

December 6, 2019

RE: Public Comment on the Proposed Plan for 100-BC Area

To Whom It May Concern,

Thank you for the opportunity to provide public comment on the Proposed Plan for cleanup of the 100-BC Area. Hanford Challenge appreciates the work that has been done under interim cleanup actions to address deep sources of contamination, such as hexavalent chromium which was removed through the two "big digs." We appreciate this work, and we believe more cleanup is needed.

The 100-BC Area is one of the more public-facing parts of Hanford, containing the National Historic Landmark, B-Reactor Manhattan Project National Park. B-Reactor is one of the first iconic sights a visitor encounters when launching a boat by Vernita Bridge or driving through the site. The heavy use of this area necessitates that additional action be taken to remove contamination to ensure human and environmental protection.

Institutional controls and long-term monitoring certainly have a role to play in the complex cleanup of the Hanford site, however they must be used carefully and certainly not for periods longer than 50 years. Institutional controls can fail too easily as they are forgotten and the world changes.

Hanford Challenge would like the Department of Energy and EPA to choose a cleanup plan that reduces the need for long-term monitoring and institutional controls and includes the following actions:

- Remove contamination in areas that are likely to attract tribal and public use, such as
 areas adjacent to the Columbia River. Institutional controls and monitored natural
 attenuation should only be used in areas that are not likely to attract significant tribal
 and public use.
- 2. Remove contaminated pipelines that are identified in the 100-BC Proposed Plan and Remedial Investigation and Feasibility Study.
- 3. Treat contaminated groundwater extracted from the 100-BC system using the 100-K pump and treat facility to reduce the amount of chromium in the groundwater over a shorter period of time.
- 4. Remove, treat, and dispose of soil near the B-Reactor spent fuel basin to reduce the time institutional controls would be needed to keep people out of this area to 39 years.
- 5. Calculate and consider the cost of the over 2,000 CERCLA five-year reviews needed during the 10,000 years of long-term monitoring and use this as a basis to spend more

- money on cleanup remedies that remove the source and eliminate and/or reduce the length of time institutional controls and long-term monitoring are needed.
- 6. Include the public and the development of monitoring and maintenance plans for Institutional Controls and Monitored Natural Attenuation periods, including frequency (near-term), duration, and parameter lists.
- 7. Work with the National Park Service on a collaborative process that involves the public and stakeholders to develop materials and exhibits that clearly explain the challenges, successes and reality of Hanford cleanup, especially when cleanup decisions leave waste behind. For instance: "The soil 20 feet below this sign will be contaminated with carbon-14 for 10,000 years. You, a visitor separated by 20 feet of soil, are not at risk from this materials, and we are making sure that there is still 20 feet of soil protecting you." Telling the full story, and keeping the contamination in the public story is an essential part of long-term protections. Though it should be noted, that it is Hanford Challenge's preference for source contamination removal whenever possible.
- 8. Use a tribal exposure scenario to calculate potential exposures from the remaining contamination, including calculations for how long restrictions would have to remain in place. Use the results to spend more money now on a more robust cleanup to avoid future exposures with the potential to cause risks in excess of applicable cancer and other health-based standards.
- 9. Plan for groundwater, surface water, and biological monitoring down-gradient of waste sites to manage uncertainty for vadose zone deep soil contamination, and for discharges along or into the Columbia River. Monitoring in this way will serve the additional purpose of confirming that Monitored Natural Attenuation is performing as modeled and that potential human and/or ecological receptors are being protected.

Sincerely,

Tom Carpenter, Executive Director