



Contaminated Sharps Injuries 2023 Annual Report

Chapter 81, Texas Health and Safety Code

Texas Health and Human Services
Department of State Health Services



TEXAS
Health and Human
Services

Texas Department of
State Health Services

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Executive Summary

Sharps injuries are an occupational concern due to the bloodborne pathogen (e.g., Hepatitis B) risk to healthcare personnel. A sharps injury is any injury by a sharp (e.g., needle, scalpel), such as a cut, abrasion, and/or needlestick. To reduce bloodborne pathogen exposure, Texas adopted rules for sharps-related safe workplace practices, engineered devices, exposure protocols, and parameters for reporting and recording sharps injuries in an annual Sharps Injury Log; this report summarizes the 2023 Texas Sharps Injury Log.

Texas' sharps injury regulations are in the: 1) [Texas Bloodborne Pathogen Exposure Control Plan](#); and 2) [Texas Health and Safety Code, Chapter 81, Subchapter H](#). Sharps injury definitions and rules are in the: 1) [Texas Health and Safety Code, Chapter 81, Subchapter H](#); 2) [Texas Administrative Code, Title 25, Part 1, Chapter 96, Section 96.101, Definitions](#); and 3) [Texas Administrative Code, Title 25, Part 1, Chapter 96, Rule 96.401, Sharps Injury Log](#).

According to [Texas Health and Safety Code, Sec. 81.306](#), sharps exposure information must “be recorded in a written or electronic sharps injury log to be maintained by a governmental unit.” To comply, the Texas Department of State Health Services’ (DSHS) Healthcare Safety Unit, maintains a “Sharps Injury Log” of sharps injury information reported to the department (i.e., DSHS). Per [Texas Health and Safety Code, Sec. 81.302](#), this sharps reporting requirement applies only to Texas governmental units employing individuals who: “(1) provide services in a public or private facility providing healthcare-related services, including a home healthcare organization; or (2) otherwise have a risk of exposure to blood or other material potentially containing bloodborne pathogens in connection with exposure to sharps.”

[Texas Health and Safety Code, Sec. 81.306](#), requires the following information in the Sharps Injury Log (per injury incident): 1) exposure date and time; 2) sharp type and brand; 3) a description of the exposure incident, including A) employee’s job classification or title; B) exposure department or work area; C) the procedure the employee was performing at the time of the incident; D) how the incident occurred; E) the involved body part; and F) whether the sharp had engineered sharps injury protection, and if so, whether the protective mechanism was activated, and whether the injury occurred before, during or after activation of the protective mechanism.

[Texas Administrative Code, Title 25, Part 1, Chapter 96, Rule 96.401](#) requires the following in the Sharps Injury Log (per injury incident): 1) facility name and address; 2) chief administrative officer or designee’s name and phone number; 3) injury date and time; 4) injured employee’s age and sex; 5) sharp type and brand; 6) original intended sharp use; 7) whether injury occurred before, during, or after intended sharp use; 8) whether the exposure was during or after sharp use; 9) whether the device had engineered sharps injury protection; if yes, was the protective mechanism activated; and was the exposure incident before, during, or after protective mechanism activation; 10) whether the injured person wore gloves at the time of the injury; 11) whether the injured person completed a hepatitis B vaccination series; 12) whether a sharps container was readily available for sharp disposal; 13) whether the injured person received exposure control plan training within 12 months prior to the incident; 14) the involved body part; 15) the injured person’s job classification; 16) the injured person’s employment status; 17) sharps injury location/facility/agency; and the work area where injury occurred; and 18) a list of needleless systems and sharps with engineered sharps injury protection available for employees in the governmental unit.

For a complete list of Sharps Injury Log requirements, see [Texas Health and Safety Code, Sec. 81.306](#) and [Texas Administrative Code, Title 25, Part 1, Chapter 96, Rule 96.401](#). While Sec. 81.306 and Rule 96.401 are complementary, select terms vary between these two statutes (e.g., 81.306 includes less information requirements than Rule 96.401). The DSHS Sharps Injury Log includes a combination of elements from both statutes. This report summarizes data collected on the Sharps Injury Log excluding data that identifies the governmental unit or injured person.

In compliance with [Texas Health and Safety Code, Chapter 121](#), Texas public health is carried out by local and regional health departments. Sharps exposure incident forms are reported to the local health authority or DSHS Regional Office (if no local authority) by the facility's chief administrative officer or designee. The local or regional health authority reviews the form for completeness, then sends via U.S. or electronic mail to DSHS' Central Office for inclusion in Texas' Sharps Injury Log.

Methods

Population and Inclusion

This report's data were submitted in 2023 by Texas governmental entities on behalf of employees with a sharps injury. According to [Texas Administrative Code, Chapter 96, Section 96.201](#) "a governmental unit includes but is not limited to hospital districts hospitals, city hospitals, county hospitals, hospital authority hospitals, DSHS regions and hospitals, other state hospitals and state supported living centers, community mental health and intellectual disability centers, Texas Juvenile Justice Department, Texas Department of Criminal Justice, locally or state-funded university student infirmaries, public school district clinics, emergency medical services, locally or state-funded long term care facilities, and blood banks." Data are per Public Health Region (PHR) and Texas overall.

Exclusion and Considerations

There were 623 sharps injuries reported in 2023, with zero uncontaminated sharps injuries. Uncontaminated sharps injuries before sharp use for its intended purpose are excluded due to no bloodborne pathogen risk. Sharps injuries and/or contaminated sharps injuries from private healthcare facilities were excluded because Texas law does not require private facility reporting.

Sharps injuries tend to be underreported, so this report likely underestimates the total 2023 Texas sharps injuries in governmental units. The total number of times sharps were used in each facility was not reported, so the injury rate per facility type, work area, brand, Public Health Region, and so forth cannot be assessed (no known denominator). Also, it is not possible to determine whether injuries corresponded with brand, as more injuries with one brand could be due to it being the most widely used sharps brand in the reporting facility.

Descriptive Summary

Contaminated Sharps Injuries Overview

Table 1. Month of Sharps Injury Exposure by Public Health Region, Texas, 2023

Public Health Region									
Month	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
January	3	25	1	10	3	0	1	0	43
February	1	17	2	7	3	10	2	0	42
March	1	8	1	14	1	17	5	0	47
April	2	21	1	28	3	12	4	0	71
May	1	22	0	18	0	20	6	0	67
June	0	20	1	27	5	12	7	0	72
July	1	7	1	15	3	1	7	0	35
August	2	26	1	13	2	0	5	0	49
September	1	22	2	12	4	7	3	0	51
October	2	26	*	21	1	5	6	0	61
November	1	17	1	19	2	6	2	0	48
December	1	15	1	14	0	3	2	0	36
Not reported	0	0	0	1	0	0	0	0	1
Total	16	226	12	199	27	93	50	0	623

Table 2. Time of Sharps Injury Exposure by Public Health Region, Texas, 2023

Public Health Region									
Time	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
0000 – 1159	8	117	8	94	12	22	22	0	283
1200 – 2359	6	104	4	99	15	15	28	0	271
Not reported	2	5	0	6	0	56	0	0	69
Total	16	226	12	199	27	93	50	0	623

Table 3. Sharps Injury by Age Group, by Public Health Region, Texas, 2023

Public Health Region									
Age group (yrs)	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
0 - 18	0	0	1	0	0	4	2	0	7
19 - 25	3	36	3	27	7	13	6	0	95
26 - 35	1	112	5	75	3	45	15	0	256
36 - 45	4	39	1	40	6	15	13	0	118
46 - 55	0	21	0	21	6	4	2	0	54
56 - 65	2	8	1	16	1	6	2	0	36
66+	0	0	1	3	0	0	1	0	5
Unknown/Not reported	6	10	0	17	4	6	9	0	52
Age group (yrs)	16	226	12	199	27	93	50	0	623

Table 4. Sharps Injury by Sex, by Public Health Region, Texas, 2023

Public Health Region									
Sex	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Female	12	165	11	135	15	67	37	0	442
Male	4	48	1	58	10	24	11	0	156
Not reported	0	13	0	6	2	2	2	0	25
Total	16	226	12	199	27	93	50	0	623

Table 5. Sharps Injury by Sharp Type, by Public Health Region, Texas, 2023

Public Health Region									
Device type	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Syringe/needle, all types	5	101	5	85	14	51	29	0	290
Suture needle	2	42	1	46	1	12	3	0	107
Winged steel needle/butterfly	4	13	3	9	4	3	7	0	43
IV catheter/IV	0	14	0	6	2	1	2	0	25
Scalpel	0	8	0	9	2	4	2	0	25
Other†	5	46	3	43	4	22	7	0	130
Not reported	0	2	0	1	0	0	0	0	3
Total	16	226	12	199	27	93	50	0	623

†Blood gas syringe, spinal/epidural needle, lancet/finger stick, arterial catheter introducer needle, vacuum tube blood collection holder, central line catheter needle, needle on intravenous (IV) line, unattached hypodermic needle, surgical instruments, (e.g., drill, retractor, clamp, bone cutter, pickup/forcep, staple/steel suture, microtome blade, microtome blade, pin, electrocautery device, scissors), and/or glass items (e.g., specimen tube, medication ampule/vial).

Table 6. Sharp Brand by Public Health Region, Texas, 2023

Public Health Region									
Brand	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Becton Dickinson (BD)†	0	10	1	3	4	2	3	0	23
Other*	2	16	2	6	5	2	2	0	25
Not reported	14	200	9	190	18	89	45	0	565
Total	16	226	12	199	27	93	50	0	623

†Includes multiple types by this brand. *Bard, Bavarian Nordic, Microlet, Bovie, Caina, Cardinal Health, Ethicon, Greiner Bio-1, Magellan, McKesson, Micro Fine Plus Pen, Monocryl, Monojet, Protect IV Plus, Smiths Medical, Stryker, and/or Vanish Point.

Table 7. Original Intended Use of Sharp by Public Health Region, Texas, 2023

Public Health Region									
Original use	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Injection*	5	75	4	50	8	35	15	0	192
Suturing skin/ deep tissues	2	44	1	44	1	12	3	0	107
Drawing venous blood sample	5	26	3	19	6	8	7	0	74
Cutting	0	10	0	10	5	6	3	0	34
Start IV line or heparin lock	0	15	1	10	2	3	1	0	32
Obtain body fluid or tissue sample	1	2	0	25	0	4	0	0	32
Other†	2	40	3	35	4	25	16	0	125
Not reported	1	14	0	6	1	0	5	0	27
Total	16	226	12	199	27	93	50	0	623

†Connect to IV line, finger or heel stick, draw arterial blood sample, dialysis, tattoo, remove central line/port-o-catheter, heparin/saline flush, other injection or aspiration, drilling, cutting, wiring, and/or dental procedures (e.g., extraction, hygiene, orthodontic, periodontal, and restorative).

Table 8. Sharps Injury Occurrence by Public Health Region, Texas, 2023

Public Health Region									
Time	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Before*	0	0	0	0	0	0	0	0	0
During	3	91	1	64	9	16	14	0	198
After	13	130	11	133	18	75	35	0	415
Not reported	0	5	0	2	0	2	1	0	10
Total	16	226	12	199	27	93	50	0	623

†Occurrence captures if injury happened before, during, or after sharps use for original purpose.

*Uncontaminated sharps injuries before the sharp used for its intended purpose are excluded due to no bloodborne pathogen transmission risk.

Table 9. Sharps Injury Procedure by Public Health Region, Texas, 2023

Public Health Region									
Procedure	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Between steps of multi-step process	0	25	0	83	6	32	9	0	155
Activating safety device	5	18	4	17	2	13	11	0	70
Suturing	2	33	1	20	1	6	1	0	64
Patient moved during procedure	2	17	2	11	4	9	5	0	50
Found in inappropriate place (trash, bed linen)	0	9	0	6	5	9	2	0	31
Other†	7	61	5	48	9	21	12	0	163
Not reported	0	63	0	14	0	3	10	0	90
Total	16	226	12	199	27	93	50	0	623

†Use of intravenous (IV)/central line, unsafe practice, recapping, laboratory process, interaction with another person, disassembling device or equipment, device malfunction, use of sharps container, and preparation for reuse of device or equipment.

Table 10. Sharps Injury Protection by Public Health Region, Texas, 2023

Public Health Region									
Sharps injury protection	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Yes	7	65	8	56	10	39	30	0	215
No	7	76	3	98	14	43	14	0	255
Do not know	2	66	0	30	3	11	6	0	118
Not reported	0	19	1	15	0	0	0	0	35
Total	16	226	12	199	27	93	50	0	623

Table 11. Sharps Injury Protective Mechanism Activation by Public Health Region, Texas, 2023

Public Health Region									
Mechanism activated†	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Yes	5	25	2	25	6	5	11	0	79
No	3	58	7	75	7	34	26	0	210
Do not know	2	61	0	21	2	13	5	0	104
Not reported	6	82	3	78	12	41	8	0	230
Total	16	226	12	199	27	93	50	0	623

†Some sharps (disposable needles, syringes) have a component or attachment to protect the user from injury.

Table 12. Sharps Injury Occurrence and Protective Mechanism Activation† by Public Health Region, Texas, 2023

Public Health Region									
Time	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Before	2	42	4	63	6	23	16	0	156
During	8	21	3	19	1	9	16	0	77
After	3	18	2	12	5	4	6	0	50
Not reported/not applicable	3	145	3	105	15	57	12	0	340
Total	16	226	12	199	27	93	50	0	623

†Captures if sharps injury occurred before, during, or after protective mechanism activation.

Table 13. Injured Person Wearing Gloves by Public Health Region, Texas, 2023

Public Health Region									
Wearing gloves	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Yes	13	200	12	194	24	85	47	0	575
No	3	3	0	1	2	5	1	0	15
Not reported	0	23	0	4	1	3	2	0	33
Total	16	226	12	199	27	93	50	0	623

Table 14. Injured Person Hepatitis B Vaccination by Public Health Region, Texas, 2023

Public Health Region									
Vaccinated	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Yes	12	199	9	187	17	87	41	0	552
No	2	7	0	1	0	5	5	0	20
Do not know	1	8	3	7	9	1	2	0	31
Not reported	1	12	0	4	1	0	2	0	20
Total	16	226	12	199	27	93	50	0	623

Table 15. Sharps Disposal Container by Public Health Region, Texas, 2023

Public Health Region									
Sharps container	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Yes	16	120	12	192	24	88	40	0	492
No	0	0	0	0	3	4	0	0	7
Not reported	0	106	0	7	0	1	10	0	124
Total	16	226	12	199	27	93	50	0	623

Table 16. Injured Person Received Exposure Control Training within Last 12 Months of Injury by Public Health Region, Texas, 2023

Public Health Region									
Training	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Yes	10	90	9	181	22	68	47	0	427
No	0	2	1	8	1	5	1	0	18
Not reported	6	134	2	10	4	20	2	0	178
Total	16	226	12	199	27	93	50	0	623

Table 17. Injured Body Part by Public Health Region, Texas, 2023

Public Health Region									
Body part	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Upper extremity	16	220	11	193	27	93	50	0	610
Other†	0	0	1	3	0	0	0	0	4
Not reported	0	6	0	3	0	0	0	0	9
Total	16	226	12	199	27	93	50	0	623

†Includes lower extremity, face/head/neck and/or torso (front or back).

Table 18. Sharps Injury by Job Classification, by Public Health Region, Texas, 2023

Public Health Region									
Job classification	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Registered nurse	2	79	3	42	1	35	13	0	175
Intern/resident	1	51	2	13	0	28	2	0	97
Physician/surgeon	1	13	0	36	1	1	6	0	58
Operating room/surgical technician	0	12	0	13	0	5	1	0	31
Phlebotomist	2	9	3	7	2	1	6	0	30
Other†	10	55	4	81	22	20	19	0	211
Not reported	0	7	0	7	1	3	3	0	21
Total	16	226	12	199	27	93	50	0	623

†Medical/nursing student, physical/respiratory therapist, licensed vocational nurse, housekeeping, emergency medical technician/paramedic, firefighter, law enforcement, fellow, radiology technician, phlebotomist, clinical lab technician, nursing/medical or physician assistant, dental staff, school personnel, or nurse practitioner.

Table 19. Sharps Injury by Employment Status, by Public Health Region, Texas, 2023

Public Health Region									
Employment status	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Employee	12	197	12	173	20	86	39	0	539
Student	1	6	0	9	6	4	2	0	28
Contractor	1	13	0	6	0	1	2	0	23
Other	2	4	0	3	1	2	4	0	16
Not reported	0	6	0	8	0	0	3	0	17
Total	16	226	12	199	27	93	50	0	623

Table 20. Sharps Injury by Location/Facility/Agency Type, by Public Health Region, Texas, 2023

Public Health Region									
Facility type	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Hospital	8	193	7	153	3	78	38	0	480
Clinic	4	11	4	12	2	9	8	0	50
School/college	0	1	1	7	11	5	2	0	27
Other†	3	17	0	20	11	1	2	0	54
Not reported	1	4	0	7	0	0	0	0	12
Total	16	226	12	199	27	93	50	0	623

†Surgical or outpatient treatment center, emergency medical services (EMS)/fire/police, dental facility, freestanding laboratory, medical examiner, residential facility and correctional facility.

Table 21. Sharps Injury by Work Area, by Public Health Region, Texas, 2023

Public Health Region									
Work area	1	2/3	4/5N	6/5S	7	8	9/10	11	Texas
Surgery/operating room	2	66	0	57	1	31	6	0	163
Patient room	4	31	4	31	0	15	7	0	92
Emergency department	3	25	2	9	2	13	4	0	58
Medical outpatient clinic	2	14	2	18	1	5	2	0	44
Procedure room	0	4	0	21	4	2	6	0	37
Critical care unit	0	20	0	2	0	4	4	0	30
Other†	4	57	4	52	18	23	20	0	178
Not reported	1	9	0	9	1	0	1	0	21
Total	16	226	12	199	27	93	50	0	623

†Ambulance, autopsy/pathology, dialysis room/center, labor and delivery/gynecology unit, infirmary, jail unit, laboratory, pediatrics, medical surgical unit, nursery, radiology department, rescue setting, pre-operative or post-anesthesia recovery area, endoscopy/bronchoscopy, seclusion or psychiatric unit, and sterile processing.