



## HM NUCLEAR INSTALLATIONS INSPECTORATE

### Dounreay Site Restoration Limited

### Quarterly report for 1 July to 30 September 2010

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#### Foreword

This report is issued as part of the Health and Safety Executive's commitment to make information about inspection and regulatory activities relating to the above site available to the public. It is for distribution to members of the Dounreay Site Stakeholder Group (SSG) and covers activities associated with the regulation of safety at Dounreay.

These reports are distributed quarterly and are also available on HSE's Website at <http://www.hse.gov.uk/nuclear/llc/2010/index.htm>. Site Inspectors of HM Nuclear Installations Inspectorate usually attend Dounreay SSG meetings and will respond to questions raised there by members of the Dounreay SSG. Any other person wishing to enquire about matters covered by this report may contact the HSE's Nuclear Directorate on 0151 951 3484/3290.

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#### Inspections

The Nuclear Installations Inspectorate (NII) Site Inspectors and Specialist Inspectors visited Dounreay on the following dates during the quarter:-

26-29 July 2010  
9-12 August 2010  
6-9 September 2010  
13-22 September 2010

### Routine matters

Inspections are undertaken at site as part of the process for monitoring compliance with:

- (i) the conditions attached by HSE/NII to the nuclear site licence;
- (ii) the Health and Safety at Work etc Act (HSWA) 1974 and
- (iii) regulations made under the HSWA for example the Ionising Radiations Regulations 1999 and the Management of Health and Safety at Work Regulations 1999.

This entails monitoring licensee's actions on the site in relation to incidents, operations, maintenance, projects, modifications, safety case changes and any other matters which may affect safety. The licensees/operators are required to make and implement adequate arrangements under the conditions attached to the licence in order to ensure legal compliance. Inspections seek to judge both the adequacy of these arrangements and their implementation. In this period routine inspections of the site found:

DSRL is making progress with the site's fuel strategy.

DSRL appears to have a good approach to incident management and learning from experience. NII welcomed the positive approach to learning from others which helps Dounreay raise its health and safety standards. The effectiveness review of actions by DSRL's Independent Assurance Team is good practice which will help to ensure that there is closure between the original action intent and the actual action response. The staff responsible for managing the system demonstrate competency. DSRL has implemented initiatives across the site to ensure lessons are learnt from incidents demonstrating the site is alert to and actively pursuing improvements.

An inspection demonstrated that training requirements had been met in the sample used.

DSRL is in the process of reviewing its safety case procedures. The NII is being kept informed of progress with this work.

DSRL demonstrates that it is alert to and actively pursuing improvements using results from a commissioning programme.

DSRL discussed with the NII proposals to change an existing plant, which appeared adequate in principle. The NII will monitor progress with the implementation of the proposals.

An example was found where DSRL was unable to demonstrate that the safety case adequately identified the conditions and limits necessary in the interests of safety. DSRL is actively seeking ways to improve the situation.

A number of instances were found where DSRL inspection records contained anomalies. DSRL has instigated an internal review process to ensure site procedures are fully implemented.

On the basis of a sample inspection undertaken during the quarter, DSRL in general has in place suitable and sufficient safety mechanisms, devices and circuits which are properly connected and in good working order and these are subject to a suitable regime of examination, inspection, maintenance and testing (EIM&T). There is a strong focus on ensuring EIM&T is undertaken at the appropriate time with close scrutiny of proximity to Compliance Dates. However, there is a family atmosphere

between and within the teams which can lead to an over-reliance on trust: NII advocated healthy challenge and not to assume people will always do the right thing. In addition, DSRL needs to ensure that EIM&T is applied consistently across the site as an inspection found one area where there was room for improvement.

An instance was found where DSRL was unable to demonstrate so far as is reasonably practicable that radioactive material was adequately controlled or contained. DSRL is actively seeking ways to improve the situation.

In general the arrangements made and implemented by DSRL in response to safety requirements were deemed to be adequate in the areas inspected. However, where improvements were considered necessary, satisfactory commitments to address the issues were made by or are being sought from the DSRL, and the site inspectors will monitor progress during future visits. Where necessary, formal regulatory enforcement action will be taken to ensure that appropriate remedial measures are implemented to reasonably practicable timescales.

NII and DSRL met to discuss revised proposals for decommissioning PFR and DFR. We explored in more detail the options for managing the hazards arising from processing items contaminated with alkali metal residues. Initially NII had concerns about the risks associated with the process, especially for application to NaK, but the meeting served to alleviate these concerns to some extent. There remain a number of technical issues and uncertainties which need to be resolved, and DSRL appears to have an appropriate programme of work underway to address these. In addition, the evident experience and quality of DSRL's specialist staff and of their contractor's staff and facilities added confidence that the eventual safety case will be robustly underpinned. It was concluded that the meeting was a positive step towards the future decision by DSRL on the concept design for reactor decommissioning facilities. NII asked DSRL to maintain a detached position on optioneering and suggested that it might be appropriate to adopt a hybrid strategy wherein different passivation techniques are applied at different times to different reactors.

### **Non-Routine matters**

Licensees are required to have arrangements to respond to non-routine matters and events. NII inspectors judge the adequacy of the licensee's/operators response including actions taken to implement any necessary improvements. Matters of particular note considered during the current period include the following.

Level 2 Emergency Exercise Delta 46 was rated as a good standard with respect to the on-site generation of briefing for off-site agencies. DSRL is also actively looking at ways to improve emergency arrangements on the site.

DSRL and NII discussed the regulatory milestones. As it is 10 years since most of them were formulated it was appropriate to review them. DSRL provided a discussion document to tie milestones to completion of significant nuclear hazard reduction activities on site. Discussions on the milestones continue.

### **Transforming our business**

Although the previous government's proposals to establish a separate Office for Nuclear Regulation is still with ministers for consideration, the challenges of interacting with and regulating the modern nuclear industry in the UK remains. As a response to this ND has established a change programme focusing on improved ways of working and improved engagement with stakeholders, this programme also reflects the organisation's aim to be recognised as a world-class regulator.

While ND is committed to rising to the challenge of implementing major organisational and operational change, it will not be distracted from taking forward its ongoing high priority work to secure the protection of people and society from the hazards of the nuclear industry.

ND is committed that throughout this process of transformation its stakeholders are kept fully informed of the changes and any decisions that are made regarding the future structure of the Regulator. This will be achieved through reports such as the Stakeholder Group reports and on the HSE Website.

### **Regulatory activity**

Under Health and Safety legislation NII Site Inspectors, and other HSE Inspectors, may issue formal documents to ensure compliance with regulatory requirements. Under nuclear site licence conditions HSE/NII issues regulatory documents, which either permission an activity or requires some form of action to be taken; these are collectively termed Licence Instruments (LI). In addition inspectors may issue enforcement notices to secure improvements to safety.

No Licence Instruments were issued to the licensee during the quarter.