Bradford Island

List of Items of Agreement and Disagreement among the Technical Advisory Group (TAG)

March 15, 2018 Managers Meeting

The United States Army Corps of Engineers Proposal on the Upland Operable unit		
Issue/Area	**Areas of Agreement**	**Areas Requiring Further Attention**
Landfill	The entire landfill will be removed (Upland FS Alternative L5).	None
Pistol Range	The contamination in the Pistol Range will be excavated and backfilled (Upland FS Alternative PR2).	None
Bulb Slope	The contaminated soil in the bulb slope will be removed.	Discussion and subsequent documentation is needed on how "source control" will be achieved outside of CERCLA. Cleanup standards must be as equally protective as CERCLA.
Sandblast Area	The Sandblast Area will be divided into two subareas: 1) industrial area, where occupational exposure is considered and 2) habitat area, where risk to ecological and human exposure must be considered.	Industrial area- Further discussion and agreement is needed on how to handle contamination in the industrial area (ex. exposed surface soil contamination concerns about eco-risk and erosion potential). Habitat area - Further discussion and agreement on clean up criteria and approach are needed. Cleanup standards must be as equally protective as CERCLA.
Upland contamination impacting the river	The potential for contamination in the upland OU entering the river will be further characterized in the sandblast area.	A fully developed source control evaluation and plan for the entire upland site is needed.
Remedial Investigation (RI)		
Issue/Area	**Areas of Agreement**	**Areas of Disagreement**
Nature and Extent	There is contamination in the upland and river areas that require cleanup.	The full nature (what chemicals) and extent (where the contamination is located) was not done adequately which is leading to cleanup decisions that do not address all of the problems at the site.
Risk Assessment (RA)		
Issue/Area	**Areas of Agreement**	**Areas of Disagreement**
Risks to Tribal Members	Tribal Fisheries do need to be considered in the cleanup decision process and there is a tribal fisher risk scenario in the Upland risk assessment.	Did not use all tribal exposure parameters recommended by Yakama Nation. Therefore the scenario underestimates risks which could lead to a cleanup decision that is not protective of Yakama tribal members.
Upland and River Feasibility Studies (FS)		
Issue/Area	**Areas of Agreement**	**Areas of Disagreement**
Upland Remedial Action Objectives (RAO)	RAO 1 the cleanup needs to be protective of tribal fishers for cPAHs.	a. RAO 1 needs to be expanded to make the cleanup protective of all Yakama Nation tribal members exercising treaty reserved rights (all contamination, Treaty uses, and cumulative exposure). b. The upland remedy must be shown to be protective of the river. c. The cleanup must address the cumulative risks for all contaminants from all areas.
Cumulative Risks	Risk assessments for each area in the upland have been conducted.	The cumulative risks for a receptor that would visit all of the contaminated areas on Bradford Island such as a tribal member or a bird needs to be evaluated.
Contaminates of Concerns	PCBs, PAHs, and Lead appear to be the biggest risk-drivers in the upland.	Upland contaminants were not carried forward into the river investigation, such as pesticides and mercury. Vice versa, river contaminants were not adequately retained in the upland evaluations. These chemicals need to be addressed.
Applicable or Relevant and Appropriate Requirements (ARARs)	CERCLA requires the cleanup to comply with ARARs.	ARARs also include: DEQ's definition of acceptable risk (especially 10^{-6} excess lifetime cancer risk); Oregon and Washington laws on petroleum contamination; Yakama Nation's Treaty of 1855; and WA Department of Ecology Sediment Management Standards.
Historic Data	Older data at the site exists.	Historic data must be considered (ex. upland catch basin and river data).
River Background Area	A background comparison needed.	The background area is located in area where known contamination sources exist, this is not appropriate.
Forebay Data Needs	Additional sampling will be conducted in the forebay. A plan is needed so there is a common understanding of what will be done.	Ex. aerial extent
Post-Cleanup Monitoring Needs	The cleanup must be shown to address all contaminants through monitoring. A plan is needed so there is a common understanding of what will be done.	Ex. landfill groundwater