

Adroddiad

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Arolygydd a benodir gan Weinidogion Cymru

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Report

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an Inspector appointed by the Welsh Ministers

Date: 22.05.2018

TOWN AND COUNTRY PLANNING ACT 1990

SECTION 62D

The Developments of National Significance (Wales) Regulations 2016

Application by Egnedol Wales Limited

**Land formerly occupied by the Royal Navy Armament Depot (RNAD) and the
Gulf Oil Refinery at Blackbridge and Waterston, near Milford Haven,
Pembrokeshire**

ADDENDUM REPORT

Cyf ffeil/File ref: APP/N6845/A/16/3146073

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DNS Application Ref: APP/N6845/A/16/3146073

Site address: Land formerly occupied by the Royal Navy Armament Depot (RNAD) and the Gulf Oil Refinery at Blackbridge and Waterston, near Milford Haven, Pembrokeshire

- The application was made under section 62D of the Town and Country Planning Act 1990 (as amended by the Planning (Wales) Act 2015) on 8 November 2016.
- The application is made by Egnedol Wales Limited.
- The application was confirmed as valid on 22 December 2016.
- Site visits were carried out on 24 January 2017 (accompanied) and 28 March 2017 (unaccompanied), a public open forum was held on 28 March 2017, and Hearings were held on 29 and 30 March 2017.
- The development proposed is the construction of a 49.9 MW Biomass to Energy facility (BtEf), a facility for the advanced conversion of carbon to liquid fuel and gas, and (in 2 Eco Parks) an aquaculture facility to include a fish farm and prawn farm, algae production units, a cheese production unit, greenhouses, a facility for the preparation and sale of farm produce, research and development facilities, and a new grid connection.

Secondary Consent Applications

- The secondary applications were made under section 62F of the Town and Country Planning Act 1990 (as amended by the Planning (Wales) Act 2015).
- The developments proposed are the 2 Eco Parks as detailed above.

Summary of Recommendation: The applications be refused.

Procedural Matters

1. The progress of this application has not been straightforward. After the hearings were held in March 2017 the examination was suspended for 6 months up to 30 September 2017 to allow time for the Applicant to prepare and submit supplementary environmental information and information for Habitats Regulations Assessment. I then completed my report on the application which was submitted for the consideration of the Welsh Ministers in November 2017. However, in January 2018 it was decided that the examination should be suspended again in order to ensure that misunderstandings amongst the parties during the period July-September 2017 would not risk causing disadvantage to the Applicant.
2. On 24 January 2018 PINS issued formal notice of the further suspension under Section 62L(5) of the Town and Country Planning Act 1990 (as amended). The suspension was for 17 weeks, i.e. up to 23 May 2018, and made provision for the following steps:
 - by 11 April 2018: submission of the Applicant's final supplementary environmental information;
 - by 11 May 2018: advertisement of the supplementary environmental information in accordance with Regulation 22 of the Town and Country Planning (Environmental Impact Assessment) (Wales) Regulations 2016, allowing a period of 21 days for the submission of any comments;
 - by 23 May 2018: Inspector's review of the new information and determination of next steps.

3. The first step was completed on time, and Egnedol submitted a Planning Hearing Addendum Report with an explanatory letter supported by a number of appendices (Documents E1 – E15). These comprised supporting environmental information (including an updated Shadow Habitats Regulations Assessment, an updated Shadow Habitats Regulations Assessment for Marine Sites, and a Marine Environmental Impact Assessment Chapter), a number of new and updated plans, and copies of correspondence from Natural Resources Wales (NRW), Pembrokeshire County Council (PCC) and the Milford Haven Port Authority. These documents and plans are listed at the end of this Addendum Report, with the prefix “E” used to indicate this stage of the application. Video records of the marine survey were also provided. Finally, as the trail of environmental information is becoming lengthy and difficult to follow, at PINS’ request Egnedol also provided a summary of the changes in information submitted compared with that previously submitted between July/September 2017 (Document E16).
4. The supplementary environmental information was also provided to NRW and PCC, made available for public inspection, and advertised in accordance with the EIA Regulations. Detailed comments were submitted by NRW and PCC (Documents E17 and E18 respectively). Comments were also submitted by CADW, the Milford Haven Port Authority and the Hywel Dda University Health Board (Documents E19, E20 and E21) and by 3 local residents: Mrs Ann Clarke, Mr John Clarke and Mrs Shelagh O’Keefe (Documents E22, E23 and E24).
5. In the light of all of the additional environmental information submitted and the comments provided by NRW, PCC and other parties, I consider I have sufficient information to enable me to write this Addendum Report and that there is no need for any further hearing or to seek any further information.
6. Quite unrelated to this process, RWE Generation UK plc wrote to PINS saying they had not been served with formal notice of the application despite having an interest in land potentially affected by the proposed development (albeit a rather late representation). Whilst PINS is satisfied that the application proceeded in line with the relevant legislative requirements in this respect, in the interests of fairness (and as the suspension allowed it to be done with minimum disruption), RWE were given until 11 May 2018 to make any further representations they may wish to make. These were duly submitted by the deadline set (Document E25).
7. Finally, in my main report I made reference to The Conservation of Habitats and Species Regulations 2010. However, those have now been replaced by The Conservation of Habitats and Species Regulations 2017, which came into force on 30 November 2017. So far as the current applications are concerned the changes to the Regulations make no material difference to the conclusions reached in my November 2017 report. This Addendum Report does, of course, take full account of the new Regulations.

Additional Environmental Information submitted by Egnedol (Documents E1-E16)

The material points are:

8. Egnedol says the latest submitted information addresses the concerns raised by NRW and PCC in their letters to PINS of 18 and 20 October 2017, which also referred to the shortcomings in data and analysis detailed in NRW’s earlier letter of 27 April 2017 (Documents D25, D24 and D1 respectively). I took these matters into account in reaching my conclusions, as reported in my main report in November 2017.

Bats

9. The proposed site lighting scheme has been amended and refined in response to NRW's comments to minimise the effects of lights on dark flight path corridors. Certain lights have been removed from the scheme, plans SK02 and SK03 have been updated, and some building elevations have been modified to remove windows or ensure there would be no light spill from them. On mitigation measures, detailed proposals for 3 bat houses have also been submitted.
10. Further information has been provided on proposals to safeguard the blast wall and stone arch and to confirm the reduction in length of the proposed biomass storage building near to these (Building 4). Information is provided on the locations and results of 3 trial holes dug to demonstrate that construction of the storage building would not affect these existing structures, which provide important bat habitat. Scaled plans of the storage building design have also been produced and demonstrate that the nearest corner of the building would be over 20 metres away from the stone arch and that there would be protected buffer zones around each of the existing tunnel entrances. The building would use shallow pad foundations rather than piles which would minimise noise and vibration associated with construction.

Otters

11. Details of the biomass conveyor routes between the jetty and the storage building and between the storage building and the dryer hall have been produced and aim to demonstrate that they would not affect the movement of otters along the adjacent stream. It is also explained that noise and vibration levels from conveyor operation would be low and would not affect bats or otters.
12. More detailed scaled drawings of the proposed new access road have been provided to demonstrate its limited impact on the woodland area near the 2 ponds known to be used by otters. That road would not be lit and would only experience quite low levels of traffic during long-term operations. An additional assessment of the impact of the road on otters has been carried out based on its detailed alignment and design. It concludes that the proposed mitigation measures would more than outweigh any potential impact.
13. Finally, provision for a new public footpath along the northern edge of the Blackbridge site would involve the construction of a new footbridge over the Castle Pill. Information has now been provided on that proposal, and the possible impact on otters has been assessed. It concludes that the footbridge would not have an adverse effect on otters provided the proposed mitigation measures were implemented and certain existing habitat was retained. These measures could be secured by planning condition.

Marine

14. An additional marine seabed survey was carried out in March 2018 to address the criticisms that the previous survey had given poor quality results. Film of that survey has been made available to view on disk (copies submitted) and on the project website. That covered the area in the vicinity of the jetty, the 2 proposed new mooring dolphins and the temporary mooring and barge landing area that would be used for the delivery of construction equipment and materials. The survey has enabled a confident assessment of the nature and extent of seabed habitat potentially affected by the scheme to be made.

15. Further work has also been carried out to inform the Habitats Regulations Assessments for key habitats and species, which have been considered on the basis of the worst possible case scenario for the marine works. This worst possible scenario includes: the removal and replacement of the jetty deck; the removal and replacement of all jetty bracing; the installation of 2 new mooring dolphins, including the installation of piles; the use of jack-up barges to carry out the refurbishment works; and the creation of a temporary mooring location and barge landing area for the delivery of equipment and construction materials to the site. This does not include the removal and reinstallation of any jetty piles, as an inspection survey has revealed that the existing piles remain competent with minimal section loss.
16. The Shadow Habitats Regulations Assessment for Marine Sites has been reviewed and updated. All pathways have been considered as to whether there would be any likely significant effects on the European Sites. However, the assessment showed that only features of interest in the Pembrokeshire Marine SAC and the West Wales Marine cSAC needed to be considered as the impacts of the scheme would be highly localised to the marine works area.
17. NRW previously advised that for mobile species, such as grey seal and harbour porpoise, screening should take into account all SACs within the Marine Mammal Management Unit (MMMU), and they specify what the appropriate MMMUs are for those 2 species. Together they cover all of the Irish Sea and much of the coast around southern England and include over 20 SACs. The only impact extending that widely is the passage of vessels carrying biomass, which would amount to 3 movements per week, an increase of 6-7% for Milford Haven but a negligible increase further afield. In this context a 20 km search area is entirely appropriate. There are 5 European sites within that distance, and only 2 are screened in for assessment of likely significant effects, the Pembrokeshire Marine SAC and the West Wales Marine cSAC.
18. The Shadow Habitats Regulations Assessment for these sites has considered the loss/disturbance of habitats, changes to feeding habitat and prey species, noise and other disturbance, collision risk and water quality for both the construction and operational stages. It has concluded there would be no likely significant effects even without any mitigation measures. A number of proposed mitigation measures would provide further safeguards.
19. Consideration has also been given to possible "in combination impacts", and 8 other plans or projects have been identified and considered. However, it has been concluded that there would be no likely significant effect on any European site from the marine works when considered alone or when considered in combination with other plans or projects. Consequently, no further appropriate assessment is necessary.

Other Matters

20. The nature of some of the plans previously submitted had been criticised, particularly their lack of proper scaling. This has been rectified, and a number of new and amended plans have been submitted (Plans E1 – E50). These have not amended the proposed scheme but have provided more precision. In particular, they cover the proposed new access road, the detailed location and design of the biomass storage building and its association with the existing blast wall and stone arch, and the ground levels in the vicinity of the proposed greenhouses and algae preparation units.
21. Further attention has also been paid to possible aerial emissions from the process, including additional air dispersion modelling giving increased emphasis to coastal effects as well as building and natural terrain factors. The results were within 1% of the

earlier modelling work and demonstrated that the differences between the 2 model "setups" are insignificant.

22. Attention is drawn to the fact that the scheme would also require several additional licences or consents from NRW: a European Protected Species Licence for bats; a Marine Works Licence in respect of the marine works; and an Environmental Permit in respect of the biomass to energy facility. No applications have yet been made for these, and each will require the provision of detailed environmental information and, where appropriate, assessment under the Habitats Regulations. This is a material consideration in the determination of the current applications.
23. Certain aspects of the project would be subject to a further layer of regulation aimed at protecting the environment. The applications for those consents would involve detailed proposals for mitigation measures, and so it is not necessary for the same degree of detail to be finalised for the current applications. At this stage it is important that the decision maker has sufficient certainty that mitigation measures would be feasible and effective but full details of those measures would be best finalised through the other consenting processes.

Comments Submitted by NRW (Document E17)

The material points are:

Bats and Otters

24. It is acknowledged that work has been done to address many of the issues originally raised by NRW but some still remain. The information now provided on the proposed conveyor belt routes and designs does not include assessment of the effects on vegetation along the routes during the construction period. In addition, the revised scheme of bat mitigation is not clear in regard to the vegetated bund.
25. Improvements to the lighting scheme are welcomed so far as environmental protection is concerned. However, it is not clear whether it would comply with health and safety requirements under other legislation, including workplace safety legislation. On a broader front, there is a general lack of information on the deliverability of a number of the proposed mitigation measures, which leads to the conclusion that significant effects on one or more designated features cannot be ruled out.

Marine

26. It is now reported that the jetty refurbishment would include "above seabed" bracing but no "below seabed" pile replacement. However, no evidence has been provided to support the claim that the existing piles are in good condition. Similarly, it is reported that some 180 barge movements would be anticipated over an 18 months construction period. However, no evidence has been provided to justify this estimate, to explain what the frequency would be during peak periods, or to describe the nature and size of the barges or how the unloading (and loading) operations would be carried out.
27. The new drop-down video survey of the seabed now provides high quality visual evidence and is welcomed, as are the biotype maps. It is also acknowledged that piling carried out at low tide would greatly reduce the associated risks to marine species, though it would not completely eliminate risk. In addition, as only some 12 piles would be required for the new mooring dolphins, the period of risk would also be quite short. However, the effect of piling noise and vibration on harbour porpoise has still not been properly assessed. Contrary to the recognised Southall criteria, research shows that harbour porpoise are more sensitive to impulsive noise than grey seals. Consequently

it is not appropriate to assess impacts on harbour porpoise as being similar to grey seals.

28. It is reported that delivery barges would be beached on subtidal mud habitats at low tide. However, contrary to the assertion that these are dynamic environments (and so easily recoverable from change), they are in fact relatively stable and sheltered, and recovery could take 2-10 years. Particular damage would also be caused by the use of temporary moorings for high tide conditions.
29. Finally, Egnedol has clearly not fully understood the principles of Marine Mammal Management Units (MMMUs), addressing them in terms of ship movements through them. However, it is the movement of the mobile features themselves for which the various SACs within the MMMUs have been designated that need to be assessed. In this case it is the highly mobile grey seals and harbour porpoise that are the marine mammal features of concern with potential to be close to the application site but designated for SACs further afield.

Habitats Regulations Assessment

30. Attention is drawn to the recent European Court judgement on the "People over Wind" case which states that measures intended to reduce or avoid harm to European sites (mitigation measures) should not be taken into account when screening a plan or project for "likely significant effects". Taking this into account, significant effects on bat and otter features of the Pembrokeshire Bat Sites and Bosherton Lakes SAC and the Pembrokeshire Marine SAC respectively cannot be ruled out.
31. In addition, for the Pembrokeshire Marine SAC there remain uncertainties over potential impacts on habitats affected by construction works for which adequate information has not been provided. The Applicant's assessment is also inadequate so far as mobile marine mammals are concerned, where their movement around different parts of the MMMUs has not been properly considered.
32. Finally, it must be reiterated that, despite consistently advising the Applicant that related consent applications should be twin-tracked with the current applications, particularly the Environmental Permit under the Environmental Permitting Regulations 2010 and the Marine Licence under the Marine and Coastal Access Act 2009, no such applications have yet been made.

Comments Submitted by PCC (Document E18)

The material points are:

Procedural Problems

33. The application has failed to follow the best practice advice provided by PINS in respect of front-loading the application and twin-tracking related consents. The pre-application consultation was inadequate such that the environmental information submitted with the application has proved to be substandard. The numerous iterations of environmental information since have become increasingly difficult to follow, and it is difficult to be sure which documents and plans are now up to date and which have been superseded. Since the original application on 26 July 2016 and the amended application on 8 November 2017 (the current application), there have been 4 further submissions of additional and/or amended plans and documents: 14 March 2017; 18 July 2017; 29 September 2017; and 11 April 2018.

34. This has led to considerable ambiguity and uncertainty about the proposals. During discussions with the Council in February 2018 the Applicant agreed that the final submission in April 2018 would clarify all the relevant plans and documents. It is frustrating that it failed to do so.

Ecological Matters

35. Some progress has been made with the provision of scaled plans and further details, but there is still a lack of understanding of the potential impact of the proposed development. The shadow Habitats Regulations Assessment (HRA) documents submitted repeatedly assert there would be “no significant effects” but fail to provide evidence to support these conclusions. Consequently, as many issues remain unresolved, it is not considered that outstanding ecological matters could be dealt with by the use of planning conditions.
36. Attention is drawn to the recent Court of Justice of the European Union (CJEU) ruling on the “People over Wind” case, which stated that any measures intended to reduce or avoid harm to European sites (mitigation measures) should not be taken into account when screening a plan or project for likely significant effects. Thus significant effects on the Pembrokeshire Bat Sites and Bosherton Lakes SAC, the Limestone Coast of South West Wales SAC and the Pembrokeshire Marine SAC cannot be ruled out, and appropriate assessment needs to be undertaken. However, there are fundamental omissions and conflicts in the evidence which is not sufficient to enable appropriate assessment to be carried out by the Competent Authority. This is exacerbated by the piecemeal evolution of the application as each submission has tended to undermine the conclusions previously reached.
37. These problems may be illustrated by a number of examples. The first is the lack of certainty on the proposed relationship between 3 of the tunnels, the screen bund and the location of the 60 m stack and heat exchanger. Requests for clarity have merely resulted in further contradictory and ambiguous information. As a result, doubts remain about effects on integrity and conservation status in respect of bats.
38. The latest lighting scheme appears acceptable from an ecological point of view. However, there are conflicts between the commitments made by the Applicant and considerations of deliverability. The proposal is for a dark access road and greenhouse area and a considerable level of darkness in the main site area. These would appear to conflict with the requirements of health and safety at work regulations for such areas and with the Control of Substances Hazardous to Health Regulations 1999 (COSHH), which leads to concerns over the deliverability of the lighting plan.
39. Finally, there are uncertainties over the jetty works, the effects on the foreshore and the assessment of the marine SACs. For example, there would be loss of habitat due to the construction of the 2 mooring dolphins which would be at odds with the SAC management plan. The conclusions of the shadow HRA in this respect are not substantiated. In addition, reference has been made to some 180 barge movements during the construction period. However, no evidence has been provided to justify that number, to explain whether work would occur at night or at low tide, or whether the barge operations would also involve their loading with waste material to be taken away from the site.
40. The Council is of the opinion that, in these circumstances, it would be difficult for the Competent Authority (in this case, the Welsh Ministers) to undertake the appropriate assessment required by the Habitats Regulations.

Other Matters

41. Comments made at the hearing about the proposed new public footpath around the site and over Castle Pill are repeated. In order to ensure its long-term availability and benefits, the footpath would need to be a dedicated public footpath rather than the permissive path suggested by the Applicant. A dedicated footpath would contribute towards the mitigation of pedestrian safety concerns along the main road.

Comments Submitted by Other Parties

The material points are:

CADW (Document E19)

42. CADW has no objections to the impact of the proposed development on scheduled monuments, registered historic parks and gardens, registered historic landscape and listed buildings or conservation areas.

Milford Haven Port Authority (Document E20)

43. The Port of Milford Haven satisfies parts of its duties under the Milford Haven Conservancy Act and the Conservation of Habitats and Species Regulations 2017 by operating a scheme of Marine Works Licencing and Dredging Licencing within the area of the port limits. This is separate from, and required in addition to, a Marine Licence from NRW. The Marine Works Licence would cover both the construction and operational phases, and information will need to be submitted in due course to satisfy navigational safety requirements and Habitats Regulations Assessment.

Hywel Dda University Health Board (Document E21)

44. The Health Board has no grounds for objection on public health considerations and, in terms of wider public health, considers the development would be sustainable in terms of the environment and of positive benefit to the population, falling in line with the sustainable development principles of the Well-being of Future Generations (Wales) Act (2015).
45. The Applicant has assessed air quality, odours, emissions to water, waste, contaminated land, traffic and feedstock logistics. The air quality assessment shows that emissions for a range of pollutants would be less than 1% and 10% of their respective long and short term environmental benchmarks and would not lead to any significant detrimental impacts to local air quality. The air dispersion modelling shows that adverse impact on any local receptors would be unlikely.
46. Planning conditions should include provision for a travel plan which, amongst other aims, should contribute towards air quality improvements in the region.

Mrs Ann Clarke and Mr John Clarke (Documents E22 and E23)

47. The site is used by Greater and Lesser Horseshoe bats for roosting, breeding and hibernation, and these would be affected by the noise, disturbance, lighting and emissions from the plant during both construction and operation. Piling work would generate considerable noise and would be annoying to nearby humans and harmful to sensitive wildlife, such as bats, dolphins and seals. The bats would be unable to withstand the noise and intense activity over an 18 months construction period.
48. The Applicant says biomass deliveries would amount to just 3 ships per week. However, Egnedol has in mind a much larger second stage project which would involve

a lot more vessel deliveries and much longer unloading times, with associated increased marine and land-based disturbance. A new public footpath with a bridge over Castle Pill has now been included in the project, and that would make walking in the area safer, though it would have little benefit for children walking to school along the main road. The bridge and footpath would need to be accessible by wheelchair.

49. Overall, rather than use the site for a large biomass plant, it should be kept as a wildlife sanctuary or, at worst, put to a use with less impact on the surrounding environment and wildlife.

Mrs Shelagh O’Keefe (Document E24)

50. Bats and otters are protected species that have lived undisturbed on the Blackbridge site for many years. The precautions included in the scheme to protect them are ambiguous and would need to be rigorously checked and monitored. Similarly, as there are no details of the necessary Marine Licence application yet, it is difficult to assess the disturbance likely to be caused to otters, badgers and bats by the works for refurbishment of the jetty and by the seabed moorings for barges. These many concerns are exacerbated by the poor track record of energy plants of this sort.
51. There are doubts about the proposed new public footpath as its connection into the edge of Milford Haven would be via narrow connecting roads. It would not necessarily provide a viable solution to the recognised pedestrian safety issues in the area. In addition, in the absence of continuous air quality monitoring in the area, the current situation on well-being and pollution in Milford Haven is unknown.

RWE Generation UK plc (Document E25)

52. RWE owns Pembroke Power Station and associated developments. Of particular relevance to the current application, it owns land for an “Above Ground Installation” near the application site and the South Haven Gas Pipeline which runs from that Installation to the power station. Its route includes land across and adjoining the application site (see Figures 1 and 2 in Document E25) for which RWE has easement rights. The pipeline crosses the present site access road and part of the Blackbridge site near Castle Pill where it is typically 1.2 metres deep. It then crosses the Haven by means of a horizontal directional drill pipe commencing near the south-western corner of the Blackbridge site. This high pressure pipeline is critical to the operation of Pembroke Power Station.
53. Egnedol and RWE were in contact in 2015 in connection with the pipeline and a possible grid connection at the power station. However, RWE has had no further contact with Egnedol since that time. Thus, contrary to the Developments of National Significance (DNS) Procedural Guide, Egnedol has failed to engage with RWE, which is a statutory undertaker, at an early consultation stage even though it was aware of the existence of the pipeline. In this respect it failed to comply with the minimum legal requirements of the DNS procedures.
54. In practical terms, the proposed development includes works near to and over this vital high pressure gas pipeline, including ground works. These must be carried out to the required industry standards to ensure adequate protection to the pipeline. It is also worth noting that, as there has been no prior consultation, there is no agreement with RWE for Egnedol to connect to the National Grid substation at Pembroke Power Station or to the main gas pipeline owned by RWE (as indicated in the Environmental Statement).

55. RWE's gas pipeline rights include restrictive covenants to ensure the safety of the pipeline, and these would have to be maintained. In connection with this, if permission was to be granted, it is suggested a condition should be included requiring protection to be compliant with relevant health and safety legislation and the RWE Deed of Grant for the laying of the pipeline dated 14 May 2010. It could specify the agreement of a protection plan for the pipeline.

Conditions

56. In my main report I explained how suggested planning conditions had been put forward by Pembrokeshire County Council and had been the subject of opportunities to comment by the Applicant as well as NRW (who suggested several alternative conditions) and members of the public. I explained what conditions I considered to be necessary and, notwithstanding my recommendation for refusal of the applications, I included a set of conditions in an Annex to the report which I considered suitable should the Welsh Ministers be minded to grant planning permission.

57. I have reviewed that set of conditions in the light of comments made by the parties in the current submissions. As considerably more plans have now been submitted, I have rewritten Condition 2 to clearly specify the approved plans. In addition, there were duplicated conditions on the Construction Environmental Management Plan, and I have deleted one of those. To ensure the safety of the gas pipeline, the safety of works near the pipeline and the security of gas supplies to Pembroke Power Station, I also consider it necessary to include a condition to safeguard the integrity of the high pressure gas pipeline referred to by RWE above. Apart from these amendments and additional condition, nothing has been raised in the latest submissions to lead me to make any other changes to the suggested conditions. Should the Welsh Ministers be minded to grant planning permission, the recommended set of planning conditions is included as an Annex to this Addendum Report.

Conclusions

Previous Conclusions

58. In my main report (November 2017) my conclusions on ecological matters were summarised in paragraphs 274 and 275 as follows:

"274 I have concluded above that the environmental information submitted on ecological matters is not sufficient to enable Habitats Regulations Assessment to be carried out in respect of all SAC designated habitats and protected species features. Whilst the information now presented provides confidence that impacts on bats and otters could be mitigated and compensated for so that their favourable conservation status in respect of the associated SACs would be unlikely to be affected, the same conclusion cannot be reached in respect of certain marine habitats and species for which various marine SACs have been designated.

275 There are shortcomings in the data submitted and in the assessment of possible effects on the habitats and species features of the Pembrokeshire Marine SAC, which is adjacent to the application site and would be directly affected by the marine works associated with the application scheme. In addition, insufficient consideration has been given to possible effects on mobile species associated with other marine SACs, particularly the grey seal which is a feature of the West Wales Marine cSAC and for which noise disturbance is a particular conservation objective. Although common sense indicates that significant impacts would be unlikely, it is not possible to discount it with the degree of confidence needed for an assessment under Regulation 61 of the Habitats Regulations."

59. My conclusions on other matters may be summarised as follows:

- The 2 large greenhouses would be prominently located on the headland, on land that is currently open green fields, and in clear view from Milford Haven. They would appear prominent and alien in that location, particularly as the landform would be radically altered to provide 2 large terraces. They would be unacceptably harmful to the character and appearance of the area, which is away from the coast and predominantly in open countryside.
- At the Waterston part of the site 2 buildings and a car park would be located outside the former oil refinery site, on land to the east of Waterston Road. That development would be outside the land allocated for employment use in the LDP, outside the settlement boundary and in the open countryside. As such, it would be detrimental to the rural character and appearance of the edge of the village and contrary to the relevant LDP policies.
- The greenhouses and the car park would also conflict with the sustainability criteria of LDP policies GN.1 and GN.2 on account of their locations on open fields and their visual impacts on the character and appearance of the area.
- On traffic and highway safety matters, there are inconsistencies between the Transport Assessment submitted and the Applicant's latest proposal for day-to-day access to the site, which would lead to increased traffic along part of the B4325 main road in comparison with that allowed for in the Assessment. Whilst not a reason for refusal in its own right, this reinforces my conclusions on other main issues.
- The safety and efficiency of the energy generation process would be subject to control by NRW under the environmental permitting regime and, notwithstanding

assertions by some third parties, there are no reasons to have concerns on these matters so far as the current application is concerned.

- With respect to the Goals specified in the Well-Being of Future Generations (Wales) Act 2015, I share the doubts of some third parties about global responsibility, as it would be difficult to ensure that all future biomass supplies were sustainably sourced and that the localities of those sources were not harmed by the removal of trees with no compensatory replanting. However, the scheme has the potential to bring substantial benefits to the local economy and to the local market for jobs, which would support other well-being goals that have been particularly identified as being important to the people of Pembrokeshire. On balance, these would far outweigh any other well-being factors.
- There are no reasons to doubt the results of the air quality modelling work carried out, which demonstrated that levels of pollutants emitted would be very low. (The recent submission by the Health Board reinforces this conclusion, confirming that adverse effects on local receptors would be unlikely.)
- Noise levels during both construction and long-term operation would not be much higher than existing background levels, with the exception of the piling work which would only be of very short duration.

60. In addition, I recorded matters that are not in dispute amongst the main parties:

- The scheme would provide low-carbon renewable energy in support of the Welsh Government's Energy Policy Statement of 2010 which defined the move to low-carbon energy as one of its 3 main aims. The proposal would comply in principle with LDP Policy GN.4 on Resource Efficiency and Renewable and Low-carbon Energy Proposals.
- The development would bring valuable socio-economic benefits to the area, using a derelict previously developed site earmarked in the LDP for "port and energy related development", bringing investment and jobs into the local economy, and providing exciting employment opportunities which would help to relieve the loss of younger people from the area.
- Past contamination of the site has already been removed by extensive remedial works. The risks of encountering further isolated pollution could be adequately managed by suitable planning conditions.
- The only archaeological or cultural history issue raised is the possibility of encountering remains of the site's former use as a Royal Navy Armaments Depot. That could be adequately managed by a suitable planning condition.

61. The additional environmental information and other comments now submitted have not led me to reconsider any of my conclusions on non-ecological matters, and they remain valid. Similarly, the above matters on which the parties are not in dispute remain unchanged. I now turn to consider what effect the additional environmental information provided has on my conclusions on ecological matters.

Review of Ecological Matters

62. Much of the information provided has addressed detailed queries raised by NRW and PCC in relation to bats and otters, including the provision of scaled plans for various parts of the proposed development, improvements to the lighting scheme and bat houses, details of the conveyors, and an assurance that the proposed new footbridge

- over Castle Pill would not adversely affect use of the Pill by otters. Whilst the provision of these details has in some cases raised further queries from NRW and PCC (e.g. whether or not the lack of lighting would meet the requirements of health and safety legislation), they have not materially affected my assessments.
63. My previous assessments were that the impacts on bats and otters could be mitigated and compensated for so that their favourable conservation status in respect of the associated SACs would be unlikely to be affected. That conclusion is unchanged.
 64. Turning to marine habitats and species (other than the otter), the Applicant has carried out a further drop-down camera survey of the seabed in the vicinity of the jetty, the mooring dolphin locations and the proposed barge delivery area. That survey has provided high quality results which enable the nature of the seabed habitat to be appreciated in the area that would be disturbed by the proposed works. However, it has still not enabled the Applicant to justify its assessment of the impacts of the proposed works.
 65. NRW disagrees with the Applicant's assessment of the vulnerability of the subtidal mud flats that would be affected by the proposed marine works and barge activities, asserting it would take much longer for them to recover than claimed by the Applicant. I have no reason to doubt NRW's expertise on this. In addition, the Applicant has based its assessment on there not being any need to replace the jetty piles and on an estimate of 180 barge deliveries during the 18 months construction period. However, no evidence has been provided to support these assumptions, including the basis for the number of barge movements, at what stage (or stages) of the construction they would take place, and whether the barge operations would involve the loading of equipment and materials to be removed from the site as well as the unloading of equipment and materials being brought in. The Applicant's assertion that impacts on SAC habitats would be *de minimus* cannot be justified when such basic assumptions have not been justified and clarified.
 66. My November 2017 report also described concerns about the harbour porpoise, which are key features of the West Wales Marine cSAC and which have a conservation objective connected with noise disturbance. Although the Applicant now says piling operations would only be quite limited (only for the 2 mooring dolphin installations), the potential for harmful noise effects or effects that might cause behavioural change in sensitive species needs to be carried out thoroughly.
 67. For mobile species, like the harbour porpoise and grey seal, it is appropriate to consider possible effects over a wider area, and that is generally taken to be the Marine Mammal Management Unit (MMMU) area, which in this case encompasses a number of designated SACs. However, the Applicant has only carried out Habitats Regulations Assessment for marine species for the Pembrokeshire Marine SAC and the West Wales Marine cSAC, arguing that the only impact on SACs further away would be the passage of biomass delivery vessels which would be negligible.
 68. This represents a basic misunderstanding of the principle of MMMUs and mobile mammal species. The key consideration is that such species have the potential to be close to the application site at times even though they may be designated for SACs further afield. The Applicant has failed to address this possible impact.
 69. Thus so far as marine SACs and designated marine habitats and species are concerned, the additional environmental information submitted does not fully address the shortcomings identified in my previous appraisal. My conclusions remain that there are shortcomings in the data submitted and in the assessment of possible effects on the

habitats and species features of the Pembrokeshire Marine SAC and of the possible effects on mobile species associated with other marine SACs. Consequently, it is not possible to discount the possibility of adverse effects on their conservation status, as required by Regulation 63 of the Habitats Regulations.

70. The consultees have raised a new matter in connection with Habitats Regulations Assessment, the recent judgement of the Court of Justice of the European Union (CJEU) in the case of *People over Wind, Peter Sweetman v Coillte Teoranta*. That judgement was made on 12 April 2018 and ruled that Article 6(3) of the Habitats Directive must be interpreted as meaning that mitigation measures (referred to in the judgement as measures which are intended to avoid or reduce effects) should be assessed within the framework of an appropriate assessment (AA) and that it is not permissible to take account of measures intended to avoid or reduce the harmful effects of the plan or project on a European site at the screening stage (i.e. the assessment of "likely significant effects" stage).
71. I have considered whether it would be appropriate to give the Applicant an opportunity to comment on the judgement, which was made after it had submitted the additional environmental information on 11 April 2018. However, in view of the conclusions I have reached above, that would involve extra work for the Applicant without any likelihood of the shortcomings in data and assessment I have identified being rectified. Thus I consider it would be unfair to the Applicant, and that the Applicant's case would not be prejudiced by continuing without any further consultation.

Other Matters

72. There are 3 other matters that warrant attention. The first is the Applicant's claim that, as there are several associated applications yet to be made (for a European Protected Species Licence, a Marine Works Licence and an Environmental Permit) which will involve the submission of detailed environmental information, it is not necessary for the same degree of detail to be provided for the current application. It is submitted that the decision maker for the current application merely has to have sufficient certainty that mitigation measures would be feasible, with details being finalised at a later date.
73. To a large extent that is a reasonable argument under the circumstances of the current application. However, PCC has also drawn attention to the published guidance for Developments of National Significance (DNS), which advises that any related consents should be twin-tracked with the DNS application. The intention of that is clearly that all of the necessary environmental information should be provided at the onset. However, nothing of significance hinges on these arguments for the current case.
74. The second matter is PCC's submission that the numerous iterations of environmental information submitted for this application (6 separate steps have been listed) have become increasingly difficult to follow. This indicates a clear failure to properly front-load the application (i.e. to carry out proper pre-consultation with the aim of ironing out any potential disagreements before the application is formally submitted).
75. When the additional information was submitted on 11 April 2018, at PINS' request the Applicant also submitted a summary of the changes. However, the various versions of environmental data submitted over the course of the application do contain inconsistencies. I have assessed the application on my best understanding of the Environmental Statement and all of the additional environmental information submitted, and I am satisfied that my conclusions are based on the evidence available to me.

76. Finally, I consider the late representations submitted by RWE Generation UK plc (RWE), the need for which further illustrates the shortcomings in the Applicant's pre-application preparations. RWE has easement rights for a high pressure gas pipeline which crosses part of the application site and the foreshore area where it would be proposed to land barges for equipment and materials deliveries. It says it has not been consulted by the Applicant and is concerned that adequate protection measures would be put in place to safeguard the pipeline which is critical to the operation of Pembroke Power Station.
77. Whilst it is regrettable this has not been dealt with within the application documents, I consider it is a matter that could be adequately covered by a suitable planning condition for a detailed protection plan. I have included an appropriate condition in the set of conditions attached.

Overall Balance of Conclusions

78. The balance of my conclusions is little changed from those in my main report of November 2017. I consider the proposed scheme would be unacceptably harmful to the character and appearance of the area in respect of the 2 prominently located greenhouses and the associated changes to the landform at the Blackbridge site and in respect of the car park and buildings outside the settlement boundary at Waterston. In addition, there are important shortcomings in the environmental data and in the assessment of impacts on the habitats and species features of the Pembrokeshire Marine SAC and mobile species associated with other marine SACs, such that it is not possible to discount the possibility of adverse effects on their conservation status.
79. Whilst the scheme would bring a number of useful benefits, I consider these would be substantially outweighed by the harmful and potentially harmful effects described above. Consequently, I conclude that the applications should be refused.
80. I have also considered the duty to improve the economic, social, environmental and cultural well-being of Wales, in accordance with the sustainable development principle, under section 3 of the Well-Being of Future Generations (Wales) Act 2015 ("the WBFG Act"). In reaching my conclusions I have taken into account the ways of working set out in section 5 of the WBFG Act and I consider that these conclusions are in accordance with the sustainable development principle through their contribution towards one or more of the Welsh Ministers' well-being objectives set out as required by section 8 of the WBFG Act.

Recommendation

81. I recommend that planning permission be refused for both the main application and the secondary applications.

Clive Nield

Inspector

ADDITIONAL DOCUMENTS

- E1 Egnedol's Planning Hearing Addendum Report, dated April 2018, with accompanying explanatory letter of 11 April 2018 and the following Appendices:
- E2 Appendix A: NRW and PCC correspondence.
- E3 Appendix B1: Shadow Habitats Regulations Assessment, dated April 2018.
- E4 Appendix B2: Shadow Habitats Regulations Assessment, Marine Sites, dated April 2018.
- E5 Appendix B3: Marine Environmental Impact Assessment, dated April 2018.
- E6 Appendix C: Ecological Management Plan, dated April 2018.
- E7 Appendix D: Exterior Lighting Assessment, dated June 2017.
- E8 Appendix E: Drawings as detailed below.
- E9 Appendix F: Otter Reports – July 2017, June 2017, March 2018 & July 2016.
- E10 Appendix G: Earthworks Cross Section Drawings as detailed below.
- E11 Appendix H: Draft Bat EPS Licence, Revision B, dated April 2018.
- E12 Appendix J: Ground Based Tree Survey, dated June 2017.
- E13 Appendix K: Badger Survey, dated June 2017.
- E14 Appendix L: Photographs of Blast Wall.
- E15 Appendix M: Milford Haven Port Authority Correspondence, dated 9 March 2017.
- E16 Submission from Egnedol, dated 18 April 2018 (in response to PINS' request), providing a summary of changes made since July and September 2017 and including relevant NRW and PCC correspondence.
- E17 Comments submitted by Natural Resources Wales.
- E18 Comments submitted by Pembrokeshire County Council.
- E19 Comments submitted by CADW.
- E20 Comments submitted by the Milford Haven Port Authority.
- E21 Comments submitted by the Hywel Dda University Health Board.

- E22 Comments submitted by Mrs Ann Clarke.
- E23 Comments submitted by Mr John Clarke.
- E24 Comments submitted by Mrs Shelagh O'Keefe.
- E25 Submission by RWE Generation UK plc.

FURTHER PLANS SUBMITTED

- E1-E37 Plans Submitted in Appendix E:
 - E1 Replacement Plan EGW-01-001 Rev F: Master Plan
 - E2 Replacement Plan EGW-01-002 Rev D: Blackbridge Eco Park.
 - E3 Replacement Plan EGW-01-003 Rev D: BTEF- Biomass Facility.
 - E4 Replacement Plan EGW-01-025 Rev A: Jetty Frames – Existing.
 - E5 Replacement Plan EGW-01-034 Rev A: Jetty Frames – Proposed.
 - E6 Replacement Plan EGW-01-052 Rev D: Proposed Permissive Footpath.
 - E7 Replacement Plan EGW-01-054 Rev A: Pre-Construction Management Areas.
 - E8 Replacement Plan EGW-01-055 Rev B: Reptile Translocation Areas.
 - E9 Replacement Plan EGW-01-056 Rev E: Ecological Mitigation Plan.
 - E10 Replacement Plan EGW-01-061 Rev A: Location of Artificial Badger Sett.
 - E11 Replacement Plan EGW-01-066 Rev A: Maternity Roost Mitigation – Bat House Elevations.
 - E12 EGW-01-067 Rev A: Maternity Roost Mitigation – Bat House Layout.
 - E13 EGW-01-068 Rev A: Maternity Roost Mitigation – Bat House Sections.
 - E14 EGW-01-069 Rev A: Ecological Management Areas.
 - E15 EGW-01-070 Rev A: Day/Night Roost Design – Incinerator Building.
 - E16 EGW-01-071 Rev A: Day/Night Roost Design –Sea Front Bat House.

- E17 EGW-01-076 Rev E: Trial Pit Locations and Results.
- E18 EGW-01-078 Rev A: Existing Building and Tunnel References.
- E19 Replacement Plan EGW-01-092 Rev A: Building 4 Lighting Contours.
- E20 Replacement Plan EGW-01-094 Rev A: Conveyor Route.
- E21 Replacement Plan EGW-01-095 Rev A: Conveyor for Residue.
- E22 Replacement Plan EGW-01-096 Rev A: Access Road Location.
- E23 Replacement Plan EGW-01-098 Rev B: Building 4 Constraints Plan.
- E24 Replacement Plan EGW-01-099 Rev A: Pre-Construction Management Area 4.
- E25 Replacement Plan EGW-01-100 Rev A: Pipework Locations and GA.
- E26 Replacement Plan EGW-01-102 Rev A: Reservoir Access Track and Silt Trap.
- E27 Replacement Plan EGW-01-103 Rev A: Reptile Herptile Fencing Locations.
- E28 EGW-01-104 Rev D: Ground based Tree Survey.
- E29 EGW-01-105: Jetty Refurbishment 50m Buffer Zone and Barge Landing Area.
- E30 EGW-01-106: Footbridge – Otter Retained Habitat.
- E31 EGW-01-107 Rev A: SK02 – Outline Scheme of Lighting.
- E32 EGW-01-108: SK03 – Lighting Contours.
- E33 EGW-01-109: Conveyor Drive Motor/Transfer Tower Location.
- E34 EGW-01-110: Access Road and Service Corridor Section.
- E35 EGW-01-111: Blast Wall Section to be Removed.
- E36 HG-15-07-P08: Storage Building – Plan, Section and Elevation.
- E37 HG-15-07-P07 Rev A: Pyrolyser (1) and Grinding Hall (3) Proposed.

- E38-E50 Plans Submitted in Appendix G:
- E38 Replacement Plan EGW-01-079 Rev B: Algae Plateau Cross Sections, Drawing 1 of 3.
- E39 Replacement Plan EGW-01-080 Rev B: Algae Plateau Cross Sections, Drawing 2 of 3.
- E40 Replacement Plan EGW-01-081 Rev B: Algae Plateau Cross Sections, Drawing 3 of 3.
- E41 Replacement Plan EGW-01-082 Rev B: Greenhouse Plateau Cross Sections, Drawing 1 of 3.
- E42 Replacement Plan EGW-01-083 Rev B: Greenhouse Plateau Cross Sections, Drawing 2 of 3.
- E43 Replacement Plan EGW-01-084 Rev B: Greenhouse Plateau Cross Sections, Drawing 3 of 3.
- E44 Replacement Plan EGW-01-085 Rev B: Transformer Yard Cross Sections.
- E45 Replacement Plan EGW-01-086 Rev B: Storage Building Cross Sections.
- E46 Replacement Plan EGW-01-087 Rev B: Road Cross Sections, Drawing 1 of 3.
- E47 Replacement Plan EGW-01-088 Rev B: Road Cross Sections, Drawing 2 of 3.
- E48 Replacement Plan EGW-01-089 Rev B: Road Cross Sections, Drawing 3 of 3.
- E49 Replacement Plan EGW-01-090 Rev B: Road Long Section.
- E50 Replacement Plan EGW-01-093 Rev A: Section Location Plan.

Annex A – Schedule of Recommended Conditions

1. The development shall begin not later than five years from the date of this decision.
2. The development shall be carried out in accordance with the following approved plans:
 - EGW-01-001 Rev F, 002 Rev D, 003 Rev D, 004, 005, 006, 007, 008, 009 Rev A, 010, 011, 012, 013, 014 Rev A, 015 Rev A, 016 Rev A, 017 Rev A, 018 Rev A, 019 Rev A, 020 Rev A, 021, 022, 023, 024, 025 Rev A, 026, 027, 028, 029, 030, 031, 032, 033, 034 Rev A, 035, 036, 037 Rev A, 038, 039, 041, 051, 052 Rev D, 054 Rev A, 055 Rev B, 056 Rev E, 057, 061 Rev A, 066 Rev A, 067 Rev A, 068 Rev A, 069 Rev A, 070 Rev A, 071 Rev A, 074 Rev A, 076 Rev E, 077, 078 Rev A, 079 Rev B, 080 Rev B, 081 Rev B, 082 Rev B, 083 Rev B, 084 Rev B, 085 Rev B, 086 Rev B, 087 Rev B, 088 Rev B, 089 Rev B, 090 Rev B, 092 Rev A, 093 Rev A, 094 Rev A, 095 Rev A, 096 Rev A, 097, 098 Rev B, 099 Rev A, 100 Rev A, 101, 102 Rev A, 103 Rev A, 104 Rev D, 105, 106, 107, 108, 109, 110, 111;
 - HG-15-07-P01 Rev A, P02, P03, P04, P06, P07 Rev A, P08, P09, P10, P11, P12, P13, P14, P15;
 - AP-15-07-P16;
 - LSS-01-001, 002, 003, 004.
3. Construction Traffic Management Plan

Prior to the commencement of development, a Construction Traffic Management Plan (CTMP), including details of how the site is to be accessed during construction and how site accommodation and storage is to be provided, shall be submitted to and approved in writing by the Local Planning Authority. This shall include provision for access using the jetty to be made available and construction of the proposed new access road to be carried out prior to any other development. The CTMP shall be implemented in accordance with the approved details.
4. Operational Traffic Management Plan

Prior to the first operation of the development, an Operational Traffic Management Plan (OTMP) shall be submitted to and approved in writing by the Local Planning Authority. It shall include the timing of transport movements, including the loading and unloading of goods and feedstock. The OTMP shall be implemented in accordance with the approved details.
5. Staff Travel Plan

Prior to the first operation of the development, a Staff Travel Plan (STP) shall be submitted to and approved in writing by the Local Planning Authority. The STP shall be implemented in accordance with the approved details and shall continue to be implemented and developed thereafter in accordance with the approved details.
6. Prior to the commencement of development, details of proposed road safety improvements to the B4325 between Waterston and Blackbridge shall be submitted to and approved in writing by the Local Planning Authority. The improvements shall be implemented in their entirety in accordance with the approved details before any other development is commenced.

7. Prior to the first operation of the development, a scheme for the creation of a dedicated public footpath from the existing public footpath No. PP51/52 (Pembrokeshire Coastal Path and Wales Coastal Path) that crosses the site and connecting into the existing footpath network west of Castle Pill via a bridge over Castle Pill shall be fully implemented in accordance with details to be submitted to and approved in writing by the Local Planning Authority. This shall include confirmation of dedication as a public footpath (by reason of creation of an agreement under Section 25 of the Highways Act 1980).
8. Public Right of Way No. PP51/22 (Pembrokeshire Coastal Path and Wales Coastal Path) shall be kept open for public use unless and until an order under Section 257 of the Town and Country Planning Act 1990 for the diversion of the right of way has been made and confirmed in writing by the Local Planning Authority.

9. Construction Environmental Management Plan

Prior to the commencement of development, a Construction Environmental Management Plan (CEMP) shall be submitted to and approved in writing by the Local Planning Authority. It shall include details of:

- any external lighting for construction purposes;
- working hours;
- any phasing of construction works;
- pollution control measures (including noise and dust mitigation and wheel washing facilities);
- a surface water management plan;
- a waste management plan to deal with all waste generated during the construction phase; the plan shall include how waste generated will be treated, recycled and/or disposed of;
- any piling operations, including working hours and assessment of noise levels at nearby receptors.

The CEMP shall be implemented as approved.

10. Prior to the commencement of development, a detailed protection plan for RWE's high pressure gas pipeline shall be submitted to and approved in writing by the Local Planning Authority. The protection plan shall be implemented as approved.

11. Odour Abatement

Prior to the first operation of the development, details of odour abatement measures in respect of the Waterston Eco-Park shall be submitted to and approved in writing by the Local Planning Authority. The operation of the development shall be in accord with the approved details in all respects.

12. Operational Noise Control

Prior to the first operation of the development, a detailed noise mitigation scheme shall be submitted to and approved in writing by the Local Planning Authority. The noise mitigation scheme shall include a methodology for the submission and approval by the Local Planning Authority of regular noise monitoring reports and proposed mitigation. The operation of the development shall be in accord with the approved details in all respects.

Contaminated Land

13. Prior to commenced of the approved development (or such other date or stage in development as may be agreed in writing with the Local Planning Authority), the following components of a scheme to deal with the risks associated with contamination of the site shall each be submitted to and approved in writing by the Local Planning Authority:
 - (1) a preliminary risk assessment, which has identified:
 - all previous uses;
 - potential contaminants associated with those uses;
 - a conceptual model of the site indicating sources, pathways and receptors;
 - potentially unacceptable risks arising from contamination at the site;
 - (2) a site investigation scheme, based on (1) above, to provide information for a detailed assessment of the risk to all receptors that may be affected, including those off site;
 - (3) the site investigation results and the detailed risk assessment and, based on these, an options appraisal and remediation strategy giving full details of the remediation measures required and how they are to be undertaken;
 - (4) a verification plan providing details of the data that will be collected in order to demonstrate that the works set out in (3) above are complete and identifying any requirements for longer-term monitoring of pollutant linkages, maintenance and arrangements for contingency action.
14. Prior to occupation of any part of the permitted development, a verification report demonstrating completion of the works set out in the approved remediation strategy and the effectiveness of the remediation shall be submitted to and approved in writing by the Local Planning Authority. The report shall include the results of sampling and monitoring carried out in accordance with the approved verification plan to demonstrate that the site remediation criteria have been met. It shall also include any plan (a "long-term monitoring and maintenance plan") for longer-term monitoring of pollutant linkages, maintenance and arrangements for contingency action, as identified in the verification plan, and for the reporting of this to the Local Planning Authority.
15. Reports on monitoring, maintenance and any contingency action carried out in accordance with a long-term monitoring and maintenance plan for contaminated land shall be submitted to the Local Planning Authority as set out in that plan. On completion of the monitoring programme a final report demonstrating that all long-term site remediation criteria have been met shall be submitted to and approved in writing by the Local Planning Authority.
16. If, during development, contamination not previously identified is found to be present at the site then no further development (unless otherwise agreed in writing with the Local Planning Authority) shall be carried out until the developer has submitted, and obtained written approval from the Local Planning Authority for, an amendment to the remediation strategy detailing how this unexpected contamination shall be dealt with.

Landscaping

17. Prior to the commencement of development, details of both hard and soft landscape works shall be submitted to and approved in writing by the Local Planning Authority, and these works shall be carried out as approved. These details shall include:

- (i) a statement setting out the design and mitigation objectives and how these will be delivered;
- (ii) existing and proposed finished levels and contours;
- (iii) means of enclosure and retaining structures;
- (iv) vehicle and pedestrian access and circulation areas.

Soft landscape works shall include: planting plans; written specifications (including cultivation and other operations associated with plant and grass establishment); schedules of plants noting species, plant supply sizes and proposed numbers/densities where appropriate; and an implementation programme (including phasing of work where relevant).

18. All planting, seeding or turfing comprised in the approved details of landscaping shall be carried out in the first planting and seeding seasons following the occupation of the buildings or the completion of the development, whichever is the sooner. Any trees or plants which within a period of 5 years from the completion of the development die, are removed or become seriously damaged or diseased shall be replaced in the next planting season with others of similar size and species.

19. External materials

Prior to the construction of any building (and stack) hereby approved, details of the materials to be used in the construction of the external surfaces of that building (and stack) shall be submitted to and approved in writing by the Local Planning Authority. Development shall be carried out in accordance with the approved details.

Drainage

20. Prior to the commencement of development a surface water drainage plan shall be submitted to and approved in writing by the Local Planning Authority. The development shall be carried out in accordance with the approved details.

21. Prior to the commencement of development a scheme for the disposal of foul sewage shall be submitted to and approved by the Local Planning Authority. The scheme shall be implemented in accordance with the approved details prior to the first operation of the development.

22. No structure shall be built over ordinary watercourses or within 3 metres of the top of the bank of any watercourse, or within 3 metres of a culverted watercourse, without the prior written approval of the Local Planning Authority.

23. Archaeology

No development shall commence until the Local Planning Authority has been informed in writing of the name of a professionally qualified archaeologist who is to be present during the undertaking of any excavations in the development area so that a watching brief can be conducted. No work shall commence until the Local Planning Authority has confirmed in writing that the proposed archaeologist is suitable. A copy of the watching brief report shall be submitted to the Local Planning Authority within two months of the archaeological fieldwork being completed.

24. Retail

Prior to the commencement of development, details of the extent of any retail use shall be submitted to and approved in writing by the Local Planning Authority. The operation of the development shall thereafter be in accordance with the approved details.

25. Bat Mitigation

No development shall commence until an appropriate scheme of bat mitigation has been submitted to and approved in writing by the Local Planning Authority. This should include but not be limited to:

- (i) The provision of compensatory roosts away from buildings where noise and vibration is likely to be an issue (e.g. the pyrolyser building/buildings 1 and 2);
- (ii) Details of the refurbishment of tunnel entrances;
- (iii) Implementation of a minimum 12m vegetation buffer along the western elevation of storage building 4, and that this is secured from public access by means of 2.8m palisade fence, to act as a buffer to the blast wall; and
- (iv) An appropriate scheme of long-term habitat management across the site (cross referenced to and part of any Ecological Management Plan).

The scheme shall be implemented as approved.

26. Otter Mitigation

No development shall commence until appropriate measures are in place for the protection of otters so that they can continue to use both Castle Pill and the Blackbridge foreshore during both the construction and operational phases of the development. They shall include those measures set out in the otter surveys report and include the following:

- (i) Daytime working hours are to be adopted for any construction works, to commence no earlier than one hour after sunrise and finish no later than one hour before dusk; at night a quiet dark corridor is to be retained along the watercourse and its bankside vegetation;
- (ii) Construction materials are to be stored well away from the watercourse and in a way that prevents otters gaining access to them or using them to rest in (e.g. pipe ends to be capped or covered);
- (iii) Any trenches left open overnight are to have planks of wood placed at regular intervals to allow otters a way out;
- (iv) All tools, food, litter and construction materials and packaging that may constitute a hazard to otters are to be removed from the site daily; and
- (v) Any areas that may be suitable for use by otters are to be checked by a suitably qualified, experienced and licensed ecologist immediately prior to works commencing.

27. Lighting Strategy

No development shall commence until a lighting strategy, to include details of any floodlighting, external lighting and external light spill from buildings, has been submitted to, and approved in writing by, the Local Planning Authority. The development shall be carried out and retained in accordance with the approved lighting strategy. There shall be no other external illumination other than that forming part of the approved lighting strategy.

28. Ecological Management Plan

Prior to the commencement of development an Ecological Management Plan (EMP) shall be submitted to, and approved in writing by, the Local Planning Authority. The EMP shall be implemented as approved and should include the following matters:

- (i) Detailed proposals for vegetation retention, clearance and creation in front of each of the tunnels and the stone arch, around building 9, and between buildings 9 and 16, to include scaled drawings to show the existing and proposed situations;
- (ii) Description of habitat types to be created, management prescriptions to support the development of those habitats and management prescriptions for their maintenance when the habitats meet the desired condition;
- (iii) Detail of the frequency for the submission of written monitoring reports and the content of those monitoring reports;
- (iv) Arrangements for any remedial action identified by the monitoring reports; and
- (v) Detail of the organisation(s) responsible for the long-term management and monitoring of the site and of the legal and funding mechanism by which the long-term implementation of the EMP will be secured.