

**TPP Meeting #3**

**October 27, 2005**

## MEETING MINUTES

10 November 2005

**Project:** Former Trabuco Bombing Range Remedial Investigation/Feasibility Study

**Date:** 27 October 2005, 10:00 AM – 12:00 PM

**Location:** City Hall, Rancho Santa Margarita, California

**Purpose:** Technical Planning Process Team Meeting 3

**Attendees:**

Name	Affiliation	Contact Information
Larry Sievers	USACE PM	213.452.3989 larry.a.sievers@usace.army.mil
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Omo Patrick	DTSC PM	714.484.5452 opatrick@dtsc.ca.gov
Daniel Cordero	DTSC	714.484.5428 dcordero@dtsc.ca.gov
Michele Carina	City of Rancho Santa Margarita	949.635.1800 mcarina@cityofrsm.org
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Frank Manzo	Saddleback Valley Unified School District	949.580.3335 manzo@svusd.org

**Prepared by:** Joni Jorgensen-Risk

Mr. Larry Sievers opened the meeting by thanking those in attendance for coming and introduced himself as the U.S. Army Corps of Engineers (USACE), LA District, Formerly Used Defense Site (FUDS) Program Manager and Trabuco Bombing Range Project Manager (PM). He invited everyone in attendance to take a look at the recently developed project web site. Following introductions, Mr. Sievers reviewed the agenda.

Mr. Sievers proceeded to his presentation beginning with the “finish line” of the project. Before the project team can get there, delays (both real and imagined) take place. In addition, oftentimes, the team (USACE, contractors, and stakeholders) lose their focus. The FUDS program spending priorities can shift as well. Mr. Sievers reminded those in attendance that a frenetic pace needed to be maintained and the end goal of the project (closure) needed to be kept in mind.

He then reviewed the end-game scenarios that will provide a permanent solution to the problem/project definition. He stated that the Remedial Investigation/Feasibility Study (RI/FS) will construct and validate (through investigation) a Conceptual Site Model (CSM) that will be compared against remedial objectives and alternatives. Those alternatives could be a combination of any of the following: do nothing, institutional controls, construction support, surface removal, and subsurface removal.

He reviewed the proposed RI/FS schedule and added that a Technical Memorandum will be developed following this third meeting that will describe the decisions made during the TPP process. The next TPP meeting will be held following the development of the RI/FS Work Plan to brief the team on the document.

The deliverables are what make the project go round and as such, they are very important and are tracked very tightly. The GPO WP was released in October and comments are due 3 November. The Public Involvement Plan was released in October as well and will be used to maintain effective communications with the local communities. The RI/FS Work Plan is forecasted for Jan/Feb 2006 and is considered the driver of the investigation. The Geophysical Prove-Out (GPO) is currently scheduled for January 2006. In addition, anytime that the USACE undertakes a munitions investigation and potential disposal actions, they are required to submit an Explosives Safety Submission (ESS) to the Department of Defense (DoD) for approval to do so. The ESS details how the USACE will protect its staff, contractors, and the community from any potential munitions hazards. The document will be reviewed by the Department of the Army, and then at the DoD level. Oftentimes the ESS review process is lengthy (up to 3 months) because of the scrutiny that it goes through by the various agencies. Providing the ESS receives a timely submittal and review, Mr. Sievers indicated that they hope to be out in the field implementing the RI/FS Work Plan in spring 2006.

Pointing to an aerial photograph of the site, he stated that although they are still refining the site boundary lines, the photograph depicts those boundaries as they are understood at this point in time. The munitions that were used at the former bombing range would primarily be found on the surface or the very shallow subsurface. He added that those areas that have been developed are considered out of the investigation phase. They will be investigating areas of undeveloped open spaces.

The USACE has been reviewing real estate records from the 1940s, and has actually located some target coordinates. They have also reviewed aerial photographs from the 1940s to the 1950s in an effort to confirm target locations. Interviews have been conducted and they have been able to document development actions over the years.

The developers left a record of where they located over 225,000 pounds of metal scrap (this included old practice bombs and rockets) from the former bombing range. This research has provided them with a more accurate set of data points with which to define the problem at the site and understand more completely the historic use. He reviewed some of the historical aerial photographs and reviewed the evidence of ship silhouettes and targets on the ground in the 1940s and 1950s. He then reviewed aerial photographs which included the 5 former targets. The general areas of the former targets include the current City Hall, an area one block north of the Toyota dealership, the area of Arroyo Vista and Antonio, Auto Collision (an auto repair facility), and two in the golf course.

Development of the Trabuco Bombing Range was reviewed starting in 1984 when the Santa Margarita Company requested clearance support from El Toro Marine Corps Air Station (MCAS). He stated that in 1984, almost 500 of the 3-lb practice bombs located did not function as designed and still contained their explosive spotting charge. The spotting charge (similar to a 10-gauge shotgun shell) is the risk posed to the public today, as the shell/spotting charge is capable of exploding and causing injury. All practice rockets that were fired were inert; there were no explosive charges associated with them. He then reviewed a map showing where the developers located munitions in the 1980s.

Addressing the development of the former bombing range from 1994 to 2005, although the build-out of Rancho Santa Margarita is nearly complete, there have been encounters with items from the former range. He reviewed those encounters beginning in 2003 (with the Bikeway) and the last encounter being in July 2004.

Mr. Sievers reviewed the FUDS Program that was enacted by Congress in 1986 for the purpose of "correction, detection and disposal of UXO which creates an imminent and substantial endangerment . . ." He added that the Military Munitions Response Program (MMRP) uses DoD investigation/cleanup methods based on the EPA Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) process. A review of the project milestones included the completion of Preliminary Assessment in the early 1990s; the removal of 121,000 pounds of MEC in 1991; the Time Critical Removal Action (TCRA) completed in 2004; and the current RI/FS project that will proceed through the Proposed Plan and Decision Document phase.

He reviewed photos of some actual items that were found at the site under the TCRA. These included practice bombs/target markers that were 3- and 25-pound bombs, and 2.25- and 5-inch inert practice rockets.

He continued his presentation with a review of the challenges facing the USACE, LA District office. They have over 1,000 FUDS from California, Arizona, and Nevada that include chemical warfare material sites; Hazardous, Toxic, and Radioactive Waste (HTRW) sites; and the munitions sites under the Military Munitions Response Program (MMRP). The fact that the USACE is out at the former bombing range and moving forward very quickly, Mr. Sievers sees as good fortune for the site and the community of Rancho Santa Margarita simply because of the volume of sites that they do have, and the fact that only a few MMRP sites can be addressed at any given time.

A review of the Risk Assessment criteria was completed by Mr. Sievers. He noted that although the criteria will be changing, some of the elements included in the current process will remain. For Trabuco, the probability that munitions will be encountered is considered frequent; but the severity of any potential injury is considered marginal (due

to the small spotting charges involved). The ranking of these two elements provides for a Risk Assessment Code (RAC) of 2.

Mr. Sievers concluded his presentation by asking for any questions or comments on the FUDS Program, the RI/FS planning process, or the public involvement aspects of the project. He also displayed a photograph of the Geophysical Prove-Out (GPO) area that they had selected and said that the team is hoping to be conducting the GPO in January 2006. He added that they are working closely with O'Neill Regional Park officials to make certain that their needs are met with regard to the GPO field effort. There were no comments or questions.

Next, Michael Short provided a review of the TPP process and indicated that what the team wanted to finalize that day under Phase 3 of the TPP process were the data collection options. He reminded those in attendance that the Conceptual Site Model (CSM) is a living document that may change as the investigation continues, as could the closeout statement that was developed in a previous meeting. In addition, the worksheets that the team has developed may also be subject to change if new data are presented that warrant changes. Mr. Short stated that the TPP Memorandum that will be developed following this meeting will include the final meeting minutes, meeting slides, maps that have been developed, and the current worksheets.

He continued with a discussion on the data gaps that remain to be filled, one of which is soil sampling locations. The data gaps were identified under Phase 2 of the process, and many of these have been filled. The data collection options will lend themselves to balancing precision and accuracy with cost in order to keep the project on target by not wasting time and money focusing on areas that don't require an investigation.

One data gathering method that will be used is meandering path, which is the most widely used approach. He explained that because the former targets are no longer targets (they have been developed into car dealerships, office buildings, etc.) they cannot lay down a grid (there would be no point). So instead what will be done will be meandering paths looking at the areas that have not been developed within the 520-acre project site. The geophysical prove-out will determine the types of instrumentation that will be used, but most likely, the EM-61 will be used and it will provide the team with an electronic map of the subsurface. The other instrument likely to be used is the Schonstedt, which is a magnetic locator that does not create a map. The Schonstedt will be used in areas under canopy where they are unable to get a good navigational fix, or in areas where the EM-61 cart is not suited. The EM-61 will provide a GPS path record that provides details regarding what was seen and where. Software is used to determine what magnetic signatures are "ordnance-like" so that they aren't out there digging up nails and magnetic rocks; only digging MEC items hopefully. The width of the path will be five feet, and the depth will be dependent on the instrument used and the item being read. Transects will also be used to assist in reducing the footprint and characterizing the site. Transects are straight lines that can be GPS enhanced if not under a canopy. As with the meandering path, the width is 5 feet and the depth is dependent on instrumentation and item. Because the Adobe Hut has been identified as a possible target, one grid will be used in the area outside the fence that surrounds the Adobe Hut and will measure 100' x 100'. Mr. Short asked if there were any questions, of which there were none.

Bill Kelso provided the munitions constituent (MC) sampling approach being proposed for the RI/FS. The Phase I approach is used to gain a focus on the bigger picture, to see if attention needs to be paid to certain areas (leading to Phase II sampling). Under the

first phase, they are proposing the collection of approximately 30 soil samples, which will include quality control (QC) samples. The samples will be collected in areas where MC would be expected in relation to the former targets. In addition, samples will be collected if blow-in-place activities are needed. Mr. Sievers asked Mr. Kelso to explain what MC are, to which he replied that they are the environmental contaminants of concern associated with particular articles used at the site. For Trabuco, they include zinc oxide, titanium tetrachloride, potassium nitrate, dinitrotoluene (DNT), and ballistite (nitroglycerin-based). He indicated that if the rocket was functional, it should have expended all of its propellant as it approached the mark. He added that there is no evidence to suspect the use of perchlorates as rocket propellants. Perchlorate is a groundwater contaminant of concern, not a soil contaminant. Further, sampling locations are being proposed outside of developed areas and they include the area of the Adobe Hut and on the fringe of the community.

His presentation moved to the GPO, which is designed to show that the instruments that they are proposing to use will in fact be effective under actual site conditions, on specific site munitions, and at given depths. The GPO is expected to be conducted in either January or February 2006. The GPO grid will measure 100' x 100' and will be located in an area adjacent to Arroyo Vista. B.J. Allen asked about vegetation-clearing activities. Mr. Kelso indicated that they have proposed cutting the grasses to 4 inches for instrumentation testing. He explained that the GPO will be "seeded" with 22 items, placed at scientifically valid locations, depths, and orientations. The GPO is considered the future quality and training site that will be used for the length of the project. Mr. Allen asked if they had actually identified in the GPO Work Plan that the grid and seed items would be in place through the end of the RI/FS effort. Mr. Kelso indicated that was his presumption, yes. Specifically, Mr. Allen asked if there might be problems if the grid had to lie in place more than a year, and asked if possibly some of the identifying markers could be removed still allowing for minimal identification. His concern is having a GPO grid that attracts attention, and he would like to avoid that as much as possible without making it more difficult for the team to identify the grid in the event that the project was delayed and the grasses had returned. He added that if any "dummy" seed items happened to be uncovered (if the GPO grid were to lay dormant), those seed items would be clearly identified as such.

Leslie Ray asked about the GPO schedule and Mr. Kelso responded that the GPO grid is set up in one day, and they come out the following day to test the equipment. He added that the GPO effort is a total of 3 days (not including mod/demob). Mr. Allen added that the grid is already in place for instrument calibration and personnel certification so that when they return to the site for investigation and/or clearance (if that option is selected) the grid will not require re-establishing and the process can be expedited. Omo Patrick asked for some clarification on the grid location. Mr. Kelso stated that the grid needs to be included in the area of investigation for the simple fact that it needs to duplicate the geological conditions. The area was selected for its accessibility and it is somewhat removed from public access. Mr. Allen added that there is less vegetation that will need removal at the selected site. John Gannaway asked about the location selected and Mr. Allen responded that if he had another location in mind, they would certainly entertain it. Mr. Short suggested that Ms. Ray and Mr. Gannaway meet with the team following the meeting to review the details of the GPO and the grid location. Mr. Patrick asked if blind-seeding would be a part of the GPO, to which Mr. Allen responded that there would be blind-seeding in the GPO. Mr. Allen added that there is a difficulty with blind-seeding a meandering path (as will be done for the RI/FS investigation), because the path is not clearly defined, so there is no guarantee that they would "meander" into the area of the blind-seed. He added that

during the RI, the one grid will be blind-seeded, and suggested the transect could also be blind-seeded. Mr. Allen stated that Debbie Edwards, the project geophysicist from the USACE Huntsville District, will be handling the blind-seed effort.

Mr. Holte, standing in for ITSI Project Manager Joni Jorgensen-Risk, then provided an update on the Public Involvement Plan (PIP) by first explaining that there is a parallel portion of this project that moves along with the technical aspect of field work and report development, providing for effective communication between the USACE and the local communities, school children in the area, and stakeholders. The primary vehicle for that is the PIP, which describes how the interactions with the community will be handled from the perspective of the USACE and the project team. Mr. Holte stated that in order to determine how best to communicate with the members of the public, they initiated the interview process by first contacting public officials and city, county, and state agencies to get a baseline understanding of the local communities. He added that they have received over 50 responses to the on-line survey, through support and assistance from Orange County Parks, the project web site, the school districts, the City of RSM, and other public agencies. The agencies that were contacted were found to be ready, willing, and able to provide USACE with information distribution. Results of the surveys indicated that almost 2/3 of those that responded were unaware that portions of RSM were once used as a bombing range; nearly 1/2 were unaware of the potential presence and danger of ordnance/munitions in the area; nearly 1/2 indicated they were not sure who to call in the event that a suspicious item; and nearly 2/3 had not seen information or warnings regarding ordnance/munitions at the former range. He added that the warning message/logo regarding the discovery of suspicious items will be used as a "brand" and has been posted on the web site, is included in fact sheets, and will be included in posters to make sure that the community knows to call 911.

Suggestions on how to distribute project information included newspapers (primarily OC Register), direct mailings (as was used for distribution of the fact sheet via Santa Margarita Water District), and adding more signs in the park. They also suggested presentations to the local schools, the City of RSM and homeowner's association newsletters and web sites, newsletters issued by Representative Miller's office (who has been most helpful), and the project web site. Mr. Holte added that the project web site is getting a lot of activity and will be the primary vehicle used to communicate with the community.

The primary concerns expressed by the community included:

1. Safety and the need to minimize the possibility of injuries
2. Local biological, cultural/archaeological, and environmental concerns must be protected
3. Timely access to (and distribution of) information, and related contact/access with project personnel

Mr. Holte added that there is a copy of the PIP in the library and a copy can also be downloaded from the project web site ([www.trabuco-bombrange.com](http://www.trabuco-bombrange.com)). The public comment review period runs through the first week in January. The final document will be posted to the web site upon completion. He reviewed the project status and asked if there were any questions or suggestions.

There was a question regarding the project schedule, to which Mr. Sievers responded that the current phase of the project should be completed in about a year (including completion of the RI and the FS, selection of a remedial alternative, and preparation of the proposed plan and the decision document). The site will then be ready for cleanup

and Mr. Sievers said that he would be requesting funds right away. He added that there are many sites out there competing for limited funds that there is no guarantee when funds will get assigned to the Trabuco cleanup effort.

Mr. Sievers stated that the comments that he is getting from the public are very enlightening (such as providing pictures and diagrams of items found at the range on the web site) and encouraged those in attendance to forward any comments that they (or someone they might know) have, on to him.

He then introduced Mr. Patrick with the Department of Toxic Substances Control (DTSC) to provide an overview of the DTSC's oversight involvement at the former bombing range. Mr. Patrick explained that DTSC is under California Environmental Protection Agency (Cal/EPA), which also includes the Air Resources Board, Department of Pesticide Regulation, Integrated Waste Management Board, State Water Resource Control Board, and the Office of Environmental Health Hazard Assessment. DTSC's mission statement is:

*To restore, protect and enhance the environment, to ensure public health, environmental quality and economic vitality, by regulating hazardous waste, conducting and overseeing cleanups, and developing and promoting pollution prevention.*

He added that in most cases, sites have been abandoned, and the DTSC steps in to raise the red flag. When they found out about Trabuco, they initiated the public outreach program that included a public meeting and a meeting with the city council. Following that, they attempted to identify the potential responsible party, and were able to narrow that down to DoD.

The Office of Military Facilities was created in 1993 within the Site Mitigation Program, to oversee the investigation and remediation of hazardous substance contamination at operations and closing military bases in California. They also facilitate the reuse of closing military bases. The Office of Military Facilities was established in an effort to provide DoD with DTSC's full-time attention in the cleanup effort. Mr. Patrick indicated that it is his job to make sure that the USACE is complying with the California state law, since oftentimes, state law and federal law are very similar but state law is more stringent.

He provided the DTSC Project Team contacts that included himself as Project Manager (PM); Leticia Hernandez, Public Participation Specialist; Ronald Okuda, Geologist; and Daniel Cordero, who is considered a PM at large and fills in where needed. In addition, DTSC has support units that include a Planning and Environmental Analysis Section (PEAS), Engineering, Hazardous Materials Laboratory (HML), Legal, and Hazardous Waste Management.

He concluded his presentation by reviewing the roles and responsibilities of DTSC at the former Trabuco Bombing Range. DTSC is the lead agency for regulatory oversight enforcing state environmental laws in an effort to ensure the protection of human health and environment. In addition, they ensure that the community is kept informed and involved in the decision making process. Contact information was provided for those in attendance. Mr. Sievers thanked Mr. Patrick for his presentation.

Mr. Kelso provided an overhead of the updated open space map that included the locations of the former targets (mentioned above). He pointed to the locations of the former targets at the 18<sup>th</sup> green and the 8<sup>th</sup> fairway of the golf course, Auto Collision on Antonio Parkway, the Toyota dealership, and an unnamed commercial building. He explained that the original property line went from the confluence of Trabuco Creek and Tijeras Creek, and went up the centers of the canyons (center of the creek). He pointed to a V-shaped sliver of land located between the outer bombing range boundary and the golf course that is undeveloped and steep, with mature vegetation and includes approximately 520 acres. Mission Viejo is out of the picture for investigation.

He added that the maps that were included in the TPP packets were outdated, and he asked that they be replaced by latest map provided for those in attendance. He explained that the reason why the maps were outdated already was because at the time that the packets were being prepared, new information was coming in, and changes were being made to the maps as quickly as they could get processed.

Mr. Sievers thanked those present for attending and adjourned the meeting at 12:07 PM.

**ACTION ITEMS:**

- Joni Jorgensen-Risk: post photographs and munitions diagrams to the project web site (under a separate tab).

**FUTURE MEETINGS:**

- The next TPP meeting will include an introduction to the RI/FS Work Plan and will be scheduled at a later date (possibly early spring 2006).

**HANDOUTS:**

- U. S. Army Corps of Engineers, Los Angeles District, TPP3 Package, October 27, 2005. The package included the following items:
  1. Technical Planning Process Team Meeting 3 Agenda, 27 October 2005
  2. Updated Technical Project Planning worksheet package that includes Phase I MFR Worksheet, Conceptual Site Model, Project Objectives Worksheet, Site Information Worksheet, and Data Quality Objectives Worksheet.
  3. Former Trabuco Bombing Range, DERP—FUDS No. J09CA0209, Remedial Investigation (RI)/Feasibility Study (FS), Technical Planning Process (TPP), Meeting 3, October 27, 2005 PowerPoint presentation handout.
  4. Trabuco Bombing Range Phase 3 Data Collection Options PowerPoint presentation handout.
  5. Trabuco Bombing Range Public Involvement Plan (PIP) Objectives PowerPoint presentation handout.
  6. About DTSC and Our Role in the Environmental Cleanup at Former Trabuco Bombing Range, Rancho Santa Margarita PowerPoint presentation handout.
  7. Two aerial photographs from 1949 depicting practice targets, and two figures showing the Remedial Investigation Area and Proposed Soil Sample Locations.