Searching Contaminated Scenes for Evidence

By Deborah Palman, Maine Warden Service

Recently, I was called to search a homicide scene with my K-9. The detectives wanted my dog and I to locate some expended rifle shells. Since the Warden Service K-9 teams excel at finding expended shells, shot wads and other firearms related evidence, and evidence in general, we are sometimes called by Maine State Police Detectives to search for such evidence at outdoor homicide scenes. In this case, the detectives had already processed the area and found all the evidence they could that could be easily seen. The area included a long, icy driveway where one victim was killed while attempting to escape in his vehicle. Unfortunately, his vehicle got stuck in the snow bank where the suspect found him and shot him multiple times with a large caliber rifle. A number of other shots were fired in the nearby house where a woman was also killed. Information collected before I arrived indicated that around 10 shots were fired and the detectives had only recovered six shells. I was told that the suspect said he threw shells into the woods near the vehicle.

The vehicle was still stuck in the snow on the side of the driveway when I did my search. There was snow and ice on the ground, but it was somewhat hard and should not have let a shell melt down too far. The detectives had walked all around the area of the vehicle, the glass was shot out, and the vehicle contained considerable blood and some tissue. The body of the victim had been removed. Obviously, the vehicle and area of the vehicle contained considerable scent that would attract my dog, a certified cadaver dog as well as a certified evidence detection dog.

Warden Service K-9 teams face analogous situations when looking for expended shells at scenes were a large animal has been killed. Moose poachers will kill a moose and take the four quarters and the loins, leaving a large carcass and gut pile to rot. After a day or so, scavengers, including many canine scavengers, visit the area, feed, and scent mark, spreading more dog-attractive scent around. How do Warden Service K-9 teams search such a scene?

Passive Indication Required

It probably goes without saying that any dog being used to search homicide crime scenes, or any crime scene, should be trained to reliably indicate on evidence using a passive indication that does not disturb the evidence. This is to preserve DNA on the evidence, to
preserve the physical integrity of the evidence and for the safety of the dog and those in the area. My first dog retrieved evidence, but the when I heard about a Maine police dog that was searching at the scene of a robbery that dug a loaded and cocked revolver out of the snow, I was convinced to switch to a passive response. That was over 20 years ago. With the new emphasis on DNA as evidence, a passive indication on evidence has become essential to good police K-9 work.

Another advantage of a reliable passive response is that the handler can allow the dog work at a greater distance while searching. If the dog finds something, the dog should just stop searching, lie down (if that is the indication), and wait for the handler. Nearly every good evidence dog I know will work quite a distance from the handler if the dog smells evidence. It would be unwise for the handler to constantly call the dog back because often evidence is found outside the area the handler thinks is the crime scene. I can’t say how many times Warden Service handlers have come to me saying, “My dog found the shell across the road from where we were looking. And that was after I called him back three times.”

**Train with Distractions and Contamination**

All evidence search teams should practice in contaminated areas. While it isn’t convenient to create true homicide scenes at training (like cadaver work, it is hard to find volunteers for victims), road killed animals and expired blood bank blood can be used to create scent distractions. Handlers who find a dead animal in their patrol area in a place they can practice should throw some evidence around the dead animal and work a short problem. Teams should train in areas where other dogs have worked and dog elimination areas. Dogs that can search near a busy dog kennel business, for example, are properly conditioned to search in canine contaminated areas.

**Finding a Missing Item vs. Searching the Scene**

When searching a crime scene, teams should not be looking for just the missing items the detectives have not found. In reality, most requesting officers don’t think of K-9 until they think they are missing a key piece of evidence they can’t find. Officers and investigators should be requesting K-9 evidence teams every time they have to search large areas or areas with limited visibility. A crime scene search is really a search to recover all the evidence present, not just to find “X” or “Y” that is missing. Evidence searches should be thought of as covering or “clearing” an area of items the way a bomb dog works to search a building for explosives.
If K-9 teams practice advanced evidence searches by being told there are “X” items in a given area, then they are not doing problems that prepare them for real deployments. Training for real world evidence search should be to give teams an area with a number of items that are known to the trainer but not to the handler. This would include areas with no (zero) items. The K-9 team should search the area and report to the trainer what they have found, not just search until they find “X” number of items. The handler has to make sure the dog covers and searches the entire area. The teams’ effectiveness would be measured by the number of items they found vs. the actual number in the area.

To cover the entire area, handlers should have the dog search in a systematic pattern. I prefer to grid areas in lines perpendicular to the prevailing wind, moving upwind each time a new grid line is walked. This gives the dog the best advantage in uncontaminated environments. The width between the grid lines the handler walks depends on the scenting conditions and the size or “smelliness” of the article being searched for. For example, search for a penny would require that the dog search every foot or so, where as looking for a shotgun would mean searching every 20 feet or greater.

**Keeping Track of the Dog**

The handler has to keep track of the dog in case the dog indicates at a distance or moves too far away. At the homicide scene, it was dusk when I got there and I ended up doing three quarters of the search after dark. The area was thick with brush and trees and we were not far from a paved highway where the dog was in danger of being hit by cars. In a case like this, I put a lighted collar and a bird dog beeper collar or bell on my dog. The lighted collar I have is made by Auroralites (see [www.auroralites.com](http://www.auroralites.com)) and the bird dog collar is one of the types used by pointing dog owners to keep track of their dog. The beeper collars have selectors that allow the handler to have one type of beep when the dog is moving (like double, short beeps every 5 seconds) and another beep when the dog is stationary (like single beeps every second). I got the beeper collar for cadaver work and search and rescue work because it allows me to keep track of the dog’s location while he is moving and if he might be indicating passively at a distance (stationary). I have also lost some hearing due to shooting and snowmobiling, so the volume and tone of the collar are a help. The collars sound like a back up beeper on a truck. I often
use a bell on the dog, but I can’t hear it as well and they only sound when the dog is moving. Once the dog indicates passively, you can’t locate a dog wearing a bell unless you can see the dog.

Having a way to locate the dog in the dark and in thick cover makes a tremendous difference. Without such locaters, the handler has to either try to chase after the dog and keep the dog in the flashlight beam (try that in thick bushes and icy ground) or constantly call the dog back into the area the handler can observe. By constantly calling the dog back, the handler is almost guaranteed to call the dog off a find. While my dog can take being called back constantly (eventually he just ignores me and searches on his own), more sensitive dogs may shut down and quit searching if they are nagged by the handler too much.

**Searching a Scene with Distractions**

When approaching a scene with a major distraction in the area, the handler should take the dog up to the distraction on lead and show it to the dog in a controlled manner. The dog is allowed to satisfy his curiosity and see what the big stink is so he won’t be as tempted to visit it on his own. If the dog likes mark, roll in, or eat the distraction, this tendency can be corrected while the dog is on lead and under control to get the point across that this will not be allowed when the dog is working.

Dogs have an extraordinary sense of smell, so no matter how much the carcass or distraction stinks to them, they can easily find evidence in the scent cloud. The problem with searching for evidence is keeping the dog focused on the task (find the evidence) rather than to go visit the wonderful distraction they can smell upwind. This problem is faced by all dog handlers who do scent work, whether it is tracking, evidence, or detector specialty training. Keeping the dog focused around distractions is done by proper scent work training; proper obedience to the handler (established by overall good handling and training) and deploying the dog in such a way that the handler maximizes his ability to influence the dog when he knows the dog will be distracted.

In the case of the scent-filled distraction, the handler should deploy the dog so that the dog is searching away from the distraction with the handler between the dog and the distraction. This might lead to a radial type search, or a series of searches that fan out away from the distraction. A circular pattern with the handler on the distraction side is also a possibility. To do this, the handler will have had to: 1) practice searching upwind, downwind and cross the wind during training, 2) have good control of the dog to be able to call it back off
have trained a way to direct the dog to search in a particular area close to the handler. Teaching the dog to search close in a particular place is easy: throw food treats or a reward in the grass and point to them or snap your fingers over the area until the dog comes over, investigates, and finds the treats or reward. I use finger snapping as a close search signal, which worked for me until the homicide scene described above where it was too cold to have bare hands. At that scene, I had to rely on pointing and talking.

It is possible to train a dog to search with a long line close to the handler. Unfortunately, this only works well in areas without any line tangling vegetation. Also, most dogs have to be free to range well to be effective in searches that cover ground. However, working on line is a possibility if no other option exists, such as on the shoulder of a busy highway. Handlers may elect to search the area near a distraction on line, and then go off line away from the distraction.

The Results of the Search

I would like to be able to tell you that the dog and I followed all the steps above, performed the perfect search, and came up with crucial evidence for the homicide case. Unfortunately, that wasn’t what happened. We did search the scene thoroughly a “shell’s throw” away from the driveway and areas where the suspect had been. The only area I felt that I did not cover well with the dog was the deep disturbed snow and area right around the vehicle. I told the detectives that the area should be worked with a metal detector after the vehicle was towed.

So what happened to the missing shells? I don’t know yet. I do know that they probably weren’t in the woods by the vehicle or anywhere near the residence or driveway because I know the capabilities of my dog in this type of search under those conditions. Later I heard from another person associated with the investigation that the suspect said that he pocketed some of the shells and that they may have fallen out of his pocket.

My own and other Warden Service K-9s have found evidence at homicide scenes that did prove crucial to other homicide cases. In one case, Sgt. Roger Guay and Reba thoroughly searched an outside shooting scene and did not find any shells. The defendant’s story was that the victim shot at the defendant before the defendant killed the victim. The defendant claimed that the shells from the victim’s gun were left at the scene, not knowing that a trained and certified K-9 with a long list of successful searches for shells at had been used to search the area. Sgt. Guay was called to rebut the defendant’s story by testifying that they did not find any shells that could have been left.
by the victim. The defendant was convicted. Sometimes what is not found is more important than what is found at a crime scene.