

Cadaver Dogs; a Search Tool for Locating Human Remains

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Law enforcement agencies have used specially trained canines in the search for crime victims and missing persons for over 25 years. The first dog trained specifically for cadaver searches was "Pearl", a Labrador Retriever trained and used by Trooper Jim Suffolk of the New York State Police Department.

The Connecticut State Police Department followed Trooper Suffolk's lead in 1977 and the use of these dogs rapidly proved worthwhile. Their initial efforts showed that these canines were able to detect the presence of human remains above ground, as well as bodies buried up to several feet deep.

Since those early days, the training methods have been refined. The well-trained cadaver dog is able to detect buried and surface remains, and can be used to search a scene for evidentiary items such as blood, or other evidence that is soiled with trace amounts of latent blood residue or other body fluids. During crime scene searches, canines have alerted on bodies buried up to eight feet deep, as well as scattered surface skeletal fragments many years after being deposited. Buried finds have been documented up to 35 years in criminal searches.

The animals have also been successfully used on archeological sites to pinpoint unmarked burials from the Colonial Period (17th century). Their indications assist with the mapping of ancient cemeteries, removal and relocation of the remains, or preservation of the locale.

The cadaver dog training program includes introducing the animal to a wide spectrum of chemical odors that are created during the process of human decomposition. The odors represent the scent spectrum from the time of biological death through the dry skeletal stage. Because the body liquefies during the decomposition process, these chemical by-products remain in the soil beneath and adjacent to surface and interred remains. Blind-testing experiments have been conducted with soil samples taken from graves dating back over 200 years. During these tests, the canines have had remarkable success locating these samples which were hidden among other "sterile" soil samples.

During the training, dogs are taught to give a pre-determined indication when the target odor is detected. The indication can be active; i.e. scratching or digging, or passive; i.e. sitting or laying down at the location of the strongest scent.

The uses for the canine teams have increased over the years. In addition to their primary function of searching for crime victims, working crime scenes for evidence, or attempting to locate a missing person, they are being used with increasing frequency for recovery of victims in disaster situations.

During the 1980's, canine teams began to be used in attempts to locate survivors after natural disasters. In 1987, Connecticut State Police teams responded to the collapse of the L'Ambience Plaza building in Bridgeport, CT. The teams arrived within two hours and the first night was spent searching for survivors. After hopes of finding survivors had faded, the teams were used to identify areas where victims were buried under eight floors of concrete and rubble. This pinpointing technique assisted with removal of the rubble and shortened the time needed to recover the twenty-eight victims.

Cadaver dog teams are also used in the search for victims after aircraft crashes. The dogs have proven that they can identify small fragments of flesh and bone scattered over wide areas, even through fumes from jet fuel, oil, and lubricants.

Following the tragic events of September 11, 2001, canine teams were used in New York City and Washington DC. These dogs were initially used to search for survivors. Once the remains recovery effort began, the dogs and handlers worked at "Ground Zero", the landfill, and during screening operations to locate partial remains.

At the Pentagon, the initial search for survivors was conducted by canine teams from the Federal Emergency Management Agency (FEMA) Task Force. Later, the recovery operation was staffed by both law enforcement and volunteer canine cadaver teams. They were used to perform the initial search of rubble removed from the building. When the dog indicated the presence of a portion of human remains, the fragments were collected and processed at the morgue. The operation involved thirty dog teams, seventeen veterinarians and technicians, three administrators, and fifteen police officers. According to an unofficial estimate, these personnel logged more than 4,151 hours during the operation.

The recovery operation for the World Trade Center was conducted at the landfill on Staten Island. For two weeks, volunteer canine teams worked on a 24 hour rotational basis scanning the rubble as it was delivered. Recovered fragments were delivered to pathologists and anthropologists working at the site. At present, no statistics are available regarding neither the number of teams involved, nor the total hours logged. However, volunteer teams responded to assist the recovery efforts from throughout the United States.

Working cadaver dog teams are normally affiliated with law enforcement agencies or volunteer search and rescue units located nation-wide.

At the present time, there are no military canine teams working in this specialty. However, in February 2003, personnel from the Joint Task Force-Full Accounting (JTF-FA) and the US Army Central Identification Laboratory-Hawaii (CILHI) will conduct a mission in Vietnam using Trooper Matthew Zarrella from the Rhode Island State Police with his search dogs, "Panzer" and "Maximus". They will be searching 16 sites in nine provinces, mostly ground-losses. This operation should allow JTF-FA and CILHI to determine the feasibility and effectiveness of using K-9 searchers to assist with the location and recovery of the remains of missing servicemen not only from the Vietnam Conflict, but also MIA's from WW2 and the Korean War.

Properly trained and utilized, these specialty canine teams provide an additional resource in the never-ending efforts to locate human remains.