For: PLANNING & REGULATION COMMITTEE - 10 SEPTEMBER 2018

By: Director for Planning & Place

Development Proposed: Section 73 application to vary condition 2 of planning permission EHE/9294/1 to allow for import of a small amount of Intermediate Level Waste (ILW) from Winfrith to Harwell for encapsulation and interim storage.

Division Affected: Hendreds and Harwell

Contact Officer: Kevin Broughton Tel: 07979 704458

Location: 462 Complex, Rutherford Avenue, Harwell, Oxford OX11

0DF

Application No: MW.0036/18 **District Ref:** P18/V1310/CM

Applicant: Magnox Ltd

District Council Area: Vale of White Horse

Date application:

Received

11 May 2018

Consultation Period: 31 May – 21 June 2018.

Contents

- Part 1- Facts and Background
- Part 2 Other Viewpoints
- Part 3 Relevant Planning Documents
- Part 4 Analysis and Conclusions

Part 1 – Facts and Background

Location (see site plan Annex 1)

- 1. The Waste Encapsulation and Treatment Plant (hereafter referred to as the 'WEP') and Vaults store lie within the 462 Complex within the Harwell Campus in southern Oxfordshire. The nearest villages are Chilton (1.75km to the south east), Harwell (2.5km to the north east and East Hendred (2km to the north west) of the application site. The town of Didcot located 6km (3.75 miles) to the north east of the site. The 462 Complex covers an area of approximately 3.7 hectares.
- 2. The site forms part of a licenced nuclear site.
- 3. The application site is within an existing complex of buildings used for the management of solid waste materials and is located outside the floodplain.
- 4. Directly to the north west of the site boundary is an area of grassland and planting, beyond which is the Campus' perimeter planting. Public Bridleway no. 199/26/10 and Restricted Byway no. 19/6/40 run along the Campus' perimeter. Beyond the estate and to the north west the land is primarily in agricultural use.
- 5. To the south-eastern side of the 462 Complex is an internal access road known as Rutherford Avenue.
- 6. The site is located within the North Wessex Downs Area of Outstanding Natural Beauty (AONB).
- 7. The nearest residential property outside of the Harwell campus is located approximately 700 metres to the south west of the site (within East Hendred village).
- 8. Access to the application site is via the A4185 Rowstock to Chilton Road (Newbury Road) which has access to the wider network via the A417 and A34. The Harwell campus is a private estate and is served by a network of private roads

<u>History</u>

- 9. The Harwell site was originally an RAF station and was subsequently established as Britain's first Atomic Energy Research Establishment in 1946. Most of the nuclear reactors and research facilities were built between 1946 and 1960. Decommissioning of the facilities began during the 1990s.
- 10. Magnox Ltd manages and operates the former United Kingdom Atomic Energy Authority (UKAEA) sites at Harwell in Oxfordshire and Winfrith in Dorset on behalf of the Nuclear Decommissioning Authority (NDA). It is the site licence company responsible for the closure programme at both of these sites. Decommissioning results in the generation of radioactive wastes including Low

Level Wastes (LLW) as well as wastes with higher levels of radioactivity called Intermediate Level Wastes (ILW). ILW will ultimately be disposed of in a national Geological Disposal Facility (GDF) but this facility will not be available until after 2040. In the meantime, the decommissioning of nuclear facilities will require storage facilities to store ILW.

11. A number of planning permissions have been granted within the Harwell campus by the County Council. The permissions amongst other matters cover existing facilities for the storage of intermediate and low level radioactive waste which have been produced at Harwell since its establishment in 1946. The current planning permission for the WEP facility to which the current application is a variation was granted in 2003. The Vaults Store was constructed during the operational phase of the site's life when a Special Development Order (SDO) was in place and is not subject to any planning condition restrictions but is referenced for completeness. Therefore, at the time, the facility did not require planning permission. Separate planning permissions have been granted for the ILW box store building but this is not affected by the current application.

Details of the Development

12. Condition 2 of outline planning permission reference EHE/9294/1 states:

Save for any waste from outside sources held on site at the date of this permission, no waste sources from outside Harwell shall be processed in the plant hereby approved.

Reason: To minimise lorry traffic generation and the duration of disturbance from the workings."

- 13. The application seeks to vary Condition 2 of planning permission EHE/9294/1, for the development of the WEP. A variation to Condition 2 is required to allow a very small amount of Intermediate Level Waste (ILW) to be imported from Winfrith to the Harwell site for processing in the WEP and interim storage in the Vaults Store pending eventual final disposal off site. This is required since Condition 2 would otherwise preclude wastes from outside Harwell being processed in the WEP. No physical or other changes are proposed to the WEP or the Vaults Store. Both facilities have spare capacity available to accommodate the very small amount of additional waste. The development would generate a total of 16 vehicle movements all together over a three to four year period.
- 14. The original suggested revised wording of condition 2 is as follows:

Save for any waste from outside sources held on site at the date of this permission or any waste originating at Magnox's Winfrith Site, no waste sources from outside Harwell shall be processed in the plant hereby approved.

Reason: To minimise lorry traffic generation and the duration of disturbance from the workings."

However following receipt of the comments received from local parish councils, the suggested revised wording of condition 2 has been amended as follows:

Other than up to 17m3 of waste from the Winfrith site as set out in section 3 of the planning statement dated April 2018, no waste from sources outside the Harwell nuclear licensed site shall be imported to, or processed in the plant hereby approved.

- 15. The applicant states that the proposals would result in a scenario whereby the WEP, Vaults Store and ILW Box Store building at Harwell are able to accommodate all of Winfrith's ILW that is anticipated to require interim storage. Therefore, although the simple method of revising the condition suggested above does not restrict the volume of waste that can be imported or the timing of the transport, this is not considered to prejudice the reason for imposing the condition in the first place. The amount of waste proposed for import is so low and it is not anticipated that any other ILW from Winfrith would need to be stored at Harwell, other than that identified in this application and in the planning permission for the ILW store.
- 16. A breakdown of the current wastes anticipated to be transported are as follows:
 - Approximately 8 modular flasks from the Dragon Reactor and Steam Generating Heavy Water Reactor – 4.16m3
 - Approximately 18 x 500 litre drums of Thorium 9m3
 - Potential for small volumes of currently unidentified wastes as the decommissioning of Winfrith progresses – less than 1m3
 - Potential for two sea disposal drums 2m3
- 17. The applicant considers that the development is consistent with development plan policies and the Nuclear Decommissioning Strategy III which is a material consideration. It is considered that the approval of this planning application would result in planning permission being in place for the storage of all of Winfrith's ILW (that requires interim storage) at Harwell, effectively and sustainably sharing assets in line with national policy for radioactive waste management.

Part 2 - Other Viewpoints

Third Party Representations

18. No third party representations have been received.

Consultation Responses

- 19. The Office for Nuclear Regulation comments to come.
- 20. Natural England has no comments to make on the application.
- 21. The Environment Agency has no objection to the application.

- 22. The Vale of White Horse District Council has no comments to make on the application either as District planning or Environmental Health Authority.
- 23. Transport Development Control for the County as Highway Authority has no objection to the application.
- 24. The County Council as Fire Service has no concerns from a fire safety perspective.
- 25. Chilton Parish Council has no objection to this specific request to vary Condition 2 of Planning Permission EHE/9294/1, that is, to allow receipt, processing and interim storage of an additional 16 cubic metres of intermediate level radioactive waste from Winfrith. However, the Council would object to a rewording of condition 2 (NB as originally proposed) that would allow further additional receipts of intermediate waste from Winfrith without agreement of further variations to condition 2 as defined at the time of granting planning permission. Therefore, the Council would **not** support the proposed rewording given in the Planning Statement. The sensitivity of importing intermediate waste to Harwell from outside of Oxfordshire was recognised prior to granting planning permission for the Intermediate level waste box store in 2013, and condition 5 of the planning permission was imposed to restrict further imports of intermediate level waste until a large amount (70%) of existing intermediate level waste had been despatched from the Harwell site. The reason for Condition 5 was "To protect the amenity of local residents". The same principle would apply to variation of Condition 2 of Planning Permission EHE/9294/1 and it would therefore be inappropriate to amend condition 2 without first limiting and defining the amount of waste proposed to be imported and processed from outside of the Harwell complex.
- East Hendred Parish Council objected to the original planning application for the ILW store on the basis that it objected to ILW waste being imported from outside Oxfordshire, in particular from Winfrith. Although the approval allowed waste from Winfrith to be imported and stored in the new ILW store a condition was placed on this in requiring that no waste should be imported until at least 70% of the Harwell based nuclear waste planned to be sent to Sellafield had been achieved. Our understanding is that this target has not yet been reached. Although the application claims that the planned waste to be imported is a small quantity (16 m3) the Council still considers that this increases risk levels on the Harwell site within our parish, particularly as the waste will be unencapsulated when it arrives. We therefore object to this application. In particular the proposal is to amend one of the conditions to add the Winfrith Site into the condition as an acceptable source of waste, by adding text as "or any waste originating at Magnox's Winfrith Site". We object to this amendment as this would place Winfrith waste in the same category as locally produced waste which was the basis of the Council's original objection.
- 27. Harwell Parish Council has no objection to the application subject to the waste being imported from the A34 via the Chilton slip roads rather than Milton.

Part 3 – Relevant Planning Documents

Relevant planning policies

- 28. Planning applications should be decided in accordance with the Development Plan unless material considerations indicate otherwise.
- 29. The Development Plan for this area comprises:
 - The policies of the Oxfordshire Minerals and Waste Local Plan Part 1 Core Strategy (OMWCS)
 - The saved policies of the Oxfordshire Minerals and Waste Local Plan (OMWLP)
 - The saved policies of the Vale of White Horse Local Plan 2011 (VLP 2011)
 - The policies of the Vale of White Horse Local plan 2031 (VLP 2031).
- 30. The relevant Development Plan policies are:
 Oxfordshire Minerals and Waste Local Plan Part 1 Core Strategy (OMWCS)
 - W9 Management and disposal of radioactive waste
 - C1 Sustainable development
 - C5 General environmental and amenity protection
 - C8 Landscape
 - C10 Transport

Vale of White Horse Local Plan 2011 (VLP 2011)

- DC9 (Amenities of neighbouring properties & the wider environment)
- NE6 (North Wessex Downs AONB)
- E7 (Harwell Science and Innovation Campus)

Adopted Vale of White Horse Local Plan 2031 (VLP 2031)

- Core Policy 1 (Presumption in favour of sustainable development)
- Core Policy 44 (Landscape)

31. Other material considerations are:

- i) The Vale of White Horse Local Plan 2031 Part 2 (VLP 2031 2) publication version has been published and the publicity period closed on 22 November 2017. Therefore, although it is not yet adopted, this document is at an advanced stage and can be given appropriate weight.
- ii) The Government's National Planning Policy Framework (NPPF), the National Policy for Waste (NPPW) and the Nuclear Decommissioning Authority Strategy III (NDAS III) April 2016 and the Higher Activity Waste Strategy 2016 (published May 2016) (HAWS) are material considerations in taking planning decisions.
- 32. The relevant policies of the VLP 2031 2 are:

- Core Policy 15b: Harwell Campus Comprehensive Development Framework
- Development Policy 22 (Amenity).

Part 4 - Analysis and Conclusions

Comments of the Director for Planning & Place

33. The application is solely for a relaxation of the existing restriction on the importation of material from elsewhere for processing in the WEP. The application was advertised as a departure from OMWCS policy W9. I consider that the key planning issues are whether the application is in fact a departure and, if so, whether an exception to this policy should be made and whether the importation of waste from elsewhere would have any significant additional adverse effects on the local environment & amenity.

OMWCS Policy W9 Management and disposal of radioactive waste

- 34. OMWCS policy W9 states that permission will be granted for proposals for management of intermediate level radioactive waste produced in Oxfordshire at the Harwell nuclear licensed site. Permission will be granted for proposals relating to low level radioactive waste or intermediate level radioactive waste that provide for the needs of a wider area where it is demonstrated that they would meet a need for waste management that is not adequately provided for elsewhere and are consistent with national strategy for radioactive waste management.
- 35. The ILW proposed to be imported would come from Winfrith in Dorset. For this to accord with OMWCS policy W9, it would therefore need to be demonstrated that it would meet a waste management need not adequately provided for elsewhere consistent with the national strategy for radioactive waste. The applicant has advised that the Winfrith site does not contain a facility for the interim storage of its ILW, pending its final disposal. The site cannot therefore currently meet its own needs for encapsulation and interim storage. Facilities for the encapsulation and interim storage of ILW are not commonplace and only a few exist in the country. While other facilities were considered, none have spare capacity and none are closer to Winfrith in terms of the journey time of a HGV. In terms of the other 'options' available to manage and store the ILW, these would include:
 - i). The construction of an encapsulation and interim storage facility at Winfrith; and
 - ii). The transport of the ILW for encapsulation and interim storage at another Magnox/NDA site.

The level of resources required to construct a new facility at Winfrith to account for such a small volume of waste would be less sustainable than that

proposed in the application, and would have greater environmental consequences. This is one of the key reasons a much larger volume of ILW has been allowed to be stored at the ILW Box Store at Harwell. Furthermore, the development of such a facility at Winfrith would conflict with the planned end state for the site.

- 36. I do not have any information to gainsay the applicant's comments. Clearly facilities for the storage and/or treatment of radioactive waste are limited nationally. Therefore, it is concluded that the application would meet a need for waste management that is not adequately provided for elsewhere.
- 37. The national strategy for radioactive waste management is set out in the NDAS III. This states that strategic decisions about waste management are informed by the following key principles:
 - risk reduction is a priority;
 - waste should be minimised;
 - seeking opportunities to share treatment and interim storage assets;
 - waste management should support other NDA strategic initiatives such as decommissioning programmes; and
 - the waste hierarchy should be used as a framework for waste management decision making and enables an effective balance of priorities including value for money, affordability, technical maturity and the protection of health, safety, security and the environment.

The strategy makes a commitment to sharing waste management infrastructure where appropriate. With regard to Higher Activity Waste (HAW), which includes ILW, the ultimate strategy is to implement deep geological disposal in England and Wales and long-term management in near surface facilities in Scotland. This requires that the HAW inventory is converted into a form that can be safely and securely stored for many decades ("interim storage"). At the appropriate time the stored waste in England and Wales will then be transported to and disposed of in the national disposal facility. The strategy for HAW is reinforced in the NDA Higher Activity Waste Strategy 2016 (published May 2016).

38. I consider that the application is consistent with the above which is the relevant national radioactive waste management strategy. Therefore, I am now of the opinion that it has been demonstrated that the application is in fact consistent with OMWCS policy W9. "

Impact on the North Wessex Downs AONB

39. Policy NE6 of the VLP 2011 states that development in the North Wessex Downs AONB will only be permitted if the natural beauty will be conserved or enhanced and that visually prominent development will not be permitted. It goes on to say that major development will not be permitted in the AONB unless it is proven to be in the national interest and no alternative site can be found and all steps are taken to reduce its impact. Core Policy 44 of the VLP 2031 states that high priority will be given to conservation and enhancement of the natural beauty of the North Wessex Downs AONB. Policy C8 of the

- OMWCS requires that developments in the AONBs should normally only be small-scale and sensitively located and designed.
- 40. The application is not for new development but for a variation of a condition on an existing one. I do not therefore consider that it would have any detrimental impact on the AONB and is consistent with the above policies.

Amenity

- 41. Planning policy requires that proposals including for minerals and waste development should not have unacceptable adverse impacts on residential amenity and other sensitive receptors including from light pollution and that appropriate buffer zones should be provided (Policies DC9 of the VLP 2011 and 22 of the VLP 2031 2). Policy C5 of the OMWCS reflects this and also requires consideration of the amenity impacts from traffic. VLP 2011 policy E7 makes specific provision for developments at the Harwell Campus including that proposals for buildings and structures will not unacceptably harm the character and appearance of the surrounding area, taking into account their location, scale, bulk and height. This is reflected in Core Policy 15b of the VLP 2031 2. OMWCS policy C10 seeks to see waste traffic routed via the county's advisory lorry routes.
- 42. There would be no new built development proposed as part of the application. The existing facility is set within the existing Harwell campus buildings and there are no immediate neighbours who would be affected by the development. The only amenity impact that could be identified would be from the proposed vehicle movements but at 16 over a period of three to four years these would be negligible and they would arrive via the A34 which is a designated advisory lorry route and via the Chilton slip roads not Milton as requested by Harwell Parish Council. Concern has been raised by East Hendred Parish Council about how the waste would be transported but this would be controlled by the Radioactive Materials Transport Team (RMTT) within the Office for Nuclear Regulation (ONR) and is not a matter to also seek to control through planning conditions.
- 43. I therefore consider that any impacts of the proposed variation of conditions on the local environment and amenity would be negligible and that there is no conflict with the above policies.

Sustainable Development

- 44. The NPPF contains a presumption in favour of sustainable development which has environmental, economic and social roles, which is reflected in OMWCS policy C1 and Core Policy 1 of the VLP 2031.
- 45. This development would contribute towards the environmental, economic and social aspects of sustainable development by facilitating the safe treatment and storage prior to disposal of intermediate level radioactive waste.

Conclusions

46. I consider that the application accords with development plan and national policy and would be sustainable development in environmental, economic and social terms in accordance with the NPPF and should be approved.

RECOMMENDATION

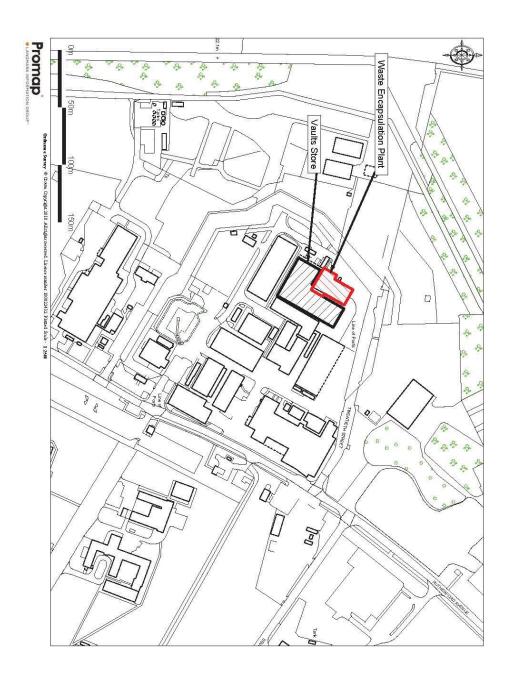
47. It is RECOMMENDED that application no. MW.0036/16 be approved subject to conditions to be determined by the Director of Planning & Place including the matters set out in Annex 2 to this report.

SUE HALLIWELL

Director for Planning & place

August 2018

Application no MW.0036/18 Harwell Waste Encapsulation Plant



Annex 2 - Conditions

- 1. The development shall be carried out strictly in accordance with the particulars of the development, plans and specifications contained in the application except as modified by conditions of this permission.
- 2. Other than up to 17m3 of waste from the Winfrith site as set out in section 3 of the planning statement dated April 2018, no waste from sources outside the Harwell nuclear licensed site shall be imported to, or processed in the plant hereby approved.
- 3. Any storage tanks to be sited within appropriate containment bunds
- 4. No discharges to the surface water drainage system.
- 5. All waste tipping, sorting and handling to be carried out on appropriate impervious concrete base surrounded by a liquid tight bund.
- 6. No soakaways to penetrate the water table or be more than two metres in depth.
- 7. No soakaways into contaminated land.
- 8. Noise levels to not exceed existing set level during operational hours.
- 9. Maintenance of the existing surface and foul water drainage systems.

Annex 3 - Compliance with National Planning Policy Framework

In accordance with paragraph 38 of the NPPF Oxfordshire County Council takes a positive and creative approach and to this end seeks to work proactively with applicants to secure developments that will improve the economic, social and environmental conditions of the area. We seek to approve applications for sustainable development where possible.

We work with applicants in a positive and creative manner by;

- offering a pre-application advice service, and
- updating applicants and agents of any issues that may arise in the processing of their application and where possible suggesting solutions. In this instance we kept the agent abreast of all consultations response received, and additional information was submitted seeking to address concerns raised.