The Prosecutor’s Perspective

On a daily basis, police departments across the country receive a constant stream of 911 domestic violence calls where victims report being threatened, pushed, slapped, kicked, punched, choked, stabbed or even shot. Some agencies report that as much as 40 percent of all their 911 calls are domestic violence related.

In March 1995, Casondra, a 17-year-old girl, made such a 911 emergency call to the San Diego Police Department. She reported being choked by her 21-year-old former boyfriend. Police were dispatched immediately and arrived at the scene within minutes. When the police arrived, the victim was recanting and her injuries were fading. Redness to the neck was all the officers could see. The suspect immediately claimed self-defense and the victim refused to give any additional statements. She emphatically begged for her former boyfriend to just leave her and her 18-month-old son alone. No arrest was made due to the lack of independent corroboration. However, the police dutifully took a report of the incident and submitted it to the Domestic Violence Unit of the San Diego Police Department for further investigation. The detectives followed up with the victim and offered her referrals and information about domestic violence. The case was subsequently closed. A week later, her former boyfriend stabbed her to death in front of her stunned friends.

Six months later, Tamara, another teenager, died as a result of domestic violence. She was 16 years old, pregnant, and the mother of an 18-month-old girl. She was found dead in a dirt field, having been strangled to death and then set on fire by her 18-year-old former boyfriend.

The deaths of these two teenagers were shocking and a sobering reminder of the reality of teen relationship violence. The abrupt deaths of these two teenagers drove San Diego to action. It also drove San Diego City Attorney Casey Gwinn, the misdemeanor prosecutor in the city of San Diego, to study existing strangulation cases being prosecuted within his office. We learned that on a regular basis victims had reported being choked, and that in many of those cases, there was very little visible injury or evidence to corroborate the “choking” incident.

The lack of physical evidence caused the criminal justice system to treat many “choking” cases as minor incidents, much like a slap on the face where only redness may appear.
We set ourselves on a course to find out as much as we could about strangulation and how to improve our response.

Below we will discuss the results of our study of misdemeanor strangulation cases, the medical perspective of strangulation cases, tips on how to improve the documentation, investigation, and prosecution of attempted strangulation cases.

**The Strangulation Study**

The initial study consisted of 100 strangulation cases, which were selected at random from police reports submitted over a five-year period. The first 100 victims were all women who reported being choked by their partners with bare hands, arms, or objects such as electrical cords, belts, rope, bras, or bathing suits. In one case, a victim reported that her boyfriend put a plastic bag over her head and tried to suffocate her. There was a history of domestic violence in 90 percent of the cases, and children were present in at least 50 percent of the cases.

Focusing on the visible signs of strangulation, we found that police officers reported no visible injuries in 62 percent of the cases. Minor visible injuries, such as redness or scratch marks, were reported in 22 percent of the cases, but often injuries were too minor to photograph. Significant visible injuries, such as red marks, bruises or rope burns, were found in 16 percent of the cases. While these injuries were significant enough to photograph, the majority of those photographs were unusable because they were blurry or washed out from the flash. This suggested a need for police officer training in close-up photography. Victims sought medical attention in only 3 percent of the cases, primarily due to persistent pain, voice changes, or trouble swallowing.

Focusing on the symptoms reported by victims and documented in police reports, we found victims often reported pain to their throats or hoarseness. Other victims reported nausea, loss of consciousness, hyperventilation, defecation, uncontrollable shaking, or loss of memory. In one case, the victim had a miscarriage within 24 hours of being strangled.

Overall, many of the police reports neglected to clearly document how the victim was strangled, for how long, what threats were being made, or what symptoms the victims were experiencing. Sadly, our study showed that unless the victim had significant visible injuries or complained of continuous pain requiring medical attention, the police handled the incident as though she had been slapped in the face, rather than having been strangled.

Further, the victims often failed to mention their symptoms or declined medical attention, even when they were having difficulty breathing. Suspects often minimized the violence
for many different reasons. For some, choking was just another form of physical violence, like pushing, and it was very normal to choke their victims.

Because of the lack of physical evidence, many police officers and prosecutors were of the mind set that “choking” cases could not be prosecuted. Without injury, we believed there was insufficient probable cause for an arrest or insufficient evidence for a conviction. *We were wrong!*

At that time, training on attempted strangulation cases was not being offered at the academy or at domestic violence conferences. Today domestic violence professionals are being trained on what questions to ask, what symptoms to look for, what information to document, how to take close-up photographs, and how to use medical experts.

**The Medical Perspective**

Strangulation is defined as a form of asphyxia (lack of oxygen) characterized by closure of the blood vessels and/or air passages of the neck as a result of external pressure on the neck.\(^1\) The three forms of strangulation are hanging, ligature, and manual. Almost all attempted or actual homicides by strangulation involve either ligature or manual strangulation. Ten percent of violent deaths in the U.S. each year are due to strangulation, six females to every male.

Ligature strangulation is strangulation with a cord-like object (also referred to as garroting), and may include anything from a telephone cord to articles of clothing.\(^2\) Manual strangulation (throttling) is usually done with the hands, but notable variants include using the forearms (as when police officers use the carotid restraint) and standing or kneeling on the victims throat.\(^3\) Manual self-strangulation is not possible, because when the individual loses consciousness, pressure can no longer be applied.

A rudimentary knowledge of neck anatomy is critical in order to understand the clinical
features of a strangled victim. The hyoid bone, a small horseshoe-shaped bone in the neck, helps support the tongue. The larynx, made up of cartilage, not bone, consists of two parts—the thyroid cartilage (so-called because it is next to the thyroid gland) and the tracheal rings.

Carotid arteries are the major vessels that transport oxygenated blood from the heart and lungs to the brain. These are the arteries at the side of the neck that persons administering CPR (cardio-pulmonary resuscitation) check for pulses. Jugular veins are the major vessels that transport deoxygenated blood from the brain back to the heart.

The general clinical sequence of a victim who is being strangled is one of severe pain, followed by unconsciousness, followed by brain death.

The victim will lose consciousness by any one or all of the following: blocking of the carotid arteries (depriving the brain of oxygen), blocking of the jugular veins (preventing deoxygenated blood from exiting the brain), and closing off the airway, causing the victim to be unable to breathe.

Only eleven pounds of pressure placed on both carotid arteries for ten seconds is necessary to cause unconsciousness. However, if pressure is released immediately, consciousness will be regained within ten seconds. To completely close off the trachea, three times as much pressure (33 lbs.) is required. Brain death will occur in 4 to 5 minutes, if strangulation persists.

**Unconsciousness within seconds – death within minutes.**

**It’s Not Just a Slap In the Face!**

### Signs and Symptoms

Symptomatic voice changes will occur in up to 50 percent of victims, and may be as mild as simple hoarseness (dysphonia) or as severe as complete loss of voice (aphonia).

Swallowing changes are due to injury of the larynx cartilage and/or hyoid bone. Swallowing may be difficult but not painful (dysphagia) or painful (odynophagia). Breathing changes may be due to the hyperventilating that normally goes hand in hand with a terrifying event, but more significantly may be secondary to an underlying neck injury. The victim may find it difficult to breathe (dyspnea) or may be unable to breathe (apnea). It is critical to appreciate that although breathing changes may initially appear to be mild, underlying injuries may kill the victim up to 36 or more hours later due to decompensation of the injured structures.

Mental status changes may manifest early as restlessness and combativeness due to temporary brain anoxia and/or severe stress reaction, and subsequent resolve. Changes can also be long-term, resulting in frank psychosis and amnesia.

Objective signs noted in strangulation victims include involuntary urination and
defecation. Miscarriages have been anecdotally reported occurring hours to days later.

Visible injuries to the neck include scratches, abrasions, and scrapes. These may be from the victim’s own fingernails as a defensive maneuver, but commonly are a combination of lesions caused by both the victim and the assailant’s fingernails. Lesion location varies depending on whether the victim or assailant used one or two hands, and whether the assailant strangled the victim from the front or back.

Three types of fingernail markings may occur, singly or in combination—they are: impression, scratch, and claw marks. Impression marks occur when the fingernails cut into the skin; they are shaped like commas or semi-circles. Scratch marks are superficial and long, and may be narrow or as wide as the fingernail itself. Claw marks occur when the skin is undermined; they tend to be more vicious and dramatic appearing. Because most victims are women, the scratches caused by their longer nails frequently are more severe than the scratches caused by assailant’s. Claw marks may be grouped, parallel markings vertically down the front of the neck, but often are scattered in a random fashion.

Redness (erythema) on the neck may be fleeting, but may demonstrate a detectable pattern. These marks may or may not darken to become a bruise. Bruises (ecchymoses or purpura) may not appear for hours or even days. Fingertip bruises are circular and oval, and often faint. A single bruise on the neck is most frequently caused by the assailant’s thumb. However, bruises frequently may run together, clustering at the sides of the neck, as well as along the jaw lines, and may extend onto the chin, and even the collar bones (clavicles).

Chin abrasions are also common in victims of manual strangulation, as the victim lowers the chin in an instinctive effort to protect the neck, and in so doing, scrapes the chin against the assailant’s hands.

The tiny red spots (petechiae) characteristic of many cases of strangulation are due to ruptured capillaries—the smallest blood vessels in the body—and sometimes may
be found only under the eyelids (conjunctivae). However, sometimes they may be found around the eyes in the peri-orbital region, anywhere on the face, and on the neck in and above the area of constriction. Petechiae tend to be most pronounced in ligature strangulation. Blood red eyes (subconjunctival hemorrhages) are due to capillary rupture in the white portion (sclera) of the eyes. This phenomenon suggests a particularly vigorous struggle between the victim and assailant.

Ligature marks (e.g., rope burns) may be very subtle, mimicking the natural folds of the neck. They may also be much more dramatic, reflecting the type of ligature used, e.g., the wave-like form of a telephone cord, or the braided pattern of a rope or clothesline. If the victim has been strangled from behind, the impression from the ligature generally will be horizontal at the same level of the neck. This may be of use to differentiate the ligature mark from strangulation from the pattern left from a hanging. In a hanging, the ligature mark tends to be vertical and teardrop shaped, with the knot at the nape of the neck, directly in front or behind the ear or up under the chin. To further differentiate strangulation by ligature from strangulation by hanging, the mark on the neck in ligature is usually below the level of the thyroid cartilage (“Adam’s apple”) while in hanging, it is usually above. Finally, in strangulation by ligature, the hyoid bone and/or thyroid cartilage are often fractured, whereas in hanging, these are usually intact.

Ligature marks are a clue that the hyoid bone may be broken. As a general rule, on a post mortem exam, if a hyoid bone is fractured the death will be a homicide from strangulation until proven otherwise. However, because the two halves of the hyoid do not fuse until age 30, the hyoid may not break in younger victims who die as the result of strangulation. One third of manual strangulation victims have fractured hyoids.

Swelling (edema) of the neck may be caused by any one or combination of the following: internal bleeding (hemorrhage), injury of any of the underlying neck structures, or fracture of the larynx allowing air to escape into the tissues of the neck (subcutaneous emphysema).

Lung damage may be due to vomit inhaled by the victim during strangulation. This may lead to aspiration pneumonitis—a very serious condition as the gastric acids begin to digest the lung tissue. Milder cases of pneumonia may also occur hours or days later. The lungs may also fill with fluid (pulmonary edema) due to complex pathological processes that may arise from direct pressure placed on the neck.

Lastly, victims may have no visible injuries whatsoever, with only transient symptoms, yet because of underlying brain damage by lack of oxygen during the strangling, victims have died up to several weeks later. Because these hidden consequences of strangulation may appear minor, officers at the scene should radio for medics for a medical evaluation of all victims who report being strangled.
The Training Curriculum

Realizing that untrained officers and prosecutors may fail to recognize the seriousness of attempted strangulation when victims survive, training was developed to assist professionals to identify the signs and symptoms common in strangulation cases.

Thanks to the help of many individuals, such as detectives, prosecutors and physicians, many of those practical tips are listed below.

Practical Tips

1. Treat your Strangulation Cases Seriously.

Start by using the word “strangle” as opposed to the word “choke”. “Strangle” means to obstruct seriously or fatally the normal breathing of a person. On the other hand, “choke” means having the windpipe blocked entirely or partly by some foreign object like food. Once a victim reports being strangled, treat the case as a felony not a misdemeanor. The case should be taken seriously and investigated as if it were an attempted homicide or aggravated assault case. Do not be misled by the lack of visible injuries. Remember the victim may be suffering from internal injuries. If you treat the case seriously so will everyone else, including the victim. Most states have aggravated assault crimes. In California, it is appropriate to charge a defendant who strangled someone with felony assault with a deadly weapon (Penal Code section 245(a)), even when the victim only has redness on her neck or throat pain. It is also appropriate to arrest a suspect for attempted felony spousal abuse under Penal Code section 273.5.

2. Conduct a Thorough Interview and Investigation at the Scene.

As discussed above, there are many ways a perpetrator can strangle a victim. The level of injuries and symptoms will depend on many different factors including the method of strangulation: the age and health of the victim, whether the victim struggled to break free, the size and weight of the perpetrator, the amount of force used, etc. Therefore, it is important to ask the victim to demonstrate how she was strangled and to ask follow-up questions that will elicit specific information about the signs and symptoms of strangulation.

3. Use Follow-up Questions.

For Method and/or Manner:

- Ask the victim to describe and demonstrate how she was strangled. (One or two hands? Forearm? Object?) Document points of contact and photograph method of strangulation.

- How long did the suspect strangle the victim?

- How many times and how many different methods were used to strangle the
victim?

- On a scale from one to ten, ten being the most pressure, how hard was the suspect’s grip?

For Identifying Visible Injuries:

- Look for injuries behind the ears, all around the neck, chin, jaw, eyelids, shoulders and chest area. (Any scratch or ligature marks, bruising, tine red spots, swelling?)

For Evidence Gathering:

- Does she have pain? Does she believe she may have injuries that are not visible? (Head injuries, hidden by clothes)
- Was an object used to strangle the victim? (Locate, photograph, and impound the object.)
- Was any property damaged? (Drywall damaged from victim’s head?)
- Any medical treatment recommended or obtained? If so, obtain medical release.

For Identifying Symptoms and/or Internal Injury:

- Was the victim shaken simultaneously while being strangled?
- Was the victim thrown against the wall, floor, or ground? Describe surface.
- Did the victim have difficulty breathing or hyperventilate?
- Any complaint of pain to the throat?
- Any trouble swallowing?
- Any voice changes? Complaint of a hoarse or raspy voice?
- Any coughing?
- Did the victim feel dizzy, faint, or lose consciousness?
- Did the victim urinate or defecate as a result of being strangled?
- Was the victim pregnant at the time?
- Did the victim feel nauseated or vomit?
For Establishing Motive, Intent and Anticipating Minimization/Recantation:

- What did the suspect say when he was strangling the victim? Use quotes.
- Ask the victim to describe the suspect’s demeanor and facial expression.
- If an object was used, determine if the suspect brought the object to the crime scene. (This information may be used to show premeditation).
- What did the victim think was going to happen? (Did she think she was going to die?)
- What caused the suspect to stop? (Did she pass out? Witness(es) intervene?)
- Any prior incidents of strangulation?
- Any pre-existing injuries?

To Eliminate Defenses/Excuses (Self-Inflicted Injury, Self Defense, Prior Injury):

- Determine if the suspect was wearing any jewelry, such as rings or watches? Look for pattern evidence.
- Any injuries to the suspect (face, neck, arms, hands)? Take photos of suspect.
- Did she protect herself?

As indicated above, this article focuses on attempted strangulation cases. For an excellent article on investigating homicide strangulation cases, A Guide to the Physical Analysis of Ligature Patterns in Homicide Investigations by Brent E. Turvey, MS, Winter, 1996. He can be reached for comment or consultation by contacting: Knowledge Solutions, 1271 Washington Avenue #274, San Leandro, CA 94577-3646. Phone 510-483-6739.

A quick reference sheet of questions is provided at the end of this article.

4. Look for Injuries.

The victim may be embarrassed or minimize the incident. Look for injuries around the eyes, under the eyelids, nose, ears, mouth, neck, shoulders, and upper chest area. If injuries are present, look for redness, scratches, red marks, swelling, bruising, or tiny red spots (petechiae) that arise from increased venous pressure.

5. Take Plenty of Photographs and Follow-up Photographs.
Take the following photographs:

- **Distance photo** - one full body photograph of the victim from a distance will help identify the victim and the location of the injury.

- **Close-up photo(s)** - multiple close-up photographs of the face, neck area (front, back, and sides of the neck) at different angles will make it easier to see the injuries clearly.

- **Follow-up photos** - taking follow-up photographs of the injury 24, 48 and 72 hours later will document the injuries as they evolve over time and maximize your documentation. It is also helpful to place a non-glare ruler in the same plane of the injury to accurately measure the size of the injury or injuries.

Most agencies take Polaroid or 35 mm photographs. In 1996, thanks to the support from Polaroid, 1600 Law Enforcement Camera Kits were purchased by police officers and sheriff deputies at a dramatic savings. With the training Polaroid provided on close-up photography, we saw immediate improvement in the quality of photographs being taken by officers and an increase of prosecution involving attempted strangulation cases.

Some agencies use infrared and ultraviolet photography to document strangulation injuries. Infrared images can detect unseen bleeding below the skin surface, particularly in dark-skinned victims. Ultraviolet photography renders fine surface detail and can discover subtle injuries. Ultraviolet can also record old, completely invisible healed injuries. These techniques are used by Lt. James O. Pex, Oregon State Police, Coos Bay Forensic Laboratory, and Dr. Mike West, DDS, Coroner and Chief Medical Examiner Investigator, Forrest County Mississippi. Lt. Pex uses four photographic techniques in domestic violence cases: color photography, alternative light source (narrow band light source) photography, reflective ultraviolet (UV) photography, and infrared (IR) photography.

6. **Take Care to Identify the Dominant Aggressor.**

Frequently, in attempted strangulation cases there are claims of mutual combat or self-inflicted injuries. Because victims fear for their lives, they may protect themselves by pushing, biting, scratching, or pulling their own hair.

Depending on the method of strangulation being used, the suspect may be the only individual with visible injuries.

For example, if the suspect is strangling the victim from behind and using a chokehold, the victim may protect herself by biting the suspect in the arm. If the suspect is manually strangling the victim from the front (face to face), she may either push him away, scratch him, or pull his hair.

When officers arrive at the scene, they may find the suspect with visible injuries and
the victim with no visible injuries. If both parties claim self-defense, officers need to avoid the temptation just to arrest the person who is perceived to have won the fight or the person with no injuries. Special care must be taken to identify the dominant aggressor. Also consider the following factors:

1. Height/weight of the parties.

2. Who is fearful of whom.

3. Detail of statement and corroboration.

4. History of domestic violence, assaults, or criminal history.

5. Use of alcohol or drugs.

6. Whether either party is subject to a restraining order or on domestic violence probation.

7. Pattern evidence.

8. Injuries consistent with reported statement.

9. Examine hands for any hair, blood, fiber, or evidence of epithelial cells after strangulation (fingernail scrapings).

10. Signs of symptoms of strangulation.


7. **Encourage the Victim to Seek Medical Attention.**

As discussed above, there may be internal injuries to the victim that may later cause complete obstruction several hours after an injury.\(^{24}\) We recommend that patrol officers request paramedics to be dispatched to the scene to conduct an initial screening of the case. The medical examination will usually prove very helpful. It may enhance the case, as in one of our cases where the police report indicated “red abrasions to the neck” and the medical records indicated “she had multiple linear contusions to both sides of her neck with overlying redness, mild edema and tenderness.” Or, you may even save a life. It is better to intervene at the misdemeanor level than to wait until the violence escalates to a serious felony or a homicide. It is better to be safe than sorry.

8. **Note Your Experience in Your Report.**

As in other criminal cases, we encourage patrol officers to note in their police reports their experience and training in domestic violence cases and strangulation training in particular. For example—
Based on my experience and training, I know strangulation can cause serious injury. Unconsciousness can occur within seconds. Death can occur within minutes. The symptoms and injuries in this case are consistent with someone being strangled. I strongly encouraged the victim to seek medical attention. The elements of (list crime) are present for felony prosecution.

9. **Obtain Copies of Your 911 Tapes.**

Because at least 50 percent of strangulation victims experience voice changes, it is important to obtain a copy of the 911 tape. If the victim called 911 to report the incident, you may have evidence of her voice changes.

10. **Tape Record Your Follow-up Investigations.**

As a result of the strangulation training, San Diego Police detectives have noted that in approximately 8 out of 10 cases victims report changes in their voices. Based on this anecdotal evidence, it is important to tape record or videotape your follow-up investigation to document voice changes for later evaluation by your medical experts.

11. **Use Forensic Investigators and/or Nurses.**

As a pilot project, involving attempted strangulation cases, the San Diego City Attorney’s Office has enlisted the help of a forensic nurse. She has helped with follow-up examinations, taking follow-up photographs, and interpretation of medical records, the significance of signs and symptoms in our strangulation cases.

12. **Use Expert Witnesses at Trial.**

Even when the victim has not obtained medical treatment, it is important to use medical experts at trial in order to educate the jury and the judge about the seriousness of strangulation. Jurors and judges need to know that strangulation can cause unconsciousness within seconds and death within minutes. They also need to know that symptoms are important evidence of strangulation and that victims can die from strangulation without the presence of a single mark.

Expert testimony is admissible on a “subject that is sufficiently beyond common experience that the opinion of an expert would assist the trier of fact.” *(California Evidence Code section 801.)*

Expert witnesses can be used for various reasons, including teaching the jurors about medical, technical, or scientific principles or expressing an opinion after evaluating the significance of the facts of the case.

Ultimately the judge will decide whether a witness is qualified as an expert to express an opinion on strangulation. Recently in a misdemeanor attempted strangulation case prosecuted by our office in June 2000, Judge Bonnie Dumanis allowed evidence on
on attempted strangulation through the testimony of Detective Mike Gulyas. Detective Gulyas qualified as an expert based on his experience as domestic violence detective, the strangulation training he received in 1996 and his experience in conducting numerous investigations involving attempted strangulation. The case resulted in a guilty verdict.

**Below are some areas you may want to check on in order to lay the foundation for your expert's qualifications:**

1. Education
2. Training
3. Licenses and certificates
4. Work experience
5. Teaching experience
6. Published writings
7. Professional organizations
8. Previously qualified as an expert witness.

**Below are some questions about attempted strangulation:**

1. Have you had the opportunity to examine patients who have reported being strangled?
2. Are you familiar with the signs and symptoms of strangulation? Describe them.
3. Are you familiar with the methods of strangulation? Describe them.
4. Would a chart help you explain those symptoms and methods?
5. How does a victim lose consciousness from strangulation?
6. How does death occur from manual strangulation?
7. How long would it take to manually strangle someone to death?
8. Is it possible to strangle someone to death without leaving any marks?
9. Are you familiar with the injuries and symptoms of the case and how?
10. Have you had the opportunity to review the police report, 911 tape, paramedic run sheet, medical records?
11. In your opinion, are the signs and symptoms, consistent with strangulation?

Below are questions for your medical examiner (courtesy of San Diego County Deputy District Attorney Dan Goldstein):

1. Are you a medical examiner?
2. How long have you been a medical examiner?
3. What specific training goes into becoming a medical examiner?
4. What are your duties?
5. What is an autopsy?
6. How many autopsies have you conducted in your career?
7. Have you testified in court?
8. What is a witnessing pathologist?
9. Were you the witnessing pathologist on *** during an autopsy of the victim?
10. Who was the pathologist?
11. Did you review the pathologist’s report?
12. Please describe the external trauma of the victim that you saw.
13. Ask the witness to describe photos and injuries.
14. Ask the witness to describe any injuries to the eyes, face, and mouth.
15. Ask the witness to describe internal injuries.
16. What was the cause of death?

What are the reasons you believe the victim died from strangulation?
Conclusion

Today, we know that strangulation is one of the most lethal forms of domestic violence: **unconsciousness may occur within seconds and death within minutes.** Victims may have no visible injuries whatsoever and yet because of underlying brain damage by lack of oxygen during the strangling, victims may have serious internal injuries or die days or several weeks later. When domestic violence perpetrators use strangulation to silence their victims, not only is this felonious assault, it can be an attempted homicide. Strangulation is also a form of power and control, which can have a devastating psychological effect on victims in addition to a potentially fatal outcome.

The change came in 1995 from the tragic deaths of 17 year-old Casondra Steward and 16 year-old Tamara Smith. Not wanting to let Tamara and Casondra die in vain, San Diego City Attorney Casey Gwinn authorized a study of 300 misdemeanor “choking” cases. The study uncovered a particular pattern of signs and symptoms. We also learned that visible injuries were uncommon.

To understand the medical significance from the findings of the study, the City Attorney’s Office enlisted the help of Dr. George McClane, a local specialist in emergency room medicine. This legal-medical partnership in late 1995 subsequently evolved into a national education campaign which is now helping thousands of domestic violence professionals to improve their investigation, documentation and prosecution of attempted strangulation cases. And wonderful things are happening:

- Many strangulation cases are being elevated to felony level prosecution due to the risk of death during the violence.
- Cases we once thought could not be prosecuted are being routinely submitted for either felony or misdemeanor prosecution.
- Law Enforcement and Prosecution Protocols are being updated.
- Specialized medical forms have been developed to help medical professional document injuries and identify symptoms (Diane Faugno from Pomerado Hospital).
- Strangulation training is now being included in many law enforcement and prosecution trainings throughout the country.
- District Attorney Penny Clute from Plattsburgh, New York launched a state-wide campaign to educate law enforcement and medical professionals about strangulation (**www.daclute.com**).
- Detective Tom McNeal from Los Angeles Sheriff’s Department trained over 3,000 officers on strangulation.
• Training tapes on strangulation have been developed by the Law Enforcement Television Network, San Jose Police Department and POST. These training tapes are being used to educate domestic violence professionals and even grand juries.

• Research is being conducted by Dr. Taliaferro and her team of medical students in Texas to learn more about the signs and symptoms of victims who survive attempted strangulation.

• Doctors, forensic nurses and domestic violence detectives are being developed as experts to testify in court about strangulation.

If Casondra’s and Tamara’s cases have caused this wonderful progress and will continue to motivate others to improve the investigation and prosecution of strangulation cases, Casondra Steward and Tamara Smith did not die in vain.

About the authors:

Dr. George McClane is a 1985 graduate of the College of Human Medicine in Michigan State University. He completed a residency in Emergency Medicine at Boston Medical Center, Boston Univ. School of Medicine, and in 1990 served as Chief Resident in his final year. Dr. McClane has lectured extensively on the medical aspects of domestic violence, in both national and international conferences as well as at the University of California, San Diego, School of Medicine. Currently, he is an emergency physician at Sharp Grossmont Hospital in San Diego. In addition to full-time clinical work, he serves as an associate professor of community medicine for Stanford Medical School, serving as an instructor in emergency medicine for the Sharp Family Practice Residency Program. Dr. McClane lives in Point Loma with his wife and daughters.

Gael B. Strack graduated from Western State College of Law in December 1985. After passing the bar exam in June 1986, she started her legal career as a defense attorney in San Diego with Community Defenders Inc. She also worked as a deputy county counsel in juvenile dependency. Currently, she is the Assistant City Attorney for Domestic Violence and Special Projects and lectures across the country on the issues of domestic violence, teen relationship violence, child abuse, strangulation and elder abuse. Prior to this appointment, Gael was the Head Deputy City Attorney for the Child Abuse and Domestic Violence Unit. She is President of the San Diego Domestic Violence Council and former Co-chair of the San Diego Domestic Violence Fatality Review Team, Education Committee on Teen Relationship Violence and the Safe Seniors Coalition, Committee member of the Violence Against Women Act Task Force. Gael has worked on a number of domestic violence outreach programs throughout her career as a prosecutor.

For further information, contact Gael Strack at gbs@sdcityatty.sannet.gov


13. **The location of Hyoid Fractures in Strangulation Revealed by Xeroradiography.** Journal of Forensic Sciences. 1994, 303-305. Michael S. Pollanen, Barbara Bulger, R.T.(R), and David A. Chiasson, M.D.


20. Special thanks to San Diego City Attorney Casey Gwinn and Police Chief Jerry Sanders for authorizing this research and providing ongoing, year-round training to San Diego police officers and deputy city attorneys and the following individuals for contributing to the training curriculum: Detectives at the the San Diego Police Department Domestic Violence Unit, Retired Police Sgt. Anne O’Dell, Nashville Police Sgt. Mark Wynn, San Diego Deputy District Attorney Dan Goldstein, San Diego Chief Medical Examiner Brian Blackbourne, Forensic Nurse Maggie Whelen and Oregon Police Department Lt. Pex.


25. *Deaths Allegedly Caused by the Use of “Choke Holds”*, E. Karl Koiwai, M.D.

26. *State v. Carter*, 451 S.E.2d 157 (1994), [where expert testified manual strangulation would have taken four minutes for death to occur]; *State v. Bingham*, 719 P.2d 109 (1986) [three to five minutes]; and *People v. Rushing*, case no. SCD 114890 (1986), [court transcript where Deputy District Attorney Dan Goldstein elicited the following expert testimony from Dr. Christopher Swalwell: “The minimum amount of time to strangle somebody is somewhere around a minute to two for them to die, but obviously it could be longer.”]

Follow-up Questions for Strangulation Cases
By Dr. George McClane, Emergency Physician & Gael B. Strack, SD Assistant City Attorney

1. Ask the victim to **describe** how she was strangled. Describe method. One or two hands? Forearm? Object?

2. What did the suspect **say** while he was strangling the victim?

3. Was the victim **shaken** simultaneously while being strangled? Describe.

4. Was the victim **thrown** against wall, floor or ground? Describe facts & surface.

5. How long did the defendant strangle the victim?

6. How many times was the victim strangled? Describe each incident & method.

7. On a scale from 1 to 10, how much **pressure** do you think was used? Describe. Was it continuous?

8. Any difficulty breathing?

9. Any complaint of a hoarse or raspy voice?

10. Any complaint of pain to throat?

11. Any coughing or trouble swallowing?

12. How did the victim feel? (E.g. dizzy, faint or lose consciousness?)

13. Did the victim vomit, urinate or defecate as a result of being strangled?

14. Look for injuries behind the ears, all around the neck, chin, jaw, eyelids, shoulders and chest area. Take photographs of any visible injury however minor and describe injuries.

15. After photos are taken of the victim’s injuries, ask victim to demonstrate how she was strangled. Document pain, points of contact and then photograph method of strangulation.

16. Ask victim to describe suspect’s demeanor and facial expressions.

17. What did the victim think was going to happen? (e.g., Did she think she was going to die?)

18. What caused suspect to stop?

19. If an object was used to strangle the victim, describe, photograph and impound object as evidence.

20. Was the suspect wearing any rings? Look for marks caused by rings.

21. Any prior incidents of strangulation? Or any pre-existing injuries?

22. Did the victim attempt to try to protect herself or himself? Describe.


24. During follow-up investigation, take follow-up photos of any subsequent injuries. Ask if she showed injuries to anyone, took any subsequent photographs or sought medical attention? Ask her to sign medical release.