



Thanks for dropping by at the Quorn Agricultural Show

Staff from the Department of Industry, Innovation and Science and the Australian Nuclear Science and Technology Organisation (ANSTO) were on site at the Quorn show to discuss the National Radioactive Waste Management Facility project and answer questions about the lifecycle of radioactive waste. The show was a great success and gave the community an opportunity to have their questions answered by both the Department and ANSTO experts.

The Department is discussing the proposal with as many community members as possible to ensure everyone has the opportunity to have their voices heard and to receive additional information. The number of people dropping by to hear more showed there was strong interest in the project.



Deadline for Barndioota Consultative Committee extended

Due to ongoing intermittent power issues following the wild weather in South Australia, we have extended our deadline for nominations of community representatives for the Barndioota Consultative Committee. The original deadline for submissions was 5pm Monday 3 October. The deadline has been extended until **4pm Thursday 13 October**.

Nominations can be:

- Sent via email to radioactivewaste@industry.gov.au
- Lodged directly with the project team when members of the team are present at its offices at Hawker and Quorn.

Please call the radioactive waste hotline 13 28 46 if you have not received confirmation of your application.

Meet the Experts

Come meet experts from Geoscience Australia when they visit Hawker and Quorn to talk about geological and seismic aspects of the project.

Members of the project team will host Geoscience Australia representatives at the Hawker Institute on **Tuesday 18 and Wednesday 19 October** and at the Quorn Town Hall on **Thursday 20 October**.

Geoscience Australia is an Australian Government agency that uses national-scale earth observation infrastructure to provide impartial evidence based on the best available science.

Like us on Facebook!



We're excited to announce the project team is now on Facebook. You are able to post your queries on the proposed facility and share information we provide through the page.

The Department will update the Facebook page on a regular basis and provide updates on the process moving forward. The page will be monitored in business hours Monday to Friday and we aim to provide responses as soon as possible within those hours.

Find us by searching "National Radioactive Waste Management Facility Project".

Nuclear medicine supporting a healthier Australia

Nuclear medicine today answers the questions that plagued the health system for too long.

How do you non-invasively diagnose serious illnesses, such as cancer, heart disease, muscular and skeletal conditions?

How do you monitor the internal organs of someone with a condition such as spina bifida without exacerbating the situation?

Thanks to the nuclear medicines produced by Australian technicians at ANSTO these once complex questions are now answered routinely.

'Nuclear medicine' might sound on the fringe, but if you've had a SPECT or CT SPECT scan you've benefited from nuclear medicine and on average one in two Australians will benefit from nuclear medicine at some point in their lifetime.

Medicines such as Technetium-99m originate from Sydney's Lucas Heights multi-purpose reactor, and enable doctors to monitor internal organs in a non-invasive way.

The same can be said for Iodine-131, which is used in the treatment of thyroid cancer and Quadramet Samarium-153, which is used to provide pain relief to patients with osteoblastic skeletal metastases.

And the only way these medicines can be produced in large scale, commercial and quality supplies, is with a nuclear reactor.

ANSTO supplies around 10,000 patient doses per week of nuclear medicine to more than 250 hospitals and medical centres across the country.

That's a lot of nuclear medicine, helping a lot of Australians.

Meet the team – Kaley Willmott

Kaley is a project officer with the National Radioactive Waste Management Facility team focussing on community engagement.

Since joining the team in June 2016, Kaley has visited Hawker, Quorn and surrounding areas every few weeks.

"I've always had an interest in regional Australia and meeting locals and seeing this country has been a great part of this role," she said.

Before joining the National Radioactive Waste Management team, Kaley worked on northern Australia policy.

She lives with her husband and her dog and enjoys running.



Correcting the record

The Department supports the right of the Medical Association for Prevention of War (MAPW) to oppose all nuclear activity, but must correct some facts.

MAPW's claim only one per cent of the waste at the facility would come from the production of nuclear medicine is completely wrong.

Some 75 per cent of future low level, and 98 per cent of future intermediate level, waste is directly associated with nuclear medicine production.

Yes there will be waste from a variety of other sources, including Woomera, and we have always acknowledged this. It will account for just over half of the initial waste and a small proportion after that.

The Canadian reactor referenced by MAPW will cease routine nuclear medicine production, and the fact is they have no workable plan to replace medicine they produce for themselves or countries they export to.

Canada's experiments with cyclotrons have failed to produce both the quantity and quality of Technetium-99m predicted and as a result the costs have significantly increased. The cyclotrons fail to produce the other radionuclides used widely in nuclear medicine that rely on the reactor. The Canadian cyclotron solution can currently only provide several teaching hospitals in Vancouver. The vast majority of 99mTc demands across the country require the import of reactor produced generators. The cyclotron technology does not meet the needs of Australia in terms of quality or quantity, does not provide flexible service delivery – for example for after-hours emergency service – would require billions of dollars of infrastructure investment and far more expertise in the form of scientists, technicians and operators decentralised across the country.

Canada is not opposed to nuclear reactors, indeed, about 16 per cent of electricity supply is generated in nuclear power plants there. Canada is not making a philosophical move away from nuclear.

There are 250 hospitals and nuclear medicine centres around Australia, and if they relied on cyclotrons instead of nuclear reactors, then they would not get the amount, quality, availability or reliability of medicine they need.

Australia is set to increase medicine production from a predominantly domestic supply to 10 million doses annually to help meet a global shortfall from the shutdown of a number of ageing reactors.

This will not, as claimed, dramatically increase waste levels. Part of the project is an innovative waste plant to reduce waste volumes by around 90 per cent.

Further, claims our reactor currently produces nuclear medicine only one day a week are just wrong – the reactor currently operates about 300 days a year, and irradiates targets for nuclear medicine for almost every one of those days, if not all of them. Nor will the new production facility be massively taxpayer subsidised – it will pay itself off well within its lifetime.