October 27, 2016

Mr. Aaron Yue, Project Manager DEPARTMENT OF TOXIC SUBSTANCES CONTROL 5796 Corporate Avenue Cypress, California 90630

Ms. Pamela S. Innis Topock Remedial Project Manager Office of Environmental Policy and Compliance U.S. DEPARTMENT OF THE INTERIOR P.O. Box 25007 (D-108) Denver, Colorado 80225-007

Re: Fort Mojave Indian Tribe Comments on Data Gap Work Plan-3

Dear Mr. Yue and Ms. Innis:

On behalf of my client, the Fort Mojave Indian Tribe (the Tribe), I have reviewed the Technical Memorandum: Topock Soil RFI/RI-Plan to Address Data Gaps Identified During Work Plan Implementation (DGWP-3) prepared on September 21, 2016. The comments below are divided into General which address process and Specific which address individual proposed soil sample locations.

The Tribe uses these comments to remind the agencies of the spiritual and cultural importance of reducing or avoiding, whenever possible, any impacts to the Topock site. It is, and has always been, the Tribe's position that the activity of sample marking and collection results in an unalterable and unacceptable impact to the sacredness of the area. When there are reasonable alternatives and methods available that reduce the impacts to the area, the Tribe expects the agencies to consider and adopt those alternatives and methods as specified in the Programmatic Agreement, CIMP and Treatment Plan.

General Issues

There are five General Issues:

 Interpretation of a "New Sample" and Counting of total samples collected: The Soils EIR allows for up to 73 additional/contingency soil samples. When questioned on the 10/5/16 teleconference, DTSC responded that they performed an internal evaluation and have defined only new sample locations as qualifying for an additional/contingency sample. DTSC maintains that an additional soil sample proposed for collection at a location already disturbed and sampled is not counted as an additional/contingency sample. The Tribe does not agree with this interpretation of the Soils EIR. Every single sampling activity contributes to the overall impact to the area, both new sample locations and returning to prior sampling locations and contribute to cumulative impacts and effects under CEQA, NHPA and other laws. The Tribe concludes that the DTSC interpretation of the counting of additional/contingency samples leads to further impacts beyond those accounted for in the Soils EIR and are therefore neither acceptable to the Tribe nor considered pursuant to CEQA and NEPA. These impacts include those associated with marking the sample location, mobilization of personnel and equipment, disturbance to the ground during ingress and egress, and ground disturbance during the actual sampling. In addition, some samples in rocky soil in AOC-4 were collected using hand equipment yet proposed samples at the same location are now proposed to be collected using hydrovac trucks thereby further intensifying impacts.

- 2. Lack of Sufficient Detail Related to New Sample Justification: The DGWP-3 does not contain sufficient details for a complete review by the Tribe. Details regarding the selection of comparison criteria (background vs. eco vs. human screening levels) are not provided. On a recent teleconference, PG&E referenced the description of the use of screening levels in data gap determination in the Soil Characterization Work Plan. However, that document is neither cited nor referenced in DGWP-3. Therefore, it is difficult to understand which comparison criteria were used at any given proposed sample location. In addition, for some samples only the generic chemical category, i.e., metals or dioxin-TEQ, is cited as the exceedance when, if the specific metal or dioxin congener had been provided, the Tribe could have performed an adequate review. Also, the existing sample or samples that serve as the basis for the proposed samples should always be listed in the justification. This information had been requested by the Tribe in both DGWP-1 and -2, but is still missing in DGWP-3 and must be provided to complete an adequate review of the plan prior to approval.
- 3. <u>Consideration of Alternatives</u>: The Tribe believes that there are reasonable alternatives to the proposed additional sampling and the impacts that sampling will have on the area. These alternatives include using risk assessment to evaluate existing data and in those areas where risks are acceptable then the need for additional samples is eliminated. Other alternatives include modeling or mapping concentration trends (e.g. in BCW) and use those results to limit additional samples. For example, dioxin congener evaluation is a common fingerprint methodology to determine if multiple samples came from the same source. The dioxin data along BCW could be subject to such an evaluation as further confirmation of decreasing concentrations within BCW. A third alternative is to plan to use confirmation sampling. If an area has concentrations that may require remediation then using confirmation samples that will be collected during an action is a reasonable alternative. The Tribe believes that it is the duty of the agencies to consider these alternatives and methods to reduce impacts to the area.
- 4. <u>Missing Evaluation of Background</u>. There is precedent in California to use characterization data to determine the background range of dioxin congeners in soil. That evaluation has not been done at the TCS and some of these detected concentrations may be due to background.
- 5. <u>Scouring of BCW sediment</u>. The regular scouring and migration of sediment in BCS due to water flow from rain events is a known occurrence. This knowledge, coupled with the decreasing concentration in the lower stretch of BCW, should be sufficient to estimate sediment concentrations and use those estimates in risk calculations without additional samples.

Specific Issues

Comments on specific proposed new soil sampling locations are provided in the following table. Due to the complexity of the review process, only sample locations outside the TCS fence line have been reviewed. The lack of comment on a particular within-fence line sample location should not be interpreted as an approval from the Tribe.

SWMU	SAMPLE	COMMENT	RECOMMENDATION
/AOC	LOCATION		
	ID		
AOC1	AOC1-T1g	This location is close to AOC1T2h which	Delete sample, use
		only has 34 Dioxin TEQ (mammal)	existing data
AOC1	AOC1-T7,	These locations between AOC1TCS4e	Delete sample, use
	T8	(870 TEQ-mammal) and AOC1-T5d (520	nearby data and pattern
		TEQ mammal). Concentrations	
		decreasing along this stretch.	
AOC1	AOC1-8	This sample location is near AOC1-T5d.	Move sample to slope
		There is a potential source of dioxin in	and additional
		AOC14. Move this sample to the slope	environmental impacts
		beneath AOC14-14W, 19	must be considered by
			DTSC and DOI.
AOC1	AOC1-5,6,7	Concentrations beginning at AOC1-T5D	Delete samples and use
		(520 TEQ) reduce to concentrations in	existing concentrations
		sediment at the mouth of BCW to 110	and pattern
		TEQ or below (AOC1-BCW28).	
		Concentrations decreasing along this	
1001	100100	stretch.	
AOC4	AOC4-33,	These samples are up the sidewall of the	Delete samples and use
	34, 35	drainage as much as 15° above the	the existing data and
		bottom. These sidewalls are very rocky	the physical ravine
		and have very limited soll thickness. If	side-wall barrier
		denosition and then subsequent securing	
		during rain events would have removed	
		these concentrations from this steep slope	
		In addition, there are numerous nearby	
		samples for these proposed locations (e.g.	
		AOC4A06 to AOC4F06 near proposed	
		AOC4-33) that show low concentrations	
		of the target analytes (e.g., dioxin TEOs at	
		11, 8.2, 2.6, 4.3 and 3.6, respectively).	
		These are low concentrations and are	
		samples near/adjacent (around 10 feet) to	
		the physical barrier of the ravine side-	
		wall. Other relevant samples are AOC4-	

TABLE OF SPECIFIC COMMENTS ON PROPOSED SAMPLE LOCATIONS

		IOK IOT (10 TEO) and disability further	
		100-J07 (10 TEQ) and signify further	
		AOC4-L07-L08 (40 TEQ). The low	
		adjacent concentrations plus the unikely	
		presence on the steep side wall make these	
1001	100107	proposed samples not likely informative.	
AOC4	AOC4-37	The AOC4-37 location is far up	Delete sample AOC4-
		topography from the other samples. The	37
		bounding of dioxin concentrations on the	
		south side of the water tanks are	
		adequately bound by low concentrations	
		in AOC4-19 and 20 (6 and 8 TEQs	
		respectively). While AOC4-28 seems to	
		have the elevated dioxins, PAHs and	
		PCBs the focus on the south side of the	
		water tanks will provide more informative	
		data.	
AOC4	AOC4-36,	These three sample locations are proposed	Move AOC4-36 and 39
	38, 39	below the water tanks.	and delete AOC4-38
		The question of interest is decreasing	and additional
		concentrations away from the potential	environmental impacts
		sources in AOC4. Therefore, move	must be considered by
		AOC4-36 to the east towards AOC4-39.	DTSC and DOI.
		Move AOC4-39 down slope towards the	
		bottom and also east towards AOC4-38.	
		Delete sample location AOC4-38.	
AOC4	AOC4-40	This sample is proposed to look at slope	Delete AOC4-40
		areas east of the water tanks as a source to	
		AOC10 locations. There is already	
		evidence of sediment transport from this	
		sample area to AOC10 locations and	
		samples. If the AOC4-40 sample location	
		had been impacted by dioxins and PCBs,	
		then these analytes would have been	
		found in AOC10 samples. Since no PCBs	
		have been detected in AOC10, that	
		supports the conclusions that the AOC4-	
		40 proposed location is outside the area	
		impacted by these chemicals.	
AOC9	AOC9-21, 22	Proposed sample locations AOC9-21 and	Delete samples AOC9-
		22 are placed to evaluate upstream inputs	21 and 22.
		into the AOC9-15 location. AOC9-21 is	
		on the road and AOC9-22 in a drainage	
		just above the AOC9-15 location. There	
		is clear surficial evidence of sediment	
		transport from the AOC4-40 proposed	
		location to AOC9-22, AOC9-23 and	

		AOC9-15. However, since AOC9-15	
		does not have the same detected	
		chemicals as in $AOC4$ the data do not	
		support any connection between these	
		areas (There is further evidence in the	
		AOC10a-3 data [on the road] which also	
		does not contain these same analytes). It	
		is most likely that the $\Delta OC/4.40$ location	
		does not contain elevated dioxing or DCBs	
		and therefore the $AOC0.21$ and 22	
		locations are not sources to AOC0 15	
40010	AOC10- 4	This many and assume is to determine a	Delete eccepte
AOCIO	AOC10a-4	This proposed sample is to determine a	Delete sample
		migration pathway down gradient of	AOC10a-4
		AOC10a-3. However, the only metal	
		exceedance of any criteria in AOC10a-3 is	
		Nickel (32 ppm vs. background of 27).	
		This is not a sufficiently strong reason to	
		collect this sample.	
AOC10	AOC10-25	Sample proposed based on dioxin TEQ	Delete sample AOC10-
		concentrations in AOC10-15. Sample	25
		AOC10-15 was collected in an above-	
		grade pile of soil which has clear	
		boarders. AOC10-25 is just up-gradient	
		of AOC10-15 and not likely a source of	
		dioxin to a pile of soil. If at a later time if	
		removal of concentrations at AOC10-15 is	
		warranted then step-out samples beyond	
		the boundaries of the soil pile could be	
		used.	
AOC10	AOC10-26	Proposed sample is to analyze for dioxin	Sample locations
		in deposited sediment.	accepted and additional
			environmental impacts
			must be considered by
			DTSC and DOI
AOC10	AOC10-27	Proposed sample is to look at dioxin	Delete sample AOC10-
110010	11001027	down-gradient from AOC10-15 This	27
		sample location is on the other side of a	27
		large soil berm across the drainage Also	
		when comparing metal concentrations	
		between AOC10-15 and AOC10.5 (near	
		the proposed AOC10 27 location) there	
		does not seem to be a relationship	
40014	4.0014.20		0 1 1 1
AUC14	AOC14-20,	Samples proposed in exposed debris	Sample locations
	21	within road-cut. It is presumed that the	accepted and additional
		purpose is to look at the vertical extent of	environmental impacts
		contamination above and below the	must be considered by

		debris. [Note that during the field walk	DTSC and DOI.
		the exact locations of these 2 trenches	
		were not provided. Will these be set in	
		the field during sampling or have	
		locations been set?]	
AOC27	AOC27-51	Sample proposed to determine the lateral	Delete sample ACO27-
110027	110027 51	and vertical extent of debris found in	51 and perform visual
		samples AOC27-6 7 and 8 However	inspection
		there is visual information regarding the	inspection.
		depth of debris in this area. The slope	
		between the road and the bottom of BCS	
		has visible debris which is below the level	
		of the road. There is sufficient	
		information from the previous tranches	
		and the visual observations to estimate the	
		and the visual observations to estimate the	
		7 have algorithd matals, DAHs and dioxin	
		If it is likely that this area would be	
		aubiest to a removal action, then extent	
		subject to a removal action, then extent	
Parimeter	DA 10 11	These complex are all provious locations	Delete DA 12 Semples
Samples	PA-10, 11,	and therefore are proposed to not count of	Delete PA-12. Samples
···· 1	12	and therefore are proposed to not count as	PA-10, 11 accepted and
		the provious complex were collected	auditional
		(hand to als?) but hydrowed is monoced to	environmental impacts
		(nand-tools?) but hydrovac is proposed to	must be considered by
		confect these proposed samples. These	DISC and DOI.
		While DA 10 and 11 have algorithd DA Ha	
		acmpared to criteria DAU 12	
		compared to citteria, FAH 12	
		greater and PCPs loss than twice the	
		lowest criterion	
		Note that the sample locations were not	
		Note that the sample locations were not	
		liaited during the site visit so their exact	
		fully evaluated	
Perimeter	DA 18 10	These samples are all provious locations	Delete DA 18 10 20
Samples	120, 21	and therefore are proposed to not count as	Delete $FA-18$, 19 , 20 , 21 and if these areas
1	20, 21	new samples by DTSC. It is unclear how	subject to remediation
		the previous samples were collected	use confirmation
		(hand-tools?) but hydrovac is proposed to	sampling
		collect these proposed samples. These	sampning.
		locations are proposed for deeper samples	
		For PCBs, only PA_{-1} has a detection	
		above the screening criteria. For DAUs	
		above the screening criteria. For PAHS,	
		an four samples are above screening	

	criteria. However, if these areas are candidates for removal, then a limited removal plus confirmation sampling can be used. Note that the sample locations were not marked during the site visit so their exact locations could neither be determined nor fully evaluated.	

The Tribe requests that, in addition to considering reducing the number of proposed additional samples (see Table above), there must be a specific consultation regarding the interpretation of the Soils EIR in relation to impacts from the collection of additional soil samples prior to approval of DGWP-3 and any further field work. The Tribe must be involved in this discussion regarding how impacts to the site, a sacred area, are determined and hereby requests a meeting to consult with DTSC to address this question prior to the approval of DGWP-3.

Sincerely,

16.

Michael J. Sullivan, Ph.D., CIH Consultant to Fort Mojave Indian Tribe

cc: Timothy Williams, Chairman, FMIT Shan Lewis, Vice-Chairman, FMIT Linda Otero, Director, ACS, FMIT Nora McDowell, FMIT Leo Leonhart, Technical Consultant, Hargis + Associates Courtney A. Coyle, Legal Counsel, FMIT Jason West, Field Manager, BLM Karen Baker, DTSC Ana Mascarenas, MPH, Assistant Director EJ and Tribal Affairs, DTSC Tribal Representatives: CRIT, Cocopah Tribe, Hualapai Tribe, Chemehuevi Tribe TRC Members: C. Schlinger, M. Eggers, B. Prucha, E. Rosenblum