

CONFIRMATION OF: CONFERENCE ☒ TELECOM OTHER:	DATE HELD: 15 APRIL 2009 DATE ISSUED: 16 APRIL 2009 RECORDED BY: ANNA MONTOYA PLACE: CH2M HILL DOCUMENT CONTROL NO:
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SUBJECT: FT. WAINWRIGHT TAKU GARDENS FFA MEETING

PARTICIPANTS - ANCHORAGE:	FRANKIE JEWEL – TECH LAW (TELE)	
TERRY HEIKKILA - JACOBS	BETH ASTLEY - CRREL	DENNIS SHELTON – CH2M HILL
SARAH BELWAY - JACOBS	DAVID BEISTEL – FT. WAINWRIGHT	SHARON RICHMOND -DEC
ANNA TIEDEMAN – JACOBS	JOSEPH MALEN – FT. WAINWRIGHT	MARLENA BREWER –DEC
BOB BROCK – USAED	JEREMY BLEI – CH2M HILL	WIN WESTERVELT – CH2M HILL
MARILYN GAUTHIER - CH2M HILL	GUY WARREN - DEC	EARL CRAPPS - DEC
MESERET GHEBRESLASSIE - USAED	MATT LEVESQUE – DEC	DEB CAILLOUT - DEC
JOE KING – ARMY ENVIRONMENTAL	MIKE UTLEY - USAED	JACQUES GUSMANO - EPA

ACTION REQ'D BY	MEETING NOTES
	ITEM
	<p><u>Revised Draft 2007/2008 Drum/Debris and PCB Remedial Investigation Report.</u></p> <p>Presentation was given by Terry Heikkila updating and discussing the RI Report submitted on 3 April 2009.</p> <ul style="list-style-type: none"> (Matt) Are there any problems with data quality in the Geophysical Survey? (Terry) Data quality is fine, no problems. (Jack) We need a workplan for any new activities to be conducted in 2009. (Terry) New activities were briefed during the January 09 FFA meeting but heard nothing back. The presentation will be placed on the ftp server. (Jeremy) Data sample result - the Jacobs report does not include a discussion of the sample results. This discussion will be included in the RI report (Sharon) We had significant problems with the surface soil sampling and did not review and approve the Tech Memo. (Jack) The additional surface soil and locations (sampled in March, 09) need to be added to the Jacobs report.
	<p><u>2009 Geophysical Survey and Field Work</u></p> <p>Terry Heikkila and Sarah Belway presented and discussed completed and proposed work including March geophysical survey, surface-soil sampling, sound-berm sampling, groundwater monitoring, test pit installation, Subarea E activities and backfilling of open excavations.</p> <ul style="list-style-type: none"> (Sharon) Question: Was a geophysical survey done beyond excavation areas? (Sarah) When they did areas that were backfilled they went beyond excavation areas. (Guy) Why did you survey bottom of the hole and then go back and survey it after backfill. (Terry) Part of the workplan. EM61 survey after excavation after nothing is left. Some depths were too great so had to backfill to do a survey. (Sarah) Appendix H of the Jacobs report includes the Geophysical Survey Data. We have included the latest data that has before and after hot spots. (Guy) Are all anomalies covered in this report? (Terry) This figure (in the presentation) is not included in the report (done last night) but we have the geophysics done in February. (Terry) data is in the presentation but all excavation locations are not. (Guy)

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	<p>With hand sifting and then putting it back in backfill you would expect to see metal anomalies show up. (Bob) You could have used backfill you brought on site. (Sharon) Can't understand how there could be so much metal when she watched for hours people sifting and hand picking metals. How could there be so much metal contamination still? Just rusty dirt? Can that be what's making it come back dirty? Deteriorating drums? (Joe M) Least likely are deteriorated drums. (Guy) How are you going to verify what you're finding? (Jack) Technique you use will be important to try to explain a data anomaly that exists. Use photos would be a good idea to verify. (Guy) May want to demonstrate the iron concentration is high. Need to make up a workplan to add in.</p> <ul style="list-style-type: none"> • (Matt) May want to use positional accuracy to make sure you are on a specific anomaly. (Jack) Important to make sure we didn't miss anything. Make sure it isn't any deeper, it isn't real. • (Marti) Would it be cost prohibited to take it out and put clean fill in and you get a clean survey? No trying to convince people that it's clean. (Joe M) Yes, it is a cost concern. It's more cost effective to just do specific areas. (Marti) Could there be a potential to move partial? (Terry) Yes, that's already been done. • (Jack) BIG QUESTION, IS THERE SOMETHING DEEPER? How do we know that this isn't deeper? (Terry) We will dig deeper with an excavator and get below the anomalies. (Joe M) Reason we didn't do it before is because we couldn't put a body in there due to safety. (Terry) We will test pit to the water if we continue to find anomalies with a schondstedt. (Joe M) Pictures will be taken and documented, if soil is rusty, we will backfill with offsite soil. • (Guy) Are there any other surveys waiting to be done? (Terry) No. • (Guy) Does every backfill area have anomalies? (Terry) No, just 3. (Mike K) Make outlines on Survey slide different colors showing the main three backfills and then others in a different color. • (Mike K) Do you have the limits where it was backfilled? (Terry) Yes, we can add that to the presentation. (Guy) Are you going to go back to the three major anomalies and reinvestigate? (Terry) NO plan but we can if DEC decides they want to. • (Jack) Is there any reason why we are doing this RI by May? This is an ongoing thing and you will have several revisions going on. It's a moving target with several versions. • (Guy) Beth you said anomalies have been removed? (Beth) Yes, 49 & 48 and marked every anomaly and Dave came back and said ALL were removed. (Guy) Is this documented in the report? (Terry) No, but it can be. (Guy) Information needs to be in report. (Sarah) We don't go and report every single spot on the graphic. (Matt and Jack) We need to see separate graphics for each year, 2007, 2008, 2009 (with and without all compiled). Cost saving – have graphics electronically available instead of making so many copies over and over again. • (Guy) Are dig logs and data presented in the report when you went back to the areas of anomalies? (Sarah) No but can be added in. • (Deb) How large will test pits be? (Sarah) 5ft deep 1 to 1 side slopes. (Joe M) If we have to dig deeper then that's what we do. • (Marty) Have we seen data and waste characterization of what's going to be backfilled.

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	<p>(Sarah) It is already in the report. (Sarah) Tech Memo is already out to Army, awaiting their distribution. (Joe M) Any details on EM questions ask Beth.</p>
	<p><u>Draft Remedial Investigation Report Risk Assessment:</u></p> <p>CH2M Hill discussed their Revised Draft RI Report: Focus was on tables and figures. Planning on delivering an E copy (CD) Monday May 4th. Hard copy Friday, May 8th.</p> <p>Sections 1-3 Overview, no discussion or questions.</p> <p>Section 4:</p> <ul style="list-style-type: none"> • (Jack) You appear to be logically describing the RI by phases of work or years of work, do you have a summary at the end of each chapter, changes to strategy, to be able to tie the logic? (Marilyn) We do have that for the RI itself as a rap of at end of report, not by chapter. <p>Section 5:</p> <ul style="list-style-type: none"> • (Marty) For the groundwater have you guys done any trend analysis? (Marilyn) We do not have sufficient data sample events. • (Earl) Is there a section in here where you will discuss the migration to groundwater cleanup levels? (Marilyn) Based on the fact that we have groundwater data from all sites, we will determine predictions rather than media. • (Sharon) It is important to define why there is no reason to believe that there is no material left under house. Is it mere observation? Referencing pages and field notes can be used as information to say specifically what was observed. (Marilyn) There is a table that indicates the basis for excluding analysis but it's not in the report, may need to add it in. (Sharon) Going through this on a house by house scenario would be beneficial.
	<p><u>Nature and Extent of Contamination:</u></p> <p>Surface Soil:</p> <ul style="list-style-type: none"> • (Sharon) Was 2005/2006 included in database given? (Marilyn) Yes (Sharon) If the samples don't exist and they are clean then why have them in the database? (Marty) If the soil has moved, don't include that data. (Marilyn) Will remove 2003/2004 data from graphic. (Sharon) Hot spots could have been moved during 2006 construction of vertical buildings. (Marilyn) Would have seen hot spot in data evaluation on surface sources contamination aside from the PCB's. (Marty) During preconstruction and construction days, use data but don't use in the Risk Assessment because it's not current. <p>Subsurface Soil Samples:</p> <ul style="list-style-type: none"> • (Marty) What was used for risk assessment? Dennis: Used complete data set and included previous graphic. • 81 Monitoring Wells on a not so large site. • (Sharon) During the 2008 sub-slab data collected at the houses, were all heaters operational at the time? (Joe M) They are within 1 & 2 degrees of each other.

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	<ul style="list-style-type: none"> • (Marty) For completeness of the whole risk picture isn't it important to calculate the risk of arsenic? (Dennis) Needs to be a discussion as a contaminant of concern and a risk that needs to have a blurb in the report. (Marty) Depending on how high the levels are, if there is a significant exceedance of risk, it needs to be captured in the report. • (Marty) Were soil results associated with any kind of munitions debris? (Joe K) No munitions found in areas. <p>Groundwater</p> <ul style="list-style-type: none"> • (Marilyn) Is there a background cobalt contamination data? (Dennis) Perhaps USGS has something on this. USGS report says there are 32 micrograms per meter in this area. • (Joe M) Two new housing areas are going to be north of current housing area. One well exists but two will be there when finished with project. Utilities have been sold to Doyon and now they have the say in what we do. <p>Soil Gas</p> <ul style="list-style-type: none"> • (Joe M) When they run the analyses on these cans they will run calibration curves and then they'll run a blank....then the lab will run a second blank to reduce the possibility of carry over before running your first sample. A compound found in the sample is a semi-volatile compound. In this case they only ran one blank and found this chemical in the sample. It was suggested to us that there was carry over that was happening and also supporting that was there was some heavier compound in the area. Recollected both sides of the house and indoor and split it and sent to two different labs which came back with no contamination. • (Sharon) Are all houses at risk of contaminants? (Joe M) No • (Marilyn) MW77 well was installed and PCE that is showing up above PCL in that well. Discussed in the past to put in additional wells. (Joe M) Are there any other issues so that we can do everything at once? If we are looking at the numbers and we need a boundary, we have to get between the street and the utilidor (goes close to just above groundwater). We need to be careful. If there's going to be more well installation, we need to know about it now. • (Jack) Did the housing people do sampling around perimeter? (Joe M) They have not done any sampling yet. (Jack) They were supposed to do west side and across the road. (Joe M) Their data quality standards are not even close to ours. Last time that they did west side on White street, the data quality was really bad. (Joe M) Might as well have us do it and have it done right.
	<p><u>Risk Assessment Summary</u></p> <p>Soil Vapor</p> <ul style="list-style-type: none"> • (Marty) Were the other contaminates attenuation factors evaluated? (Dennis) You're looking for separation as much as attenuation allows and your truncated on one end by the indoors which is going to be affected by ambient levels and other end the sub-slab based on this contamination rate. If you have a lot of contamination and you have very little ambient air then you have a condition where you can really range in an inaccurate attenuation factor. For these chemicals all we can do is assign a less than number. (Marty) If you can provide the documentation to all that rationale, your decision making

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	<p>process has to be explicit and communicated to those readers who may not understand the detail of the logic.</p> <p>Freon (Jack) Does the IRA report go into detail on the probable source of Freon. (Marilyn) The potential sources are given in the PRSE which are a variety of construction materials that contain the Freon material.</p> <p>Residential Soil and Arsenic</p> <ul style="list-style-type: none"> • (Jack/Dennis) PCB samples are closure samples? Soil removed is not included in the risk evaluation results for soil. (Dennis) Appendices will provide all risk results and risk screenings. • Did you calculate what the resident was exposed to at the maximum? (Dennis) We did not do that. Maybe add that in as a worse case scenario, not in RI but elsewhere. (Dennis) Not a good idea, too many additional steps. • Does the risk assessment provide a multimedia calculation on a house by house basis. (Dennis) The Army's intent was to not have the "my house is better than yours". Just being really careful on how we present the risks. Here's the challenge: How do you assign a dot to a house? Different houses are different distances apart. It becomes a very subjective thing.
	<p><u>Taku Gardens Development and Investigation History Chronology</u></p> <ul style="list-style-type: none"> • (Jeremy) How can this figure be improved? (Jack) This is a good introduction graphic. Not just a good start, this is almost there...just a few changes maybe. If something isn't noted in this figure, it needs to be in the RI Report. • (Jack) Who is up keeping admin record for this report? (Joe M) Physically sitting in my admin record in my office. Email traffic is on my computer as well. (Jack) You need someone to set up an outline for admin record so that things are in order and people can find what they need. • (Jack) We need to have all references in admin record for ANYTHING noted in the RI so that the public can go back and look at these reference reports. Any decision that was made in the RI needs to be able to have something to go back to and reference. Don't refer to something the public doesn't have access to. • Sharon: Jacobs and CH2M Hill need to include in the reports the decision to not sample for dioxins and furans.