

ONR – NGO Forum Video conference meeting 26 February 2021 (1000-1300)

Office for Nuclear Regulation present:

Mark McAllister (MM) - Chair Adrienne Kelbie (AK) – Chief Executive (ONR co-chair) Mark Foy (MF) – Chief Nuclear Inspector Dr Mina Golshan (MG) – Deputy Chief Inspector and Director, Sellafield, Decommissioning, Fuel and Waste Division Rob Campbell (RC) – Delivery Lead for Decommissioning, Fuel and Waste Katie Day (KD) – Policy and Communications Director Jo deBank (JdeB) – Senior Communications Manager

Environment Agency:

Alan McGoff (AM) – Manager, Reactor Assessment and Radiological Monitoring Team

NGO representatives present:

Dr Jill Sutcliffe (JS) - Low Level Radiation and Health Conference (NGO co-chair) Katy Attwater (KA) – Stop Hinkley Sue Aubrey (SA) – Stop Hinkley Peter Banks (PB) - Blackwater Against New Nuclear Dr Ruth Balogh – West Cumbria Friends of the Earth Prof. Andy Blowers (AB) – Blackwater Against New Nuclear Richard Bramhall (RB) - Low Level Radiation Campaign Peter Burt (PBurt) – Nuclear Awareness Group/Nuclear Education Trust Paul Collins (PC) - Stop Sizewell C Neil Crumpton (NC) – People Against Wylfa B David Cullen (DC) - Nuclear Information Service Rod Donington-Smith (RDS) - Cumbria Trust Alison Downes (AD) - Stop Sizewell C Rita Holmes (RH) – North Ayrshire Radiation Monitoring Tor Justad (TJ) – Highlands Against Nuclear Transport Dr David Lowry (DL) - Nuclear Waste Advisory Associates Sean Morris (SM) - Nuclear Free Local Authorities Ian Ralls (IR) – Friends of the Earth Nuclear Network Michael Taylor (MT) – Together Against Sizewell C Trish Whitham (TW) - Nuclear Information Service Pete Wilkinson (PW) – Together Against Sizewell C Chris Wilson (CW) – Together Against Sizewell C

Observer:

Dr Johan Swahn – MKG (Swedish NGO Office for Nuclear Waste Review) from midmorning who later gave a presentation to NGO attendees on RSM in Sweden and the role of NGOs.

Secretariat:

Daniel Jones – ONR Communications Manager

1 WELCOME AND INTRODUCTIONS

1.1 Adrienne Kelbie (AK) welcomed everyone to the meeting and invited the ONR Chair Mark McAllister (MM) to update the Forum on the recent announcements made regarding changes to the ONR senior leadership team.

2 ONR LEADERSHIP CHANGES

- 2.1 MM outlined the changes to the new leadership structure which ONR had announced on 16 December 2020. MM explained that AK had been expected to step down early in 2022. MM advised that he felt Mark Foy's (MF) appointment to the new combined role of Chief Nuclear Inspector/Chief Executive would ensure continuity and would allow the senior leadership team to remain largely intact. MM advised that current Deputy Chief Inspector Donald Urquhart had been promoted to the role of Executive Director of Operations, which was a new role created under the new leadership structure. MM also took the opportunity to pay tribute to the fantastic job Adrienne had done while Chief Executive of ONR, noting for example, how ONR was now a more professional and outward looking organisation.
- 2.2 Neil Crumpton (NC) asked about any potential ministerial influence in the decision.
- 2.3 MM responded by advising that appointing MF to the role would allow ONR to maintain stability and focus on core purposes. Ministerial involvement in appointments is determined by the Energy Act 2013.
- 2.4 Jill Sutcliffe commented that she agreed AK had done a great job as ONR Chief Executive. JS expressed concern at the potential workload that the combined role would place on MF.
- 2.5 MM agreed AK had done a terrific job. MM advised that when MF takes up the new combined post he would have ultimate 'sign-off' but that Donald Urquhart would also share the workload in his new role as Executive Director of Operations. MM also confirmed that Sarah High will support MF in her capacity as Deputy Chief Executive.
- 2.6 David Lowry (DL) commented that he had requested that the new ONR leadership structure be added to the agenda of the next meeting of the CNI Independent Advisory Panel (IAP), but this request had been turned down, which he expressed concern about.
- 2.7 MF commented that the IAP agenda had already been set when the request from DL was received. MF confirmed at the next meeting all members will be briefed on the changes, explaining that ONR was not refusing to discuss this matter, but it had not identified it as one of the three substantial agenda item topics.
- 2.8 DL commented that he had made a formal request for this matter to be added as an agenda item and the refusal to place it on the agenda suggested that advice of panel members was not required.

- 2.9 MF reiterated that the matter would be discussed at the next meeting, but that he didn't expect 45 minutes of discussion, which is the time allocated for substantial agenda items.
- 2.10 AK added that the decision to change the ONR leadership structure had been taken by the ONR Board. AK advised that the IAP is focused on regulatory matters not organisational matters of this type, and that it would be more appropriate for MM to address as opposed to MF.
- 2.11 DL disagreed, advising in his view, the new combined role would take time away from the Chief Nuclear Inspector's role. DL argued it was not just a managerial issue but also a regulatory matter.
- 2.12 MF advised that there was no lack of capacity in new arrangements. MF advised that the new Executive Director of Operations will have leading regulatory responsibilities, and that he was very confident Donald Urquhart would do a good job in this new role.
- 2.13 Sean Morris expressed some concern at new arrangements. He commented that the separation of Chief Executive and Chief Nuclear Inspector had helped ONR to improve its interface with stakeholders. SM asked if model would be reviewed to ensure it is working effectively.
- 2.14 MF advised that ONR was alert to this. MF recognised the new way of thinking AK had brought to engaging with stakeholders, and he committed to continue to do this.
- 2.15 AK advised that Katie Day (KD) would take over future co-chairing arrangements of the ONR NGO Forum, with KD expected to co-chair first meeting in May 2021.
- 2.16 JS thanked NGO members and Peter Burt (PBurt) for their contributions at the last Forum meeting in remembering Phil Davies who had been a long-time member of the ONR NGO Forum and who had very sadly passed away recently.

3 UPDATE FROM THE CHIEF NUCLEAR INSPECTOR

- 3.1 MF commenced his presentation by providing an update on how ONR was responding to the COVID-19 pandemic. MF advised that the majority of ONR staff were continuing to work at home. MF confirmed that ONR's presence on sites had reduced in January, but that he expected this would now start to gradually increase. He also advised that ONR inspectors visiting a site were now required to take a COVID-19 test before attending site.
- 3.2 PBurt asked if ONR inspectors counted as key workers.
- 3.3 MF confirmed that some ONR staff were classed as key workers. He also advised that this classification combined with a warrant allowed ONR inspectors to travel to different areas of the country. MF confirmed that ONR had made a request for a limited number of vaccines but noted that ONR staff were now starting to be vaccinated as part of the national vaccination programme.

- 3.4 Mike Taylor (MT) commented that Sizewell B (SZB) is due to go into an outage in April. MT advised that boron had been used to keep the reactor running at half power over an extended period, expressing concern about this.
- 3.5 MF advised that the SZB reactor had been running at half power, but that this was not caused by boron usage. MF confirmed that the reduced power mode of operation is covered by the safety case, he added that the operating power levels of the reactor are recorded and form part of the considerations for future justification for the continued operation of the reactor.
- 3.6 MF moved to updated on the Energy White Paper and what this means for ONR. MF confirmed that the UK Government had stated its intent around small modular reactors (SMRs) and advanced modular reactors (AMRs). MF advised that ONR was expecting to receive a request by government to begin the Generic Design Assessment (GDA) of an SMR design in the next 12 months; and that in the next two years, he expected a further assessment of an SMR/AMR technology to commence.
- 3.7 MF confirmed that ONR inspectors have initial high level assessments of Advanced Modular Reactor technologies which are part of government's ongoing competition, advising that the approach allows ONR to develop its capability and readiness to undertake a meaningful GDA.
- 3.8 In relation to Hinkley Point C (HPC), MF confirmed that construction was continuing at the site. He advised that ONR was satisfied with the health protection measures in place, confirming that an ONR inspector was on site this week. MF added that there had been elevated rates of COVID-19 on the site and confirmed that HPC was taking the matter very seriously, with targeted closure of offices, surge testing, and deep cleaning on site. He advised that ONR would continue to monitor the situation closely.
- 3.9 In relation to Sizewell C (SCZ), MF confirmed that ONR was currently progressing its assessment of the site licence application, which will involve looking at the organisation that would have responsibility for holding and discharging the legal responsibilities under the licence. He confirmed that ONR would need to be satisfied with the capability of the organisation to hold the licence before a licence could be granted. He added that if the development did go ahead, it may involve funding through the Regulatory Asset Base (RAB) model, a process ONR would likely feed into, not as a financial regulator, but as a competent body able to independently advise on the progress and quality of the build.
- 3.10 NC asked if fusion is one the advanced technologies likely to be considered. NC also noted that costs at the HPC development have risen by £500 million, suggesting that because of the cost pressures, additional oversight was needed. He also commented on the technical capability at SZC and asked who would be doing the ground works on the concrete islands.
- 3.11 MF confirmed that fusion was one of the technologies government was looking at as part of its AMR technology considerations. MF advised that ONR was involved in discussions with BEIS, supporting its work to ensure an appropriate regulatory framework is in place for fusion, should it become reality. However, he advised that

the ONR may not necessarily be the regulator, under the current legislation HSE would regulate the technology.

- 3.12 MF explained that the HPC development was a challenging major infrastructure project, confirming that ONR was there to ensure work was being completed safely, to design and required quality.
- 3.13 In relation to SZC, MF added that ONR had completed the Generic Design Assessment (GDA) of the EPR reactor design many years ago and that the design acceptance confirmation issued at that time was for the generic EPR design and would not need to be revisited. He added ONR would be undertaking an assessment of the site specific EPR design for SZC to gain assurance that the design was appropriate for the site before building could commence.
- 3.14 Tor Justad (TJ) commented that he had been made aware of a meeting to discuss SMR technologies in the Highlands. TJ noted that the Scottish Government policy was opposed to new nuclear. He asked, if ONR had not yet assessed any SMR designs, why such a meeting would take place.
- 3.15 MF advised that he didn't know the specific details surrounding this matter but had observed that vendors have been engaging with various parties, so may be looking to create opportunities in the area. MF advised that there were currently eight existing sites that government had identified for potential new build, each adjacent to existing nuclear licensed sites.
- 3.16 TJ asked if the existing list of potential sites included Dounreay. MF advised that Dounreay was not on the list as far as he was aware.
- 3.17 DL commented with regards to the UK HPR1000 reactor design, that the Environment Agency (EA) had put in a robust response to the RAB consultation, noting that the EA had indicated they would not accept involvement of a new regulator. DL asked how the hierarchy of regulators would work.
- 3.18 MF advised that a financial regulator would be necessary for any RAB model, but this would not be ONR. However, the financial regulator would be unlikely to have sufficient knowledge or expertise to assess the construction, its adequacy and quality, which is where ONR may have a role to advise on. MF emphasised that ONR would still be the independent regulator maintaining our focus on ensuring the safety and security of the reactors as a priority.
- 3.19 DL asked if ONR had made this clear to the Department for Business, Energy & Industrial Strategy (BEIS), and any concern expressed at any potential 'watering' down of standards.
- 3.20 MF confirmed that this would not happen and that standards will not be reduced. MF advised that discussions around the RAB model were still at an early stage. He confirmed that ONR had been clear that safety and security needed to take priority.
- 3.21 KD added that in ONR's response to the RAB model consultation, ONR had also made this clear.
- 3.22 Ian Ralls (IR) asked what input ONR had had in the Energy White Paper.

- 3.23 MF advised that ONR had little influence. KD added that ONR had not been involved.
- 3.24 Pete Wilkinson (PW) commented with regards to SZC, ONR had noted that it needed to assure itself of the capability of the organisation seeking a site licence. PW commented that EDF cannot demonstrate the capabilities required.
- 3.25 In response, MF advised that ONR regulates licensed sites, and one does not currently exist at SZC. He confirmed that EDF needed to establish an organisation that could discharge the obligations required under a nuclear site licence. He added that if ONR considered that the capability of the prospective licensee organisation was inadequate, it would impact the date ONR would issue a nuclear site licence.
- 3.26 PW asked when does the suitability of the SZC site come into consideration.
- 3.27 MF advised that ONR would consider the conditions at the site as part of the assessment of the pre-construction safety report, which would need to demonstrate that the reactor could be constructed and operated safely at the SZC site.
- 3.28 Jill Sutcliffe (JS) asked if a decision on SZC had already been made. MF confirmed that ONR had made no decision with regards to the nuclear site licence application.
- 3.29 Paul Collins (PC) commented that he was aware that EDF were making 'noise' about adapting the use of SZC and asked where ONR was on this.

Action 21.01 – ONR to share response with wider Forum that was issued to Pete Wilkinson (HPGE202102165) regarding hydrogen and direct air capture (DAC) proposals at the SZC site.

[**Post meeting note** – Response to enquiry HPGE202102165 shared by ONR with all attendees following meeting.]

- 3.30 MF explained that if the design is changed, ONR would need to assess the proposed modifications based on their safety significance. MF advised that any proposed design changes would be considered during the assessment of the pre-construction safety report. He added that although the EPR design has gone through the GDA process, this did not stop the design changes from being made at a later date as it would be the site specific design that would be modified.
- 3.31 In response to a question on sea defences at SZC, MF advised that ONR would assess the defences as part of the assessment of the pre-construction safety report.
- 3.32 Chris Wilson (CW) commented that it appeared that developers could start a process and 'make it up as they go along'. CW cited the issues still outstanding with the EPR design following the GDA.
- 3.33 MF confirmed that the outstanding issues were being addressed and that ONR would require a robust demonstration of safety of the plant, with all outstanding safety issues being addressed before ONR would Consent to it being operated.
- 3.34 Alison Downes (AD) commented that Ministers used language which suggested that SZC would be going ahead. AD advised that she had heard Humphrey Cadoux-

Hudson (EDF Nuclear Development Managing Director) say that the design at SZC would not be changed, which AD noted appeared to be a total contradiction.

- 3.35 MF advised that it was EDF's ambition to have a like-for-like reactor at SZC. However, he did note that learning between construction projects could have significant benefits to safety. MF advised that HPC and SZC are different sites with different ground conditions, so these factors would need to be considered by EDF. He explained that if EDF wanted to put in place new systems this would change the design, and ONR would need to be informed about any safety significant design changes. MF was clear that ONR would ensure any proposed design changes were safe.
- 3.36 MT expressed concerns about the size of the proposed SZC site and requested the site safety justification through a Freedom of Information request.
- 3.37 MF advised that ONR wouldn't have a specific report, so MT would need to be clear in a request to us and suggested contacting KD with any more details. Richard Bramhall (RB) asked if nuclear power plants could operate without discharging alpha emitting discharges.
- 3.38 MF advised that this is not a matter that ONR regulates. Alan McGoff (AM) advised that this was a matter that the EA had responsibility for regulating. AM advised that the impact in terms of dose would be very small, but he acknowledged the different views and debate around dose rates.
- 3.39 Katy Attwater (KA) commented that she had yet to receive a response to an enquiry that was submitted three months ago to ONR about waste storage at HPC and timelines for a future Geological Disposal Facility (GDF).
- 3.40 KD advised that ONR was working hard to pull together a response but acknowledged it had taken longer than we had hoped and was outside of our usual service level agreement for responding to enquiries. KA accepted this position and thanked ONR for keeping her informed.
- 3.41 She added that with the timelines on storage of waste and the climate change situation, she did not know how new build could go ahead.
- 3.42 MF moved to update on the operating fleet of reactors. MF advised that the two reactors at Dungeness B remained shutdown, adding that EDF had made significant investments at the site. He advised that ONR was waiting to receive the safety case, which needed to demonstrate the continued safety of the reactors, before permission could be given for them to return to operation. In relation to Hunterston B, MF advised that ONR had received a safety case for a further period of operation which was currently being assessed. In relation to Hinkley Point B, MF advised that both reactors were shutdown and that there were some technical issues that still needed to be resolved before ONR could permission the return to service of the reactors.
- 3.43 In relation to Sellafield, MF confirmed that site inspections were continuing. In relation to Dounreay, MF advised that activities at the site had been shutdown due to COVID-19.

- 3.44 MF confirmed that since becoming the regulator of safeguards, ONR had successfully submitted returns to the IAEA. He added that ONR was also continuing to facilitate IAEA inspections.
- 3.45 MF noted that the work being undertaken by the Safety Directors Forum (SDF) to produce a 'Good Practice Guide' for SSG/LLC meetings was progressing. KD added that she had recently checked in with the SDF team, who confirmed they were still undertaking engagement work and that a draft document was now expected in May; KD advised that ONR would speak with team on progress.

Action 21.02 – ONR to discuss timing of draft guide with SDF.

[**Post meeting note** – KD has discussed matter with SDF project team. Update to be provided by KD to the ONR NGO Forum on 26 May 2021.]

- 3.46 MF updated on the Nuclear Energy Agency (NEA) survey which is gathering information to inform its development of a guide on what it means to be a trusted regulator. KD added that she had been working with communication colleagues at other nuclear regulators around the world. KD advised that ultimately the NEA would be looking at producing a 'Green Booklet' guide. KD thanked all those who had already responded to the survey.
- 3.47 In relation to the EA consultation on the UK HPR1000 reactor design, MF explained that ONR doesn't consult on GDA but would attend meetings which the EA were hosting to answer any questions, noting that ONR had attended meetings on 10 and 24 February 2021.
- 3.48 MF moved to update on ONR's commitment to improving transparency, commenting that ONR will be engaging further on transparency to agree draft principles. KD added that ONR was looking to improve transparency and was considering what more practically we could do.

Action 21.03 – ONR to invite expressions of interest from members of the Forum on attending a focus group with ONR to discuss further.

[**Post meeting note** – ONR NGO Forum members invited to join a meeting with ONR to look at the issue of openness and transparency. A meeting has been scheduled with several NGOs who have volunteered to take part and will take place on 25 May 2021.]

- 3.49 In response to a question submitted regarding the reactor trip that occurred at the South Texas Project Electric Generating Station, following the recent extreme cold weather, MF explained that the trip had occurred in one of the reactors due to an issue with the feedwater pump. MF confirmed that all the systems had behaved as they should. In relation to the UK reactor fleet, he advised that all nuclear facilities were required to look at extreme hazards both now and, in the future, which included extreme temperature variations.
- 3.50 MF moved to update on enforcement action taken by ONR since the last meeting of the Forum. MF confirmed that ONR has issued six enforcement letters; two improvement notices; a direction and had also completed a transport related investigation.

- 3.51 DL requested some further details about the transport event.
- 3.52 MF advised that it had been a minor issue involving three dutyholders, which had led to ONR issuing an enforcement letter to each dutyholder. The letters were issued to the dutyholders, as they had consigned packages containing Class 7 goods without correct labelling or documentation using the Royal Mail Parcel Force.
- 3.53 DL commented that at the NEA stakeholder event in 2019, there was only three stakeholders present who could be considered NGO representatives. DL commented that in his view, the NEA needed to look at its interpretation of stakeholders, which DL considered to be an example of their lack of transparency. KD agreed to discuss further with DL offline.
- 3.54 Rita Holmes (RH) in relation to HNB, asked MF if ONR had been informed of the date that Reactor 3 was due to come offline. RH also asked what would stop ONR authorising a further period of operation and asked if ONR would 'step in' if predicted rates of cracking were found to be inaccurate following the current operating period.
- 3.55 MF advised that ONR didn't currently have an exact date on when Reactor 3 would come offline. He advised that if predictions of core state do not meet current assumptions, he was confident EDF Energy would not seek to return the reactor to service.
- 3.56 In relation to recent enforcement action, Mina Golshan (MG) advised that ONR had recently brought a successful prosecution against Sellafield Ltd. and had also issued a site wide improvement notice requiring improvements to electrical safety.
- 3.57 PW noted that the defence from the EA on low level radiation detection and impact is the same as was used in 1983 by BNFL too low to cause damage to health. The Winsdcale discharge levels were promptly reduced after the Nuclear Laundry TV programme identified the ten-fold increase in childhood leukaemia in Seascale. PW commented that it seems we have learned nothing in 40 years. PW argued that we are still not prepared to have a sensible discussion about this topic between experts holding diverse views, while committing to new nuclear build and renewal of Trident.

Action 21.04 – Alan McGoff to arrange response to PW on behalf of EA regarding this matter.

- 3.58 PBurt asked if there are plans in the future for ONR to undertake consultations on GDA, licensing type issues, in line with the recommendations of the recent IAEA review of ONR's activities.
- 3.59 KD advised that ONR is considering a range of proposals that could enhance transparency, including how the IAEA recommendation could be addressed.
- 3.60 David Cullen (DC) requested to raise points arising from the Burghfield DEPZ court ruling, advising that he had some concerns about the process described in the ruling. Unfortunately, on the day ONR was unable to address this question due to time constraints.

Action 21.05 – ONR to contact DC to invite him to put his questions/concerns in writing to ONR.

[**Post meeting note** – DC contacted on 1 March 2021 by ONR and invited to submit his questions in writing so that ONR could respond and address any concerns he might have regarding the court ruling.]

- 3.61 Andy Blowers (AB) commented that there had been a lot of discussion around sites. AB noted that the existing sites identified by government were not intended for SMR. AB commented that the ONR and Environment Agency were required to look at materials given to them but asked if this was done passively and argued that existing sites identified by government were completely unsuitable. AB argued it was impossible to give approval 'rationally' to construction at these sites. AB also noted that a revised National Policy Statement for Nuclear Power Generation (EN-6) had still not been produced by government. He suggested that there was an impression that regulators were giving a 'light touch' to large substantial plants.
- 3.62 MF commented that he recognised the issue with SMRs and potential site location. He explained that government had only identified a certain number of sites for new reactors. MF affirmed that ONR does input into discussions, but it was still early with regards to SMRs and acknowledged that government would need to review the siting policy should SMRs be considered for deployment out with current criteria. MF confirmed that ONR does expect to undertake a GDA of an SMR design but stressed this did not mean the design could necessarily be deployed.
- 3.63 IR asked who input and influenced the Energy White Paper and who government consulted.
- 3.64 MF advised that he was unaware of the details. He advised that ONR would continue to ensure that reactors are constructed and operated in a safe and secure manner.
- 3.65 TJ asked what consideration ONR had given to whether nuclear power was carbon neutral and asked if ONR would take this into account during its assessment.
- 3.66 MF explained that the environmental footprint was not considered as part of ONR's assessment of a reactor design.
- 3.67 AM added that government set energy policy and route to carbon net zero. He advised that the Energy White Paper talks about the need to update the National Policy Statement for Nuclear Power Generation, which the EA looked forward to.
- 3.68 The co-chairs invited all attendees to take a 10 minute break.

4 WASTE MANAGEMENT: CURRENT AND FUTURE POSITIONS AND REGULATION

- 4.1 JS welcomed MG and congratulated MG on her recent award of a CBE.
- 4.2 MG thanked JS and others for their kind words. MG commenced her presentation by explaining the current position with regards to the storage of radioactive waste. MG advised that interim storage involved storing the waste in overground facilities, which are designed to house the radioactive waste, noting that the facility design was determined by the type of radionuclides, condition of waste/spent fuel and waste package.

- 4.3 MG explained that all storage facilities must have a safety case justifying safety for their continued use; are subject to inspection and maintenance activities based on the requirements set-out in the safety case; subject to periodic safety reviews, which is all in line with the requirements placed on the operators under the Nuclear Site Licence. MG added that there are currently legacy storage facilities that do not meet the very high standards we expect for long-term operation of nuclear plants/storage of waste. MG explained that for some of the facilities, an upgrade to them is not reasonably practicable, and the only option is to retrieve the waste from these facilities and move it to modern facilities for interim storage.
- 4.4 MG used a selection of images to show the breadth of facilities that house waste, which ONR has responsibility for regulating. MG advised that government had made the decision that a GDF was required to provide suitable containment for waste. MG explained that ONR was working with BEIS to ensure ONR had the necessary powers to grant a nuclear site license for a future GDF, noting the recent ONR consultation on the proposed criteria for a licensing decision for a GDF (based on interpretation of the term "Bulk Quantities") had attracted some really good comments from a variety of stakeholders, confirming that ONR was now in the process of formulating its response to the consultation exercise.
- 4.5 MG advised that ONR will apply the nuclear site licensing regime to a GDF, but with suitable flexibility to assess, on a case by case basis, applicability to a potential near surface disposal of Intermediate Level Waste and/or exclusion of Low Level Waste disposal. MG explained that ONR was progressing this work to provide assurance of proportionate and targeted regulation of a future GDF to communities potentially interested in engaging with the siting process.
- 4.6 MG moved to update on the timelines for a future GDF. MG explained that depending upon the locations taken forward through the siting process, ONR anticipates submission of a nuclear site licence application in the mid-2030s to early 2040s. MG also noted that ONR continues its engagement with Radioactive Waste Management (RWM) to ensure RWM is working towards building suitable capacity and capability to hold a nuclear site licence at an appropriate time.
- 4.7 MG explained that as the GDF programme develops, ONR expects to apply a staged regulatory model with increasing technical detail in line with development of a site-specific GDF safety case. MG also confirmed that ONR has regulatory oversight of waste generating sites/licensees to ensure they maintain adequate storage capacity and capability to deliver safe and secure interim storage until suitable disposal routes are made available. MG added that ONR needed to ensure that licensees arrangements and practices for waste storage enables waste disposal in a GDF in the future.
- 4.8 MG explained that ONR does not have a decision-making role in the GDF siting process. MG advised, however, that ONR was committed to engaging with interested communities to explain ONR's future regulatory role and how our expectations will apply to a GDF, noting the recent meetings that ONR staff had attended with the newly formed Copeland and Allerdale Working Groups.
- 4.9 MG advised that along with the environmental regulators, ONR was engaging with RWM to provide regulatory advice and to scrutinise RWM's work to deliver a GDF.

MG explained that ONR's focus was on the development of both RWM's organisational capability in preparation to become a licensee and its safety case to underpin safe operations at a GDF. She noted that through the engagements ONR has with RWM they were aware of our expectations. MG also explained that through the routine engagements on RWM's research and development portfolio, we maintain oversight to ensure the organisation will have the necessary knowledge to underpin its safety case at the right time. MG added that this will also enable ONR to identify topics where we may consider independent research to support future regulatory decisions.

- 4.10 MG also explained through regular engagement with RWM, ONR was able to ensure it was giving appropriate advice to waste producers about packaging radioactive waste for future disposal at a GDF.
- 4.11 PW advised that waste could not be isolated as gas had to be expelled from a waste repository, so it was incorrect to claim a GDF could isolate waste. PW commented that there were many outstanding issues that still need to be resolved, and he questioned how so much faith could be put into this form of disposal.
- 4.12 MG acknowledged the point made by PW but advised there would be multiple barriers in place to keep the disposed waste isolated from the environment and people.
- 4.13 PW expressed concern at the use of the word 'isolate' and questioned why this word is used with reference to a GDF.
- 4.14 AM advised that the ONR along with the EA were taking a joint regulatory approach, and there were issues that needed to be resolved to regulatory satisfaction.
- 4.15 Rob Campbell (RC) explained that a GDF was recognised internationally as the best way to dispose of waste. He added that the IAEA define a GDF as providing 'isolation' from the biosphere.
- 4.16 PW expressed concern at using language that was not accurate and using language of 'certainty'. He expressed the view that we needed to be honest with the public on these matters.
- 4.17 IR commented that the 'Flowers report' (released in 1976) stated no new nuclear should proceed without establishing long term storage of waste, noting that a location for a GDF had still not been established.
- 4.18 MG advised that it is government policy for the UK to have a GDF. MG explained that ONR's role was to ensure that licensees manage their operations safely and ensure that waste is stored safely and securely until a GDF is built.
- 4.19 IR commented that government was pushing ahead with new nuclear but still had no way for long term disposal of waste, which he considered should be a pre-requisite to new build.
- 4.20 MG advised that ONR's role was to work within government policy, noting that ONR could not operate outside of its vires and step into the government policy sphere.

- 4.21 IR commented that he considered ONR to be performing its job admirably but felt there was no 'joined up' thinking on this matter.
- 4.22 MG advised that if at any point ONR has safety concerns resulting from delays with a GDF being brought online, ONR would have no hesitation in bringing those concerns to the attention of government.
- 4.23 MF added that ONR did not have any concerns now with the safety and security of waste stored on sites. He advised should there be safety concerns and if a GDF was going to extend beyond current timelines, then ONR could intervene and highlight concerns to government so that alternative options could be developed.
- 4.24 Rod Donington-Smith (RDS) commented that working groups such as Allerdale wanted to be kept small and nimble so they could move to a community partnership, commenting in his view, that real communities were being left on the sidelines. He commented that a lot of money was being spent and felt it was very hard to put the 'brakes' on. In his view the present situation was not good for locals and those involved in working groups had limited historical knowledge and that he had been unimpressed.
- 4.25 MG explained that ONR had no role in the composition of working groups.
- 4.26 Ruth Balogh (RB) asked how is it that facilities at Sellafield do not meet high standards and had managed to escape ONR scrutiny, with RB advising that this continues to astonish, disturb and depress her to think this could happen. RB asked how long it would take to resolve issues and how safe were people. RB questioned what would happen in the interim period before a GDF was built.
- 4.27 MG affirmed that ONR has evidence that Sellafield is safe and that there are no 'cliff edge' issues that could lead to a release. MG advised that ONR was working to ensure that where shortfalls were identified action was taken to bring about improvements. MG explained that legacy facilities at Sellafield dated back to the 1950s and 60s, and they did not meet modern standards. MG advised that ONR's regulation is focused on ensuring the timely removal of waste from these facilities. In relation to RB point on a GDF, MG confirmed that a GDF would be licensed by ONR and would need to meet the high standards that we expected, and that in the interim period ONR would regulate existing storage facilities to ensure waste stored on the sites is safe and secure.
- 4.28 DL added that between 2012-15 both he and PW had been representatives on the then Energy Minister's GDF board. DL advised in his view, the proposals from industry at the time had been ludicrously optimistic. DL asked how plutonium storage at Sellafield would be dealt with safely and securely, asking what difference it would make to the regulator when fissile plutonium needed to be incorporated into plans. DL asked what requirements would be placed on operator.
- 4.29 MG advised that any facility built would need to give due consideration to fault assessment and assured the Forum this would not escape ONR's regulatory attention. MG also advised that consideration would also be given to retrieval of waste.

- 4.30 DL proceeded with line of questioning when three attendees who had not had a chance to contribute were waiting to speak. JS asked for DL to be muted.
- 4.31 AB commented that you can regulate for the possibility that a future facility would have plutonium to deal with, noting that with legacy waste we know what we've got to deal with. AB expressed view that to pile new build waste onto this would be intolerable. In his view, ONR needed to say to government we can't do this, commenting that if the policy was ludicrous, ONR must say so.
- 4.32 MG advised that ONR was satisfied with current plans for managing waste. In relation to Sellafield, MG explained that ONR's top priority is the management of special nuclear material which ONR was satisfied is currently safe and secure and that SL is addressing areas where shortfalls have been identified.
- 4.33 KA asked via the chat function if a GDF requires a certain geology, and if the communities applying comply with that basic geological requirement, commenting that surely the invitation should only go to relevant communities.
- 4.34 On the day due to the restrictions on time, ONR was unable to address question from KA.

Action 21.06 – ONR to respond in writing to question submitted from KA.

[**Post meeting note** – Response issued to KA by ONR on 1 March 2021. ONR advised KA that it does not regulate the site selection process for a future GDF or have a decision-making role in the process for identifying and selecting sites for investigation. It confirmed that RWM is the organisation with responsibility for identifying a suitable site and that they would be able to provide further information on the geological requirements.]

5 SUMMARY AND CLOSE

5.1 JS closed meeting by thanking all speakers and NGOs before wishing everyone well. AK due to IT issues was unable to join JS for the close and summary of the meeting but issued a written message to thank everyone for their participation at the meeting.