

# FieldNOTE

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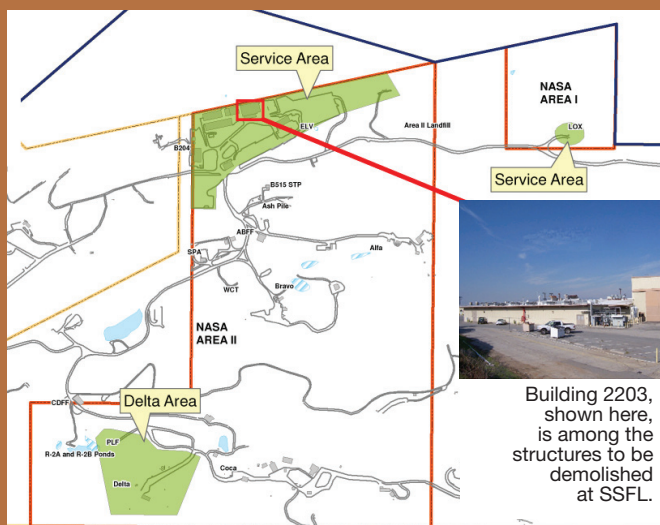
An Update  
on NASA's  
Cleanup Efforts at  
Santa Susana  
Field Laboratory

## DEMOLITION BEGINS at SSFL

NASA is making steady progress towards cleanup at the Santa Susana Field Laboratory and is about to take a big step forward by preparing for the demolition of test stands and supporting facilities. These structures, once an important part of our nation's space program, have been inactive and are no longer needed for NASA's rocket propulsion missions. NASA is removing the structures to meet cleanup obligations for the SSFL site. NASA is committed to communicating with the public about cleanup and demolition. As part of that commitment, NASA is organizing opportunities for people to tour and take photographs of the site before demolition begins. This edition of FieldNOTE, a regular newsletter featured on the SSFL cleanup website, describes the steps NASA is taking to perform demolition safely and to protect public health and the environment.

Demolition will occur in a phased approach beginning in the northern part of Area II [see map below] starting in the Service Area where there are no test stands, followed by demolition of the remainder of Delta Test Area structures. Coca Test Area structures will be demolished as part of phase 2 in late 2015. NASA is working to finalize phase 3 in the Alfa and Bravo Test Areas where active public involvement by community members has been instrumental in the preservation of one test stand. [See side bar at left.]

NASA, the State Historic Preservation Officer and consulting parties including the Santa Ynez Band of Chumash Indians considered the effects of demolition on cultural resources and how the effects could be mitigated. The result was an agreement that altered the proposed demolition plan. It specifies saving one test stand (in Alfa or Bravo Area) for historic preservation providing cleanup goals can still be met.



Building 2203, shown here, is among the structures to be demolished at SSFL.

## Safety First

NASA is working with the United States Army Corps of Engineers (USACE), an agency that has extensive oversight and quality assurance experience with demolition projects, and with contractor Bhate Environmental Associates, Inc. whose past work includes the safe demolition of obsolete structures at NASA's Marshall Space Flight Center. NASA recognizes that demolition requires careful planning and attention to details. A work plan must be approved before demolition activity begins. This "how to" manual states how all practices and procedures are to be implemented with the health and safety of workers, the public, and the environment as the top priority.

## Pre-demolition Activities

Preparing the site for demolition is expected to take several months. The initial work will happen inside the buildings – performing asbestos abatement and removing other regulated materials such as PCB-containing ballasts and mercury-containing light tubes. These materials will be properly disposed of at licensed facilities. Outside, workers will remove transformers and install perimeter safety fencing. A storm water protection system will be put in place to minimize the potential for soil, disturbed during demolition, to migrate into waterways or move away from the demolition site. The demolition contractor will develop a Storm Water Pollution Prevention Plan using best management practices. This plan will be consistent with NASA's existing and successful plan that has proven sediment and erosion control practices including hydro seeding, silt fencing, fiber rolls, sand bags, and dust controls. Utilities including sewer, water, natural gas, propane, electricity, telephone and other communications in proximity to the work site will be disconnected. Once this work is complete, then demolition will begin in earnest.

## Demolition Activities

Demolition on the land NASA administers at SSFL will be performed using equipment that is typical at any construction or demolition work site – hundreds of them ongoing right here in southern California. The demolition work plan specifies how and in what order essentially all man-made structures will be disassembled, deconstructed and removed from the site. Large excavators will be the demolition workhorses. They can be outfitted with different implements – grappling jaws to remove wood and wall boards, shearers that act like scissors to cut metal, and jack hammers to break up concrete slabs.

NASA's goal for demolition is to remove structures and foundations up to a depth of five feet in a manner that is safe to on-site workers and local community members. "In addition to the general safe work practices for operations using heavy equipment, NASA is paying close attention to controlling fugitive dust and stormwater runoff," said NASA's SSFL Program Director Allen Elliott. Controlling dust during demolition is key given the size of the work area and climate in southern California. A number of best management practices and mitigation measures that control dust are spelled out in the demolition work plan. For example, spraying a fine mist into the air will suppress dust at the work site. Air monitors stationed at the work site will sound an alarm to notify workers when dust reaches a certain level in that area, and work will cease until levels are reduced.

NASA has conducted pre-demolition surveys on all buildings planned to be demolished, including a radiological survey using a conservative range for alpha, beta and gamma radiation. There were no detected radiation levels in the buildings, outside areas, or structures above what is considered natural background levels.

Demolishing buildings, supporting structures and test stands will generate approximately 95,000 tons of debris – the vast majority of it being steel and concrete. An Environmental Monitor will oversee that all materials including wiring, scrap metals, asphalt and concrete will be carefully segregated on site and surveyed for the type and level of any chemical or radiological contamination. [See side bar at left.] Hazardous and non-hazardous materials will be handled, packaged and transported to the appropriate facilities in accordance with safety precautions outlined by local, state and federal regulations. Some of the concrete, providing that it meets cleanup requirements will be crushed for use as on-site backfill. "Environmental stewardship is a priority for NASA and to that end materials from demolition will be recycled and reused, where possible, to reduce the amount being disposed of in landfills," said Elliott.

NASA recognizes there is public concern about waste being transported off site, especially with the volume of truck traffic. Trucks carrying demolition debris will generally travel down Woolsey Canyon Road to Valley Circle Boulevard; to Roscoe Boulevard; to Topanga Canyon Boulevard. From Topanga Canyon Boulevard trucks will either go north to the SR 118 or south to the US 101 depending on the location of the disposal facility. The demolition contractor is preparing a detailed Construction Transportation and Control Plan which includes a traffic control plan, parking plan, existing and construction traffic operations, motorist information strategies, truck safety plan, hazardous materials transport plan, and ridesharing plan. These safety measures will be strictly enforced to protect the public during demolition.

## Keeping the Past for the Future

NASA is committed to protecting human health and the environment throughout demolition activities as well as safeguarding the cultural legacy of the site. Workers involved in demolition are trained in identifying state- and federally-listed plant and wildlife species and cultural resources, and work would be suspended if these were encountered. For many years, NASA has been protecting sacred lands located at SSFL and will continue to do so during demolition. In addition, Native American Monitors will oversee field sampling, vegetation clearing, and ground disturbing activities in areas of archaeological concern. After demolition, all areas will be regraded and planted with a native seed mix to restore the site. NASA will update the National Register eligibility of any remaining structures or features, and will revise and maintain its cultural resources management plan.

NASA recognizes there is a great deal of public interest in the history of SSFL. The test stand structures played a significant role in our nation's history, and NASA has retained historical records and will extensively document the stands prior to demolition. Working with artifacts experts and interested community members, NASA is identifying, collecting and preserving special parts and representative pieces of the test stands. NASA is also gathering historical photos and narratives to be archived at the Library of Congress. Oral histories from former workers at SSFL tell of what it was like to work at the test stands during that historic time. These materials will be available to schools, museums and on the Web. The National Parks Service's Heritage Documentation Program is working with NASA and producing videos that feature virtual "fly-through's" of the Test Areas at SSFL. An example of one of these animated clips can be seen at <http://www.nps.gov/history/hdp/exhibits/multimedia/santa2.htm>.

Demolition is a necessary and important step towards completing the cleanup at SSFL. It has been preceded by careful planning to ensure the health and safety of workers, the public and the environment. Progress is being made and NASA remains committed to providing open and ongoing communication with the public.

**Interested  
in more  
information?  
Visit the  
SSFL Cleanup  
Website at  
[ssfl.msfc.nasa.gov](http://ssfl.msfc.nasa.gov)**

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