Final Meeting Minutes Restoration Advisory Board (RAB) Meeting Former Galena Forward Operating Location (FOL), Alaska Galena, Alaska 26 October 2016

Time/Place: 8:15 pm, 26 October 2016 – Larson Charlie Hall, Galena, Alaska

Attendees:

Twenty people attended the meeting including representatives from the Air Force Civil Engineer Center (AFCEC), the Alaska Department of Environmental Conservation (ADEC), and the Galena Restoration Advisory Board (RAB). The following is a list of people attending the meeting.

AL Weilbacher, AFCEC Donna Kozak, Booz Allen Hamilton (BAH) Bruce Henry, Parsons Win Westervelt, CH2M Adam Plack, US Army Corps of Engineers (USACE) Ashley Olson, Ahtna Ron DesGranges, Ahtna Dennis Shepard, ADEC Tim Bodony, Community RAB Member Jon Korta, Galena City Mayor Shanda Huntington, Galena City Manager Chris Reitan, Galena Interior Learning Academy (GILA) Phil Koontz, Louden Tribal Council Tim Kalke, Sustainable Energy for Galena (SEGA) Jim Doesburg, Directed Technologies Drilling Ron Burgett, Community Member Ranch Burgett, Community Member Shirley Cleaver, Community Member Larry Hausman, Community Member Flora Keogh, Community Member

Agenda: See Attachment 1

Introduction:

AL Weilbacher opened the RAB meeting by reviewing the agenda for presentations on Performance-Based Remediation (PBR) Cleanup efforts.

Presentations

Performance-Based Remediation

Win Westervelt (CH2M) gave a presentation (Attachment 2) with an update of the PBR contract. The PBR contract is for the cleanup of 32 sites at the Former Galena FOL. Installation of remedial systems started in 2015 and will continue until 2018. Operation of the remedial systems will continue through the summer of 2020. Win provided a brief overview of the

activities that were completed during the 2016 field season, which included installation of 12 subsurface aeration systems as follows:

Bioventing

- Former POL Fuel Lab Building 2541 near the BLM compound (Site SS016)
- Southeast Runway Fuel Spill (Site ST010)
- Old Abandoned Pipelines (Site CPL006)
- Former Building 1812 Hazardous Waste Satellite Accumulation (Site CSS002)
- Former Birchwood Hangar (Site SS014)
- Truck Fill Stands (Site SS017)

Soil Vapor Extraction

- Former JP-4 Fuel Stands at ADOT Maintenance Building (Site ST009)
- Former UST at POL Fuel Lab Building 1837 (Site ST020)

Air Sparging

Former Combat Alert Cell Hangar (Site CST011)

Air Sparging/Soil Vapor Extraction

- Former Wilderness Hall Building 1872 (Site SS005)
- Former Steam Plant Underground Storage Tanks (Site TU001)
- Former UST at Dining Hall Building 1859 (Site CST014)

Win showed the locations of the 12 subsurface aeration systems and then provided a description of how the remediation technology works and where the technology was being applied. Win explained that bioventing injects air to stimulate aerobic biodegradation of fuel hydrocarbons. Soil vapor extraction pulls air out of the subsurface, and removes volatile organic compounds by stripping them out of the subsurface. Soil vapor extraction also works well for chlorinated solvents like trichloroethene (TCE), as well as volatile fuel hydrocarbons. Win went on to explain that air sparging injects air below the water table, and treats fuel hydrocarbons by aerating groundwater and stimulating aerobic biodegradation in saturated soil.

Win describe other activities that occurred in 2016 included the following:

- Additional soil excavation at the RAPCON Yard (Site CSS001)
- Blast media surface soil excavation at west side of Steam Plant (Site TU001)
- Offsite disposal of PCB- and petroleum-contaminated soil, and tar drums from Time Critical Removal Action (TCRA) at the Disposal Site West of Dike (Site DP023)
- Annual landfarm operation and soil treatment (transitioned to windrows using a Brown Bear tiller)
- Annual groundwater sampling of monitoring wells

Win described the small excavation of fuel-contaminated soil at the former RAPCON Yard (Site CSS001). Win also showed pictures of the excavation of blast grit media at the Steam Plant (Site TU001).

Win then summarized the field activities planned for 2017, which include the following:

Horizontal Well Air Sparging

- Million Gallon Hill/Missile Storage (Sites CG001/CG002)
- POL Tank Farm Area (Site ST005)

Bioventing

Former Fire Protection Training Area (Site FT001)

Soil Vapor Extraction

Former South Apron Maintenance Area (Site SS015)

Sulfate-Enhanced Bioremediation Injections

- Former Building 1812 Hazardous Waste Satellite Accumulation (Site CSS002)
- Former Birchwood Hangar and Truck Fill Stands (Sites SS014/SS017)
- Former JP-4 Fuel Stands at ADOT Maintenance Building (Site ST009)

Enhanced Anaerobic Bioremediation Injections

• Former South Apron Maintenance Area (Site SS015)

Excavation

Former Waste Accumulation Area South of Building 1499 (Site SS018)

Win mentioned other activities that will occur in 2017, including operation and maintenance of remediation systems (systems are typically checked once a month), annual groundwater monitoring, and landfarm reconstruction and operation. Bruce Henry (Parsons) mentioned that the landfarm reconstruction was to accommodate greater volumes of soil to be treated with the new Brown Bear tiller.

Activities that are projected to occur in 2018 include completing the excavation at the Former Disposal Area West of Dike (Site DP023) and installation of remedies for the Former Building 1845 TCE area (Site SS006).

Tim Bodony (RAB co-chair) asked to see the slide with the 2017 proposed work sites, and asked for more detail regarding the excavation at Site SS018. Bruce replied that it is a small excavation of fuel contamination (maybe 1200 cubic yards) south of the steam plant. The excavation may take a couple weeks as the fuel line may have to be pulled to complete the excavation, and then replaced.

Bruce also mentioned that the sulfate injections were to treat deeper fuel contamination in saturated soil and that injection would be through Geoprobe rods. Tim asked what time of year the injections would occur and Bruce confirmed they would occur around August. Tim also mentioned that Parsons should coordinate with SEGA since they could have a lot of truck traffic in the area. Bruce indicated that the SEGA activity was greater in the fall and winter, and the PBR work should wrap up before it gets cold.

Phil Koontz asked if the soil was going to the landfarm and Bruce confirmed it was. Jon Korta asked where the clean backfill was coming from, and Bruce indicated it is river gravel obtained from local contractors.

Closing Remarks

Donna Kozak spoke about AL Weilbacher's service with the Air Force over the years with restoration efforts at the Former Galena FOL, starting in 2009. Tim Bodony thanked AL on behalf of the Galena community. AL concluded the RAB meeting by saying he enjoyed his experience working in Galena, and mentioned the next RAB meeting will be in April 2017.