

Group 6

FOIA/PA NO: 2014-0367

RECORDS BEING RELEASED IN THEIR ENTIRETY

<u>No.</u>	<u>Date</u>	<u>Description/(Page Count)</u>
1.	7/3/13	Email: From: Sylvia Acacio, Energy Solutions, To: Catina Gibbs, NRC. Subject: RE: Drop In with Chairman Macfarlane week of June 10 th . (6 pages)
2.	12/3/13	"ACRS – 10 CFR Part 61 Technical Basis Site Specific Analysis Rulemaking" Presentation, Energy Solutions, Daniel B. Shrum. (17 pages)

Waters, Michael

From: Sylvia Acacio <snacacio@energysolutions.com>
Sent: Wednesday, July 03, 2013 12:13 PM
To: Gibbs, Catina
Cc: Pace, Patti; Woollen, Mary; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

That sounds like a good plan. We can confirm the 2:30pm start time on July 10th. Please let me know if there's anything else you might need from our end.

Thanks again for all your help,
Sylvia

From: Gibbs, Catina [mailto:Catina.Gibbs@nrc.gov]
Sent: Wednesday, July 03, 2013 7:39 AM
To: Sylvia Acacio
Cc: Pace, Patti; Woollen, Mary; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Good morning Sylvia, unfortunately, Chairman Macfarlane is only available at 2:30-3:00PM. I will ensure that they make it to their next appointment on-time. If for some reason they run a few minutes late, I will contact Commissioner Apostolakis' Office to let them know. Will this work for you?

Thanks.

Catina

From: Sylvia Acacio [mailto:snacacio@energysolutions.com]
Sent: Tuesday, July 02, 2013 5:12 PM
To: Gibbs, Catina
Cc: Pace, Patti; Woollen, Mary; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

Our team would like to confirm the drop-in with Chairman Macfarlane but asked if there's any possibility to meet at 2:15pm so that they'd have enough time to meet and to make it to their next meeting with the Commissioners on the 17th floor.

Many thanks again,
Sylvia

From: Sylvia Acacio
Sent: Tuesday, July 02, 2013 2:42 PM
To: 'Gibbs, Catina'
Cc: Pace, Patti; Woollen, Mary; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Thanks so much, Catina,

I believe that time would work but let me confirm with the team and get back to you. I should have an answer for you soon.

Many thanks again,
Sylvia

From: Gibbs, Catina [<mailto:Catina.Gibbs@nrc.gov>]
Sent: Tuesday, July 02, 2013 2:33 PM
To: Sylvia Acacio
Cc: Pace, Patti; Woollen, Mary; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Good afternoon Sylvia, Chairman Macfarlane would be delighted to meet with representatives of Energy Solutions. The Chairman only has one time slot available on 7/10, at 2:30-3:00PM. Will this time work for Mr. Lockwood and representatives?

Thanks.

Catina

From: Gibbs, Catina
Sent: Wednesday, June 26, 2013 4:17 PM
To: Sylvia Acacio
Cc: Pace, Patti; Woollen, Mary; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Good afternoon Sylvia, thank you for this helpful information. I will follow-up with you near the end of this week.

Thanks.

Catina

From: Sylvia Acacio [<mailto:snacacio@energysolutions.com>]
Sent: Wednesday, June 26, 2013 3:57 PM
To: Gibbs, Catina

Re: Gibbs

Cc: Pace, Patti; Woollen, Mary; Niedzielski-Eichner, Phillip; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

Just wanted to update you that we now have drop-in's scheduled with Commissioners Apostolakis, Ostendorff, and Magwood on July 10th. If Chairman Macfarlane's calendar should open up that afternoon, David and his colleagues would still very much like to see her.

Here is the schedule of meetings on the 10th:

3pm Cmr. Apostolakis
3:30pm Cmr. Ostendorff
4pm Cmr. Magwood

Many thanks again,
Sylvia

From: Sylvia Acacio
Sent: Wednesday, June 12, 2013 3:52 PM
To: 'Gibbs, Catina'
Cc: 'Pace, Patti'; 'Woollen, Mary'; 'Niedzielski-Eichner, Phillip'; 'Waters, Michael'
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

David and his colleagues completely understand and would like to keep this request open in the event Chairman Macfarlane's calendar opens up.

They have a drop-in scheduled on July 10th at 3:00pm with Commissioner Apostolakis and could meet the Chairman then, if she becomes available. However, they are also open to looking at the 8th or the 11th as well.

Thanks again and I look forward to hearing from you in the coming weeks.

Best regards,
Sylvia

From: Sylvia Acacio
Sent: Wednesday, June 12, 2013 10:28 AM
To: 'Gibbs, Catina'
Cc: Pace, Patti; Woollen, Mary; Niedzielski-Eichner, Phillip; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Thank you, Catina,

I will explain this to David and his colleagues and will let you know if they would like to keep this request open.

Will get back to you soon.

Thanks again,
Sylvia

From: Gibbs, Catina [<mailto:Catina.Gibbs@nrc.gov>]
Sent: Wednesday, June 12, 2013 9:39 AM
To: Sylvia Acacio
Cc: Pace, Patti; Woollen, Mary; Niedzielski-Eichner, Phillip; Waters, Michael
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Good morning Ms. Acacio, I apologize for the delay in responding to your Drop-in request, but I've just received a recommendation from staff. Chairman Macfarlane's term expires 6/28/13. Unfortunately, at this time, I am unable to confirm any Drop-in meetings for the month of July and moving forward.

If you would like for me to keep this request as an open item, I would be more than happy to touch basis with you once the Chairman's schedule reopens.

Thanks,

*Catina M. Gibbs
Administrative Assistant to
Chairman Allison M. Macfarlane
U.S. Nuclear Regulatory Commission
301-415-1820 (Office)
301-415-3504 (Fax)*

From: Gibbs, Catina
Sent: Wednesday, June 05, 2013 12:11 PM
To: Sylvia Acacio
Cc: Pace, Patti; Woollen, Mary; Niedzielski-Eichner, Phillip
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Good afternoon Sylvia, I apologize for the delay in responding to your Drop-in request. Staff has not made a recommendation, yet. I will give them a nudge and hopefully I'll be back in contact with you soon. I appreciate your patience during this process.

Thanks,

Catina

From: Sylvia Acacio [<mailto:snacacio@energysolutions.com>]
Sent: Monday, June 03, 2013 4:29 PM
To: Gibbs, Catina
Cc: Woollen, Mary; Pace, Patti
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

Just following up on my last email from a couple weeks ago. Would Chairman Macfarlane have any time for a drop-in the week of July 8th at all?

Response

Many thanks again,
Sylvia

From: Sylvia Acacio
Sent: Wednesday, May 22, 2013 5:12 PM
To: 'Gibbs, Catina'
Cc: Woollen, Mary; Pace, Patti
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

David Lockwood has changed the dates of his DC trip and he will now be in town the week of July 8th. The attendees will be:

David Lockwood – CEO, EnergySolutions
Victoria Napier – Senior Vice President of Federal Government Relations, EnergySolutions
Thomas Magette - Managing Director Nuclear Practice, PriceWaterhouseCoopers

The topics of discussion will be:

Status of Zion Decommissioning
Part 61 Rulemaking
Part 71/72 Harmonization

Please let me know if Chairman Macfarlane would have time that week for a drop-in.

Many thanks again,
Sylvia

Sylvia N. Acacio
Assistant to David Lockwood, CEO
EnergySolutions
(801) 649-2288 Phone

From: Gibbs, Catina [<mailto:Catina.Gibbs@nrc.gov>]
Sent: Tuesday, April 16, 2013 2:51 PM
To: Sylvia Acacio
Cc: Woollen, Mary; Pace, Patti
Subject: RE: Drop In with Chairman Macfarlane week of June 10th

Good afternoon Ms. Acacio, this email confirms receipt of your Drop-in request with Chairman Macfarlane. Your request has been forwarded to staff for consideration. I will be in touch with you as soon as a determination has been made. In the meantime, can you please provide me the names and titles of attendees and topics of discussion.

Thanks,

*Catina M. Gibbs
Administrative Assistant to
Chairman Allison M. Macfarlane*

U.S. Nuclear Regulatory Commission
301-415-1820 (Office)
301-415-3504 (Fax)

From: Sylvia Acacio [<mailto:snacacio@energysolutions.com>]
Sent: Monday, April 15, 2013 6:58 PM
To: Gibbs, Catina
Subject: Drop In with Chairman Macfarlane week of June 10th

Hi Catina,

David Lockwood, the CEO of EnergySolutions will be visiting DC and asked if Chairman Macfarlane would be available for a drop in sometime the week of June 10th. If so, please let me know what works best for the Chairman Macfarlane.

Many thanks in advance,
Sylvia

Sylvia N. Acacio
Assistant to David Lockwood, CEO
EnergySolutions
(801) 649-2288 Phone

Release



ENERGY SOLUTIONS

ACRS – 10 CFR Part 61 Technical Basis
Site Specific Analysis Rulemaking



Daniel B. Shrum

December 3, 2013

62

10 CFR Part 61



Proposed Rule will require Part 61 facilities to:

Prepare New and Revised Site-Specific technical analyses

“Proposed rule would affect existing and future LLRW disposal facilities that are regulated by NRC or an Agreement State”

Set exposure limits for intruders

Current rule has no long term exposure standards for inadvertent intruder

Develop criteria for the acceptability of LLRW for disposal

Allows facilities to “account for facility design, disposal practices, and site characteristics to determine criteria for the acceptability of LLRW for disposal”

Part 20

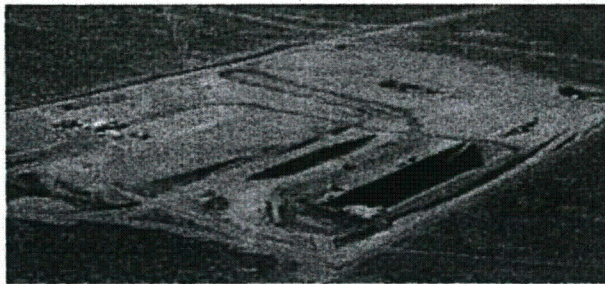
NRC will Amend Part 20 to “conform to the proposed requirements of LLRW acceptance”

Site Specific Technical Analyses

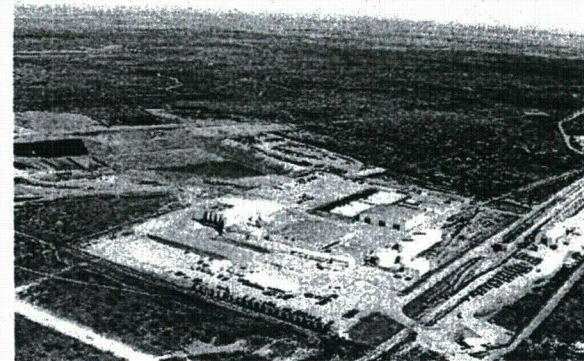


Fundamental Requirement of new rule

Four Current Commercial Part 61 disposal facilities:



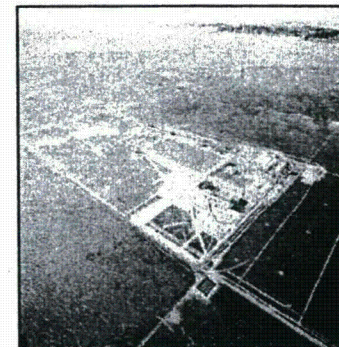
US Ecology – Hanford Complex, Washington



WCS – Andrews County, Texas



Barnwell Facility – Barnwell, South Carolina



Clive Facility – Clive Utah

All four facilities have current PAs – with different exposure limits

Reasonably Foreseeable



- Reasonably Foreseeable \neq You can run the model
- More to a model than plugging in numbers – analyses and evaluations have been conducted on components for LLRW facilities, but for more reasonable time frames. For example:
 - Durability of cover components
 - Durability of waste forms
 - HIC durability
 - Drainage durability/fouling
 - Rebar strength and durability
- Many components of engineered systems have not been evaluated for timeframes much longer than 300 years therefore 10,000 year timeframes are less meaningful

Review

Performance Period



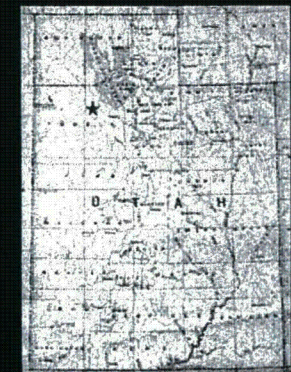
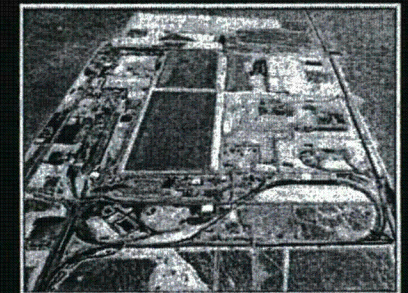
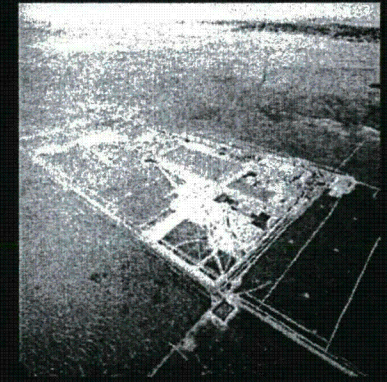
- Will capture longer lived isotopes to evaluate catastrophic effects
- Allows for flexibility as the error terms grow larger
- Should allow for a higher threshold – 1 to 10 rem as contemplated by the IAEA
- Moves focus to site location as opposed to engineering features
- Captures DU – which was the original purpose of the rule

Inadvertent Intruder

ENERGYSOLUTIONS

Clive specific example

- Site inhospitable to human habitation
- Inherently protective against intruder scenarios
- Utah DRC conclusion
 - “...unrealistic to assume residential or agricultural intruders.¹”
- From the Nuclear Regulatory Commission’s Order
 - “...significant intruder exposures at a site like [Envirocare] are unrealistic.¹”
 - “...could be licensed under 10 CFR 61 regardless of the time frame you looked at.¹”



¹Memorandum and Order in the Matter of Louisiana Energy Services, L.P., CLI-06-15, June 2, 2006

Inadvertent Intruder

ENERGYSOLUTIONS

From DRC June 7, 2013 responses to
EnergySolutions PA for SEMPRASAFE waste:

- Resident lives, farms, and mines on the Clive facility (page 134)
- Pumps water from high TDS (65,000 mg/l)/low yield (gallons per day) aquifer (Page 132)
- Treats water for consumption and irrigation (page 136)
- Ability to grow crops in high saline soils (page 137)
- Receive dose from filter cake (page 136)

Waste Acceptance Criteria



- All four commercial disposal facilities currently use WAC to enforce critical and limiting assumptions of an approved site-specific performance assessment
- Effectively applied throughout DOE complex
- PA-derived WAC would end need for further rulemaking
 - Establishes risk-informed performance-based standard
 - Consistent with NRC Principles of Good Regulation
 - Continued rulemaking will result in status quo until end of second rulemaking

Compatibility

- Definitions are ambiguous and overlap
- Confusion of various categories
- H&S basis of Performance Objectives
- Consistent implementation of Part 61 across the Agreement States is critical
- Transboundary implications for waste generators as well as disposal facilities
- Consistent standards nationwide