

FAO GDF siting process consultation Department of Energy and Climate Change Room M07 55 Whitehall London SW1A 2EY Email: radioactivewaste@decc.gov.uk	copy FAO MRWS consultation Radioactivity and Pollution Prevention Branch Welsh Government Cathays Park Cardiff CF10 3NQ E-mail: RPPmailbox@wales.gsi.gov.uk
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RESPONSE DATED 03.12.2013:
Review of the Siting Process for a Geological Disposal Facility
joint Consultation by DECC, the Welsh Government and the Northern Ireland Executive
(URN 13D/250, September 2013)

Consultation Questions

1. **Do you agree that a test of public support should be taken before the representative authority loses the Right of Withdrawal?**
If so, what do you think would be the most appropriate means of testing public support, and when should it take place?
If you do not agree with the need for such a test, please explain why.

- 1.1 Consultation para.2.30 posits a neat solution! Upon encountering failure, simply move the goalposts¹. The idea of bypassing a politically inconvenient tier of local government is an otiose reflex.

¹ Does an apparent habit of changing the goal posts mark selective mutation in Government policy DNA? Other recent examples of blatant shifting of inconvenient goal posts include:

- changing the definition of fuel poverty “so that official statistics record far fewer households as fuel-poor”, according to the Chair of House of Commons Environmental Audit Committee (02.12.2013: available at <http://www.parliament.uk/business/committees/committees-a-z/commons-select/environmental-audit-committee/news/publication-of-energy-subsidies-report/>); and,
- when marksmen failed to reach the badger cull target in Somerset in October 2013, despite DEFRA having reduced the target, the Environment Secretary argued in a radio interview on 9th October that the “*badgers are moving the goalposts*” (<https://audioboo.fm/boos/1650041-owen-paterson-badgers-moving-goalposts-on-bbc-somerset#t=0m0s>). The poet laureate Carol Ann Duffy eloquently captured the flavour under the title “*22 Reasons for the Bedroom Tax*” (reproduced here from *The Guardian*, 11.10.2013: available at <http://www.theguardian.com/books/2013/oct/11/bedroom-tax-poet-laureate-carol-ann-duffy>):

Because the Badgers are moving the goalposts.
The Ferrets are bending the rules.
The Weasels are taking the hindmost.
The Otters are downing tools.

The Hedgehogs are changing the game-plan
The Grass-snakes are spitting tacks.

The Squirrels are playing the blame-game.
The Skunks are twisting the facts.

The Pole-cats are upping the ante.
The Foxes are jumping the gun.

- 1.2 The “Right of Withdrawal as narrowly permitted under the 2008 MRWS White Paper² amounts to explicit recognition by the political classes of the momentous implications of a decision to site a GDF for higher activity radioactive waste in any community anywhere in the UK. The creation of higher activity radioactive waste at the commencement of the production chain is no less momentous. It marks a point of no return, locking future generations into a one-sided, irrevocable and punishing contract.
- a. A nuclear waste GDF must now per force also accept the entire inventory of higher activity radioactive waste,
 - (i) thoughtlessly created by previous generations (commencing in the 1950s);
 - (ii) as well as the waste continuing to be created by current generations, fully conscious of foisting indeterminate risk on future generations.
 - b. The burden of building, or completing construction of a nuclear waste GDF, now falls on the next generation. Its care, maintenance and operation fall on successor generations in time.
 - c. The responsibility for ensuring biologically and environmentally safe isolation of all disposed nuclear wastes, over the course of hundreds of thousands of years into the future, is expressly transferred to an extremely long succession of future generations.
 - d. Future generations have no choice but to receive and deal with the radiotoxic waste legacy as bequeathed! The radioactive decay timescales are staggeringly long: up to 240,000 years. By comparison, it is salutary to recall that *homo sapiens* have been in existence on this planet for approximately 130,000 years.
- 1.3 There is little sense in restricting the “Right of Withdrawal” only to the decision stage for disposal site selection, at the opposite end of the chain of nuclear waste production process. As a matter of principle, the Right of Withdrawal should apply either throughout the entire decisions chain (starting at the political stages when the creation of additional or new higher activity radioactive waste is expressly authorised, encouraged or facilitated), or not at all. In other words, the Right of Withdrawal should be available at the commencement stage of creation of higher activity radioactive waste, as well. The Right of Withdrawal and planning consent decisions are wholly separate matters. The former should be exercisable at any point in time. There are ample grounds for the Right to bite at all points along the decisions chain, including:

The Voles are crashing the party.
The Stoats are dismantling the Sun.
The Rabbits are taking the biscuit.
The Hares are losing the plot.
The Eagles are kicking the bucket.
The Rats are joining the dots.
The Herons are throwing a curveball.
The Shrews are fanning the flames.
The Field mice are sinking the 8-ball.
The Swans are passing the blame.
And the Pheasants are draining the oil from the tank-
but only the Bustards have broken the bank.

² DEFRA (2008) Managing Radioactive Waste Safely: A Framework for Implementing Geological Disposal. A White Paper by Defra, BERR and the devolved administrations for Wales and Northern Ireland. Cm 7386. June 2008. Available at <http://mrws.decc.gov.uk/>

- a. giving practical effect to democratic accountability and transparency at local level on decisions and actions taken by the UK Government. The encouragement, facilitation, invitation, promotion of, or financial, fiscal or political support for, the inexorable manufacture of higher activity radioactive waste at existing or new nuclear reactors, by the Government, comprise critical drivers of subsequent decisions culminating in the creation of industrial quantities of radiotoxic nuclear waste. It is therefore necessary to ensure political classes can no longer affect amnesia on the direct link between political approval of or exhortation for nuclear power generation, the creation of higher activity radioactive waste by the nanosecond³ at every operating nuclear reactor, and the consequential need to dump the radiotoxic waste in a GDF somewhere, in the hope the waste might then remain biologically safely isolated from all surface environments for hundreds of thousands of years in future;
 - b. emphasising full cradle to grave responsibility implicit in the voting behaviour of Members of Parliament. A vote in Parliament for approving, authorising, encouraging, facilitating, inviting or supporting nuclear power generation is irrevocably a vote for the creation of additional higher activity radioactive waste, whether at existing or new nuclear reactors anywhere in the UK. Moreover, the same vote inexorably propels unavoidable need for disposal of radiotoxic wastes in a GDF somewhere deep under the ground, hopefully safely isolated from surface environments for hundreds of thousands of years;
 - c. clarifying the cradle to grave responsibility of local communities gaining or seeking to gain various socio-economic and community benefits from the operation of existing or new higher activity radioactive waste manufacturing nuclear reactors hosted by these communities.
- 1.4 Plainly, the UK Government needs to modernise democratic processes effectively, by providing for a free standing “Right of Withdrawal” from the very start of the political decision making process, right through the entire chain of decisions, including subsequent nuclear reactor construction and commissioning, down to the creation of higher activity radioactive waste in an operating reactor and its permanent disposal deep in a GDF.
- 1.5 Both District and County Councils should have the Right of Withdrawal. The exercise of the Right by either or both tiers of local government does not give rise to incompatibility.
- 1.6 Common sense suggests a test of public support falls to be considered on a continuous basis, from GDF siting through to GDF construction, operation and closure (including early closure). There can be no justification for extinguishing “Right of Withdrawal” at any point whatever, irrespective of the outcome of separate requirements under respective planning and regulatory consents regimes.
- 1.7 A test of public support is by definition a snapshot. That entails repeating the test at each incremental stage of the GDF siting process itself, as well as during GDF construction and operating phases. Thus, a positive test result at any given point in time could not be presumed to grant unconstrained licence to proceed through subsequent incremental stages, regardless of the outcome of any separate planning or regulatory consents regime. Local communities, as well as the representative authority, should therefore retain the right of withdrawal even subsequent to statutory planning consents, during GDF construction and operation. The reserve right would

³ The primary product of nuclear fission in a nuclear reactor is the creation of radionuclides. These radionuclides make up different categories of nuclear waste, including higher activity radioactive waste.

be exercisable by successor generations, in light of circumstances prevailing at the time. The salient point being that generational changes are bound to occur even during the transition from GDF site selection to its routine operation. Any number of factors bearing on GDF parameters could turn out to be material, carrying implication for generations in succession.

- 1.8 As for methodology, the test of public support, at each point in time, would perhaps be better conducted in the form of simultaneous local, regional and national referenda. Appropriate tier weighting of the results may be warranted. The GDF would, after all, be expected to receive higher activity radioactive waste created at any site in the UK.

**2. Do you agree with the proposed amendments to decision making within the MRWS siting process?
If not, how would you modify the proposed phased approach, or, alternatively, what different approach would you propose? Please explain your reasoning.**

- 2.1 Merits of the proposed phased approach aside, GDF development consent (Consultation para.2.64) could not meaningfully be held to supplant or quench the host community's subsequent Right of Withdrawal at any point, given the exceptional circumstances attending a radiotoxic GDF. For example, generational succession; the nature of indeterminate risk; novel near-term outcome bearing on expectations of extreme longevity of containment integrity of the implanted radiotoxic waste. It would therefore be inadvisable to regard development consent as immutable, whether prior to or in the lead up to and including commencement or completion of excavation works, for instance.
- 2.2 Notably, the existing and proposed approaches under the MRWS siting process remain focussed largely on
- a. passive recruitment of volunteer GDF host communities; and,
 - b. starting the MRWS siting process long after industrial quantities of higher activity radioactive waste have been created and accumulated, posing serious risk to the environment and human health.
- 2.3 The probability of compromise, failure or deficiency in any parameter affecting a facility, or implanted wastes inside a facility, may not be so remote as to be negligible. In that regard, prudence counsels the development of a number of facilities at different locations. There is scant assurance passive voluntarism alone may yield more than a single site, not the least given the prospects of open ended production of additional higher activity radioactive waste at new nuclear reactors under any number of new build programmes. The latter prospect could place a single GDF host community under immense pressure to continue accommodating ever increasing quantities of radiotoxic wastes.
- 2.4 Secondly, starting the MRWS siting process at the end of the chain of production of radiotoxic wastes comprehensively trashes the principle of intergenerational equity.
- 2.5 In that vein, consideration could be given to engaging two agent classes overlooked so far, under an additional, albeit parallel, five-track approach within the framework of the MRWS siting process. The additional approach would focus on exploiting the combined potential of class vested interest, nudged by appropriate sanctions, for

active recruitment of volunteer GDF host communities. The agent classes are namely Members of Parliament and the communities hosting existing or seeking to host new nuclear reactors. But for the behavior of agent classes, the problem of mounting industrial quantities of higher activity radioactive wastes, awaiting biologically and environmentally safe permanent disposal, might have been managed than has been the case. And, the urgent clamour of “national priority” (Consultation para.1.19) might have been less edgy.

- 2.6 The existing and proposed MRWS siting approaches are attempting to sellotape bridges over iniquitous futurity chasms chiselled by the radiotoxic legacies inherently characterising nuclear power infrastructure. The political and ruling classes, in thrall to atomic lobbying, have persistently taken bad nuclear infrastructure decisions, serially since the 1950s. Indeed, the affliction continues to date. By far the clearest responsibility for perpetuating a nuclear waste mess originates with a majority of Members of Parliament, in concert with all hues of Governments of the day, with the Whitehall steam-rollers maintaining the momentum and championing a juggernaut.
- 2.7 To the extent a government of the day and the Whitehall machinery tend to act largely as authorised under a majority vote of Members of Parliament, the present 60-year long nuclear waste headache falls to be seen to have been manufactured by the voting behaviour of Members of Parliament. At a secondary level, the creation and accumulation of nuclear waste legacies has been aided and abetted by communities vying to host nuclear reactors creating industrial quantities of additional high activity radioactive wastes by the container load.
- 2.8 It ought to be axiomatic that those creating a problem carry principal responsibility for ensuring safe solutions, individually, jointly and severally. However, the agent classes have historically exhibited a complete absence of joined up approach to the creation, accumulation and biologically/environmentally safe contemporaneous permanent disposal of all higher activity radioactive waste, within the lifetime of each waste creating generation. Buck passing on nuclear waste disposal appears to have chronically infected the voting behaviour of Members of Parliament when advocating expansion of nuclear power generation. Similarly, legitimate hunger for developmental benefits on the part of economically vulnerable peripheral communities appears to have engendered communities into hosting nuclear reactors, while passing the buck on safe permanent disposal of higher activity wastes created by those very same reactors.
- 2.9 Both agent classes appear germane candidates for finding GDF sites. Grasping the futurity nettle entails putting an end to buck passing traditions. That, in turn, suggests an additional five-track approach, running in parallel with and dovetailing the MRWS siting process, thus.
- 2.10 **A five-track additional parallel approach dovetailing the MRWS siting process**
- 2.10.1 **Provide certainty for GDF host communities**
Legitimate concerns regarding the size of disposal inventories (Consultation para.3.56) can be addressed fairly and squarely. The combined historical and contemporary quantities of higher activity radioactive waste could be capped at levels prevailing on fixed date, say, 5th April 2015. This entails the winding down of all current higher activity radioactive waste production at operating nuclear reactors over the course of the intervening period, to nil by the date specified. It is crucial to robustly scotch inventory uncertainty from the outset, as well as the prospects of out of control open ended inventories as enshrined at Consultation paras 3.52-3.55 and paras 3.58-3.62, respectively.

2.10.2 **Demonstrate environmentally safe GDF operation before authorising new or additional higher activity radioactive waste production**

The UK Government should take proper heed of the recommendation of the Royal Commission on Environmental Pollution, as made in 1976⁴:

‘There should be no commitment to a large programme of nuclear fission power until it has been demonstrated beyond reasonable doubt that a method exists to ensure the safe containment of long-lived highly radioactive waste for the indefinite future.’

The UK Government could properly revisit all new proposals involving higher activity radioactive waste production at all currently authorised nuclear reactors (namely, not as yet built or commissioned; and, if built, not yet commissioned), as well as prospective new build reactor projects, after at least the first GDF has been shown to have demonstrated safe operation for a period of 100 or so years. This time scale would facilitate a reasonable period,

- a. for suitable rectification, maintenance and monitoring measures to be determined, tried, tested and implemented; and,
- b. for the development of enhanced scientific understanding of the likelihood and implication of postulated interactions between radiation emitting heat sources implanted in deep repository caverns and ambient bio-hydro-geo-chemic processes at depth, over millennial time scales.

2.10.3 **Stopping the buck with MPs voting for nuclear power generation**

Plainly, the burden of all risks, construction, operation and closure of any GDF is expressly transferred to future generations. Future generations, by definition, have no come-back on this one-sided one-direction transaction. This is a grave bind. The nuclear waste production and accumulation problem is a direct result of the voting behaviour of Members of Parliament (MPs) in Parliament. Such wilful voting behaviour needs to be balanced with suitably direct responsibility. It cannot be acceptable, proper or reasonable for MPs to indulge in voting behaviour on the principle of passing the buck to future generations. MPs appear to have fallen into a habit of making short term momentous decisions on higher activity radioactive waste creation while remaining divorced from the extremely long term consequences for future generations. A way has to be found that welds decision making behaviour to national interest obligations for the higher activity radioactive waste so created. In recognition of the gravity of burden on future generations for hundreds of thousands of years, appropriate legislation could be laid requiring all MPs (including retired MPs) who voted or vote for continuing higher activity radioactive waste production (whether at existing or new build nuclear reactors):

- a. to canvass actively, convince and deliver at least one local community from within their electoral constituency to volunteer hosting a GDF in the national interest. Members of Parliament should be reminded “*there is no ‘best’ or ‘most suitable’ generic type of geology*” (Consultation para.3.9). It may boil down to a question of drilling deeper in some locations than others. Thus, every constituency is eminently suited to deep investigation, subject to Consultation para.3.21, considering the depth of overburden in the range of 200m to 1000m;
- b. to pay an annual GDF levy from the MP’s tax funded final salary pension entitlements upon retiring. The levy would be a lasting reminder of the

⁴ RCEP (1976) *Nuclear Power and the Environment*. Royal Commission on Environmental Pollution, Chairman Sir Brian Flowers. Sixth Report. Cmnd 6618. HMSO.

momentous implication of voting behaviour. Members of Parliament should welcome permanent ties to votes on nuclear waste creation as milestones in Parliamentary career. The levy would be comfortably affordable. MPs pensions are highly generous compared with the basic state retirement pension, on which rely the majority of ordinary retirees after a lifetime of hard graft at a fraction of tax funded MP and Ministerial salaries. Funds raised through the levy could be held in a ring fenced escrow GDF account⁵ on the Treasury books, strictly at the disposal of future generations saddled with responsibility of managing the operation and eventual closure (by entombment) of one or more GDFs. The annual GDF levy could be applied along the following lines:

- (i) at 5% plus CPI or RPI (which ever is the higher) from an MP's pension payments;
- (ii) at 10% plus CPI or RPI from every MP failing to deliver a volunteer GDF host community from their constituency. No exemption permitted whatever;
- (iii) at 15% plus CPI or RPI from every MP declining to canvass or convince respective constituency communities of a grave need to volunteer hosting a GDF. No exemption permitted whatever; and,
- (iv) to address recalcitrance, appropriate sanctions could be modelled on procedures prescribed by Parliament under the regulations governing entitlement to the Job Seeker's Allowance. For example, where an MP serially fails to secure a GDF host volunteering community, deprivation of the pension for an indefinite period of time⁶ could be considered.

2.10.4 **Stopping the buck with nuclear reactor host communities**

For their part, local communities appear to have fallen into a habit of inviting, lobbying or competing for, and enjoying all manner of socio-economic and community benefits associated with hosting industrial scale higher activity radioactive waste producing reactors, while passing the buck on safe nuclear waste disposal. Plainly, such buck passing on long-lived radiotoxic waste bequeaths indeterminate risk on distant future generations for hundreds of thousands of years. In that regard, local communities hosting nuclear reactors should no longer be permitted to continue to avoid playing their proper role in discharging cradle to grave responsibility for ensuring biologically and environmentally safe permanent disposal of all higher activity radioactive waste created under their watch and on their home turf. Reactor host communities are obliged to strike fair and equitable balance, within the lifetime of generations hosting nuclear waste creating reactors. It is incumbent on local communities hosting higher activity radioactive waste creating reactors to establish direct links with communities hosting a safe working GDF. A false divorce between the hosting of creation and safe permanent disposal of higher activity radioactive waste warrants extinguishing. Such evident reactor host deficit could be addressed, in the national interest, through appropriate measures requiring:

⁵ The ring fenced escrow account should be established expressly separately from, and supplementary to, the UK Government's provisions under the DECC (2011) Waste Transfer Pricing Methodology for the disposal of higher activity waste from new nuclear power stations. Department of Energy & Climate Change. URN 11D/923, December 2011. Available at http://www.decc.gov.uk/en/content/cms/meeting_energy/nuclear/new/waste_costs/waste_costs.aspx

⁶ Reilly & Anor, R (on the application of) v Secretary of State for Work and Pensions [2013] EWCA Civ 66 (12 February 2013). Available at <http://www.bailii.org/ew/cases/EWCA/Civ/2013/66.html>
para.12: ... "For the Secretary of State, Mr Nicholls QC accepted that application of the prescribed procedure could lead to non-payment of Jobseeker's Allowance for an indefinite period of time."

- a. each current community hosting industrial scale higher activity radioactive waste producing reactors, to actively seek out and negotiate with other communities to volunteer hosting a GDF for all current as well as historic higher activity radioactive waste;
- b. each prospective community seeking to host new or additional industrial scale higher activity radioactive waste producing reactors, to actively seek out and negotiate *a priori* volunteer community or communities to host a GDF for all projected production of higher activity radioactive waste in future;
- c. mandatory closure of any higher activity radioactive waste producing reactor where the reactor host community fails or declines to secure a GDF host volunteer community, within a specified period of time following the measure coming into force, in the case of existing hosts. And, automatic cancellation of nuclear new build proposal in the case of prospective host failing or declining to secure a GDF host volunteer community, within a specified period of time following the date of new build announcement; and,
- d. commensurate updating of all nuclear reactor site licensing conditions by respective regulators.

2.10.5 **Admitting agent recruits into the MRWS siting process**

Under the fifth track, any additional volunteer GDF host community identified by either agent class could be admitted into the normal MRWS siting process, without entailing further modification of a revised siting process.

3. **Do you agree with this approach to revising roles in the siting process set out in the White Paper?**

If not, what alternative approach would you propose and why?

- 3.1 It would not be acceptable to grant the Radioactive Waste Management Directorate (RWMD) a lead role any proposed Steering Group (Consultation para.2.73). As the NDA's delivery vehicle and GDF developer, RWMD is *prima facie* a biased entity. Moreover, the NDA's handling of the Sellafield/Windscale radiotoxic waste portfolios vests neither sufficient credibility nor trust in the organisation. Neither deserves a place on the Steering Committee. It should be entirely up to the Steering Committee to call upon RWMD as and when determined by the Committee for evidence, explanation, justification, auditing, GDF design, work programmes, timelines, radiotoxic inventories, costs, logistics, etc.
- 3.2 It is preposterous to suggest a DECC Minister, chairing the Geological Disposal Implementation Board (GDIB), could ever objectively hold the UK Government to account for delivery of the GDF project (Consultation para.2.83). The authors of the Consultation document ought to have known that a DECC Minister represents the UK Government. The GDIB needs to be purged of all taint of Government Ministers and Whitehall apparatchiks. It should be reconstituted as a wholly independent Board, with membership drawn solely from civil society NGOs and academics with no past or current association or involvement whatever with Government departments, Ministers, Members of Parliament, the nuclear industry or industry lobby. The UK Government cannot be held to account independently otherwise. Government Ministers, including the DECC Minister, and Whitehall machinists fall to constitute a stakeholder group, at the full disposal of a reconstituted wholly independent Board.

4. Do you agree with this proposed approach to assessing geological suitability as part of the MRWS siting process?

If not, what alternative approach would you propose and why?

- 4.1 At Consultation para.3.12, a critical and open appraisal of local geoscientific factors would be a reasonable pre-requisite.
- 4.2 Future consultation documents should clarify what level of surface population and/or infrastructure densities, or nature conservation designation, would preclude a location from further consideration under the MRWS siting process.

5. Do you agree with this proposed approach to planning for a GDF?

If not, what alternative approach would you propose and why?

- 5.1 Planning consents for GDFs should be retained outside the remit of the Planning Act 2008 regime for Nationally Significant Infrastructure Projects. The infrastructure planning regime is not desirable for addressing the particular characteristics of a GDF, bearing in mind the trashing of intergenerational obligations and the burdening of future generations long into distant time with indeterminate risk. Contrary to vested interest arguments at Consultation para.3.30, viewed from the ground up, the level of engagement with local communities under the national infrastructure planning regime is at most superficial and at best a snapshot. The national infrastructure planning regime is wholly ill-suited for developments where continuous community consents, trust and unconditional rights of withdrawal should be paramount at all times.
- 5.2 Putative democratic accountability of the Secretary of State (Consultation para.3.34) is not consonant with democratic accountability at community level. The Secretary of State is the Government's architect and puppet. The role renders the function inherently suspect and comprehensively untrustworthy.
- 5.3 The mischief bandied about at Consultation paras 3.32-3.35, para.3.37, paras 3.39-3.40, paras 3.42-3.44 and para.3.46, respectively, warrants striking out. The UK Government's desperation to box-in, foreclose and legally stifle inconvenient and untimely local inquiry fora, under local planning authorities, is plain to see. The Government is seeking to subvert and stamp on local community interests. The UK Government would do better to lock up its propensity for central control than lock-in GDF host communities under the discreditable national infrastructure planning regime. Unlike an inquiry under the 2008 Planning Act, fifty shades of artificial lighting underground are hardly likely to be a lead feature among the dominant concerns at a public local planning inquiry.
- 5.4 There is no legal hindrance to the UK Government producing a free standing generic Appraisal of Sustainability (compliant with the Strategic Environmental Assessment Directive), as well as a separate Habitats Regulation Assessment, for the purpose of informing and illustrating a generic UK GDF. It is mischievous to link these assessments expressly or narrowly with a national policy statement.

- 6. Do you agree with this clarification of the inventory for geological disposal – and how this will be communicated with the volunteer host community? If not, what alternative approach would you propose and why?**
- 6.1 Consultation paras 3.52-3.55 and paras 3.58-3.62, inclusive, constitute not clarification but a Trojan Horse. The proposals underline quantum uncertainty and potentially out of control, open ended inventories for any GDF. This is not, and could not, be acceptable for any host community. Further, the proposals comprehensively violate a futurity principle. What may be tolerable is a GDF built, filled and closed within the lifetime of the same single generation.
- 6.2 No UK Government could be trusted not to manipulate the size of any putative nuclear new build programme, current or future. No amount of written comfort can be relied upon either. The bottom line is that the determination of quantum of higher activity radioactive waste inventories remains at all times subject to the whim of the Government of the day.
- 6.3 For the purpose of disposal in the first GDF, the Government would do better to aim at capping the combined historical and contemporary quantities of higher activity radioactive waste at levels prevailing on a pre-set date. Should this entail the winding down of all current higher activity radioactive waste production at operating nuclear reactors to nil by a specified date, so be it. That provides the only clear and reliable quantum for potential GDF host communities to grapple with. Any other scenario is unquestionably a huge unbounded fudge. Beware UK Government representatives, highly versed in the fine arts and crafts of public relations, bearing gifts of mass deception. Recall that any goal posts are phenomenally only where they are, at any point in time, expressly as deemed by UK Government. Enter the realm of policy magic. Consultation para.3.60 hints tentative clues: *“detailed volumes reported will change over time”* for *“defined waste types”*, *“but communities can be confident that the underlying waste types and waste origins will conform to the waste types set out”*.
- 6.4 Consider another example. The statement at Consultation para.3.59 (*“Spent Fuel (oxide) and ILW from a new build programme of a specified maximum size, such as the 16GW(e) for which nuclear operators have developed proposals”*), hides a veritable Tardis style wriggle room. What if global investors offered to double the size of that programme, in light of a 35-year guaranteed profit making cash-cow gifted by the Government to EDF⁷, for proceeding with new build Hinkley C higher activity radioactive waste manufacturing facilities? What if the nuclear waste inventories were to balloon following one, or more, partial or complete reactor core meltdown? What if nuclear wastes from defence programmes increased significantly, unexpectedly or otherwise? Other wriggles in the mix include: novel reactor designs; higher thermal ratings for reactor cores; higher fuel burn rates; etc. As soon as retrievable, all such stuff is headed in one direction only: the nearest available GDF, which will simply just have to grow. No question about it.
- 6.5 The Government would do well to revisit all currently authorised new reactors (even if built but not yet commissioned), as well as nuclear new build projects in the pipeline, after at least the first GDF has been shown to have demonstrated safe operation for a period of 100 or so years. This time scale would facilitate a reasonable period,

⁷ An initial Commercial Agreement (subject to contract, at the time of writing), between the UK Government and EDF was announced on 21.10.2013, under which EDF would build two new European design Pressurised Water Reactors at Hinkley Point (on the Severn Estuary), in return for a package of eight substantial financial inducements. <https://www.gov.uk/government/news/initial-agreement-reached-on-new-nuclear-power-station-at-hinkley>

- a. for suitable rectification, maintenance and monitoring measures to be determined, tried, tested and implemented; and,
 - b. for the development of enhanced scientific understanding of the likelihood and implication of postulated interactions between radiation emitting heat sources implanted in deep repository caverns and ambient bio-hydro-geo-chemic processes at depth, over millennial time scales.
- 6.5 Consultation para.3.64 beggars credulity. If the number of nuclear reactors operating globally double, triple or quadruple in size, is the UK Government seriously suggesting it would never seek to maximise sales of Made in Britain nuclear fuel supplies to other countries? Global nuclear fuel supplies would be guaranteed to inflate the UK plc export trade balance. It would also inflate the quantities of spent nuclear fuel subsequently returning back to the UK for disposal in a GDF. Spent nuclear fuel falls in the category of higher activity radioactive waste.
- 6.6 A paper-thin veneer at paras 3.58 to 3.64, inclusive, hides the UK Government's general objective: reserving absolute rights to visit nuclear waste muggings on GDF host communities in future, without let or hindrance. The question for GDF host communities is how to stop the UK Government hijacking host community control over the use of any GDF.
- 7. **Do you endorse the proposed approach on community benefits associated with a GDF?**
If not, what alternative approach would you propose and why?
- 7.1 Reserve comment for the time being.
- 8. **Do you agree with the proposed approach to addressing potential socio-economic and environmental effects that might come from hosting a GDF?**
If not, what alternative approach would you propose and why?
- 8.1 At Consultation para.4.31, the information in question ought to be provided as a matter of course, without reservation, untainted by the UK Government, RWMD, the nuclear industry and their associates.
- 8.2 Consultation para.4.32 ought to be struck out entirely, alongside paras 3.32-3.37, paras 3.42-3.44 and para.3.46. GDFs do not belong in camp of the national infrastructure planning regime. GDF planning consents fall properly to be determined under local planning authority frameworks. Do please refer as well to comment at paras 5.1-5.3 hereof. In any case, there is nothing stopping the UK Government from producing a free standing generic Appraisal of Sustainability (compliant with the Strategic Environmental Assessment Directive), as well as a separate Habitats Regulation Assessment, for the purpose of informing and illustrating a generic UK GDF.
- 8.3 At Consultation para.4.33, all information ought to be provided a priori and untainted. Furthermore, the entire 'Learning' phase should be conducted and managed

independent of the UK Government, RWMD, the nuclear industry and their associates.

9. Do you have any other comments?

- 9.1 The UK Government needs to act promptly to accelerate Consultation para.1.37 (including any implication for Right of Withdrawal), out of Whitehall cupboards, regardless of the outcome of voluntarism.
- 9.2 The Welsh Government appears to enjoy the privilege of a free ride through the MRWS siting process. It does not have to (neither has it, to date) put out a specific call inviting communities in Wales to volunteer hosting a GDF. It is as if the higher activity radioactive waste being created by the nanosecond on an industrial scale at Wylfa (Anglesey), continuously since 1970, was taking place on an entirely different planet. It gets even better. The Welsh Government unconditionally supports the invitation to generating companies by the UK Government, for the construction of new and even larger nuclear waste creating reactors on Anglesey. The Welsh Government still declines to put out a call inviting Welsh communities to come forward as potential GDF host volunteers (Consultation para.1.10 and para.3.45, respectively). Clearly, an astonishingly neat little trick! Just shovel off all Made in Wales higher activity radioactive waste over the border. Out of sight, out of mind. Simple, really. Problem solved.
- 9.3 The notion of “a” host community for a GDF is seemingly a falsehood, in the context of the hundreds of thousands of years for which the radioactive waste containment integrity of the GDF requires ensuring. Plainly, no human generation is known to be capable of persisting over such extended time scales. Neither can any host community. Over the course of time, human generations come and go, whether or not within a community. Individual communities, in turn, undergo complex multi-level change, some thriving, others not. Thus, in terms of generational transitions over the time scales in question, the generation volunteering to host a GDF site could be said to comprise a ‘GDF host elective generation’. Upon agreeing to construct the GDF, each subsequent (and different) generation in that community comprises a serial ‘GDF host slave generation’. Strictly speaking, the ‘host’ is not the community, but a particular generation or generations living in the spatial bubble termed a community. The Consultation document silently purveys a falsehood of a perpetual generation in a perpetual spatial bubble.
- 9.4 A separate falsehood appears perpetuated at Consultation para.2.24. There can be no certainty whatever of the impacts of operation, care and maintenance of a GDF remaining strictly contained within the boundaries of a given spatial bubble. Consultation para.2.24 might well apply to an exo-planet.

ends.