

MARCH 2011

DOUNREAY NEWS

End of an era – Craig More goes

See centre pages



**No paint job
for sphere
this year**
– more on page 2

**OHD want
to save
your lungs**
– page 9

**Ian is our
new SAP (E)**
– see him on page 10

DFR paint job scrapped



“This looks like a ludicrous waste of public funds,” Highlands and Islands MSP Dave Stewart told The Sun.

Bosses at Dounreay agreed – and won't now be spending £500,000 on a repaint of the sphere.

The money saved will go instead towards actual decommissioning work.

The sphere's been repainted every 10 years for as long as anyone can remember.

And the cycle is repeated every decade of the lifetime plan for the site.

Its next coat was due over the next 18 months or so.

But that's been changed after

the decision last year to scrap the sphere once the reactor is decommissioned.

The saving will help to reduce the cost to taxpayers of decommissioning site.

The girder area may still need to be repainted to maintain it in a safe condition for workers.

But the bulk of the sphere doesn't need repainted to maintain the containment around the reactor inside the sphere.

The steel is thick enough to last a lot longer than the time it will take to dismantle the reactor. ○

Looking after Dounreay's radioactive waste

Knocking down Dounreay will create enough intermediate-level radioactive waste to fill 100 double-decker buses.

It's the most dangerous type of waste there is at the site and will be hazardous for thousands of years to come.

So where will it go when the site has been flattened?

Thousands of tonnes of this type of waste are being generated across the UK.

Until recently, it was all destined for a single disposal site where it would be buried deep underground.

The Dounreay waste would have been stored here until 2050 or so before being moved out in several thousand lorry loads.

That's now changed after the Scottish Government decided it did not support deep disposal.

The UK Government is still carrying on with its search for a disposal site for the rest of the UK, but the waste at sites in Scotland like Dounreay will be staying where it is.

New facilities will need to be built “near site, near surface” for the waste.

Dounreay's head of waste **Alex Anderson** says it doesn't change what needs to be done in the short-term.

“We still need to get all the waste into a condition that is safe for the long-term – that hasn't changed,” he said.

“So plants like the cementation plant continue to have a really important role getting this type of waste into a form that's safer for future generations to manage.

“It's the planning for how they manage it in future that is changing. Our plan was to store it for a few decades before sending it to a UK facility for deep disposal. That will change now and we'll plan for the waste to stay here in facilities where it can be monitored and retrieved.” ○

Send your stories to the editor at:



sue.thompson@dounreay.com

Rubble recycling helps crush costs

The diggers have done their work, and Craig More House has been reduced to one thousand tonnes of rubble.

The rubble is taken in lorry loads to the D6500 compound to the east of the licensed site, to swell the material already being crushed by the aggregate production and recycling facility.

A total of 38,000 tonnes of concrete and rubble has been through the facility in the last six months, saving the site £76,000 in landfill costs alone.

DSRL project supervisor **Alistair Simpson** has been co-ordinating the operations in conjunction with sub-contractor Johnson Controls and local firm A&W Sinclair. He said that the crushing has now come to an end for the time being.

"We have re-used a significant amount of aggregate both on and off-site. Several thousand tonnes have been used in the D3100 (new LLW repository) project, to provide temporary roads and hard standing so that the enabling works can go ahead," he explained.

Added JCL manager **Peter Swanson**: "Several thousand tonnes were also used to infill the footprint of the D3900 project, and we used tonnes of reclaimed topsoil to reinstate and landscape DN023 next to PFR, which will be seeded in the spring."

The remaining aggregate will be stockpiled and used the next time Dounreay has a hole that needs to be filled in. ○



News in brief

New regulator to combine functions of existing nuclear bodies

The UK government has formally announced its intention to set up a new independent statutory body to regulate nuclear power in the UK, taking over the regulatory functions currently performed by the industry's existing regulators.

The Health and Safety Executive (HSE) is establishing a new regulatory body, the Office for Nuclear Regulation (ONR) from April 1.

The new regulator will combine all the elements of the HSE's current Nuclear Directorate - the Nuclear Installations Inspectorate (NII), the Office for Civil Nuclear Security (OCNS) and the UK Safeguards Office (UKSO). It will also include the Department for Transport's Radioactive Materials Transport Team which deals with regulating the transportation of radioactive material.

According to the Government statement, the ONR will have its own board and legal identity, which will strengthen, focus and improve nuclear regulation in the UK, and ensure greater accountability, transparency and efficiency of regulatory processes. When fully operational, the ONR will be legally separate from, but still supported by, the HSE.

Legislation to establish the ONR will now pass through Parliament, but by setting up the office as a non-statutory body in the meantime the government is "signaling our commitment to securing an appropriately resourced and responsive regulator for the future challenges of the nuclear sector," according to the ministerial statement.

Consultation on plutonium stocks opens

The UK Government has begun a consultation on the long-term management options for Britain's existing civil plutonium stocks, currently housed in secure facilities at Sellafield and Dounreay pending a final decision on the best long-term solution for its management.

The three options under consultation are – reuse as fuel, immobilisation and direct disposal as waste, or continued long term storage.

The Government's preliminary view is that the best long term solution for the plutonium is through reuse as MOX (mixed oxide) fuel, a proven and available technology that creates a proliferation-resistant waste. The costs of managing plutonium in this way are similar to disposing of plutonium as waste.

Lord Marland of Odstock, Parliamentary Under-Secretary of State for Energy and Climate Change said: "There are currently no final plans for how the UK's plutonium should be managed in the long-term.

"It is high time that we got to grips with this and developed a coherent, comprehensive plan for dealing with the issue.

"We are keen to assess all the options for affordability, deliverability, value for money, safety and security." ○

CNC firearms training exercises

The Civil Nuclear Constabulary at Dounreay with the cooperation of DRSL will be taking part in a series of firearms training exercises over the weekend of Friday March 4 and concluding on the afternoon of Sunday March 6.

The exercise will begin at 8pm on Friday and end at 10pm. On Saturday it will begin at 10am and end at 10pm, and on Sunday will begin at 10am and end at 6pm. These times are approximate, but the exercise will be over by the stated time.

The exercises are an important part of CNC's commitment to maintaining the highest security standards. All exercise participants will be clearly identified and make themselves known in any public environment.

Where there is a requirement for CNC vehicles in exercise, to use public roads, normal conventions for speed etc will apply.

The site alert will not be sounded as part of this exercise. If it is sounded at any time over the weekend it will be treated as a genuine alarm and responded to accordingly. Site emergency arrangements for safety/security will be unchanged.

If you require any further information please contact **Inspector Andy Brotherston** on 01847 802217. ○



A national counter terrorist awareness talk is being presented to businesses, industries and communities by the Security and Police services in relation to the reporting of suspicious activity in order that members of the public can go about their everyday lives safely.

These presentations which last approximately 20-25 minutes are available both on site and off site and the intention is that all available staff and contractors will be afforded access to them.

CNC community liaison officer **Dave Hardie** is the point of contact and is available for these presentations. The main drive behind these presentations are that "Communities together can defeat Terrorism".

Competition update: 'dialogue' continues

DSRL competition support team manager Mark Raffle brings us up to date on the progress of the competition for the Parent Body Organisation (PBO).

Members of the Babcock Dounreay Partnership and Caithness Solutions bid teams were on site for another week in February, visiting facilities on site and holding discussions with site personnel. This was part of the competitive dialogue phase of the competition, which has now been extended by two weeks and will continue until mid-April. Dialogue will be held between bidders and the NDA at the NDA's premises in Cumbria. Bidders will return to site for another week on March 14.

Throughout this phase of the competition DSRL will continue to supply documents requested by the bidders to NDA. So far over 2,300 files have been supplied since the start of informal site access in August 2010, and over

3,800 files since provision of data started in May 2009.

The DSRL competition support team and DSRL management would like to thank everyone involved for their continuing support to the competition and for promptly returning the requested documents.

Following dialogue the bidders will be invited by NDA to submit their final tenders, which must be returned by August 18. The preferred bidder will be announced by NDA on November 29, and is expected to become the new PBO on March 30, 2012.

In the meantime the DSRL competition support team has been preparing a management of change document and transition plan to allow the transition to the

new PBO to take place between December 2011 and March 2012. As the transition will result in DSRL being owned by a different company, this is a high category change and requires the agreement of regulators and the NDA as well as DSRL internal agreements.

Anyone requested to speak to the bidders will receive an invitation from the DSRL competition support team – if you do not receive such an invitation, please do not speak to the bidders on any subject relating to DSRL. Bidders can be recognised by their distinctive passes, which have a blue circle containing their name and "Bid Team", although some may be on visitor passes.

A number of rules for

competition were previously published and continue to apply – the rules and other information can be found on the intranet, under the Director's Support Office.

The DSRL competition support team contacts are **Mark Raffle** (Tel 6670), **Rhona Gill** (Tel 6067) and **Lorraine Lannon** (Tel 6858), D2003 Zone 9, or email "dsrl competition support".

To ensure that only work formally agreed with NDA is carried out, all requests for competition support should be routed through this team. Please let the team know if you are asked directly by NDA, bidders or anyone else to carry out any work connected with competition.

If you have any questions – please get in touch with **Mark, Rhona or Lorraine.** ○

Caithness Horizons receive artefacts for Dounreay collection

Staff at Caithness Horizons were pleased to receive a consignment of artefacts from Dounreay recently.

Heritage Officer **James Gunn** handed over diverse items from the site's distant and more recent past, including visitor books dating from 1957, apprentices trophies, **Owen Pugh's** retirement gift, a PFR turbine blade and recent commemorative mugs. ○

One item that will be staying at Dounreay for the moment is a metal table lighter in the shape of the DFR sphere, that **James** acquired from eBay.

The lighter was produced by construction company Motherwell Bridge, who were responsible for building the sphere.

According to the book *Motherwell Bridge; the first hundred years*: "On 22nd May, 1957, the sphere underwent its final pressure and vacuum tests, a process which took four days. It passed with flying colours... The whole of Motherwell Bridge was enthused by the achievement. A special workers' bus trip to Caithness to see it was organised – a round trip of some 700 miles – and specially designed table lighters, mini replicas of the Dounreay sphere, were issued by the company to works staff as a permanent memento of the achievement."



L to R: Joanne Howdle, Chris Colville & Beki Pope.

James Gunn is on a mission. The National Museum of Scotland would like to acquire a new and a worn PFR turbine blade for the national collection.

Says James: "I have a pair that has gone to Caithness Horizons, but I've failed in my attempts to find more.

"Can any reader help me to locate these?"

Check out the brand new
Caithness Horizons
website which has been
given a totally new look
and is under
redevelopment:
<http://www.caithnesshorizons.co.uk/>



Site News in brief

- Further process improvements continue with DFR NaK destruction. Batch number 210 has now been completed out of the planned total of 335. The plant has now moved into a statutory maintenance outage which is due to last for seven weeks.
- The sodium inventory disposal facility in PFR has processed 12 loads of alkali metal wetted material this financial year, containing a total of 6114kgs of alkali metal contaminated waste.
- In DFR, water treatment in the west pond and sludge removal from the east pond progressed during January. The total amount of water discharged from both ponds is 807m3.
- Work to strip-out redundant electrical equipment and cabling in PFR has continued during January.
- The new FCA ventilation system is operating satisfactorily. The stack capping is waiting for a weather window to support installation.
- Decommissioning of D1217 continues with the removal of ILW, and the redundant ventilation system.
- Preparations for the decommissioning of the sample bulge in D1204 continue with lead shielding replacement.
- The group campaigning to save the sphere has written to Parliament with their concerns about its proposed demolition.
- A new fares structure for the Assisted Travel to Work Scheme has been introduced.
- DSRL is considering its socio economic development plan for 2011/12. A paper will be submitted to Dounreay Stakeholder Group to discuss the activities that will be included in the plan.
- DSRL has committed funding to develop Science, Technology, Engineering and Mathematics (STEM) in Caithness & North Sutherland which is designed to increase the number of young people with STEM skills and enable them to make informed career choices. The project is jointly funded by DSRL, HIE and the Highland Council.
- Visitors to Dounreay in January included thirteen nuclear graduates working in diverse areas of the industry. ○

Craig More is demolished as Dounreay skyline changes

The area around Craig More House was closed off as bulldozers moved in at the end of January and razed the building to the ground. The gaping hole in the skyline where it once stood is a stark reminder that Dounreay's days are numbered.

The building, which was constructed in 1961, was the flag ship of AEA Technology, the privatised offshoot of UKAEA.

In later years it was used as the Caithness headquarters of contractor Nuvia Ltd, before becoming empty in 2009.

Local company Gunns won the contract to carry out the demolition, managed by senior project manager **Robbie Manson**.

1961: D9807 under construction



Wilson Manson working in the Design Office (October 1990)



The formal opening of Craig More House took place on December 10, 1996. The DSRL photographic archive has a record of those attending, some of whom are still on site today.



Craig More is demolished as Dounreay skyline changes



Demolition men: (L to R) - Angus Gunn, Ian Gunn, Alex Coghill
David Spencer is in the digger.



Neil Buchan watched the demolition of Craig More House with a little bit of nostalgia.

He won a competition to name the building in 1996.

He took his inspiration from the landscape of Caithness, and decided that, just as the local crag Creag Mhòr is a prominent visible feature on the southern skyline, the name might suit the building which stood alone in the centre of the site.

Craig More House, originally known as D9807, was purpose built in 1961 to house the Dounreay central design office, and continued to house a design office in various guises until its demolition. In 1993 Neil was appointed as the head of the Dounreay Design Department (then part of AEA Technology, the science and engineering arm of UKAEA) and subsequently became General Manager, Scotland of AEA Technology plc. He was based in the building until 2000.

Neil remembers: "When AEA Technology plc was floated as a private company in 1996 D9807 was leased from UKAEA Government Division as the local headquarters for the fledgling company.

"In order to mark the occasion and reinforce a distinctive identity it was decided to rename the building and my suggestion was chosen by **Peter Watson**, the Chief Executive of AEAT.

"It didn't go quite to plan, however, as the corporate 'identity police' thought that Creag Mhòr House might be a bit of a challenge for our southern cousins, so the name was 'Englified' to Craig More House!"



The demolition of Craig More House produced 1,000 tonnes of rubble, which was crushed into aggregate at D6500 and will be recycled for on-site use. Twenty tonnes of steel was also recycled.

Trade show set to return

Dounreay's annual exhibition of technology and innovation will be held this year on Thursday, May 19

It's the eleventh year of the day-long event, which normally attracts about fifty companies and takes place in a marquee at the entrance to the site.

"There's been a positive level of interest in the exhibition so far this year and we are hopeful that we will have as many companies on display in 2011 as we did last year", commented **Lisa Jones-Taylor** from exhibition organisers, Nu-Tech Associates Ltd.

"We know that the Government's spending cuts are hitting hard, but many suppliers are keen to invest time and money into marketing their products, to

keep ahead of the rest, because they see it as an essential part of successful business.

"The companies who will be exhibiting at this event will be looking to either expand their customer base by promoting technology transfer or new and innovative ideas, as well as to solidify existing customer loyalty", added Lisa.

For further details contact: Nu-Tech Associates Ltd Tel: 01946-695554, or email them on: sales@nu-techassoc.co.uk ○



Training at Naver

To arrange your training please check the training event calendar and SAP for dates, or call us at Naver on 01847 804735. ○

March	Course Title	Venue
1	Site induction	Dounreay
2	Basic radiation induction	Dounreay
2	Confined space operator	Dounreay
2-3	Business Gateway start-up	Naver
3	Fire fighting & security refresher	Dounreay
4	Emergency first aid	Dounreay
7-10	Counterbalance novice	Janetstown
8	Site induction	Dounreay
8	Windmills stage 2	Naver
8	Pay & grading workshop	Naver
10	Fire fighting & security refresher	Dounreay
10	Asbestos awareness & bolt on	Naver
14-17	Design inspection & testing	Naver
14	Pay & grading workshop	Naver
15	Pay & grading workshop	Naver
15	Site induction	Dounreay
15	Institute of Leadership management training	Naver
16	Basic radiation induction	Dounreay
16	Supervisory skills	Naver
17	Fire fighting & security refresher	Dounreay
18	Emergency first aid	Dounreay
18	Project day (City & Guilds)	Naver
22	Site induction	Dounreay
23	Basic radiation induction	Dounreay
24	Pay & grading workshop	Naver
24	Fire fighting & security refresher	Dounreay
25	Operational monitoring theory	Naver
28	Pay & grading workshop	Naver
29	Site induction	Dounreay
31	On the job trainer skills	Naver
31	Fire fighting & security refresher	Dounreay

Word Search

SPORTS

Q	L	S	O	R	S	B	T	S	D	F	E	U	U	Z
S	L	A	U	F	M	W	Q	G	A	Q	I	T	A	S
M	A	G	M	B	S	A	I	Y	E	K	C	O	H	N
H	B	G	U	L	N	L	E	M	S	L	U	R	M	O
Y	Y	N	F	L	O	N	L	N	M	R	K	Z	E	A
H	E	I	S	A	O	N	H	A	O	I	L	A	U	O
A	L	W	S	B	K	S	O	S	B	X	N	L	S	V
T	L	O	O	T	E	D	B	T	T	T	R	G	D	O
H	O	R	S	E	R	I	D	I	N	G	O	I	I	E
L	V	T	E	K	C	I	R	C	K	I	V	O	P	R
E	F	J	H	S	A	U	Q	S	H	I	M	O	F	I
T	G	L	L	A	B	T	E	N	N	I	S	D	A	P
I	A	O	R	B	E	A	H	G	M	I	O	N	A	U
C	Y	C	L	I	N	G	N	I	X	O	B	D	F	B
S	A	A	B	F	T	Y	B	P	R	B	V	X	C	J

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|------------|--------------|------------|
| Athletics | Golf | Snooker |
| Badminton | Gymnastics | Squash |
| Basketball | Hockey | Swimming |
| Boxing | Horse Riding | Tennis |
| Cricket | Netball | Volleyball |
| Diving | Rowing | |
| Football | Rugby | |

Answers in next months issue ○

+ OHD BULLETIN +

Wednesday March 9, 2011 is National No Smoking Day

Are you ready to stop smoking, asks Marleen Leighton

Smoking cigarettes rapidly delivers nicotine to many parts of the brain. It is not known exactly how it causes dependence. If brain cells are repeatedly exposed to nicotine, they gradually alter the way they respond.

This explains why a smoker experiences pleasant sensations when they are smoking and unpleasant symptoms when the supply to the brain runs out. These withdrawal symptoms include headaches, anxiety, depression, sleeplessness and craving for cigarettes.

Important facts about smoking incidence in Scotland:

- Smoking causes at least 20 – 25% of all deaths in Scotland. It is the biggest single preventable cause of ill health and premature death in Scotland.
- 30% of the adult population smokes.
- 25% of boys and 16 % of girls are regular smokers by the age of 16. Many young people become addicted to cigarettes within weeks of starting to smoke and find it difficult to stop
- 25% of women smoke during pregnancy with potentially serious consequences for their children's health.
- Exhaled smoke has smaller particles, which means it can penetrate deeper into the lungs. Breathing second-hand smoke increases the risk of heart disease by 25% and lung cancer by 24%.
- More than 17,000 under-fives are admitted to hospital with illnesses caused by their parents smoking

Preparing to stop smoking can take anything from days to months. It is

important that you don't try until you are sure you are ready to stop.

Top tips for breaking free

- **Set a date** - No Smoking Day on Wednesday March 9 is a good time as you'll be stopping with more than a million other people. Use the days between now and then to plan. Pledge your quit attempt and get lots of useful quitting tips and ideas on how to spend the money you save.
- **Get free local help** - find your local free stop smoking service by calling the smokeline on 0800 848484. Using their help and a proven treatment can make it four times more likely that you'll succeed in stopping smoking. You don't need to do it alone.
- **Deal with nicotine withdrawal** - your pharmacist or GP can talk to you about the treatments that can improve your chances of success.
- **Tell your friends and family** - get their help and support too – even get them to sponsor your quit attempt.
- **Make a list of the reasons why you want to stop smoking** - whether it's to be fitter, for your children or to save money; carry the list with you to remind yourself during difficult moments.
- **Know what to expect** - most people will find it difficult to stop smoking but it does start to get better after just a few days – just have a look at the benefits you'll gain from quitting.
- **Keep a diary** - write down when and where you smoke, and how you feel each time. Use the clues from your diary to spot temptations in your day and make a plan to avoid them.
- **Reward yourself** - plan some treats with the money you will

save.

- **Coping with cravings:** Wait until the craving passes, this usually lasts only 3-5 minutes. Start an activity and keep busy until the craving passes. Drink some water to take your mind off it. Remind yourself of the reasons you wanted to stop smoking. Take one day at a time and congratulate yourself on each day you remain smoke free.

Stop smoking without weight gain:

Many, but not all, ex-smokers put on some weight when they stop smoking. The degree of weight gain is in the majority of cases relatively small, so do not use this as reason to start again.

To prevent excessive weight gain, eat healthy, well balanced meals and low calorie, low fat snacks. Drink a glass of water whenever you feel like smoking or nibbling. Increase daily exercise to control your weight and improve your health.

The Occupational Health Department are always available for any health related queries and can be contacted on extensions 2184 & 2187 ○



OFF THE RECORD

by Edward Mountain
Conservative Candidate for Caithness,
Sutherland & Ross

Before Christmas I visited Dounreay to see for myself the tremendous work that is being done there by the 2,000 members of DSRL and the 20 or so contracting firms working on the project.

The visit gave me great confidence that, despite the difficult conditions, the historic waste created on site was being dealt with to the high standards demanded of the industry today. The current safety record gives us an indication of what a skilled workforce we as a country have on site.

So this leaves the question; why are we dumping Dounreay and by 2025 potentially making up to 33% of the Caithness workforce redundant?

The answer is simple; the current government does not wish to have nuclear power in Scotland and in time they wish to rely on greener energy.

The problem is that green energy (wind, hydro and tidal/wave power), which are all heavily subsidised by taxation, will not in the medium term supply all our needs. There are not enough efficient turbines or sites to put them on. Thus we will continue to rely on imported power much of which will be generated using nuclear reactors.

Putting it simply; Scotland will use and tolerate nuclear power when it suits, which makes nonsense of the argument for not having our own generation capacity.

What I saw confirmed my belief which is that a working reactor at Dounreay will not only give Scotland greater security over our power supply but it will continue to ensure employment opportunities for the people of Caithness. It will also offer potential opportunities to entice nuclear reliant industries, such as nuclear medicine to the area further enhancing the future of this fragile and remote employment area.

I believe that we have a duty to review the current hypocritical policy of denying nuclear energy generation in Scotland. Nuclear power is good for the economy, good for the country, good for the environment and it does not suffer the vagaries of other green energy. However you look at it nuclear power will give us secure power at a lower cost to us and the environment.

So my call is: "Do not dump Dounreay and the very professional team we have working there but let us build on the opportunities that nuclear power generation at Dounreay can give Caithness and Scotland." ○

“Quotable Quotes”

“That this House welcomes the achievement of the University of the Highlands and Islands (UHI) in becoming Scotland's newest university which has over 8,000 students and more than 100 courses which are specifically tailored for the needs of the Highlands and Islands region and beyond; notes that this landmark achievement of university title by UHI is the realisation of a long-time ambition for the region to have its own university to support economic development and to help sustain rural and island communities; believes that, as a university, UHI will attract more young people and also recruit students from beyond the Highlands and Islands region; congratulates staff, students and supporters who have contributed to this achievement; and wishes UHI every success for the future.”

John Thurso in an Early Day motion to the House of Commons

“It's haunting, there's no question about it. You can't help but understand when you come to this place how important it is to do things safely. The consequences of not doing so can be beyond our imagination.”

Laurin Dod, MD of the Chernobyl Shelter Implementation Plan (BBC News)

“If you believe that a site has been cleaned up and you find a contaminated animal, you know you have a problem.”

Tracey Tuberville, researcher at the Savannah River Ecology Laboratory, which assesses wildlife contamination at the Savannah River nuclear weapons site (USA Today)

“We ask the government, employers and unions to give unwavering support to renewable energy, if only for its enormous job-creation potential, and forget about nuclear power, which is not only dirty and dangerous but generates relatively few jobs.”

Greenpeace press release following the stunt where their activists climbed a cooling tower at a Spanish nuclear power station in protest at its continued operation (Yahoo! News)

“When we put our bid to NDA to manage the sites, we promised that we would utilise our full, formidable strength of talent, skills and experience to ensure that the lead team on site was continually replenished to bring in new approaches, specifically aligned to moving challenges.”

NMP Chairman Tom Zarges, commenting on the appointment of a new MD for Sellafield Ltd

To see these and more visit the communications homepage at: <http://dnotes6.ukaea.org.uk/dsrl/external-headlines.asp>

Ian Mackay is new SAP(E)

In February, **Ian Mackay** took over as the site's new Senior Authorised Person Electrical (SAP[E]). He told Dounreay News what that involved.



I have recently been appointed as the new Senior Authorised Person Electrical [SAP(E)]

I have been on site since 2001 and worked in the D1400 electrical distribution team, D1313 site services unit maintenance team, the D2003 design office, and D2003 design assurance. I have an honours degree in electrical power engineering from Glasgow University. My previous work experience was with BAE Systems working in the electrical design office for 6 years on the Tornado and Eurofighter planes.

The role of the Senior Authorised Person Electrical is to ensure the safety of all persons carrying out or involved in electrical work on site. To achieve this, the review and endorsement of all Nominated and Authorised Electrical persons on site to ensure their competences are valid and kept up to date.

The SAP(E) must act as key stakeholder for DMRs that propose modifications to the general site electrical system. The SAP(E) can

also provide advice for maintenance and project work where necessary.

There are regular electrical safety walk rounds to various plants to check that they are working to the DSRL Electrical safety Rules (MAN 2016) and Electrical Safety Procedure (PRC 2057), with respect to the standards of electrical equipment, installation and maintenance carried out.

Electrical UNORs that are raised are reviewed on a daily basis and where necessary the SAP(E) will assist in any follow up to those investigations.

The DSRL Electrical Safety Rules and Electrical Safety Procedure are in the process of being updated and roll out presentations will be carried out in March where all electrical staff will receive a copy of the new safety rules. The safety rules in their current format were first issued in November 1999 under the UKAEA badge and have not been revised since then. The new issue will

reflect the change to DSRL and other relevant changes to the electrical regulations.

New requirements that will be introduced under the DSRL electrical safety procedure are:

- all electrical staff working on site require to have completed the City and Guilds 2382 qualification to ensure their competences up to date with BS7671 IEE wiring regulations 17th edition.
- all electrical staff working on site who carry out electrical testing and inspection will be required to hold a formal qualification such as City and Guilds 2391-10 Inspection and testing of electrical installations or a suitable equivalent.

As SAP(E), I am here to offer advice on any electrical issue and would be happy to meet anyone who wants to talk through a problem or idea.

TOPIC OF THE MONTH



WORK CONTROL

A work control system is used to plan, schedule, authorise, execute, and close out discreet tasks within a larger project and covers all physical work on the Dounreay site. Kevin Henderson explains why the system is changing.

The current work control system has been operational since 2006, and since then we have learnt a lot about what works and what doesn't. The current system has also diverged with different areas using different variations; this leads to confusion as people move between areas of the site.

A team from all areas of site has been reviewing the system with a view to;

- applying best practice to all areas of site;
- simplifying the system;
- introducing a common system in all areas; and
- enforcing the common system.

Identifying the tasks

These are not whole projects such as disposal of a glovebox, but manageable packages of work such as build containment, isolate supplies, remove windows, cut up pipework, etc. Each of these tasks will tend to be completed by a specific person or team and have different controls or permits. Other tasks may be a single maintenance task such as a pump repair; however larger maintenance tasks such as crane maintenance may need to be split by discipline or by parts of the crane.

Planning

Initially a work scope hazard review may be required to identify specialist advice, resources, sub-permits; these are essential for complex tasks and project work. The task owner will need to work with the works control office to co-ordinate the advice, complete risk

assessments, complete method statements/work instructions, arrange sub-permits, and ensure resources such as contractors and materials are available. Ensure that the work is added to the rolling work plan (RWP); this will normally happen several weeks before the task is due to be completed.

Scheduling

As more tasks are added to the RWP, the schedule of work for a particular building can be defined. This takes into account:

- tasks where common resources are needed; such as health physics, or a building crane;
- conflicts between tasks;
- priorities.

A weekly meeting will review the next five weeks, moving tasks on the RWP to resolve conflicts and priorities. The final week of the RWP is called the committed work plan (CWP) and is the work that is scheduled for the following week. This is finalised and "locked down" at the weekly meeting.

A daily meeting reviews work that was due to be completed today and looks at the effect of continuing work on the rest of the CWP. A decision is made on whether to continue the work or reschedule it based on priority and the effect on the rest of the CWP. Emerging work may be added to the CWP or RWP but it needs to take the knock-on effects on other tasks into account.

Execution

The aim is that the work planned

for a particular day is carried out on that day. All resources including workers, equipment, health physics, isolations, permits, etc will be programmed to be available. In some cases permits will be available in advance; for example, if it is reasonable to isolate plant before the task goes ahead. A pre-job brief is carried out by the worker's supervisor explaining key requirements and hazards associated with the task. At the worksite, the work team will carry out a point of work safety assessment and confirm that there are no additional hazards at the worksite. The work should then proceed without hold ups.

Closeout

Completion requires workers, supervisors and the facility to confirm that they are happy that the work has been carried out to an acceptable standard. In the case of maintenance, that any testing or measurements are within acceptable limits. For a project, the project manager/supervisor is confirming that any installation is to the required technical standards.

Training for the new work control system (MAN 2003) has been in progress since mid-February with an overview for all personnel involved in the planning of or doing work. Detailed table top exercises are being run with those involved with planning work. The system will be launched on 14 March and everybody will be expected to follow the system. At the same time it is proposed to carry out a safety challenge to help to embed the key features of the system; this will be launched separately. ○

Nuclear news

Scottish nuclear bunker for sale

A nuclear bunker built in Scotland during the Cold War is on the market. Built for the Scottish Parliament in 1990, the two-storey bunker is at Cultybraggan Camp near Edinburgh, one of the best preserved purpose-built World War II prisoner-of-war camps in Britain.

The bunker was designed to shelter politicians, the emergency services and military chiefs in the event of a nuclear attack.

According to estate agents Carter Jonas, the bunker is "set within the magnificent backdrop of the surrounding hills and glens on the edge of the Loch Lomond and Trossachs National Park". The guide price is £400,000.

(www.bloomberg.com and www.carterjonas.co.uk)

Manhattan Project landfill excavated

A landfill used to dispose of radioactive items from the Manhattan Project is being dug up.

The Manhattan Project was a secret military project created in 1942 to produce the first US nuclear weapon. US physicist Robert Oppenheimer was a director of the project which recruited some of the world's best scientists, such as Albert Einstein and Enrico Fermi, to participate in the work. Work was based at sites in Manhattan and Los Alamos in New Mexico.

Now clean up experts at the Los Alamos National Laboratory are uncovering items that might have been used by Oppenheimer and his colleagues, such as protective clothing, gloves, glassware and barrels of chemicals. An old calendar dating back to 1948 has also been unearthed. (Albuquerque News)

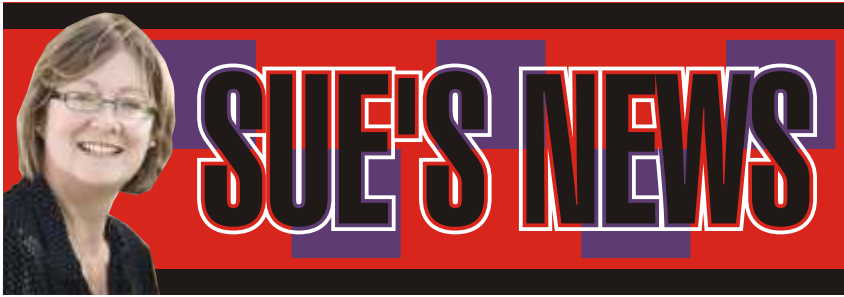
Shetland battles against radioactive shipments

Shetland-based marine environmental group KIMO has called on the Canadian government to re-think plans to ship 16 radioactive steam generators through Scottish waters to Sweden for decontamination.

Swedish firm Studsvik would clean up the generators, and sell 90% of the scrap metal, with the remainder being shipped back to Canada for storage there. If successful, the Canadian company has another 50 steam generators that could be treated in the same way.

If Canada secures permission from the UK government, the shipments would travel through the Pentland Firth on their way to Sweden.

(Shetland News) ○



Congratulations to **Lindsay Foubister** and husband **Keith** on the birth of their son, **Max**

Congratulations to JCL electrical assistant **Lorna Calder** who, together with her horse **Firestone Lady (Molly)**, won a Veteran Horse Society Performance Award 2010. Lorna is a keen horsewoman, regularly travelling with her horse to shows all over Scotland. She has also represented Scotland at Royal Windsor. Lorna is pictured with Molly at the 2010 Canisbay show, wearing the winning rosette.



Photo: James Gunn Photography

Natalie Marshall and **Jo Matheson** are pictured receiving a voucher from **Graeme Dunnett**, independent assessment and assurance services manager, as a thank you for participating in the recent safety promotion poster.

Graeme said: "Without staff participating in these promotions we would not be able to get our safety message across.

"I would encourage anybody with a good idea for a safety poster to contact **John Deighan** on 806230.



Dounreay engineer and STEM ambassador **Michael Bailey**, a mechanical engineer with an automotive background, has been working hard with high school kids on their 'Goblin' cars and they're making great progress. He also steered the Miller Academy team to the Scottish finals at Alford last year.

The Scottish finals are again at the Grampian Transport Museum at Alford on June 18 and five North Goblins cars will be competing – Pennyland, Halkirk, Thrumster, South (Wick) and Melvich. ○



DSRL IT Services – Tip of the Month

Perfect Paper

Most printers are setup to use A4 by default and our word processing programs (e.g. Word) should be setup similarly. If there is a mismatch e.g. if your default is "letter", then your prints may not appear as the printer waits for the right paper to be loaded.

It's therefore worthwhile to do a quick check to make sure you are setup correctly. Just open up Word, go to "File" and "Page Setup" and then click on the "Paper" tab.

If this is set to anything other than A4 then you should chose A4 from the list and click on the "Default" button below. This will make sure all new documents will be formatted correctly. It's also worth checking any existing documents as these may have been formatted with the wrong paper size. ○



Answer to Kings Journey puzzle

53	52	51	50	26	25	21	20	19
54	56	57	58	49	27	24	22	18
55	63	62	61	59	48	28	23	17
64	65	78	79	60	47	42	29	16
66	77	80	81	46	43	41	30	15
67	75	76	45	44	40	39	31	14
68	74	73	36	37	38	32	13	10
69	72	1	35	34	33	12	11	9
71	70	2	3	4	5	6	7	8

