility) and would not be a viable option. The latter is not a deliverable option due to the land being unavailable.
- 7.2 A thorough search for an alternative site has been undertaken as part of the preparation of the Bournemouth, Dorset and Poole Waste Plan.