675/08/10

18 June 09

### **VULCAN NRTE – BRIEF FOR THE DOUNREAY STAKEHOLDER GROUP – 24 JUNE 2009**

### **Programme and Contract**

• The Shore Test Facility has just completed a successful annual planned maintenance and defect rectification period *(current estimation 22 June)* to resume power operation and scheduled through life critical trials in accordance with the operating programme.

## Safety, Security, Environment and Waste

- In April Vulcan undertook a successful annual review by Commodore McFarlane the Head of Defence Nuclear Safety Regulation. This was followed by a successful Annual Review of Safety conducted by the Nuclear Propulsion Head of Safety, Captain Coulthard.
- On 17 June, the annual LONESTAR nuclear accident response exercise took place. This Grade C emergency arrangements demonstration was assessed jointly by DNSR and the NII.
- An updated REPPIR submission is about to be forwarded to DNSR for initial assessment prior to evaluation by the NII. The submission demonstrates pessimisms in the current assumptions that may allow emergency planning arrangements to be reviewed.
- No concerns or non compliances have been noted since the March meeting.

## **Decommissioning and Socio-Economics**

• Future programme for the site remains under consideration. There is nothing to update from previous reports.

N R CANTY Cdr RN Naval Superintendent Vulcan

Annex:

A. Response To Rick Nickerson Query (Dounreay Stakeholder Group) dated 18 June 09.

Annex A to 675/08/10 Dated 18 June 09

# RESPONSE TO RICK NICKERSON QUERY (DOUNREAY STAKEHOLDER GROUP) – DSG(2009)C021

When the site ceased to be a Navy training establishment, on 30 March 1981 HMS Vulcan was decommissioned and subsequently became known as the Vulcan Naval Reactor Test Establishment in October 1984.

1. What facilities at Dounreay does HMS Vulcan use either regularly or irregularly?

The following support is contracted from DSRL:

- a. Emergency Support Facilities (Dounreay Emergency Control Centre and Emergency Radiological Incident Centre) for Nuclear Accident Training, Exercises and accident contingency.
- b. Medical Treatment Facilities (including Personnel Decontamination).
- c. Radioactive Waste Disposal Facilities for low level liquid and solid waste.
- d. Laundry Services.
- e. Fire and Ambulance Services.
- f. In addition, Dounreay provides Vulcan with electricity, water and a Duty Health Physicist.
- 2. What effect will the decommissioning of Dounreay have on the existing operations at HMS Vulcan under the present MoD contract?

Arrangements are in place to ensure that Dounreay Decommissioning does not compromise contracted support for Vulcan operations for the duration of the current contract (2014).

3. What discussions have taken place between HMS Vulcan, the NDA and DSRL concerning the continued use of Dounreay facilities by HMS Vulcan? Are minutes/reports of these meetings already available to the public? If not please supply dates and locations to facilitate a Freedom of Information request.

To date, only background information has been exchanged between Vulcan and DSRL to assist MoD planners to consider possible options for decommissioning Vulcan beyond the planned operational dates for Dounreay facilities, if required.

4. Have meetings been held with DSRL and/or NDA concerning the possible continued use of facilities at Dounreay after the end of the existing MoD contract when either HMS Vulcan begins decommissioning or secures a new contract from the MoD?

Initial MoD decommissioning planning indicates that it may be beneficial to extend the use of certain Dounreay facilities. However, until a decision is made on the future use for the Vulcan site, no approach has been made to the NDA or DSRL to extend the operation of any facility on the NDA site.

5. How much spent fuel is produced at HMS Vulcan and at what frequencies and where is the spent fuel stored?

Once a prototype core has completed operations, it is defueled to a storage facility on the site, prior to transportation to Sellafield, for long term storage. The current prototype has been in operation since 2002 and it is anticipated that the operational core burn, that results in the 'spent fuel', will be completed by 2014.

6. What is the current projected operation timescale for the site? Is there any other potential future business for the site?

As stated above, it is anticipated that burn up of the current reactor core will be complete by 2014. The potential for future business both on-site and within Caithness as a whole is being considered by the site management team.

7. How will the replacement of Trident affect the site? If HMS Vulcan is to be used for the new programme how will that affect the Dounreay decommissioning programme?

The capabilities offered by Vulcan NRTE both to the current naval nuclear programme and Trident replacement are subject to an ongoing MoD review. Planning for the future of Vulcan necessarily considers the availability of support and services from Dounreay and any suitable alternative means of provision. There is currently no direct influence upon the Dounreay decommissioning programme.

8. If the current business model extends operations beyond the "end of site date" for Dounreay, how will current authorizations for aerial and liquid discharges be dealt with? (It is understood that currently liquid discharges are dealt with under SEPA authorizations for Dounreay and that actual discharges are processed through Dounreay infrastructure).

MoD currently holds consents from SEPA for aerial discharges from Vulcan. Liquid effluent is covered by Dounreay SEPA authorizations. Should future operations require a liquid discharge facility, appropriate consent from SEPA would be required either to extend an existing facility or to provide an alternative.

9. What plans are there for decommissioning the site and how will issues surrounding that process be consulted upon?

A decommissioning plan for the site was produced in 2006. It is being reviewed against possible future programme options and for compatibility with the current Dounreay life plan. It is anticipated that environmental impact assessments will be subject to a consultation during routine HSE and SEPA scrutiny.