

Texas EMS Trauma News

Summer 2022

Volume 9 No. 3

Office of EMS Trauma Systems
Texas Department of State Health Services
dshs.texas.gov/emstraumasystems/



INSIDE THIS ISSUE

From This Side	1
Heat Stroke	3
Be Texas Ready	5
EMS/Trauma Interactive Map	7
Texas Wristband Project	8
Updates	11
News and Links	12



*Associate Commissioner
Timothy Stevenson*

From This Side

*By Timothy Stevenson, DVM, PhD, DACVM, DACVPM-Epidemiology
Associate Commissioner of Consumer Protection*

One baby step to wellness-get some sleep!

Too many Americans don't get enough sleep! Let's make it personal; did you get at least 7-8 hours of sleep last night?

During my early years in the Army, we thought that sleep was nice if you could get it but not really essential. We thought a good soldier should just "shake off" a sleep deficit and overcome it with caffeine and mind games. Now we know better.

Sometime around 2012, the Army Surgeon General rolled out a wellness program focusing on activity, sleep, and nutrition, recognizing that all of those components are fundamental to good health. Shortly thereafter, they realized that the order was wrong; it should be sleep, activity, and nutrition. Simply put, the cycle of health starts with sleep. The Army realized that if a soldier gets a healthy amount of sleep – 7 to 8 hours for most adults – it's easier to get up at 0-dark-thirty and do rigorous physical fitness. Then after soldiers have slept well and exercised, it's easier for them to sustain good nutrition rather than grabbing a coffee and donut as they race to work.



I recently visited with a friend who was extolling the merits of a book he was reading about getting up and starting your day at 5 AM. If I were to write a book, it would be titled **The 9 PM Book**.

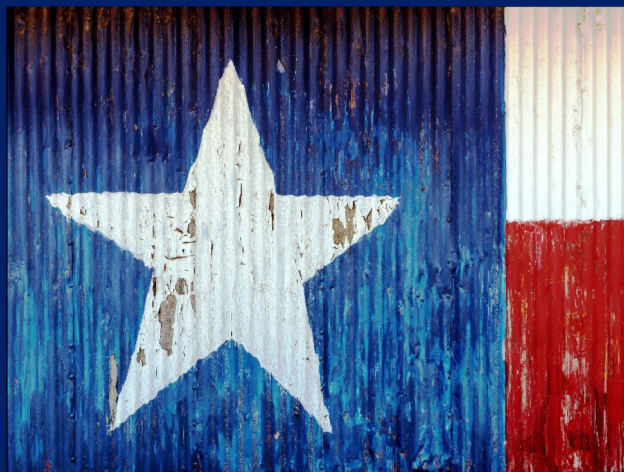
In other words, set yourself up for success by winding down at 9 PM and getting the sleep you need. Then it's much healthier and easier to get up at 5 AM, and it's also much more sustainable!

By the way, there's nothing magical about which hours you sleep – 11 PM to 7 AM is just as good as 9 PM to 5 AM. However, data indicates that working nights and sleeping during the day presents unique challenges. If you're in that situation, as I know many of our healthcare folks are, I recommend you consult a sleep expert and strive to find ways to get 7-8 hours of sleep on a regular basis.

Let's be real – we all have situations with work and life that prevent us from getting optimal sleep every day, but maintaining good sleep discipline will better prepare us for the unavoidable life and work situations that limit our sleep. It will also help us get back into a healthy routine as soon as possible. The emphasis on sleep is not just an effort to prevent zombies on the road. There are now significant scientific studies that support the beneficial effects of sleep on our brains and other body systems. So, I encourage you to learn how and take action to improve or maintain your physical, spiritual, and emotional health. Why not start with good sleep discipline.

Here are few principles to get you started:

- Go to bed and get up at the same time, even on weekends.
- Plan some time to wind down before bedtime.
- Don't just turn off the TV and expect to fall asleep.
- Minimize caffeine in the afternoons.



2022 TEXAS EMS AWARDS

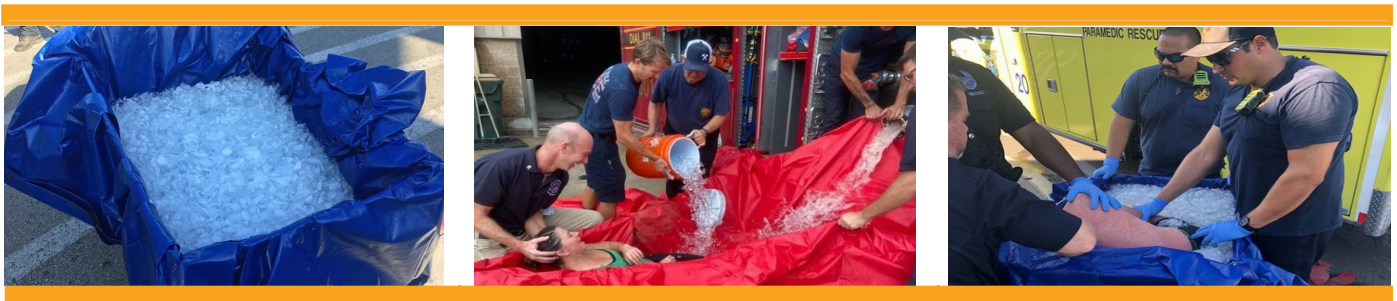
We're looking for the best in Texas, so let us know what makes your nominee really stand out.

Winners will be announced at the Texas EMS Conference Awards Luncheon

Heat Stroke

By Jason R. Pickett, MD FAEMS & Kenny Pailles, Paramedic

On a hot mid-summer day, 911 is activated by a convenience store owner reporting that a customer outside “just isn’t acting right.”



Firefighters arrive to find a 47-year-old male, prone in the parking lot, responsive to verbal stimuli.

Vital statistics

Heart rate: 150 BPM
Blood pressure: Unknown
Respiratory rate: 28 BPM
Skin: hot to the touch
Temperature: 105°F (Axillary)

- Firefighters move him off of the hot pavement.
- They begin cooling with chemical ice packs to axillae and groin while removing the patient's clothing.

EMS arrives to find the patient has deteriorated. He is now responsive to pain only.

Vital statistics

Glasgow coma score (GCS): 9
Heart rate: 160 BPM Sinus
Blood pressure: 88/48 mmHg (Mean arterial pressure- MAP 61)
Respiratory rate: 32 BPM
Temperature: 107.2°F (Rectal)

The crew treats on scene by initiating immersive ice water cooling.

- A makeshift bath is pieced together with water-proof materials gathered from the ambulance, fire engine, and the store.
- The patient is immersed with as much water-to-skin contact as possible.
- While one provider protects the patient's airway, one provider stirs the icy water aggressively, and a third provider monitors the time.

After 6 minutes of immersive cooling, the patient is removed from the bath and re-assessed:

Vital statistics

Glasgow coma score (GCS): 15
Heart rate: 124 BPM
Blood pressure: 92/50 mmHg (Mean arterial pressure- MAP 64)
Respiratory rate: 28 BPM
Temperature: 101.8°F

Transport is initiated after cooling is complete. IV fluid therapy improves vital signs even further.

Vital statistics

Glasgow coma score (GCS): 15
Heart rate 112 BPM
Blood pressure: 108/58 mmHg (Mean arterial pressure- MAP 75)
Respiratory rate: 24 BPM

Heat illness exists on a spectrum from minor incapacitation to life-threatening illness. Heat tolerance varies between individuals. While there are cases of recovery with temperatures as high as 114°F, generally a temperature over 106°F is catastrophic, leading to shock, multiorgan system failure, and death.

Heat illness may be precipitated or exacerbated by thyroid conditions, medications, stimulant drugs, tremors, or seizures. A hallmark symptom of heat stroke, which differentiates it from milder conditions such as heat exhaustion, is altered mental status.

Treatment of heat illness must begin promptly. When therapy for heat stroke is delayed, mortality is as high as 80%. The degree of injury suffered by the patient will be determined by how high the body temperature gets and how long it stays elevated. Heat stroke has a 100% survival rate if treated within 10 minutes of collapse.

Patients should be cooled with immersion in ice water bath or with application of sheets wetted with ice water that can be repeatedly dunked in ice water and changed out every minute or two until the core temperature reaches 102.2°F. Cooling them longer risks overcooling to hypothermia. Ice water immersion will drop the body temperature by about 1°F per minute, so it will take very little time to correct severely elevated temperature.

Myth: Patients with heat exhaustion are sweaty; patients with heat stroke are hot and dry.
Fact: Patients with heat stroke from exertion or exposure may be sweaty as the patient's body attempted to lower its temperature through perspiration. Skin signs are unreliable.
Myth: Patients should be cooled slowly to prevent unstable cardiac arrhythmia.
Fact: Rapid immersion cooling will not make the patient more unstable and will not cause arrhythmia.
Myth: Rapid transport to the hospital is preferable to attempting to cool the patient on scene.
Fact: EMS is in a much better position to provide rapid immersion cooling to the patient than the hospital, which is typically poorly equipped to do so. Transporting the patient before immersion cooling will only delay treatment and worsen the injury to the patient.
Myth: Intravenous fluids are the most important treatment for heat related illness.
Fact: Infusion of cold IV fluid makes a small difference in body temperature. Volume resuscitation is helpful in restoring perfusion to the skin (so that the body can offload heat) as well as to the kidneys and other organs. But the fastest, most reliable method of decreasing body temperature is cold water immersion.
Myth: Patients with heat stroke should be stripped, misted with water, and cooled with a fan.
Fact: While these methods are sufficient for milder forms of heat illness like heat exhaustion, they are insufficient for heat stroke.
Myth: Axillary or tympanic temperature measurements are appropriate in heat illness.
Fact: Axillary, tympanic, temporal, and oral temperature measurements are notoriously inaccurate in heat stroke. Invasive temperature measurement through rectal temperature is necessary.

Fireground and tactical operations in hot weather should include anticipation and preparation for immediate immersion of team members who show signs of heat illness. Heat stroke is a very treatable illness and preventable cause of death. Cooling the patient in the field is far preferable to delaying this care until arrival at the hospital, which can have grave consequences for the patient.


For more information, visit ksi.uconn.edu.



Dr. Pickett is the Chief Deputy Medical Director for the City of Austin.



Kenny Pailes is a Clinical Specialist, Field Training Officer, and Community Health Paramedic for Austin/Travis County EMS.



Be #TexasReady

**Be informed.
Make a plan.
Build a kit.**

The 2022 hurricane season is here, and the National Oceanic and Atmospheric Administration (NOAA) predicts above-normal activity in the Atlantic.

Get ahead of what's ahead with the Texas Ready video series. Learn more about how you can be prepared for all types of emergency situations. To request a video for use by your organization, contact dshs.texasready@dshs.texas.gov.

Be informed.

Did you know that a wildfire can travel a mile in three minutes? Or that a flash flood can travel nine feet in one second?

- Know your risks and stay informed about [weather alerts](#) or other [potential hazards](#).

Make a plan.

What if a disaster occurs when your family is separated or away from home? Cell phone service may not be available to communicate a plan. Pre-plan for both at-home and away scenarios.

- Know [evacuation routes](#), where your family will take shelter, and [how you'll reconnect](#) if separated.

Build a kit.

Your [kit](#) should be portable and manageable. Include any [necessary items](#) for special needs, such as accessibility or medical requirements, older family members, or pets.

- Have a [waterproof kit](#) built and ready for use, whether evacuating or sheltering at home.

Texas is the top-ranking state with the number of disasters faced. Wildfires, flash flooding, tornadoes, blizzards, and hurricanes – we see them all. No matter the disaster, it's important to be [#TexasReady](#).

MEDICAL ADVISORY BOARD (MAB) SEEKS PHYSICIANS



The Medical Advisory Board (MAB) is seeking new members. The MAB assists the Texas Department of Public Safety in determining whether applicants for driver's licenses are capable of safely operating a motor vehicle, and if holders or applicants to carry a handgun are capable of exercising sound judgement with respect to the proper use and storage of a handgun. MAB is an appointed body of licensed physicians that is administratively supported by the Texas Department of State Health Services (DSHS) EMS/Trauma Systems section.

When DPS makes a request:

- DSHS convenes a panel to consider the case or question submitted.
- Each panel member prepares an independent written report for DPS and may make recommendations relating to DPS's next action.
- As the driver licensing agency for Texas, DPS is solely responsible for all actions taken or initiated.
- Neither the Medical Advisory Board nor the attending physicians are legally liable for the decision or action taken by DPS in the suspension, revocation, or denial of a driver's or handgun license.

Some of the physical and mental conditions referred include:

- Neurological Disorders
- Drug Use/Abuse
- Alcohol Use/Abuse
- Metabolic (Diabetic) Diseases
- Vision/Eye Defects
- Blackout
- Psychiatric Disorders
- General/Medical Debilities
- Cardiovascular Diseases
- Musculoskeletal Defects

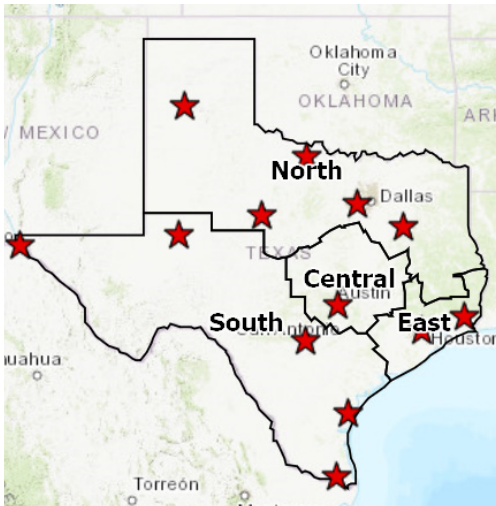
If you are interested in applying, or for additional information on the Medical Advisory Board and the administrative support at DSHS, please visit our [website](#).

EMS/Trauma Systems Interactive Map

The Texas Department of State Health Services (Department) provides the EMS/Trauma Systems [interactive map](#) to allow users to view geographical related information for:

- EMS Ground and Air Providers
- Hospital Designation Programs
- EMS Education Programs
- DSHS EMS Regional Offices

The map will not provide real-time license status information, but it is updated periodically.



Available Data

Location

Click the location button to show your current location, or type in an address to view geographical data.

Drive times

Users can view 10 and 30-minute drive times from EMS Provider and designated trauma hospital locations.

Trauma Service Areas (TSA)

View trauma service areas by boundaries or counties.

The map features predefined data that will be immediately displayed, but it also allows the user to create custom searches.

More Map Features

Situation Awareness

The Situation Awareness widget allows you to specify a location on a map and analyze information from feature layers within the specified area.

Basemap Gallery (see photo)

The Basemap Gallery widget presents a gallery of basemaps and allows you to select your preferred view.

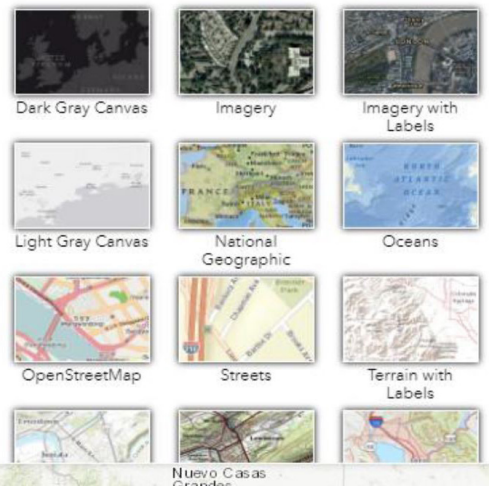
Measurement

The Measurement widget allows you to measure the area of a polygon (acres) or length of a line (miles) or find coordinates of a point.

Print

The Print widget allows the user to print the current map or define advanced print properties.

Basemap Gallery



Look for our map and the user guide that will contain tips on viewing and using map on our [website](#).

Texas Wristband Project



The target date for the Texas Wristbands nears, and there has been a lot of growth with this statewide project. As many may know, having the ability to track patients in disaster/emergency scenarios is always noted as “needs improvement.” While the wristband is not a tracking tool, it provides the mechanism for use. The Texas Wristband Project provides a unique identifier that can connect disparate systems.

The Department of State Health Services (DSHS) EMS/Trauma Systems Section and the Texas EMS & Trauma Registries fully support this project. The requirement for the use of the Texas Wristband is anticipated to go live in March 2023, which means that all EMS agencies and hospitals that should be entering data in the state registries will have a required field for the Texas wristband. This implementation will occur in March 2023 with the state’s update to the current National Emergency Medical Services Information System (NEMSIS) version. The Registry staff is working with the larger electronic health reporting (EHR) vendors for this change and informing them about the Texas Wristband. ESO has a location to enter the Texas Wristband number and a way to run a report, and several other vendors are working on it as well.

Who gets a Texas Wristband?

All patients entered into the EMS & Trauma Registries should get a Texas Wristband and keep the wristband throughout their care continuum. The confusion seems to lie with these patients: those outside of Texas who come into Texas for treatment and those transferred between facilities.

The first issue is easy. If a patient is treated in Texas and placed in the EMS & Trauma Registries, then the patient gets a Texas Wristband.

For transfers, the easiest way to explain this is that a patient gets a wristband if the patient is transferring for a Regional Advisory Council (RAC) discipline. An example would be patients transferring from an emergency department (ED) to another ED – trauma, stroke, cardiac, etc. It will not hurt to band a patient whether or not the scenarios are discussed at some point. If unsure whether a band should be used, put a Texas Wristband on the patient.

Documentation

All EMS and facilities required to report data to DSHS should have a queried field for the Texas Wristband, and it should print on an EMS run sheet and a facility’s patient documentation, such as their triage record or face sheet. The field needs to be queried in cases of facility evacuation, mass casualty incident (MCI), etc.

Rules that Require the Collection of the Texas Wristband Project

Currently, all DSHS-licensed hospitals, including rehab, must enter submersions, traumatic brain injuries (TBI), spinal cord injuries (SCI), and trauma patients into the appropriate registry. A minimum set of required fields must be completed for a patient record to be accepted, and the Texas Wristband number will be one of those fields necessary.



Tell us how things are going.

Please share any real-life incidents where the Texas Wristband made things easier. Also, share any other ways you might use the wristband, such as with regional performance improvement activities. We hope to establish a generic email where all kinds of items can be shared.

Until that is set up, please direct any ideas, comments, or questions to Christine Reeves via email at creeves@centraltexasrac.org.



MONKEYPOX

From DSHS News Updates– July 19, 2022

DSHS and local health departments are investigating cases of monkeypox that are part of an international outbreak. The disease, which can cause a serious skin rash, appears to be spreading largely via direct contact with the skin or saliva of an infected person. Most cases so far have been among men who have sex with men, so that population should be especially aware of the situation and take precautions to avoid direct contact with anyone with a rash. Anyone who develops a rash should avoid direct contact with other people and contact their health care provider as soon as possible for next steps.

[DSHS news releases](#)
[DSHS monkeypox information](#)

Clinicians should consider monkeypox when they see patients with compatible symptoms and promptly report all suspected cases to their [local public health department](#).

Notifying the health department about suspected cases will help in testing and allow public health to determine whether anyone who had close contact with the patient should get the monkeypox vaccine.

Reported Monkeypox Cases in Texas by Public Health Region

Public Health Region	Number of Cases
PHR 1	1
PHR 2/3	42
PHR 4/5N	0
PHR 6/5S	34
PHR 7	27
PHR 8	6
PHR 9/10	0
PHR 11	0
Total	110

NPRP Update: Online Assessment Now Available



The National Pediatric Readiness Project (NPRP) Assessment is now available on the [PedsReady](https://www.pedsready.org) website for hospital and emergency departments (ED) wanting to reassess their readiness.

Get started:

- Go to www.pedsready.org.
- Select the state, county, and name of your hospital/ED from a drop-down menu.
- Begin the assessment.

Upon completion, you will receive an email summary report with:

- An overall readiness score
- Answers to all scored questions broken down by the six domains of the assessment
- Copy of all answers to all questions in the assessment (both scored and non-scored)

Hospitals/EDs may want to compare these overall reassessment scores and answers to individual scored questions to their scores from their 2021 gap report. If a hospital/ED did not save their 2021 gap report, they may reach out to Texas EMS for Children (EMCS) Program Manager, [Sam Vance](#) for a copy.



TEXAS SHINES

Denton firefighter's stint on *American Ninja Warrior* a lesson in perseverance, tenacity

Courtesy of the Denton Record-Chronicle, publishes June 29, 2022

When Denton firefighter Gary Weiland, 42, had his left leg amputated in 2018, he worried whether he could still be an example of strength for his children.

"Physically, it was really hard to take, and mentally, it was even harder," Weiland said of his amputation. "When I looked at my kids, they looked at me like I was the most pathetic thing they've ever seen."

Weiland vowed his children would never look at him like that again. He wanted to prove to them that nothing, not even losing a limb, should stop them from reaching their goals

"I chose right then and there that this was not going to beat me," he said. Tuesday night, Weiland got the chance to prove his resilience when his run on *American Ninja Warrior* aired on national TV. [Read full story.](#)

UPDATES

SENATE BILL 8 (SB 8)

The EMS/Trauma Systems Section continues to work on SB 8. Multiple meetings are occurring weekly to address the funding distribution plan for recruiting EMS providers.

- We met with the Regional Advisory Councils (RAC) in early June to review the draft Statement of Work (SOW).
- The RAC SOW is based on recommendations presented to DSHS from many of our EMS Stakeholders led by the Texas EMS Alliance, the Texas Ambulance Association.
- We continue to work on messaging and website development.

Watch for a special edition of the EMS/Trauma Systems electronic newsletter that will provide details and the process for upcoming scholarships and opportunities to support the Texas EMS workforce.

EMS EDUCATION EMAILS

As a reminder, the EMSCompliance_Central@dshs.texas.gov email address is no longer in use, and not being monitored.

- For help with EMS education programs and course approvals contact the EMS Education Unit at EMSEducation@dshs.texas.gov.
- For help with EMS Instructor, Coordinator, and Information Operator certifications contact the EMS Certification Unit at EMSCert@dshs.texas.gov.

NEW NATIONWIDE SUICIDE PREVENTION HOTLINE

On July 16, 2022, the National Suicide Prevention Lifeline began using **988** as the new number for people in emotional distress or suicidal crisis to call or text. It is free and confidential and functions much like a mental health version of 911, operating 24 hours a day, 7 days a week in every state in the United States.



When in crisis, access to support is crucial. While the Lifeline's ten-digit number (1-800-273-8255) will still be active, **988** provides an easy-to-remember three-digit option for someone to connect with a crisis counselor when they or a loved one is experiencing emotional distress or suicidal crisis.

Texas EMS Trauma News

Summer 2022

Volume 9 No. 3

NEWS

NHTSA's EMS Update: Learn more about current projects and efforts in EMS from NHTSA and its Federal partners.

CDC Newsroom: View the latest CDC public health news and press releases.

Bulletin of the American College of Surgeons: *The Bulletin of the American College of Surgeons* is published monthly by the American College of Surgeons.

Washington Update: *The Washington Update* is produced bi-monthly by the National Association of State EMS Officials in cooperation with NHTSA OEMS, with funds also provided by HHS EMSC.

NACo County News: The voice of American counties.

EMSC Pulse: The EMSC Pulse Newsletter is a digest of program news and activities. Each issue includes a wealth of information about the pediatric emergency medical care community.

Integrated Healthcare Delivery: Integrated Healthcare Delivery focuses on improving the patient experience of care through inter-professional collaborations.

External links to other sites are intended to be informational and do not have the endorsement of the Texas Department of State Health Services. These sites may also not be accessible to persons with disabilities.

Links

GETAC: Visit the Governor's EMS and Trauma Advisory Council web page to view council, committees, and meeting information.

Rules: This page contains links to the Texas Administrative Code rules pertaining to EMS/Trauma Systems.

Disciplinary actions: This page provides public notice of disciplinary action by the Department of State Health Services and the Consumer Protection Division, Consumer Safety Unit.

Staff Contacts: This page provides contact information for the Office of EMS/Trauma Systems staff and programs.

Preparedness: The Center for Health Emergency Preparedness and Response is to provide public health leadership and improve health and well-being in Texas.

Homes for Texas Heroes Home Loan Program: The program, spearheaded by the Texas legislature, provides a 30-year fixed rate home loan to Texas EMS personnel, firefighters, peace officers, and others. In addition, this program offers down payment and closing cost assistance of up to 5% of the mortgage loan amount, in the form of a grant.



The Code
Green
Campaign



TEXAS
Health and Human
Services

**Texas Department of State
Health Services**

Questions, comments, or suggestions about *Texas EMS Trauma News*? Contact us at EMSTraumaNews@dshs.state.tx.us.