Types of evidence in criminal investigation

Collecting the Evidence

Collecting evidence from a crime scene is a crucial aspect of solving crimes. Before evidence can be seized, there must first be a court order approving the search of the crime scene and the seizure of the evidence found at the scene. Standard protocol for officers is for them to always use latex gloves, avoid plastic bags, double wrap small objects, package each object separately, and to collect as much evidence as possible. It is better to have too much evidence than to not have enough. There are countless amounts of evidence that can be found at a crime scene.

Blood stains are one type of evidence that can be found at a crime scene. Blood that is still in the liquid form should be picked up on a gauze pad. Once the blood is dried thoroughly it should be refrigerated and sent to the Laboratory (Andrus et al., n. d., para. 1). If the blood stain is found dried on clothing, the officer should wrap the piece of clothing in clean paper and place it in a sealed and labeled container. An object with dried blood stains needs to be sent to the Laboratory if it is small enough. If the object is too large to send, then using a clean knife the stain needs to be scraped onto a clean piece of paper, which then can be folded and placed in an envelope (Andrus et al., n. d., para. 2). When collecting autopsy blood samples, the officer should request that the pathologist obtain the sample directly from the heart and place it in a yellow or purple stoppered vacutainer. If the victim is still alive but in serious need of a blood transfusion, then the pre-transfusion blood sample needs to be obtained promptly before the hospital discards it (Andrus et al., n. d., para. 4). It is important for the Laboratory to receive all blood samples within 48 hours or the samples may be useless.

Another type of evidence that can be collected at a crime scene includes seminal stains. These are most commonly found on clothing, blankets, and sheets. Similar to liquid blood stains, seminal stains need to be air dried before being packaged and sent to the Laboratory (Andrus et al., n. d., para. 10). Victims in sex offense cases should always be examined by a physician. The physician uses a Sexual Assault Evidence Collection Kit to collect evidence directly from the victim.

Hair samples can also be found at crime scenes. Collecting hair can be made easier by using tweezers. The collected hair should be placed in coin envelopes then folded and sealed in larger envelopes. If hair is found attached to an object, the officer should leave the hair intact and package the entire object (Andrus et al., n. d., para. 13). In an attempt to collect the ideal 50 to 100 head hairs or 30 to 60 pubic hairs wanted for rape cases, the victim or suspect should bend over a large sheet of clean paper and rub their hands through their hair (Andrus et al., n. d. para. 15). The loose hair will fall out on the paper and can then be collected.

Collected fibers and threads are another type of evidence found at a crime scene. Such evidence is most commonly found caught in torn materials. Once collected, the officer should put the sample in a paper bindle that is then placed in a sealed and marked coin envelope. If the fibers are short or are few in number, the officer should send the entire area containing the fibers to the Laboratory (Andrus et al., n. d., para. 19). Any clothing from which the collected fibers or threads may have originated from must also be packaged and sent to the Laboratory.

Glass is commonly found at crime scenes. Small glass fragments should be placed in paper bindles which should then be put in a marked and sealed coin envelope. Large glass fragments should be placed in boxes with cotton or tissue to prevent the fragments from breaking during shipment (Andrus et al., n. d., para. 23). If a small broken window is found, the officer should send the whole window to the Laboratory. If the window is large, the officer should send in individual samples from different areas of the window. However, the whole broken window may be necessary if the glass samples are large enough to match the broken edges (Andrus et al., n. d., para. 24). For auto glass and auto headlights, the officer should send any remaining broken pieces along with the new lens to the Laboratory. It is important that all glass found at the scene be recovered and sent to the Laboratory. Any objects that may have been contaminated with glass should be wrapped in paper and also sent to the Laboratory for examination (Andrus et al., n. d., para. 26). Glass from a distance away may also need to be collected depending on the crime being investigated.

The entire fire scene in arson cases should be examined in search for flammable fluids. Flammable fluids may have been placed in other locations around the scene so it is important to extend the search to areas around the scene where burning did not occur. Wood can be used to detect traces of the fluid it should be sent to the Laboratory for examination. Officers should pour a small amount of found volatile liquids into an airtight glass. Small objects containing the flammable fluid should be placed in small sealed metal cans. If the samples are too large for cans they should be placed in heat-sealed KAPAK plastic before being sent to the Laboratory (Andrus et al., n. d., para.

45). Examiners can still detect flammable fluids on burnt objects, so as long as the object is not charred they should be sent to the Laboratory.

There are many pieces of firearms evidence that can be found at a crime scene. First thing to know is that the only time a loaded weapon can be submitted to the Laboratory is if it is hand delivered. All magazines should be removed from the weapon, but unfired cartridges may be left in the magazine (Andrus et al., n. d., para. 47). Officers need to record the serial number, make, model, and caliber of the weapon. The weapon should then be placed in a strong cardboard or wooden box and sent to the Laboratory (Andrus et al., n. d., para. 49). Bullets and cartridge cases should be wrapped in paper and sealed in pill boxes before being sent. Ammunition, powder, and gunshot residue need to be recovered quickly and gingerly to prevent contamination.

Tool marks can also be evidence found at a crime scene. This type of evidence can either be impressions left by the tools on objects, or the physical tool itself. The recovered tools should be wrapped in paper and packaged before shipping to the Laboratory. Send in the whole object containing the tool marks if it is small enough. If it is not possible to send in the entire object, photographs and sketches of the area containing the mark need to be taken and sent to the Laboratory (Andrus et al., n. d., para. 53).

Latent fingerprints are commonly found at crime scenes. Most fingerprints will be found on paper, glass, metal, or other smooth surfaced objects. When picking up the objects it is important for the officer to touch as little as possible and in areas least likely to contain prints so that they will be less

likely to smear the prints. Large objects should be fastened down with string on wood or heavy cardboard (Andrus et al., n. d., para 53). Papers and documents need to be individually placed in a cellophane or manila envelope which needs to be placed in between two sheets of cardboard paper. It can then be placed in a box for mailing.

The amount of evidence can either help win or lose a case. Every crime scene has evidence available for officers to collect. It is important for them to know what the standard protocol is for collecting evidence and how to properly collect it without contamination.

References

Andrus, R., Bailey, J., Sprague, T., Springer, F., Tulleners, F., Wiersema, S., et al. (n. d.). *Crime Scene Investigator Network: Evidence Collection Guidelines.* Retrieved January 15, 2014, fromhttp://www. crime-scene-investigator. net/collect. html#1