



Opioid & Substance Abuse Prevalence

**Presentation to the House Select
Committee on Opioids & Substance Abuse**

**John Hellerstedt, M.D.
Commissioner**

March 27, 2018



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Presentation Overview



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- Background
- Texas Data: DSHS Datasets
 - Poison Center Network Data
 - Inpatient Admissions Through Emergency Department Visits
 - Death Certificate Data
- Selected Public Health Concepts
 - Opioid Antagonists
 - Drug Scheduling
 - TexasAIM Initiative
 - Texas Health Data



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Background: Opioids

Opioids

- Naturally occurring and synthetic substances
- Pain relief, medical condition treatment, euphoria
- Prescribed and recreational drugs
- Common opioids: morphine, heroin, codeine, oxycodone, fentanyl

Opioid Overdoses

- Slow down bodily functions, including the impulse to breathe
- Characterized by non-responsiveness, blueness around fingertips, eyelids
- Brain damage or death possible

Background: U.S. Historical Context

18th – Early 19th Centuries

- Opium used as common medical tool for acute and chronic ailments
- Morphine extracted from opium, leading to a more potent drug widely prescribed
- Codeine also extracted, a less potent form of extracted opium

First US opioid epidemic – Post Civil War to early 20th Century

- Heroin synthesized from morphine (1874) & introduced for medicinal use (1898)
- Development of hypodermic needles expanded opiate use
- Painful conditions not well understood
- Few alternative pain treatments available
- Side effects of opiates were not well understood

How first epidemic was handled

- Alternative pain medications developed
- Decreased demand due to improved treatments for certain conditions
- Stricter prescription laws
- Professional literature trained physicians on morphine prescribing
- Pure Food and Drug Act of 1906 required better product labeling
- Narcotics taxation, opium importation bans, and eventually making heroin illegal (1924)



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Background: Current Epidemic

Contributing Factors

- 1980s: Unsubstantiated claims that opioid addiction is rare
- 1990s-2010s: Increased prescription rates for opiates
 - Access to cheaper and more potent heroin and fentanyl
 - 1995: Pain as the “Fifth Vital Sign” - reinforced by patient satisfaction surveys, accreditation standards
 - (Joint Commission standard by 2000)



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Background: Federal Response

Federal Public Health Emergency Declaration

"As a result of the consequences of the opioid crisis affecting our Nation, on this date and after consultation with public health officials as necessary,

I, Eric D. Hargan, Acting Secretary of Health and Human Services, pursuant to the authority vested in me under section 319 of the Public Health Service Act, do hereby determine that a public health emergency exists nationwide."

- **January 24, 2018:** Initial declaration renewed for a 90-day period
- **October 26, 2017:** Opioid crisis declared as public health emergency by the federal government
- **May 2017:** Substance Abuse and Mental Health Services Administration awards \$27 Million Texas Targeted Opioid Response Grant



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Background: Texas Response

Texas Occupations Code, Sec. 168.003. Legislative Finding

*"The legislature finds that **deaths resulting from the use of opioids and controlled substances constitute a public health crisis** and that there is a compelling state interest in the board closely regulating the prescribing of opioids and other controlled substances by physicians and their delegates.*

- **Senate Bill 315**, 85th Legislature, Regular Session, 2017

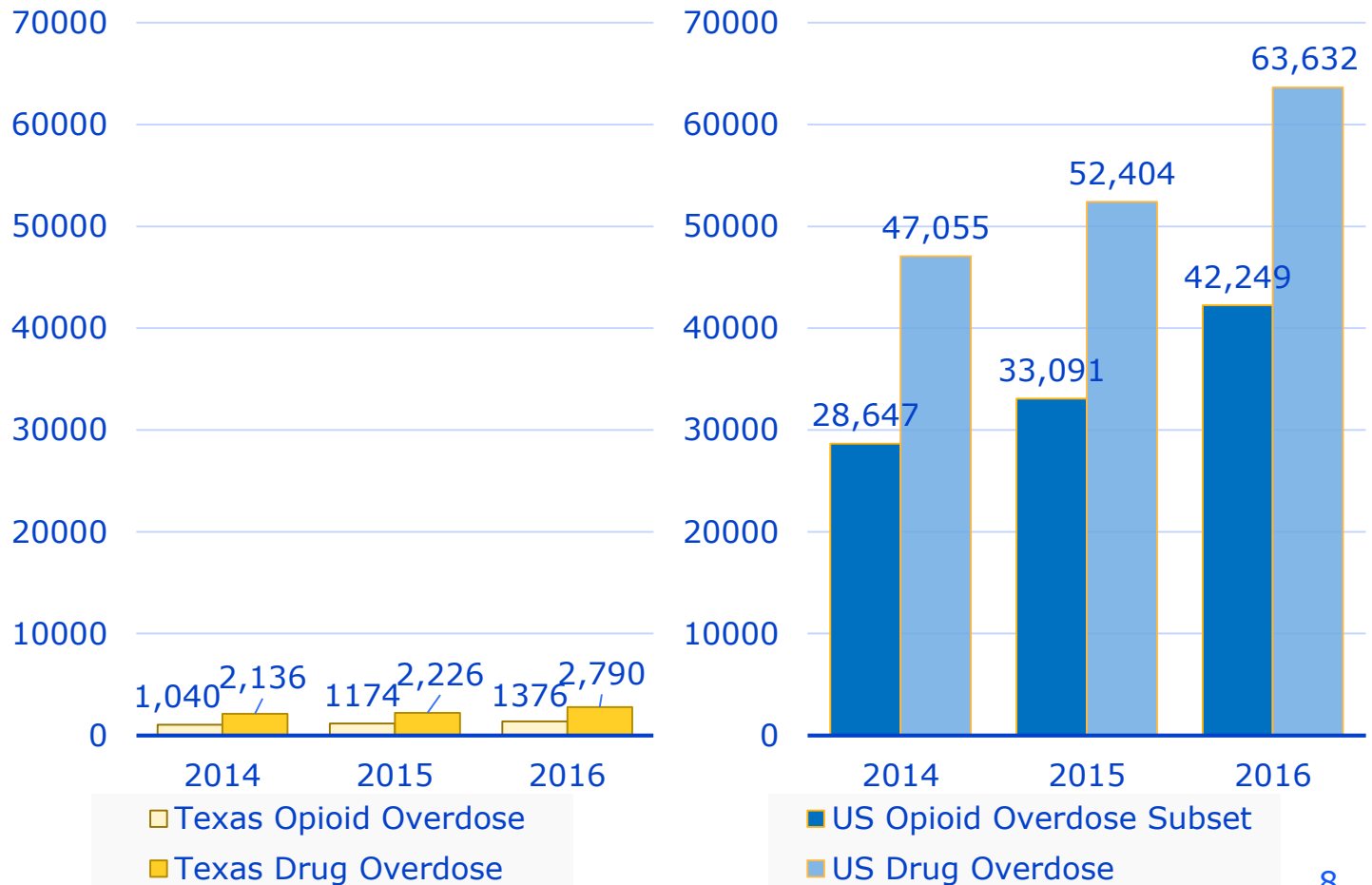


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Background: National & State Overdose Deaths

Drug Overdose & Opioid Overdose Deaths in the U.S. and Texas, 2014-2016



Texas Data Overview: DSHS Datasets

- Texas Poison Center Network Drug Exposure Calls: 2000-2017
- Inpatient Admissions Through Emergency Department Visits: 2000-2016
- Death Certificate Data: 1999-2015



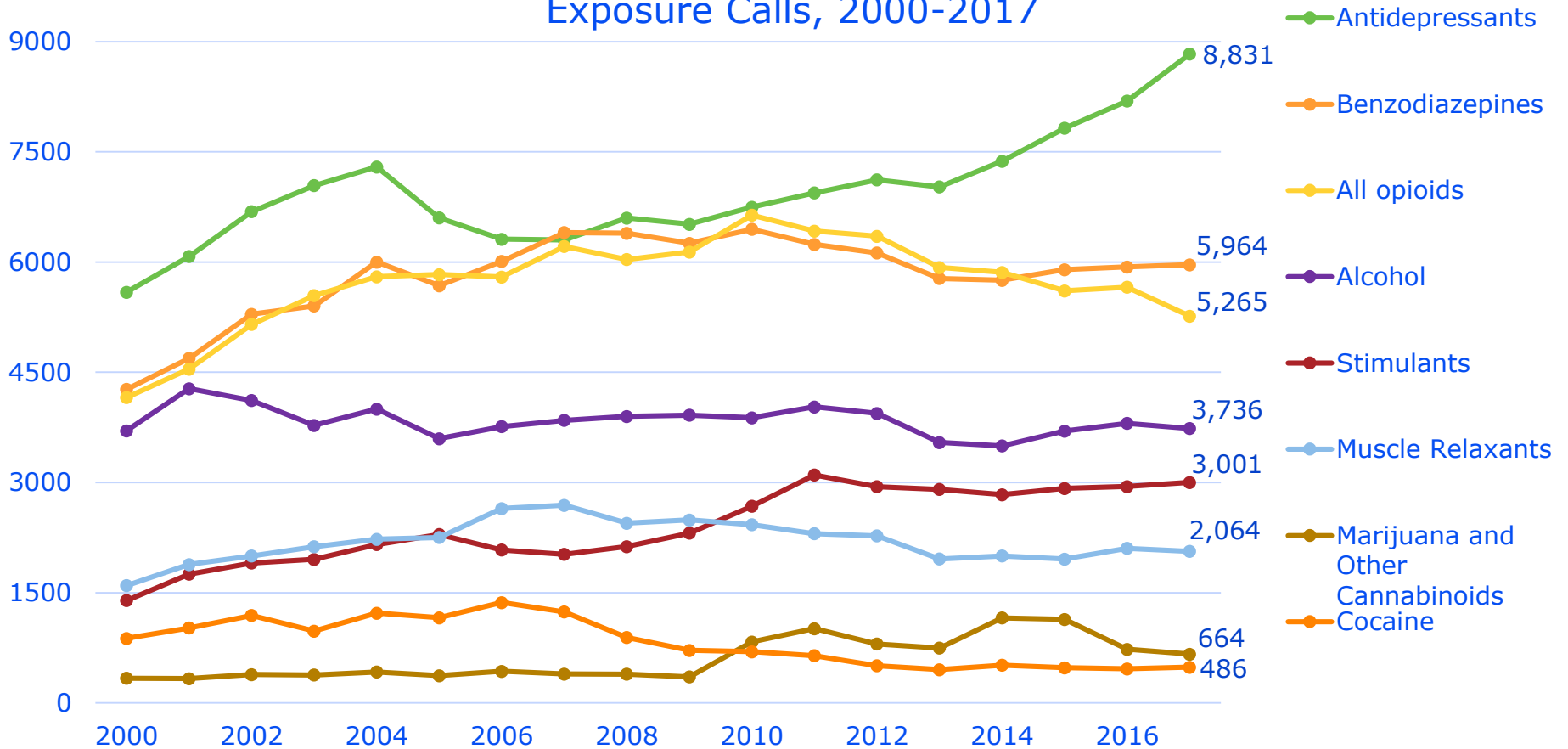
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Drug Exposure Calls

Texas Poison Center Network Drug Exposure Calls, 2000-2017



Source: Texas Poison Center Network, 2000-2017. Analyses include only those calls involving drug exposures; calls asking for information were not included.

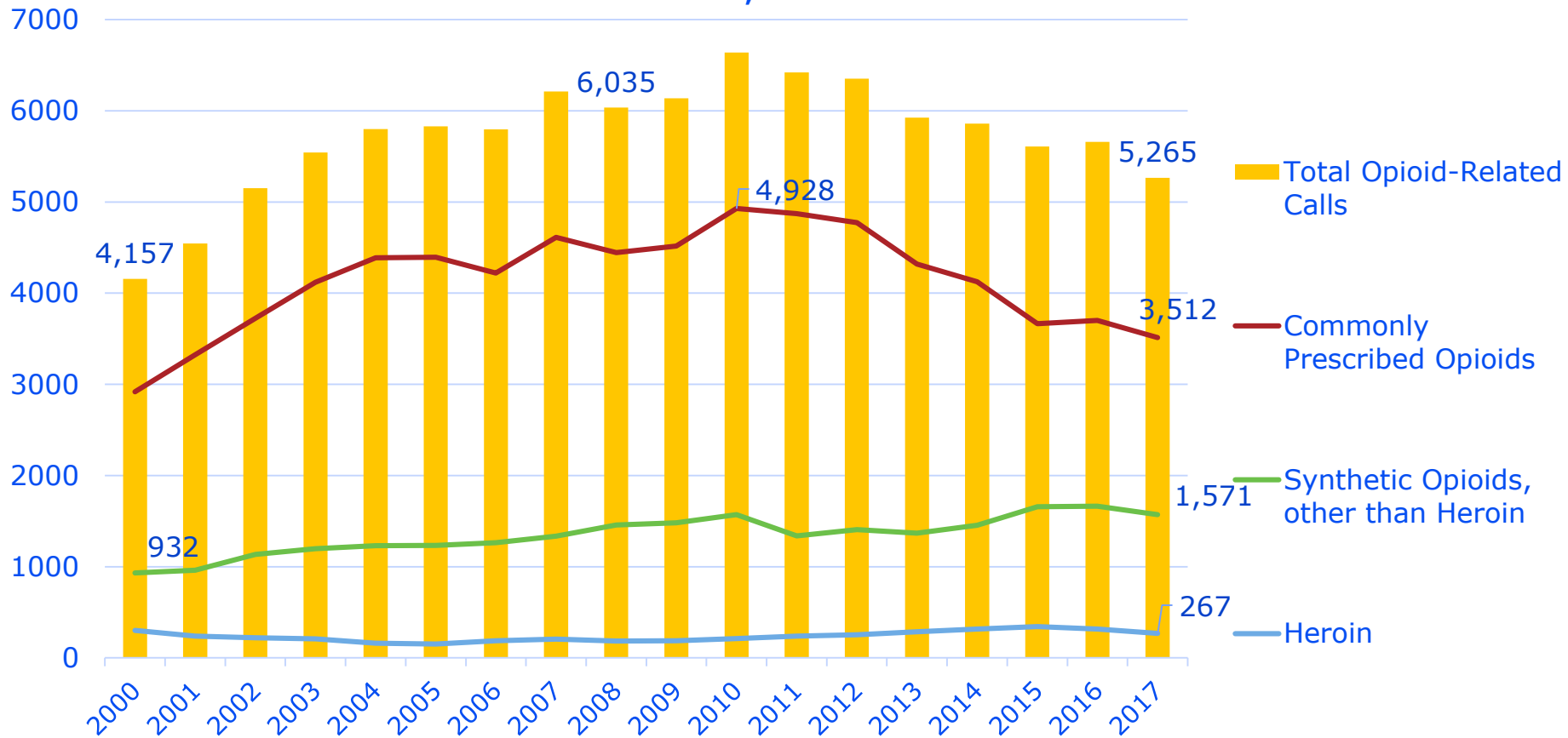


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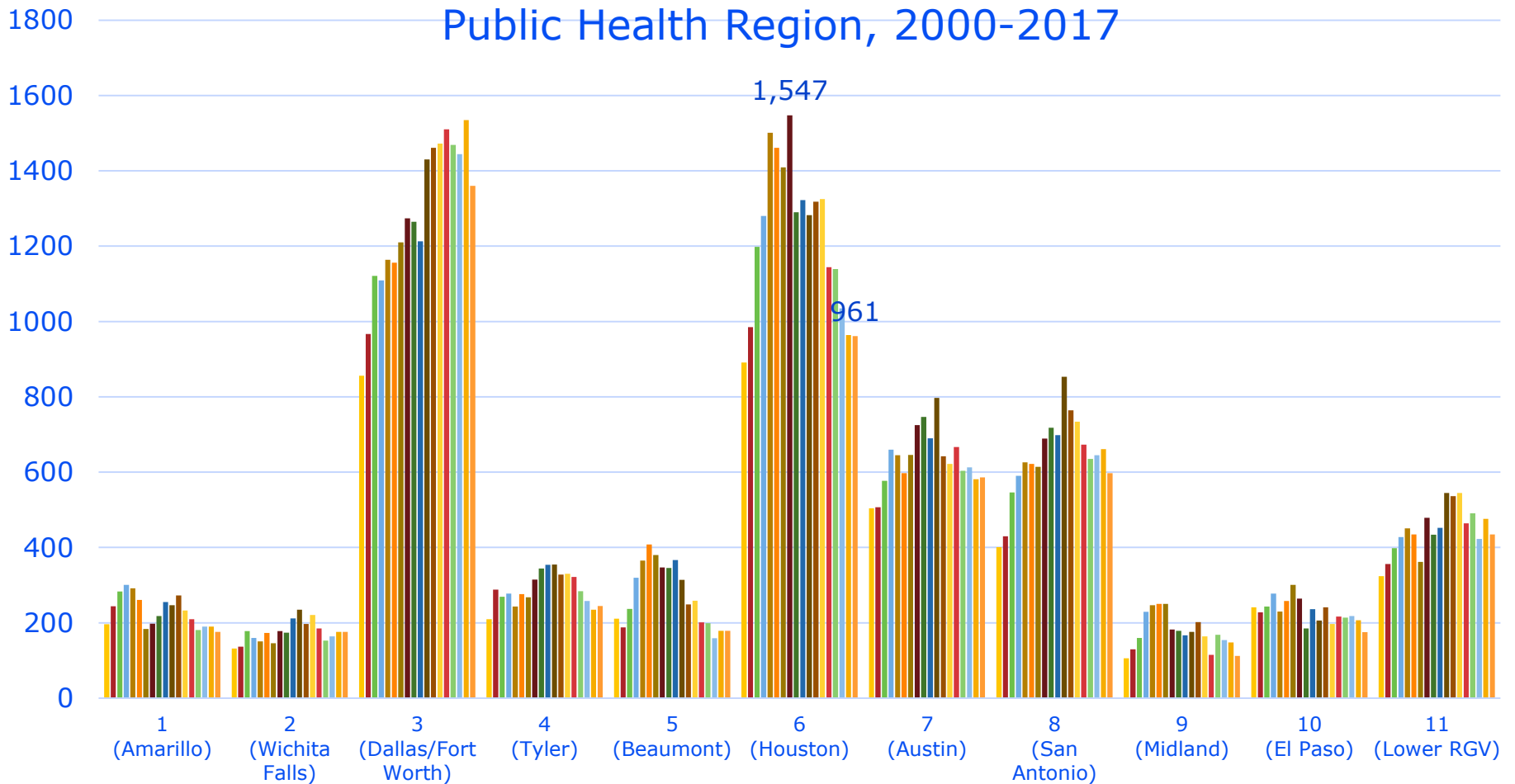
Drug Exposure Calls: Opioid-Related

Opioid-Related Exposure Calls to the Texas Poison Center Network, 2000-2017

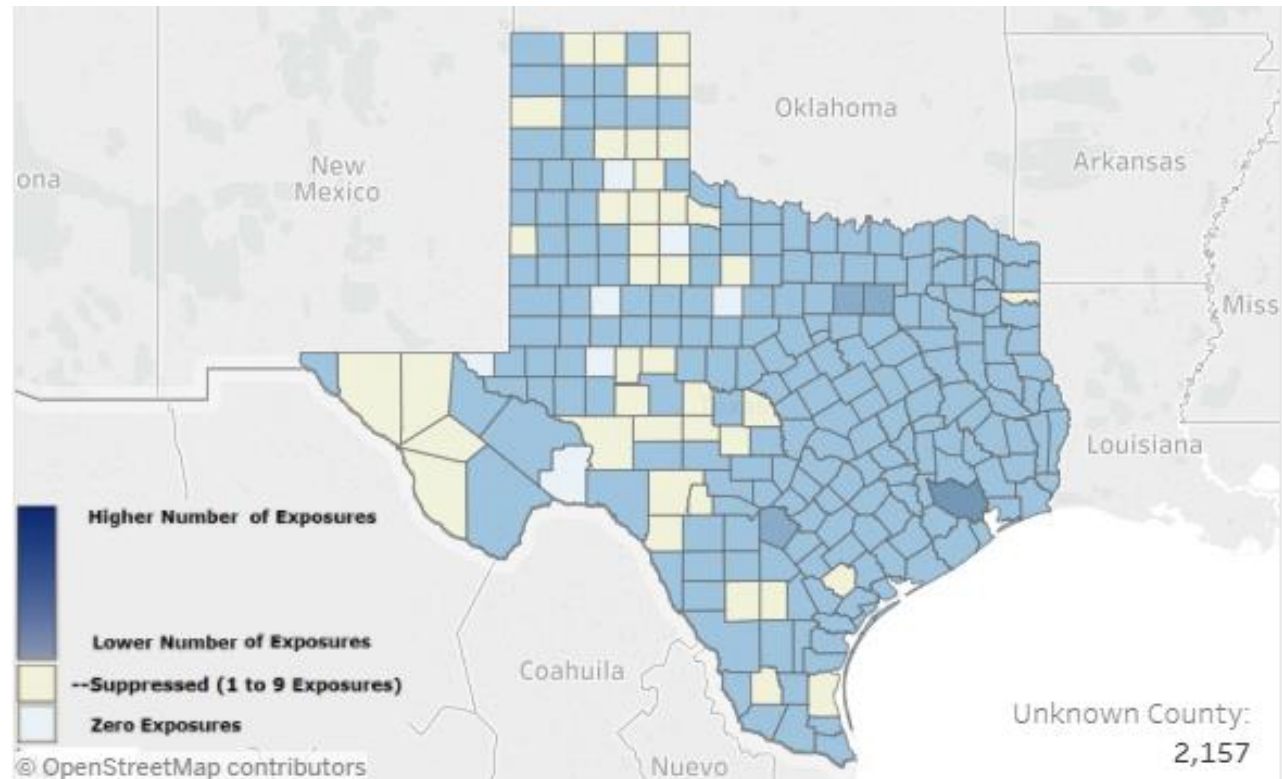


Drug Exposure Calls: Regional Data

Opioid-Related Calls to the Texas Poison Center Network by Public Health Region, 2000-2017



Opioid-Related Drug Exposure Calls: County-Level Data, 2000-2017

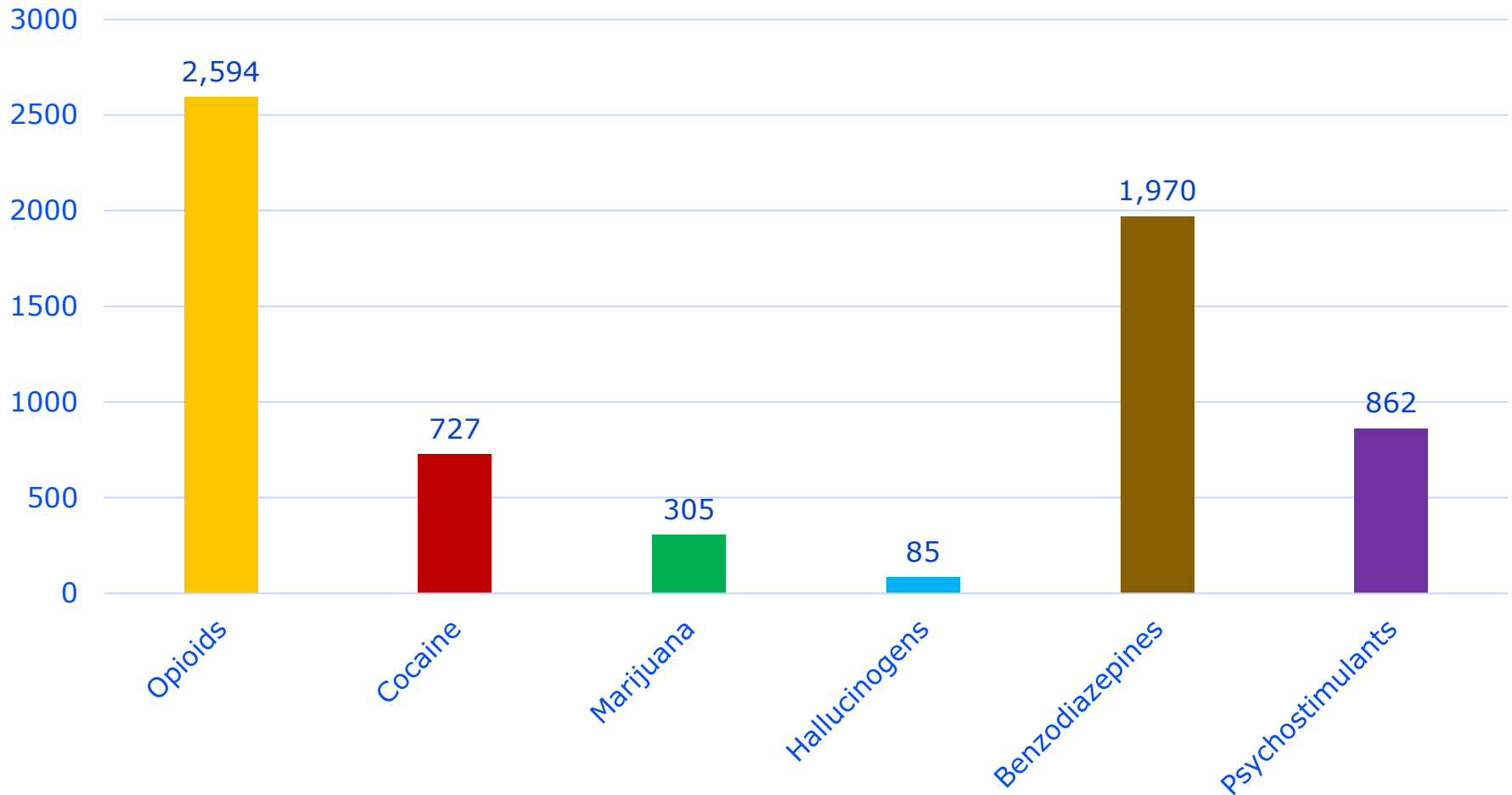


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Drug-Related Inpatient Admissions Through ED Visits, Texas, 2016



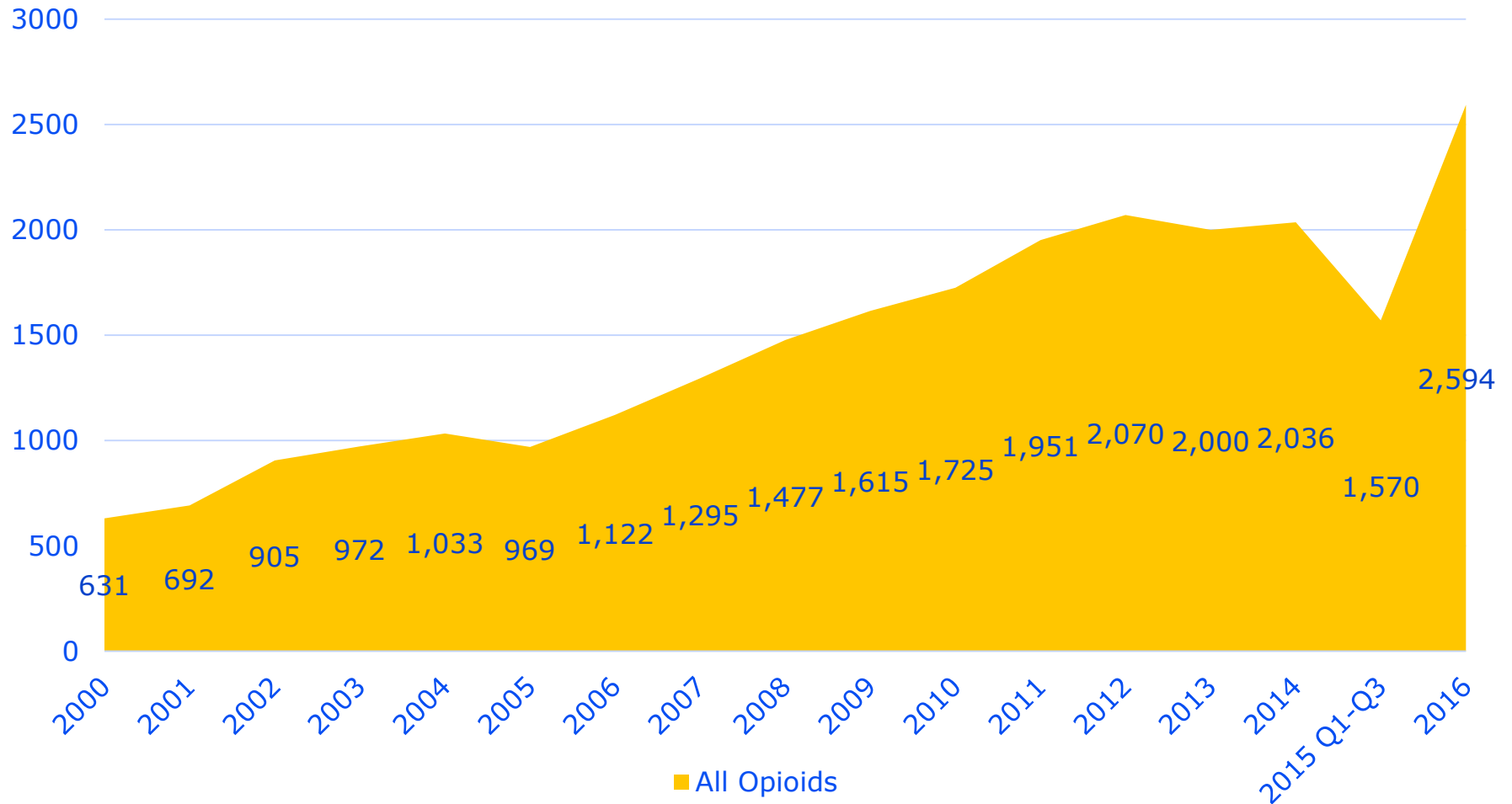
Source: *Texas Hospital Inpatient Discharge Public Use Data Files, Q1 – Q4 2016*. Texas Department of State Health Services, Center for Health Statistics, Austin, Texas. 3/7/2018.



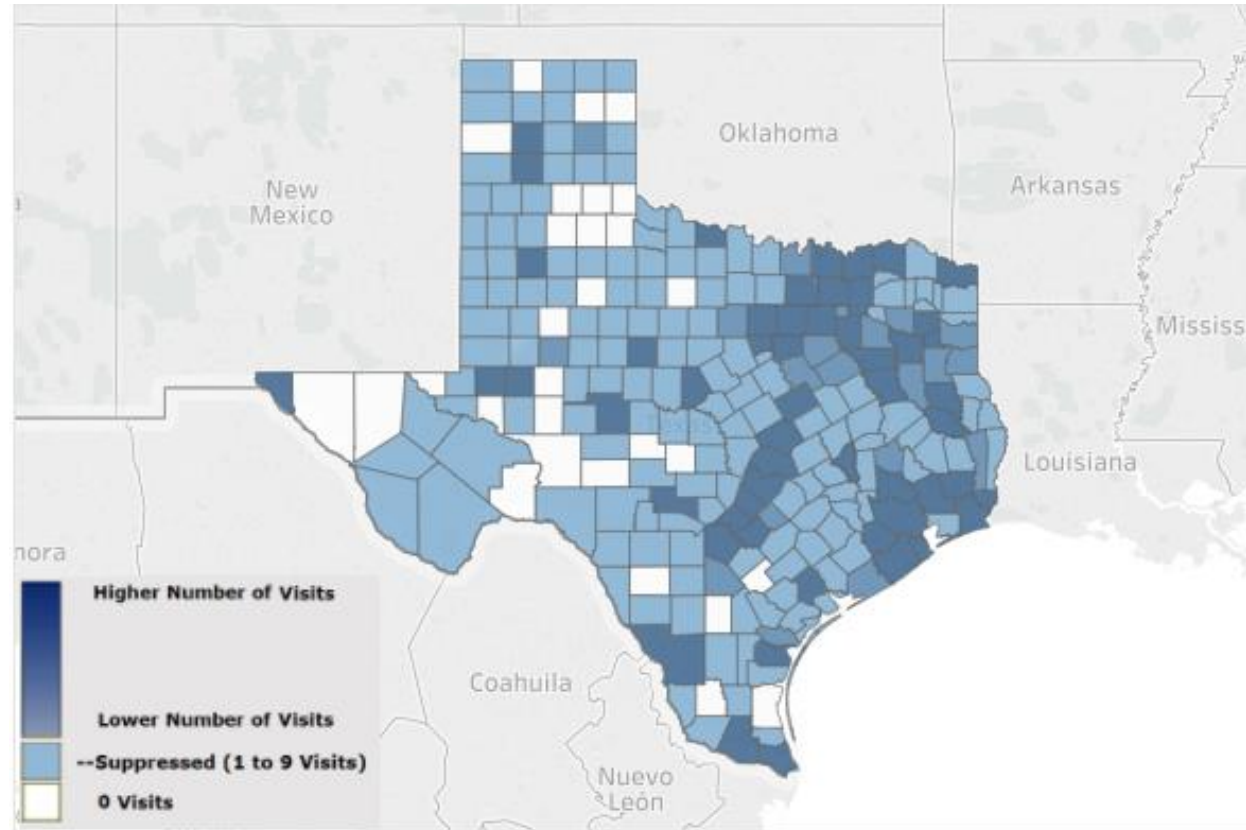
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Opioid-Related Inpatient Admissions Through ED Visits, 2000-2016



Opioid-Related Inpatient ED Admissions: County-level Data, 2000-2015Q3

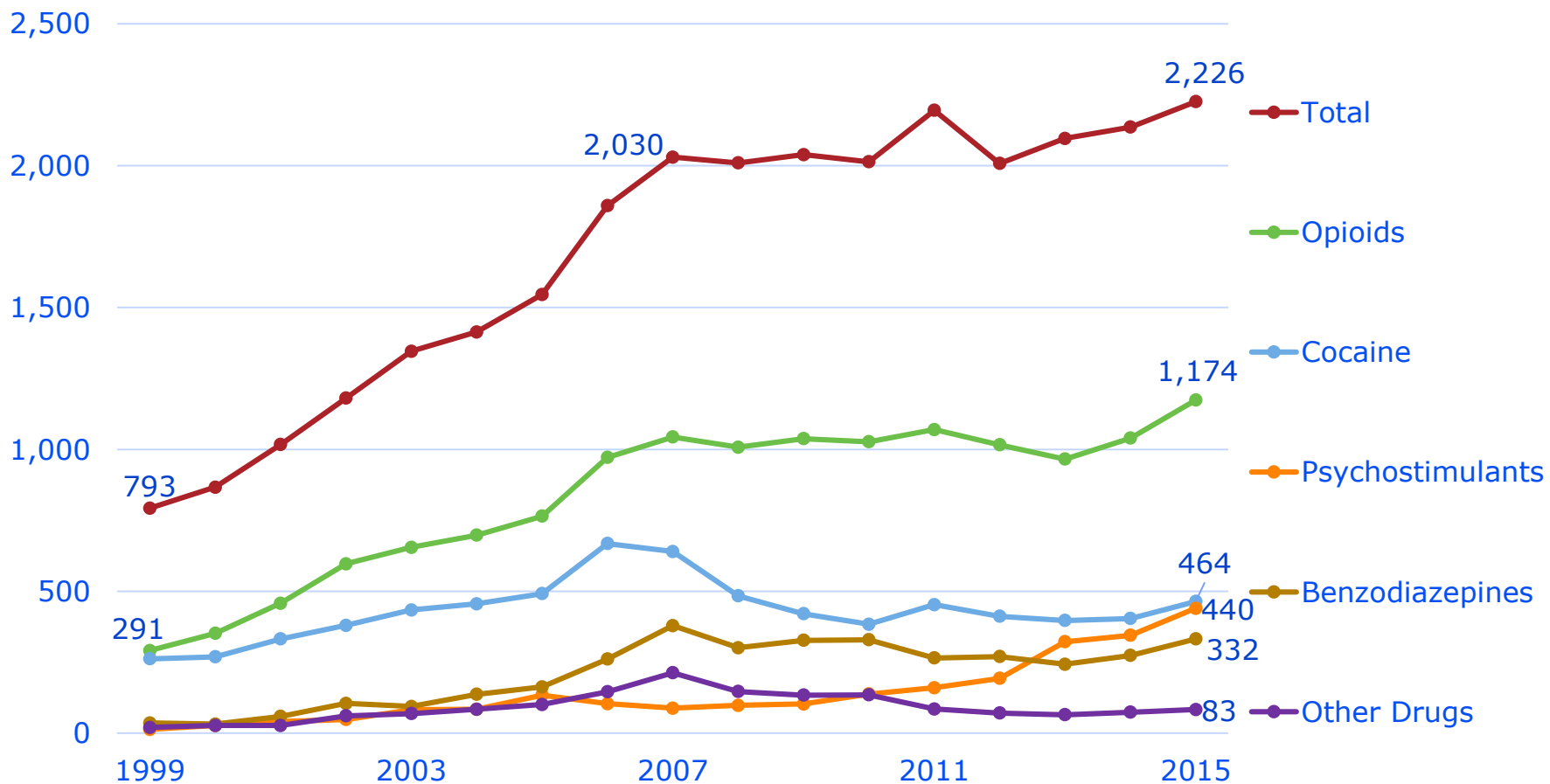


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Accidental Poisoning Deaths in Texas, by Substance: 1999-2015



Source: Texas Death Certificates
 Accidental Poisonings based on County of Occurrence
 Prepared by Texas Department of State Health Services, Center for Health Statistics 3/6/2018

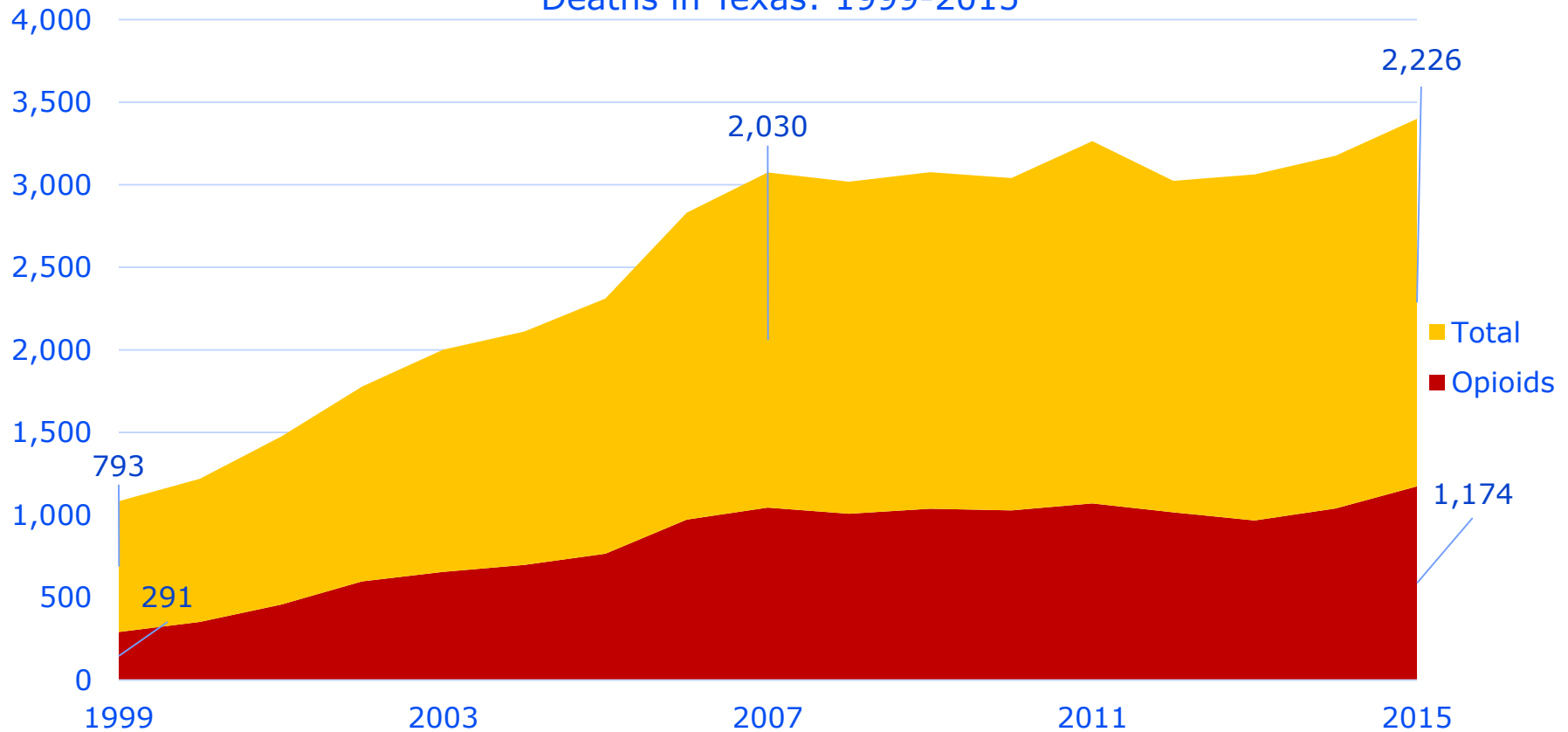


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Accidental Poisoning Deaths:

Total and Opioid-Related Accidental Poisoning Deaths in Texas: 1999-2015



Source: Texas Death Certificates
Accidental Poisonings based on County of Occurrence
Prepared by Texas Department of State Health Services, Center for Health Statistics 3/6/2018

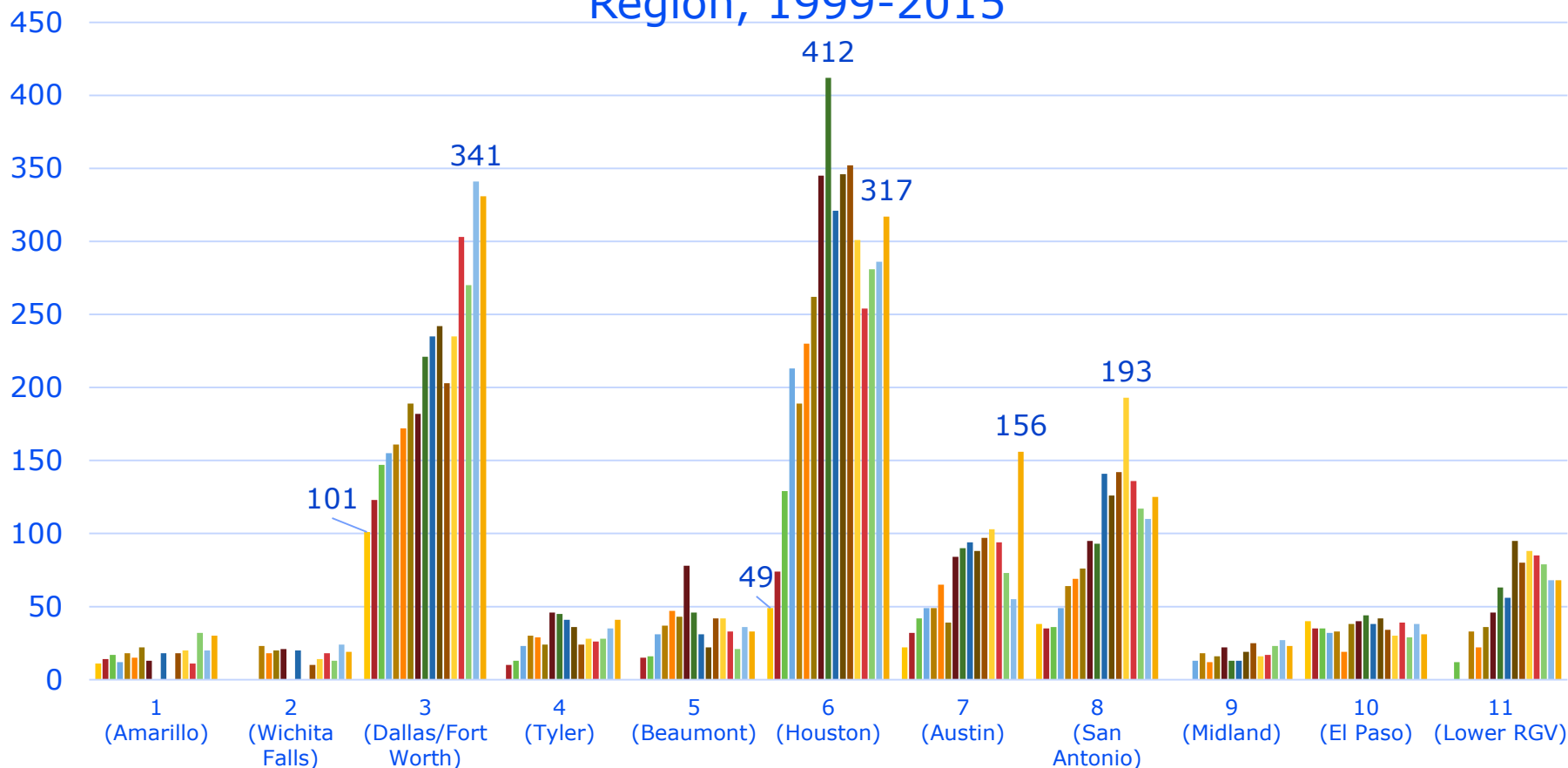


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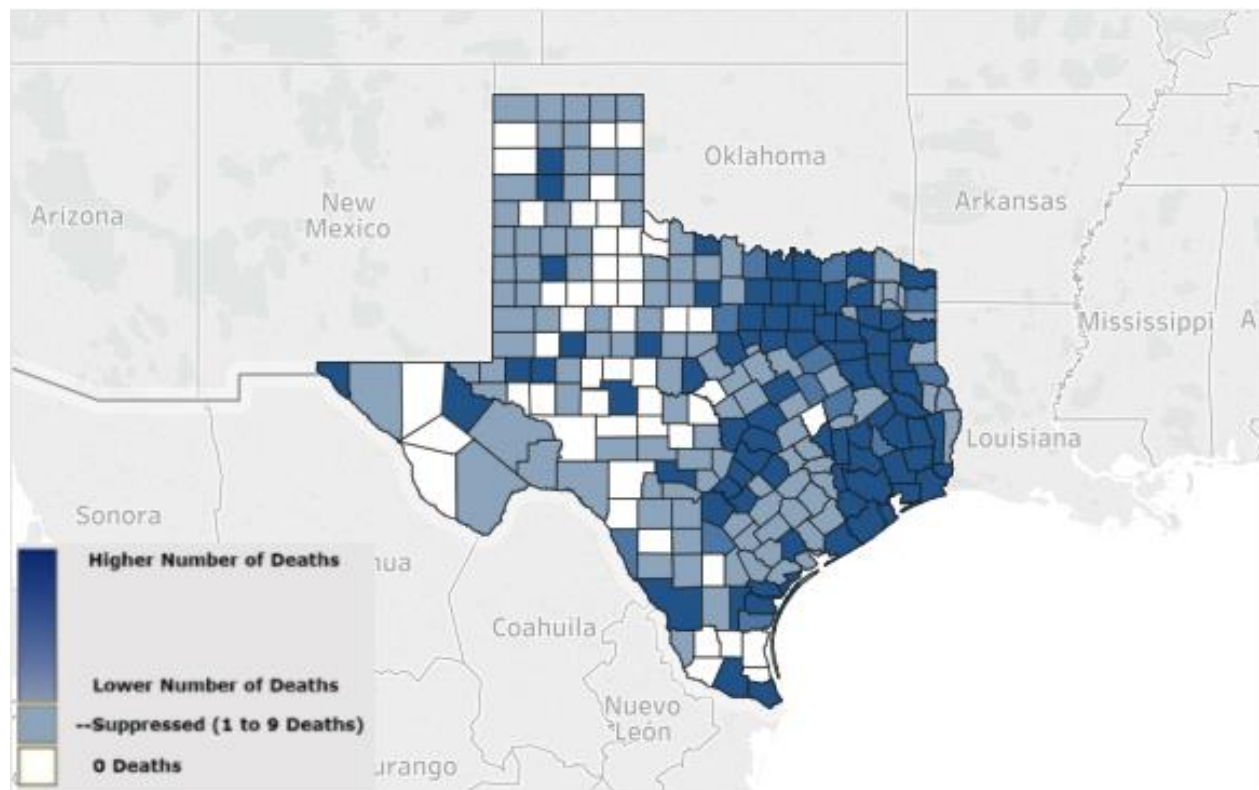
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Accidental Opioid-Related Poisoning Deaths: Regional Data

Accidental Opioid-Related Deaths by Texas Public Health Region, 1999-2015



Accidental Opioid-Related Poisoning Deaths: County-level Data, 1999-2015



Source: Texas Death Certificates
Accidental Poisonings based on County of Occurrence
Prepared by Texas Department of State Health Services, Center for Health Statistics 3/6/2018



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Selected Public Health Concepts:

- Opioid Antagonists
- Texas Controlled Substances Scheduling
- Texas AIM Initiative: Opioids
- Texas Health Data Opioid Dashboard



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Opioid Antagonists

Antagonists reverse/reduce the effects of an opioid overdose or opioid disorder

- Opioid overdoses involve
 - Non-responsiveness
 - Slowing down of basic bodily functions, especially respiration
- Naloxone: used in opioid overdose situations
 - Pure opioid antagonist – immediate impact but with a short duration (30-60 minutes)
 - Works by binding to opioid receptors but doesn't activate the receptors, preventing response to any opioids in the system
- Administered by: autoinjector or nasal spray



Opioid Antagonists: Standing Orders

SB 1462 (84th Leg., R.S., 2015):

- **Prescribers:** may issue direct or standing orders for opioid antagonists (Naloxone, etc.)
- **Pharmacies:** may dispense opioid antagonists to covered persons, including family members, friends, or other persons in a position to assist
- **Storage/Distribution:** may occur by persons & organizations acting under standing orders without compensation for storage/distribution
- **Civil/Criminal Liability Protections:** provided to persons who administer/choose not to administer opioid antagonists
- **EMS Personnel:** allowed to administer antagonist if there are clinically indicated symptoms



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Texas Controlled Substances Scheduling

An ongoing response to emerging opioid and substance abuse-related threats

Scope: Categorization of controlled substances based on medical use-driven categories

Intended Audience:

- Law Enforcement
- Pharmacies
- The Legislature

Regular Scheduling Process:

- Annual Updates
- Federal action

Emergency Scheduling Process:

- Streamlined scheduling

Recent Fentanyl Scheduling based on DEA action:

- Categorical scheduling of fentanyl products
- Previously, DEA scheduled products after detection of slight alterations to fentanyl chemistry

Texas Controlled Substances Scheduling: Factors Considered



Texas Health and Safety Code, Section 481.035
(Findings)



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Texas Controlled Substances Scheduling: Factors Considered

- **Schedule I:**
 - high potential for abuse
 - no accepted U.S. medical use
- **Schedule II:**
 - high potential for abuse
 - accepted U.S. medical use
 - may lead to dependence
- **Schedule III:**
 - potential for abuse
 - accepted U.S. medical use
 - may lead to low physical/high psych dependence
- **Schedule IV:**
 - lower potential for abuse
 - accepted U.S. medical use
 - limited physical/psych dependence
- **Schedule V:**
 - lower potential for abuse
 - accepted U.S. medical use
 - more limited physical/psych dependence



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Texas Controlled Substances Scheduling: Subcategories

Schedule I

Fentanyl,
Heroin,
Marijuana

- Opiates
- Opium Derivatives
- Hallucinogenic Substances
- Stimulants
- Depressants
- Cannabimimetic Agents

Schedule II

Cocaine,
Fentanyl

- Substances, vegetable origin or chemical synthesis
- Stimulants
- Depressants
- Hallucinogenic Substances
- Precursors

Schedule III

Benzodiazepines

- Depressants
- Narcotics
- Stimulants
- Anabolic steroids and hormones
- Hallucinogenic substances

Schedule IV

Benzodiazepines

- Depressants
- Stimulants
- Narcotics and other substances

Schedule V

- Narcotics containing non-narcotic active medicinal ingredients
- Stimulants
- Depressants



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TexasAIM Initiative: Opioids

Medical protocols to decrease the incidence of drug overdoses in maternal mortality and morbidity

- **Overview:** Texas 1 of 10 states invited by Alliance for Innovation on Maternal Health (AIM) to develop and implement Obstetric Care for Women with Opioid Use Disorder Bundle
- **Focus:** Evidence-based practices and data-driven quality improvement strategies to improve substance abuse disorder (SUD) screening, treatment, education, etc.
- **Timeline:**
 - Nov. 14, 2017: National kick-off meeting
 - Winter 2017-18: DSHS organized workgroup to steer implementation process
 - March 9, 2018: Letter sent to clinical partners inviting participation in all AIM bundles, including Opioid Use Disorder



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Texas Health Data Opioid Dashboard

Texas Health Data: User-friendly data visualization tool on the DSHS website

- **Current Datasets:**
 - Death Certificate Data
 - Texas Poison Center Network
 - Texas Administrative Claims Data (facility diagnoses codes)
- **Future Datasets:**
 - Texas School Health Surveys
 - EMS Run Data
 - Other datasets as partnerships develop
- **Future Dashboard tools:**
 - Visualizations by Public Health Region
 - Other demographic indicators as datasets allow
- **<http://healthdata.dshs.texas.gov/>**

Texas Health Data Opioid Dashboard

Opioid-Related Deaths in Texas Data Visualization Dashboard

Texas Summary Statistics

Year(s): 2015

Type of Death: Accidental Poisoning Deaths where Opioids Were Involved

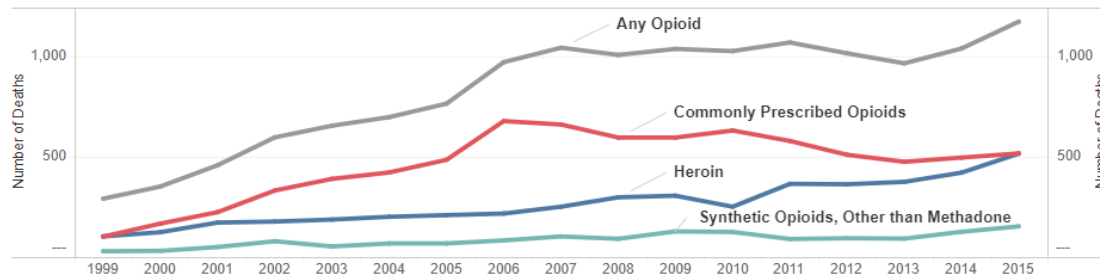
Number of Deaths

1,174

Crude Death Rate

4.3

Number of Deaths in Texas



Instructions

Year

2015

Type of Death

Accidental Poisoning Deaths where Opioid...

Opioid Category

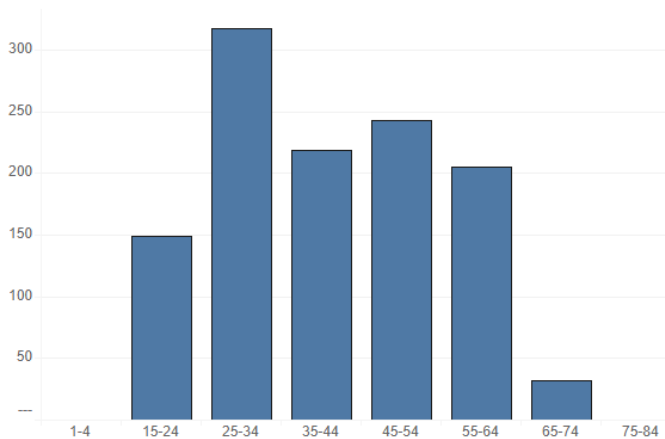
(All)

Benzodiazepines Involved

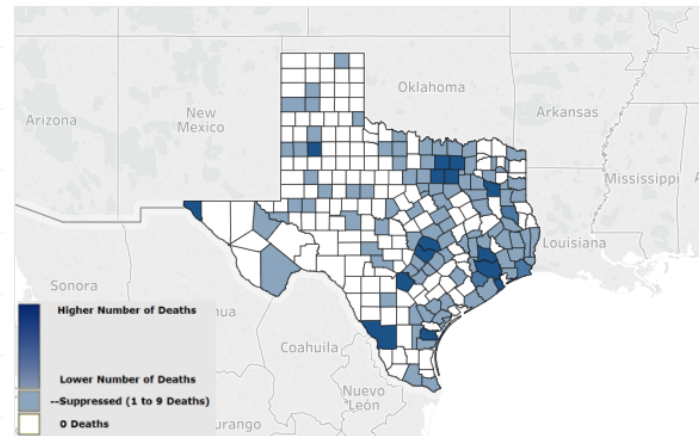
(All)

Number of Deaths by

Age Group



Number of Deaths by County



Note: Total Number of Deaths from 1 to 9 are masked with "---" on this page.



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Thank you

Regional Data Overview

- Data Points Covered for Each Public Health Region on Separate Slides:
 - Drug Overdose Deaths Involving Opioids
 - Immediate & underlying causes of death included mention of Opioids
 - Opioid-Involved Drug Exposure Calls to the Texas Poison Control Network
 - Reason for reported exposure included mention of opioids

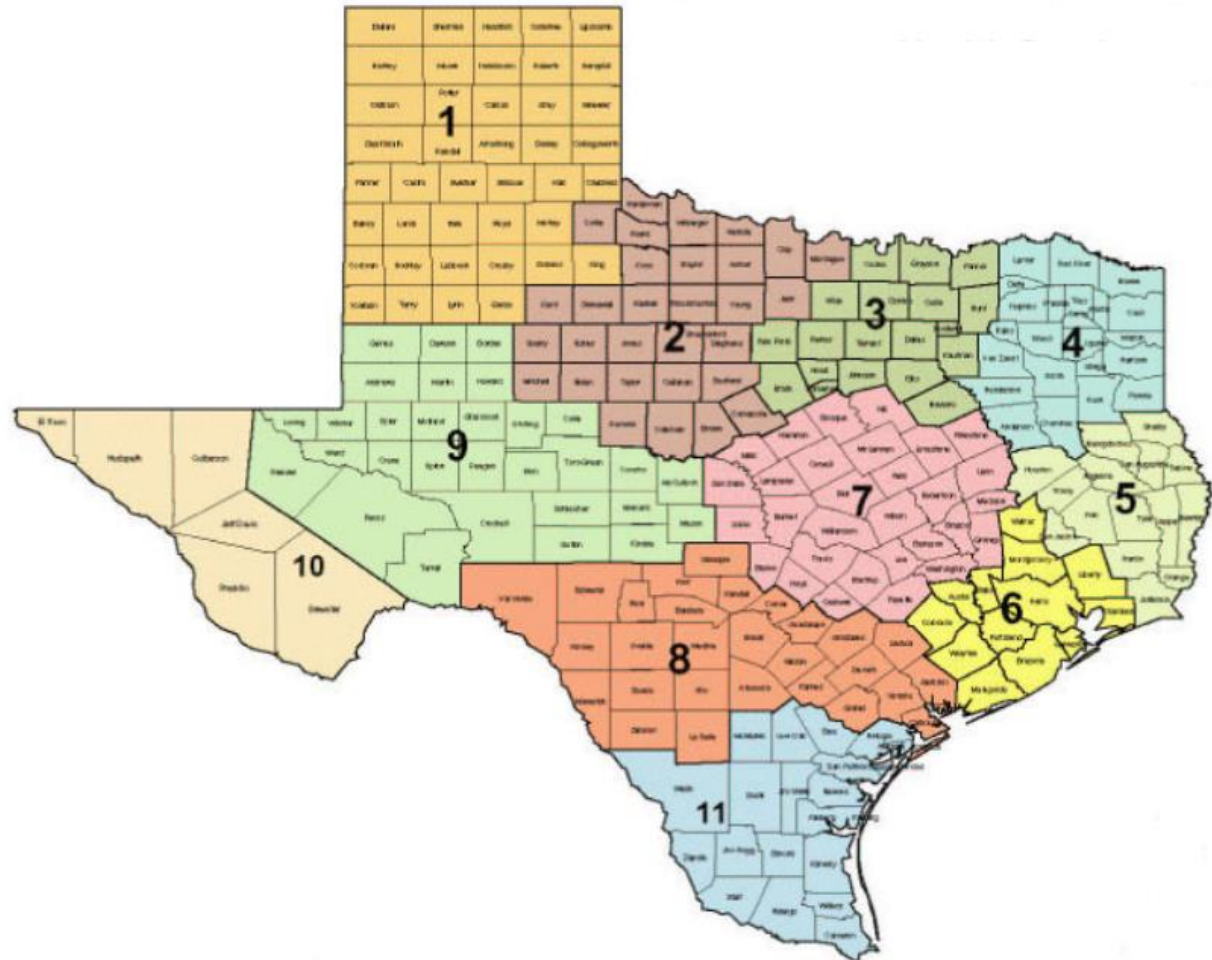


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Map of Public Health Regions



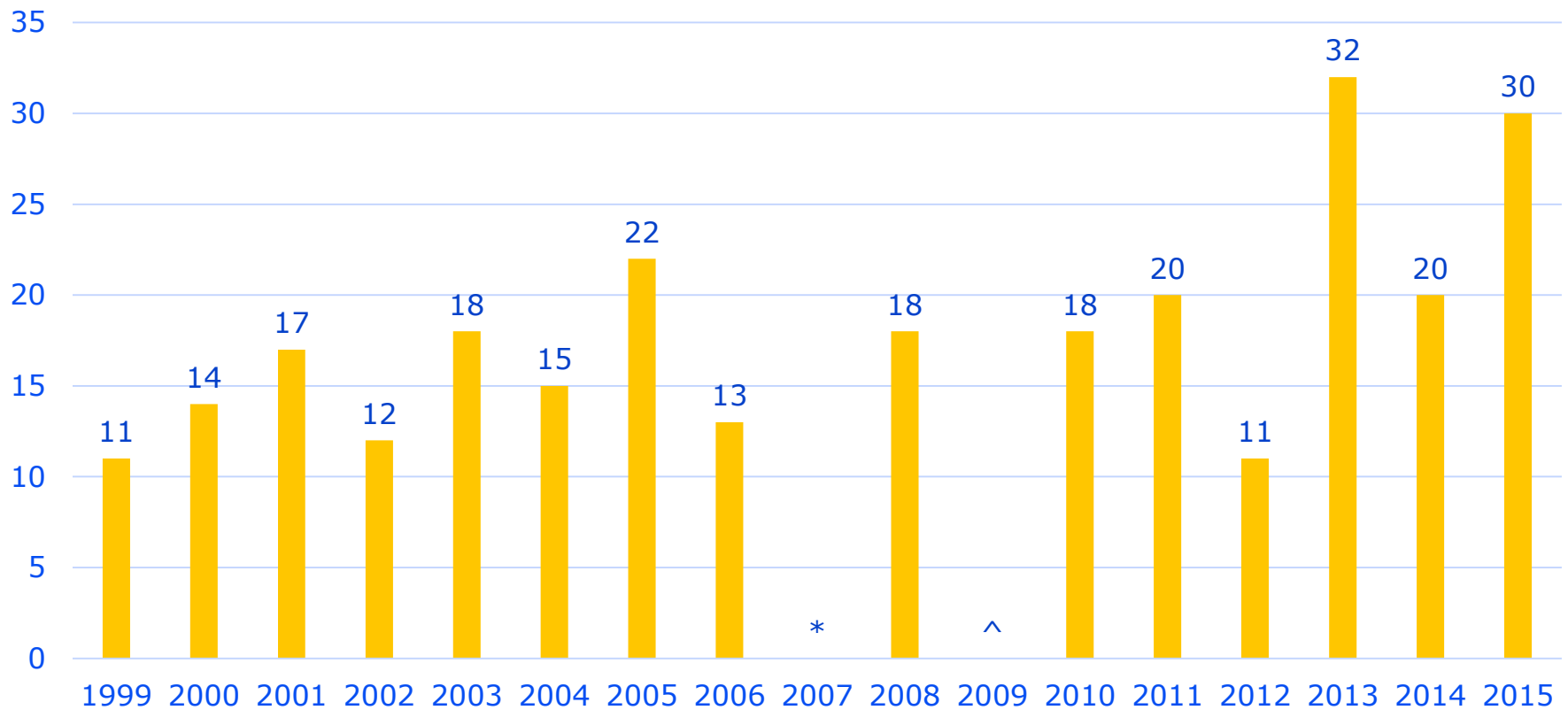
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Public Health Region 1 (Amarillo):

Accidental Overdose Deaths involving Opioids in Region 1 by Year, 1999-2015



* Counts of 1-9 are suppressed to prevent the identification of individuals in confidential data.

^ Value suppressed to prevent back calculation of suppressed small count

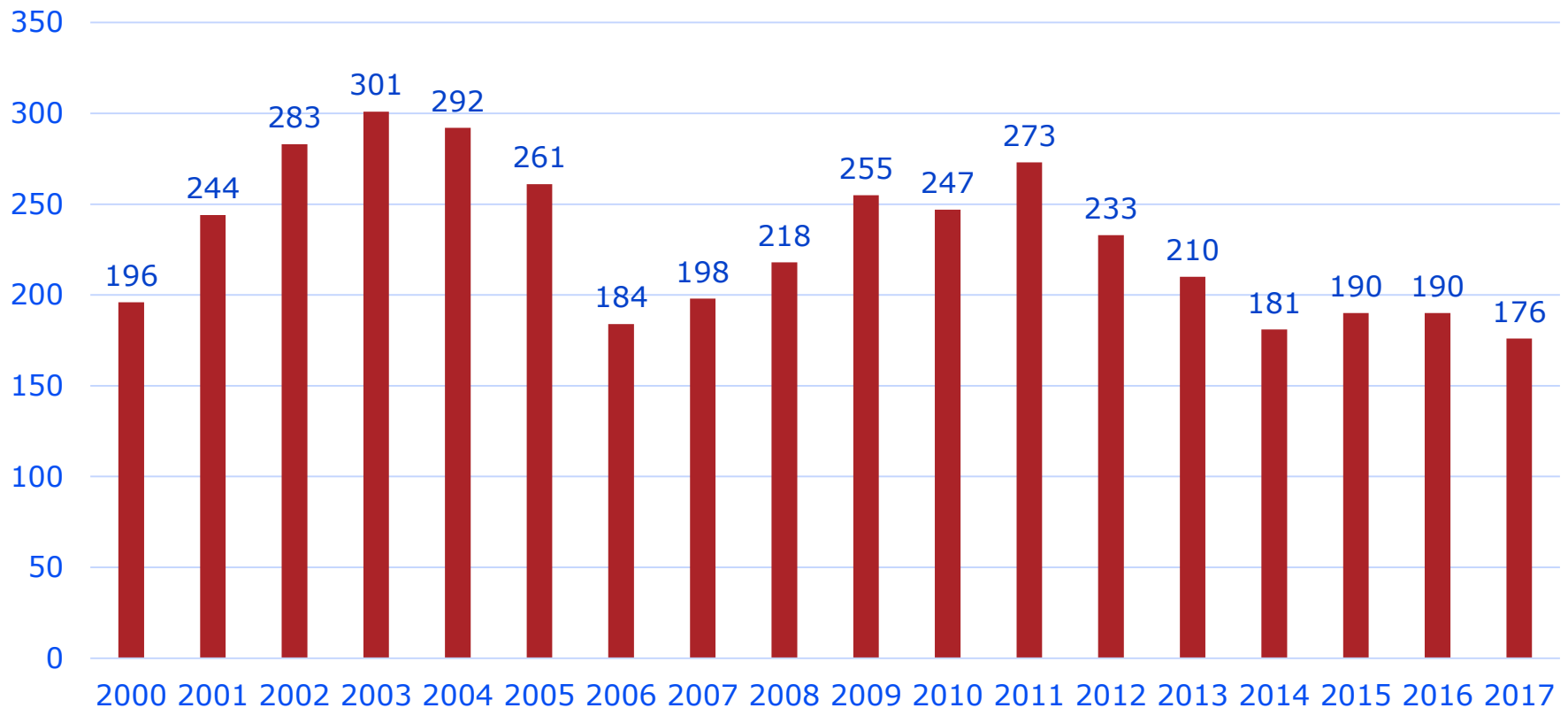


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Public Health Region 1 (Amarillo):

Opioid-Related Calls to the Texas Poison Center Network in Region 1 by Year, 2000-2017

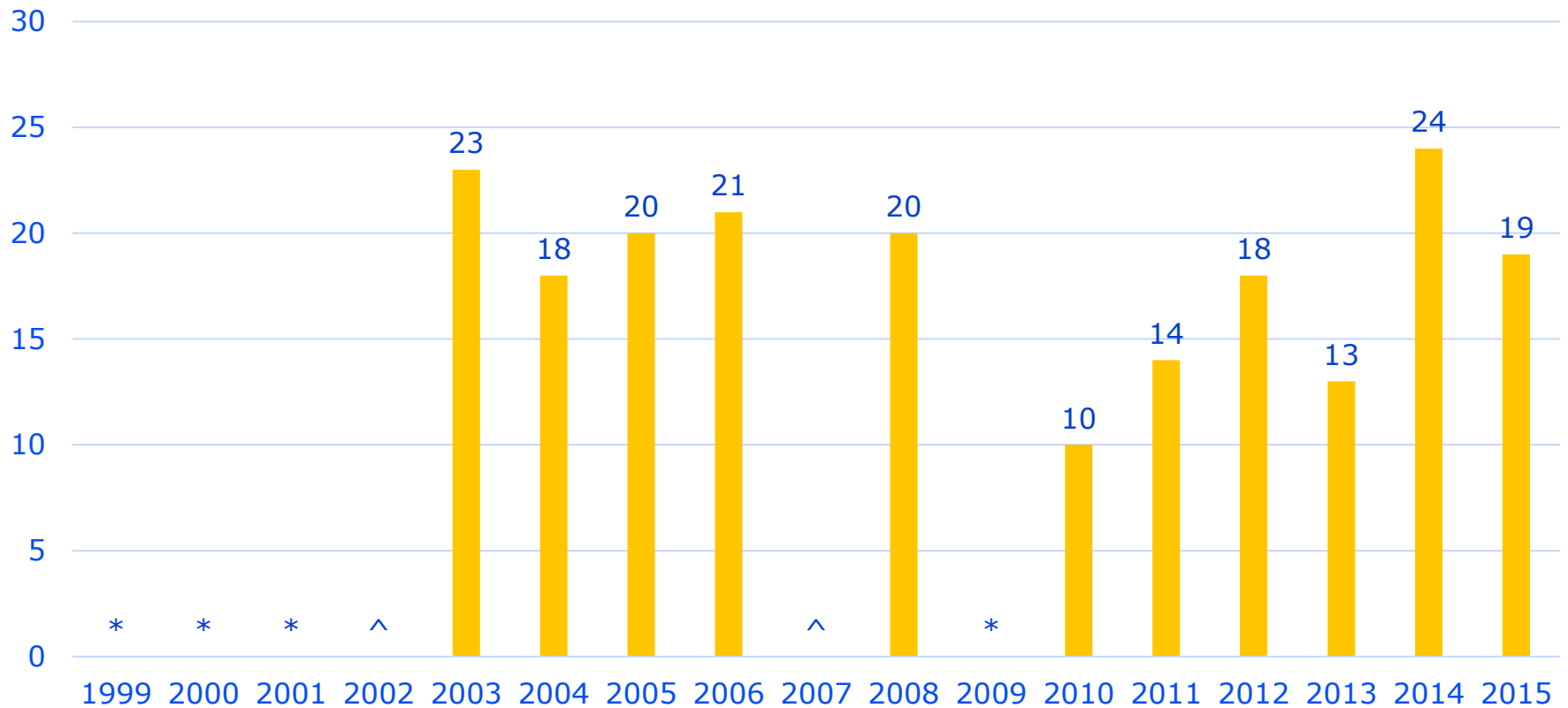


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Public Health Region 2 (Wichita Falls):

Accidental Overdose Deaths involving Opioids in Region 2 by Year, 1999-2015



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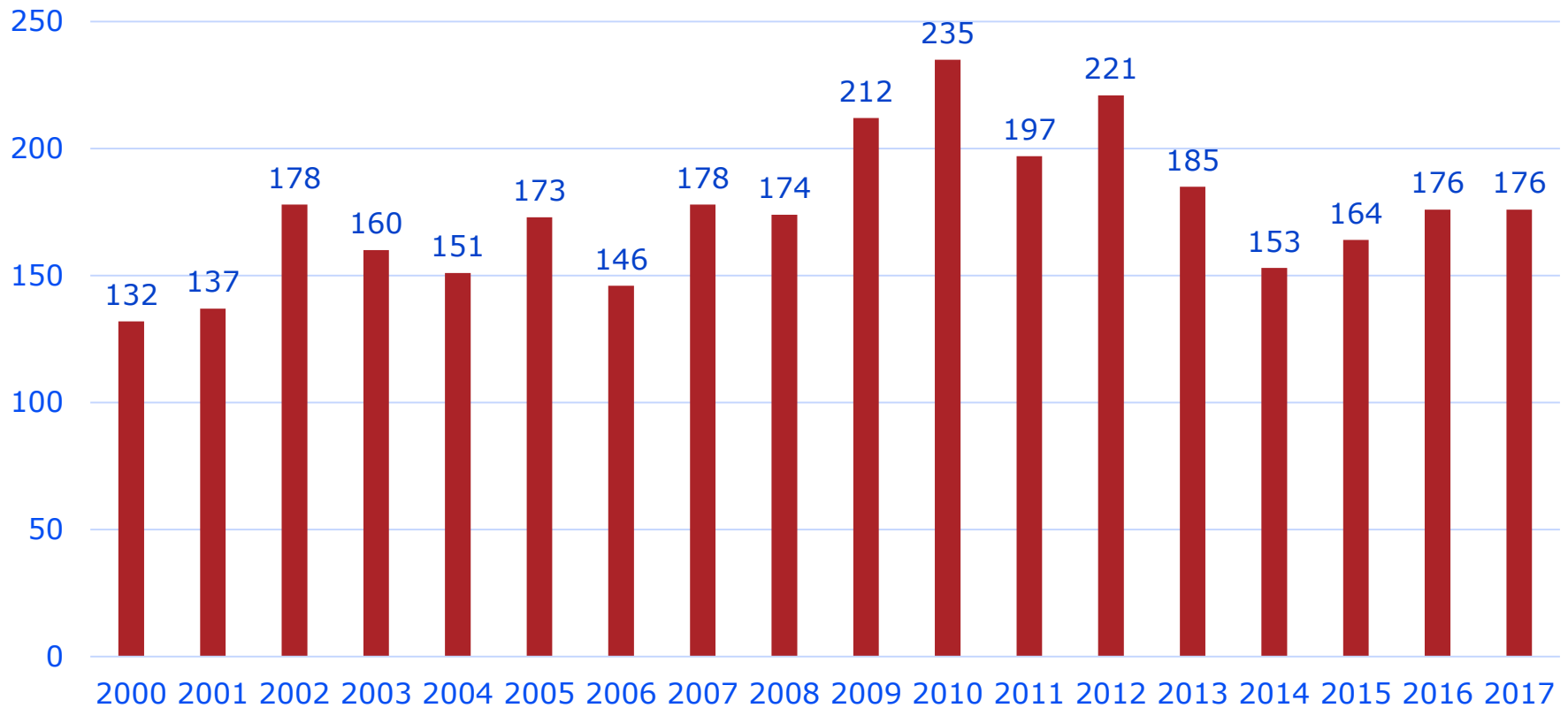


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Public Health Region 2 (Wichita Falls):

Opioid-Related Calls to the Texas Poison Center Network in Region 2 by Year, 2000-2017



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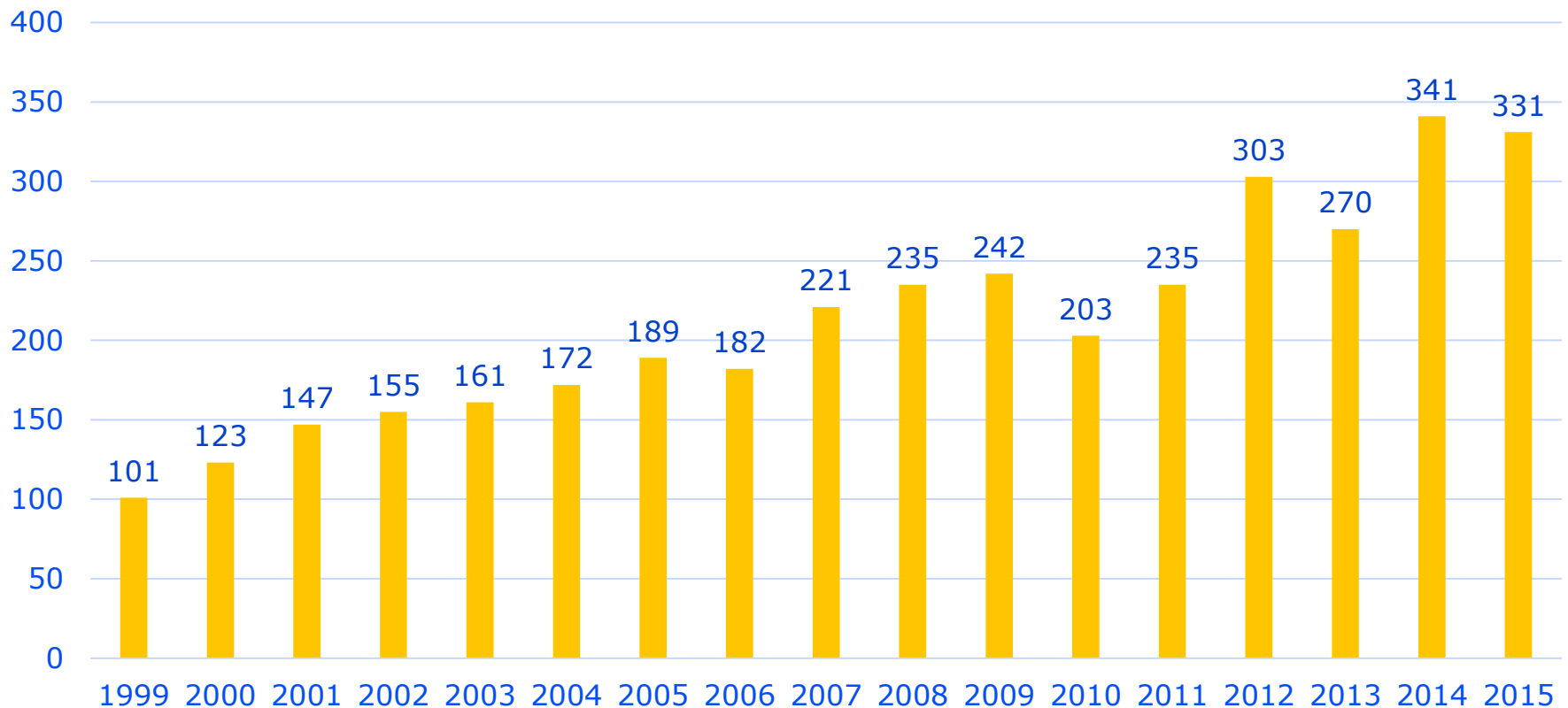


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Public Health Region 3 (Dallas/Fort Worth):

Accidental Overdose Deaths involving Opioids in Region 3 by Year, 1999-2015



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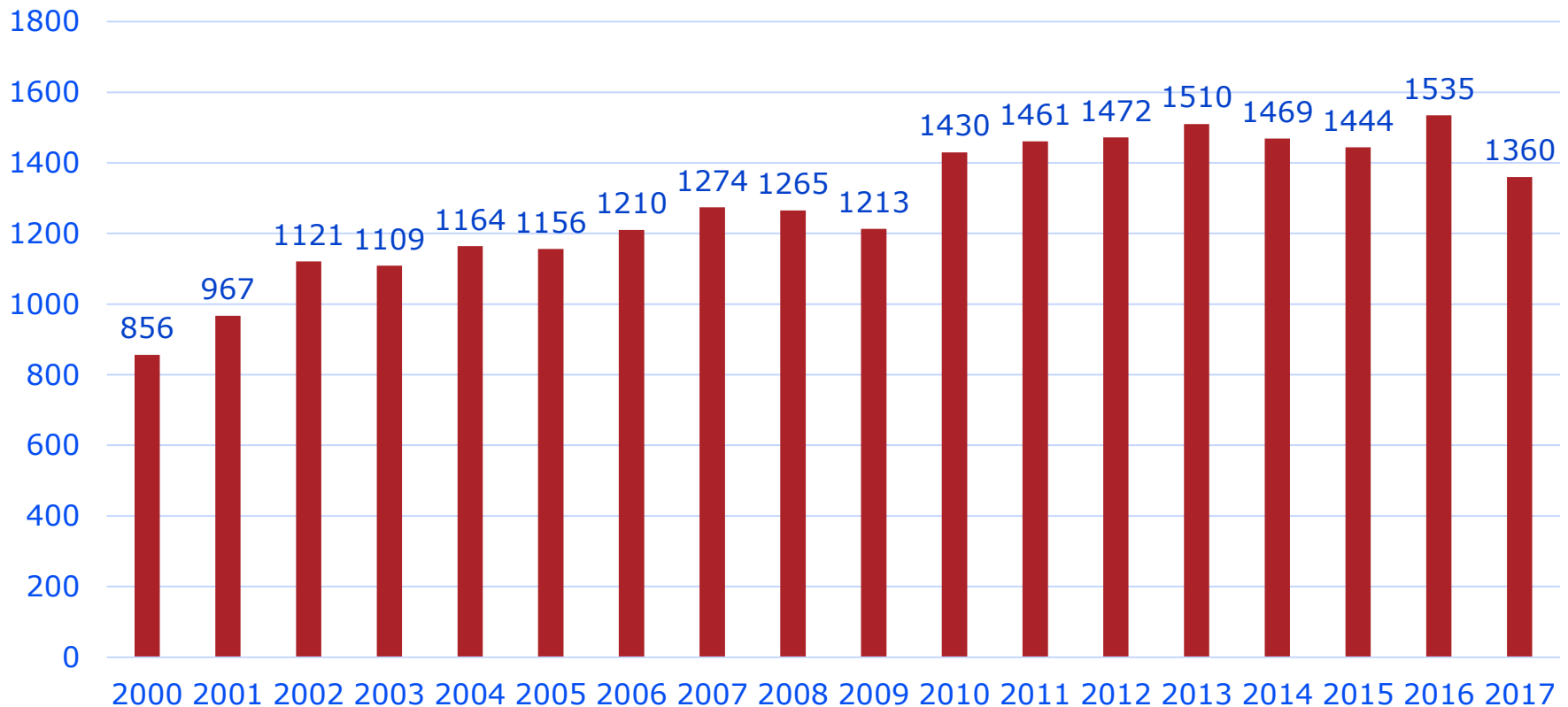


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Public Health Region 3 (Dallas/Fort Worth):

Opioid-Related Calls to the Texas Poison Center Network in Region 3 by Year, 2000-2017



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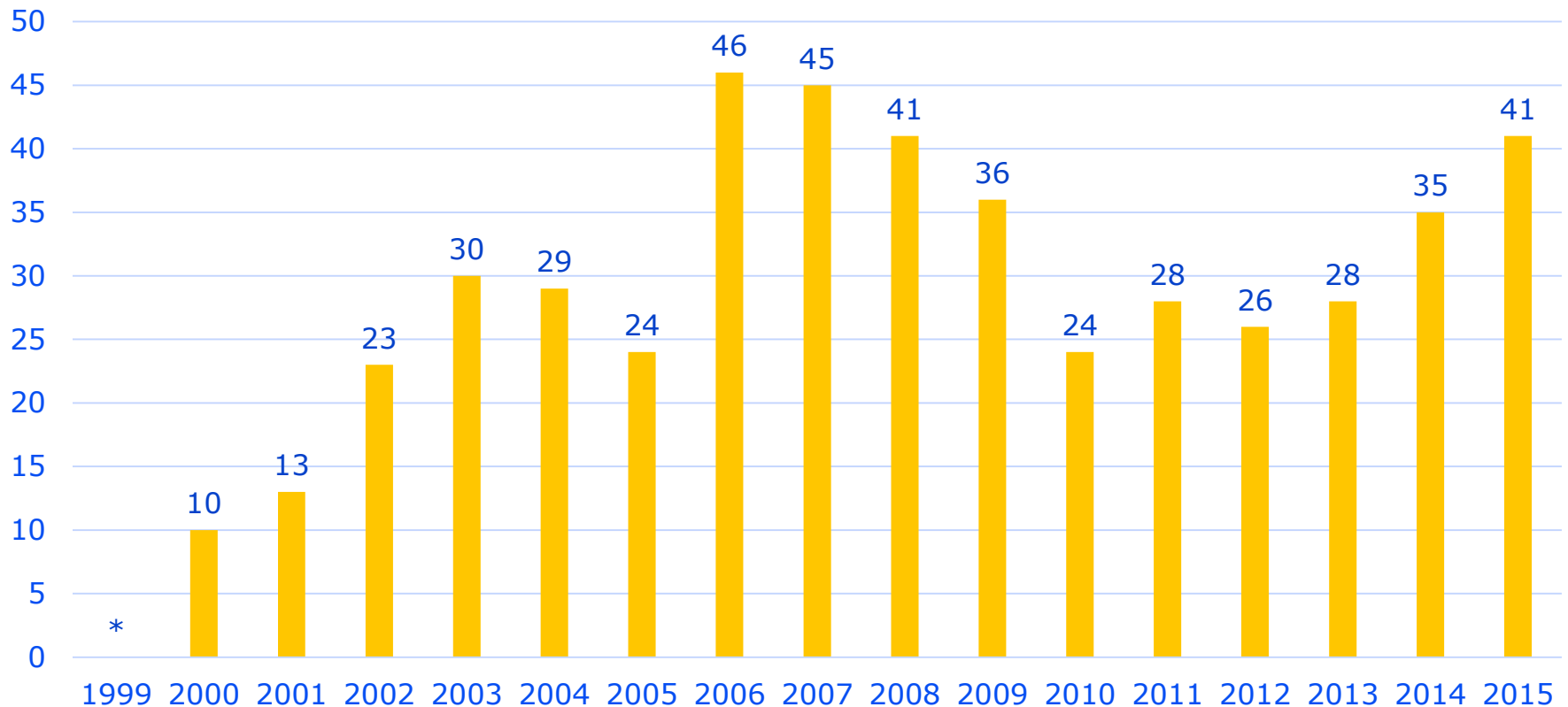


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Public Health Region 4 (Tyler):

Accidental Overdose Deaths involving Opioids in Region 4 by Year, 1999-2015



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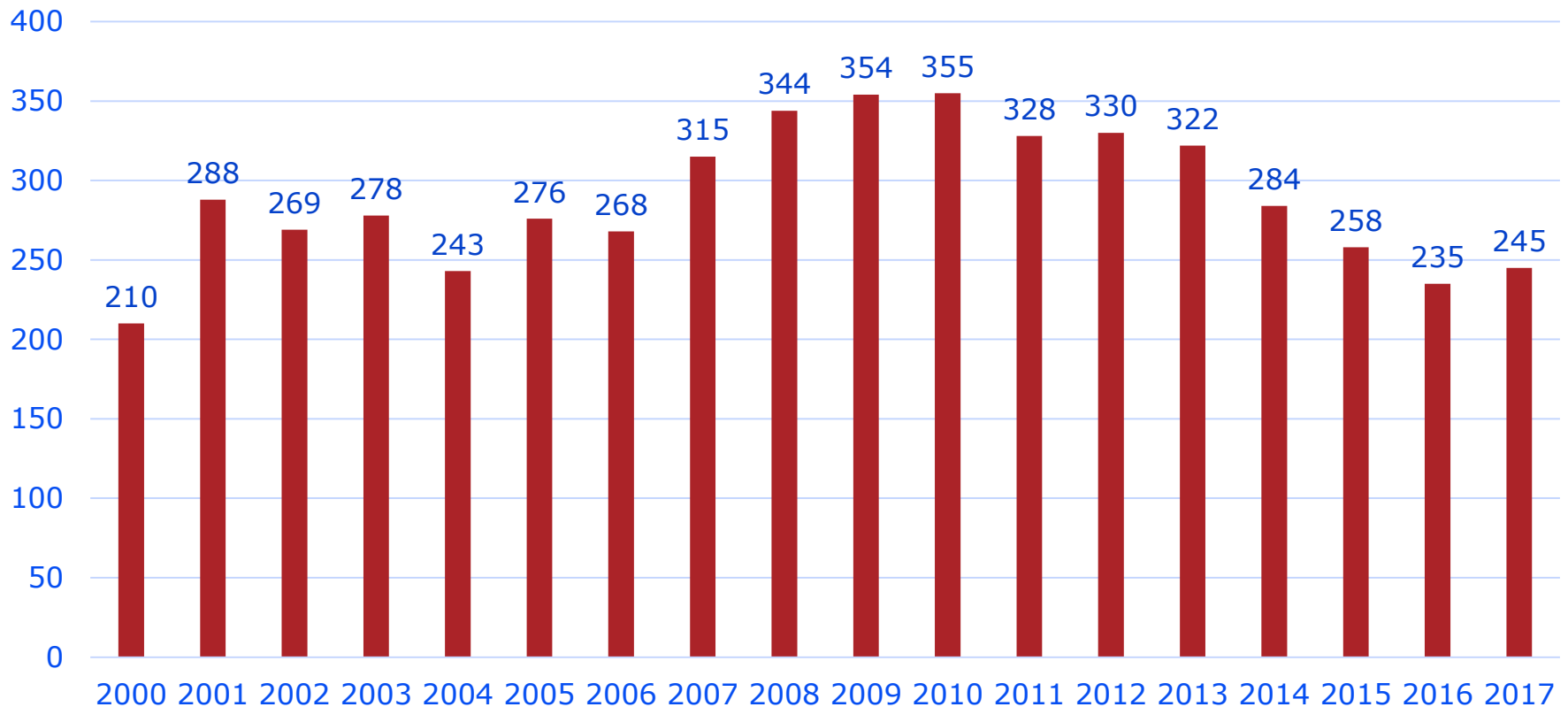


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Public Health Region 4 (Tyler):

Opioid-Related Calls to the Texas Poison Center Network in Region 4 by Year, 2000-2017



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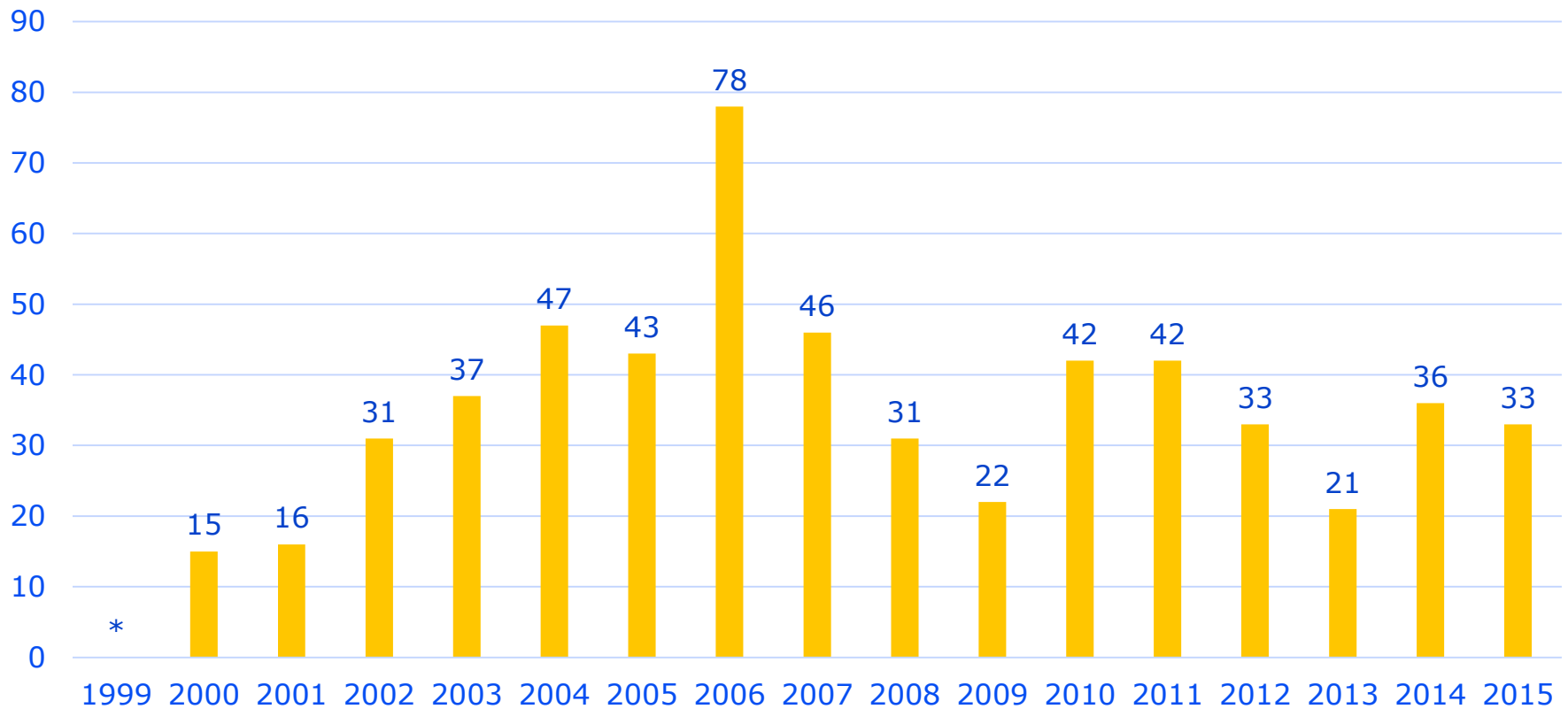


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Public Health Region 5 (Beaumont):

Accidental Overdose Deaths involving Opioids in Region 5 by Year, 1999-2015



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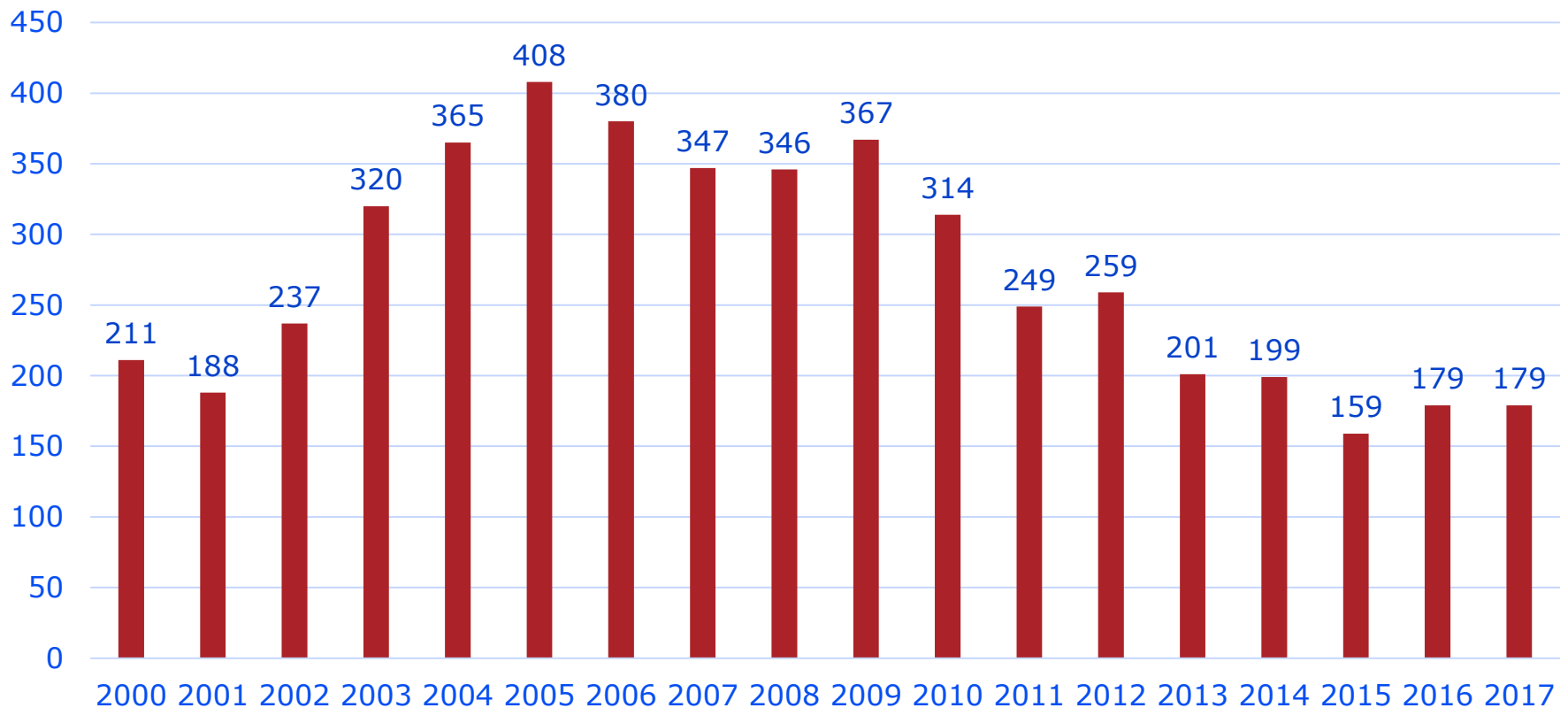


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Public Health Region 5 (Beaumont):

Opioid-Related Calls to the Texas Poison Center Network in Region 5 by Year, 2000-2017



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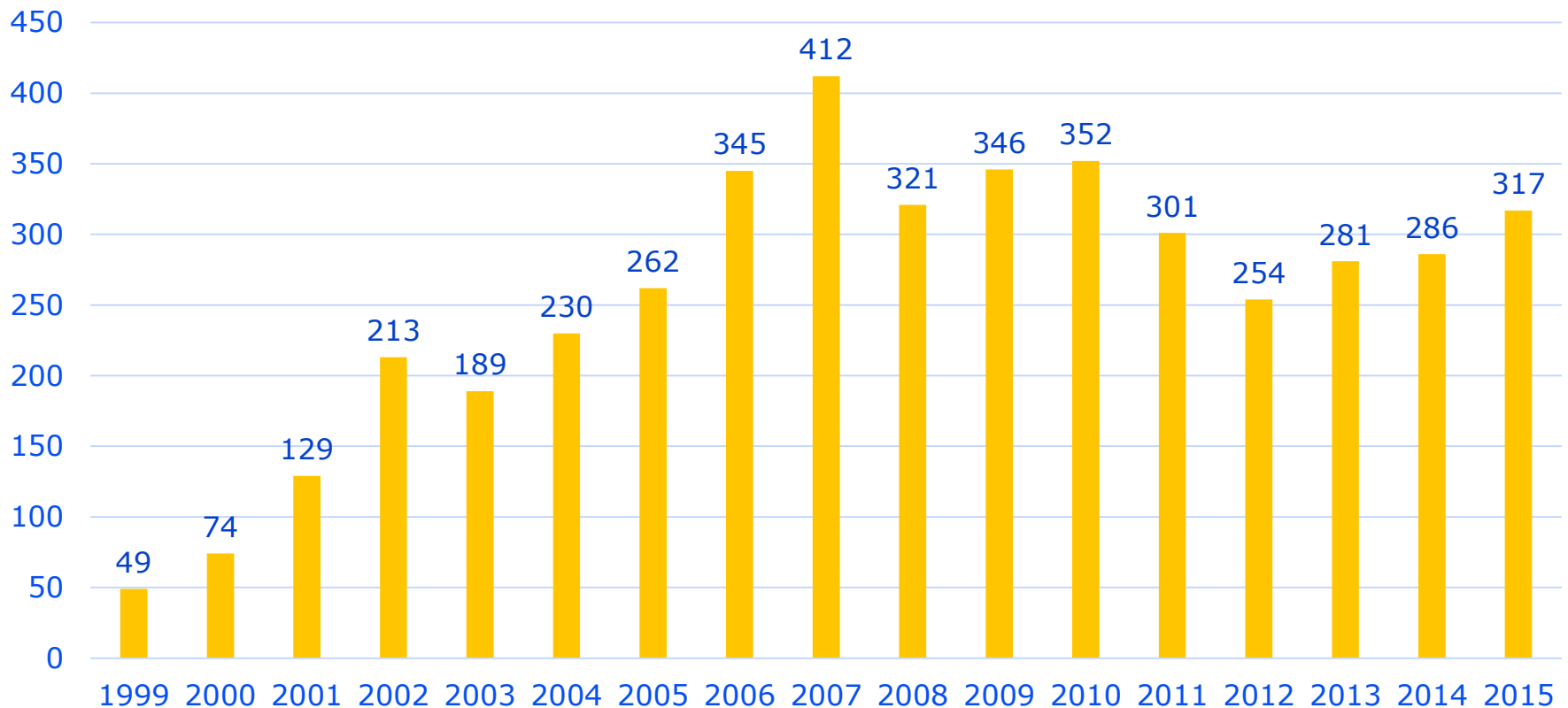


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Public Health Region 6 (Houston):

Accidental Overdose Deaths involving Opioids in Region 6 by Year, 1999-2015



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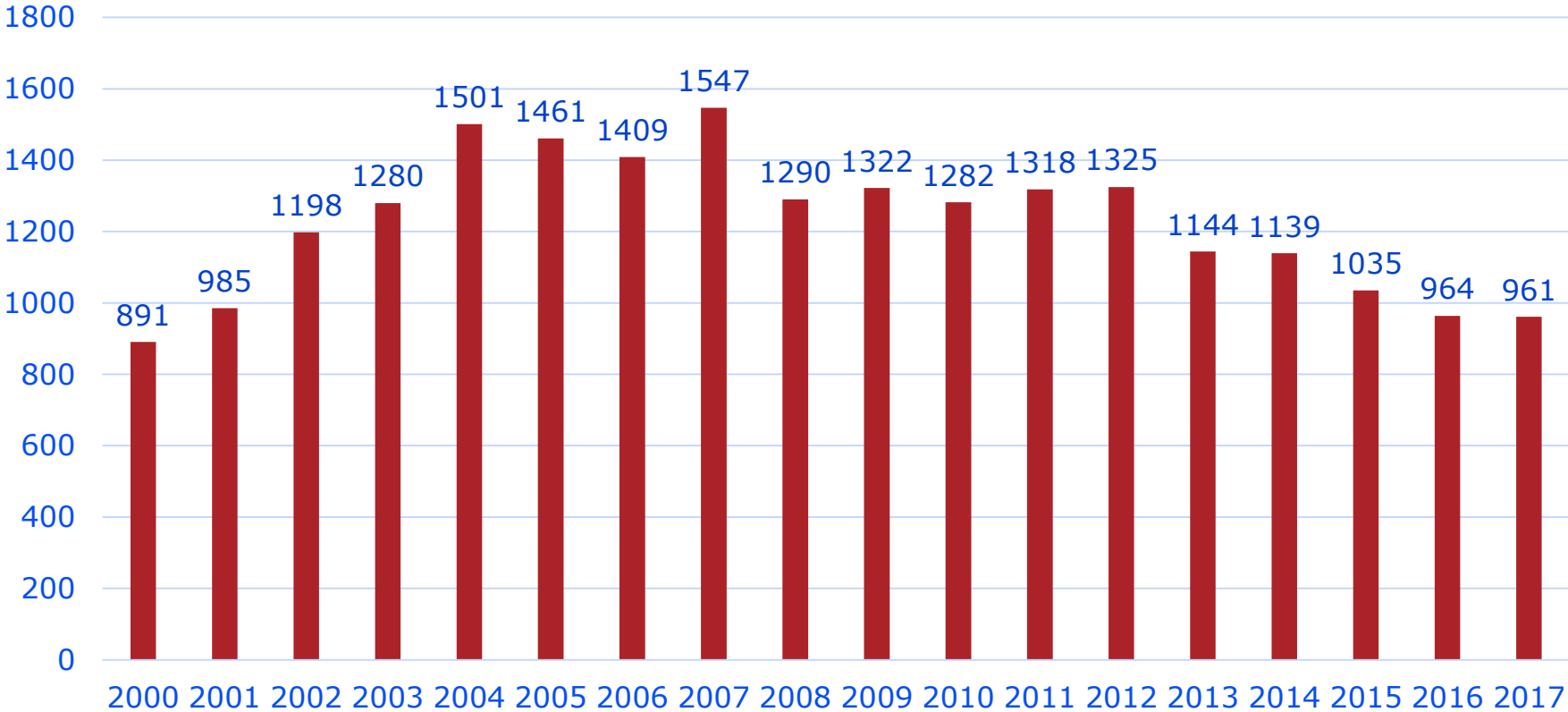


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Public Health Region 6 (Houston):

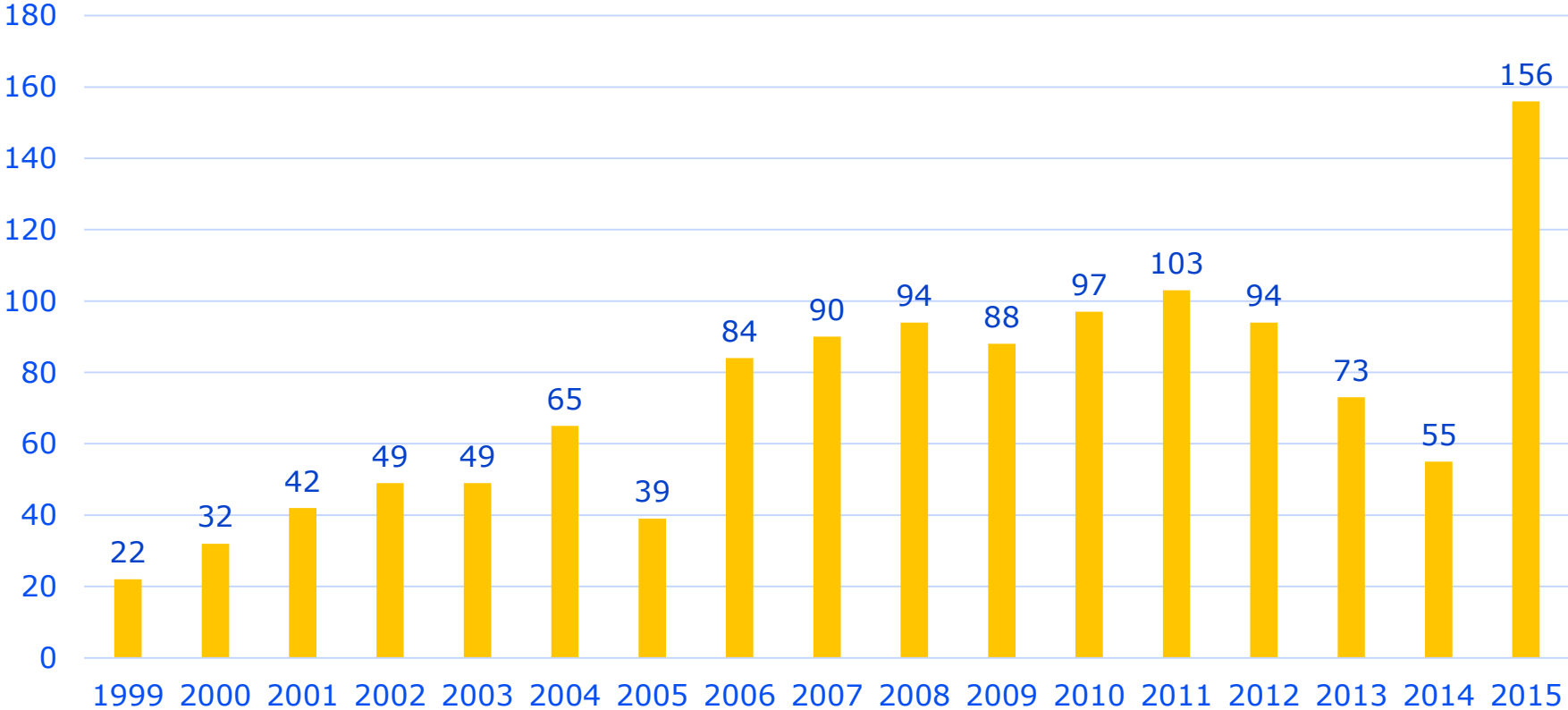
Opioid-Related Calls to the Texas Poison Center Network in Region 6 by Year, 2000-2017



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Public Health Region 7 (Austin):

Accidental Overdose Deaths involving Opioids in Region 7 by Year, 1999-2015



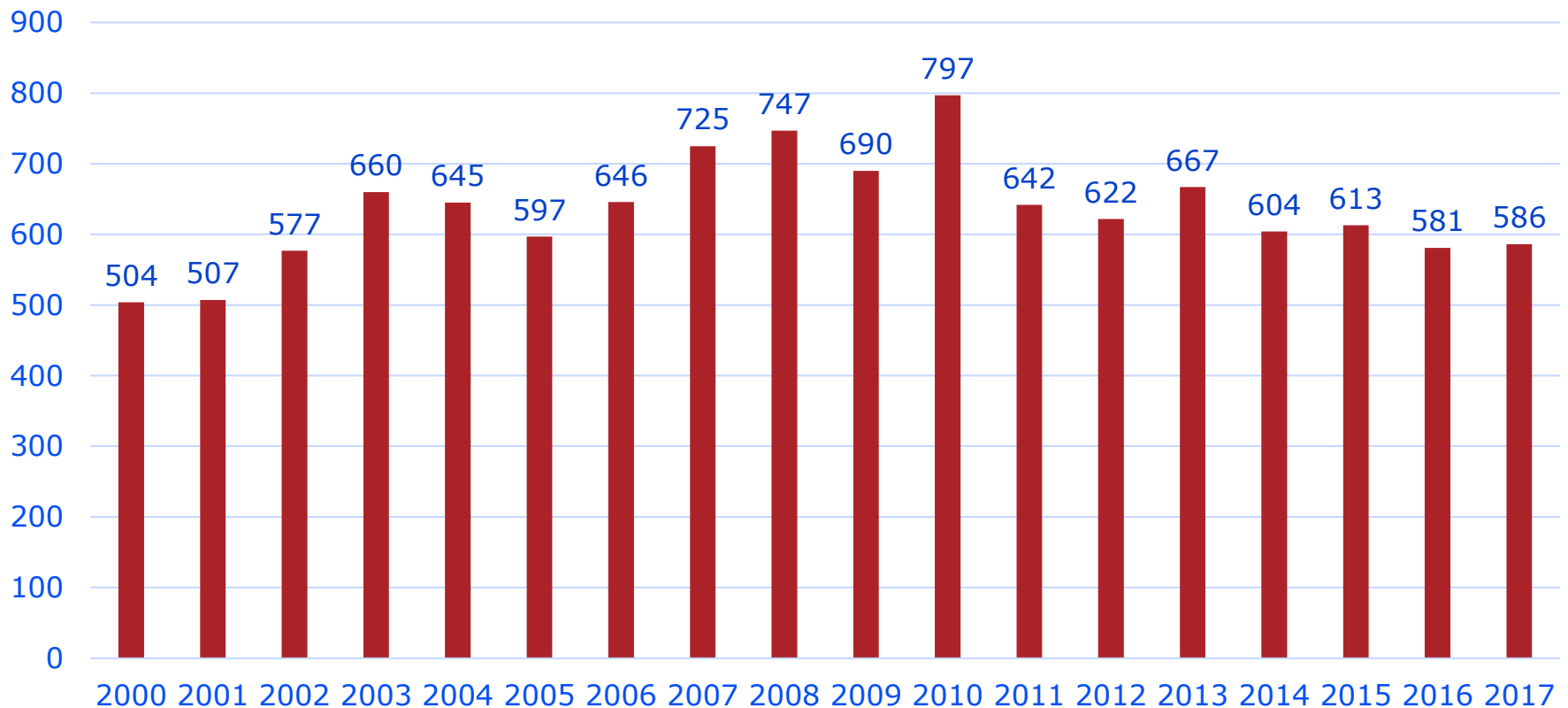
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Public Health Region 7 (Austin):

Opioid-Related Calls to the Texas Poison Center Network in Region 7 by Year, 2000-2017



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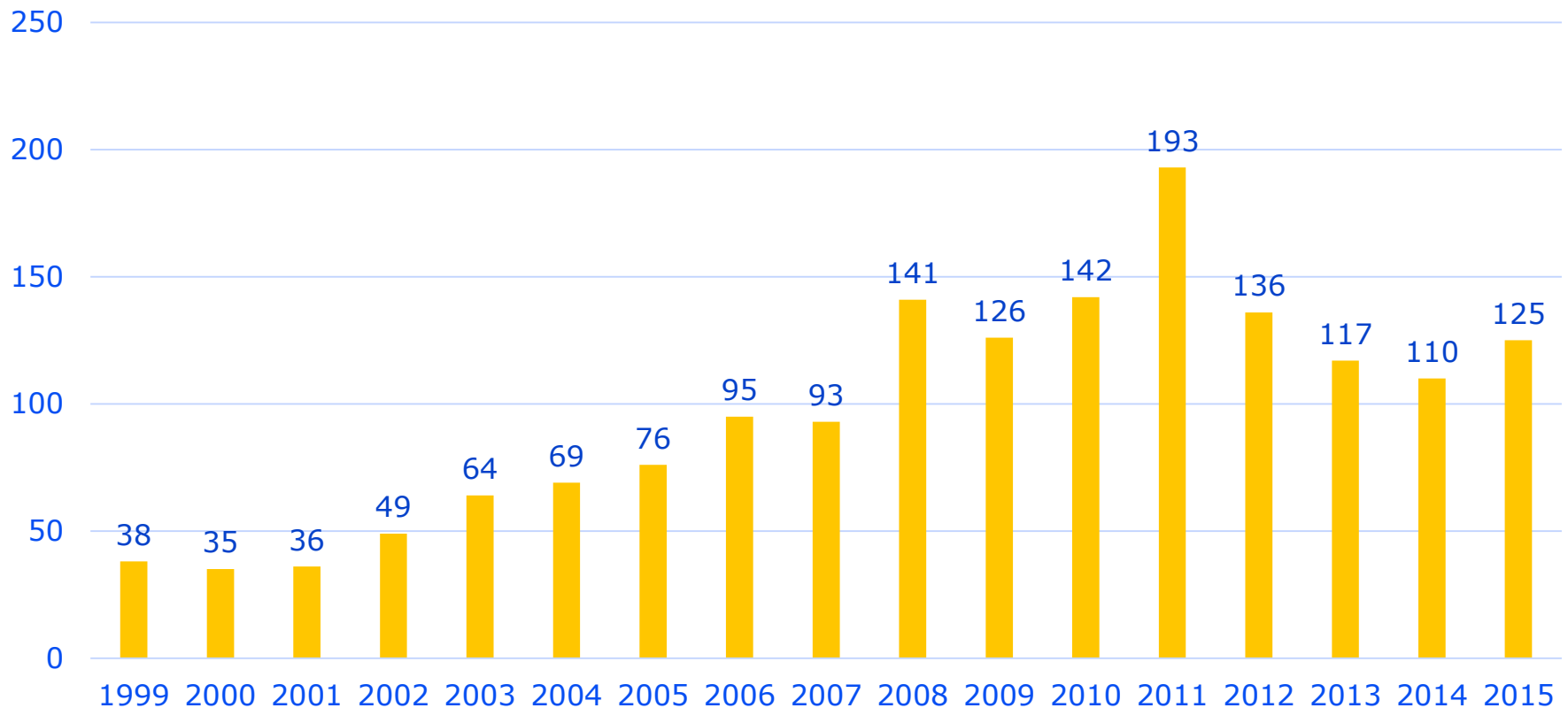


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Public Health Region 8 (San Antonio):

Accidental Overdose Deaths involving Opioids in Region 8 by Year, 1999-2015



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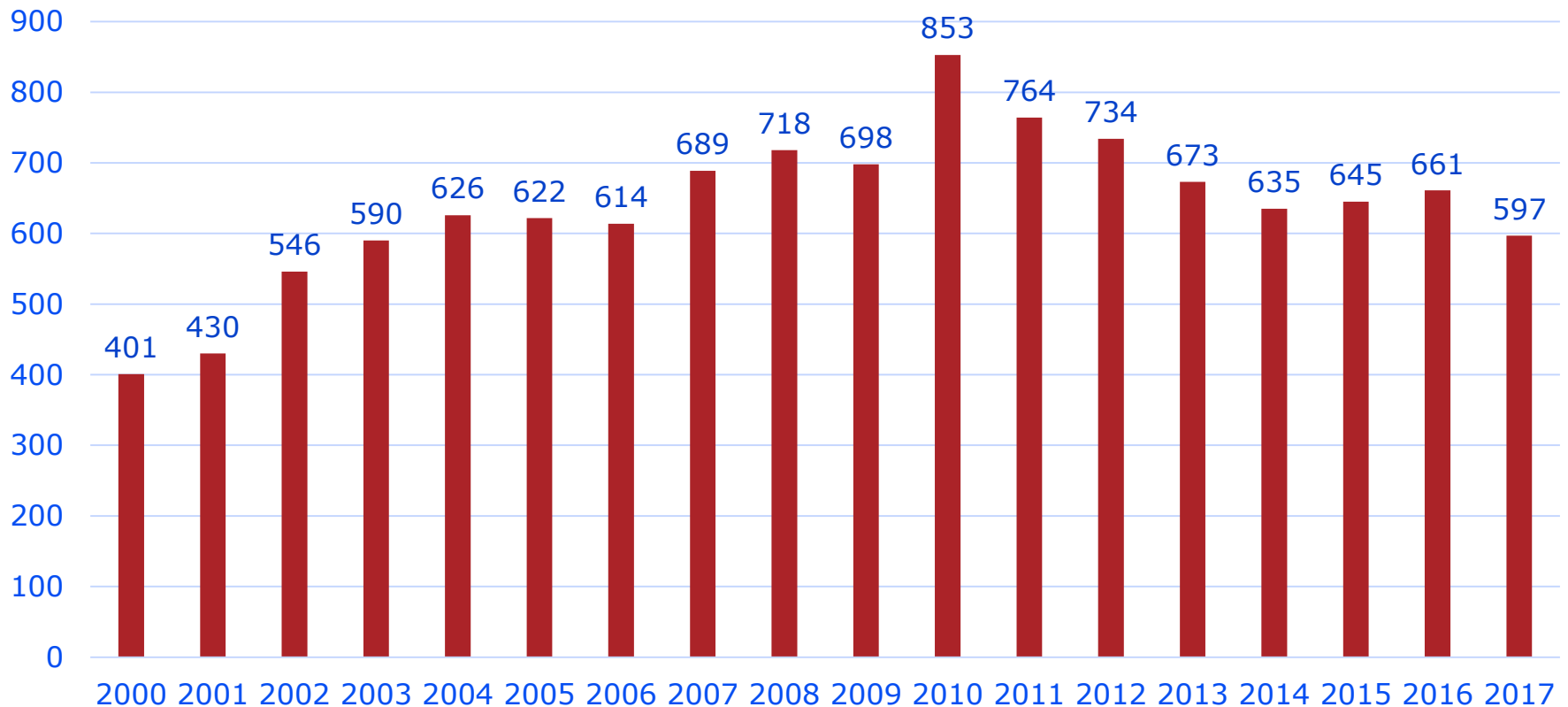


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Public Health Region 8 (San Antonio):

Opioid-Related Calls to the Texas Poison Center Network in Region 8 by Year, 2000-2017

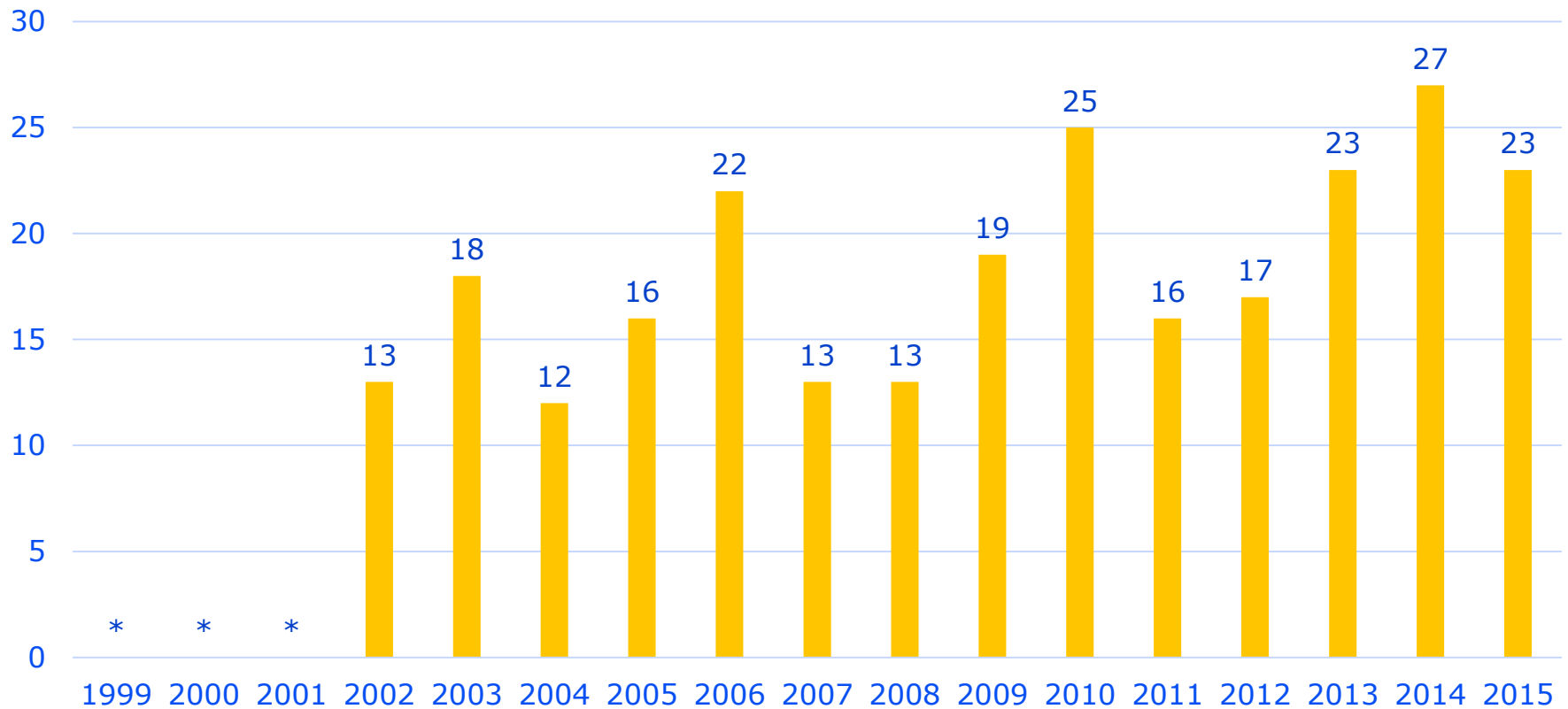


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Public Health Region 9 (Midland):

Accidental Overdose Deaths involving Opioids in Region 9 by Year, 1999-2015



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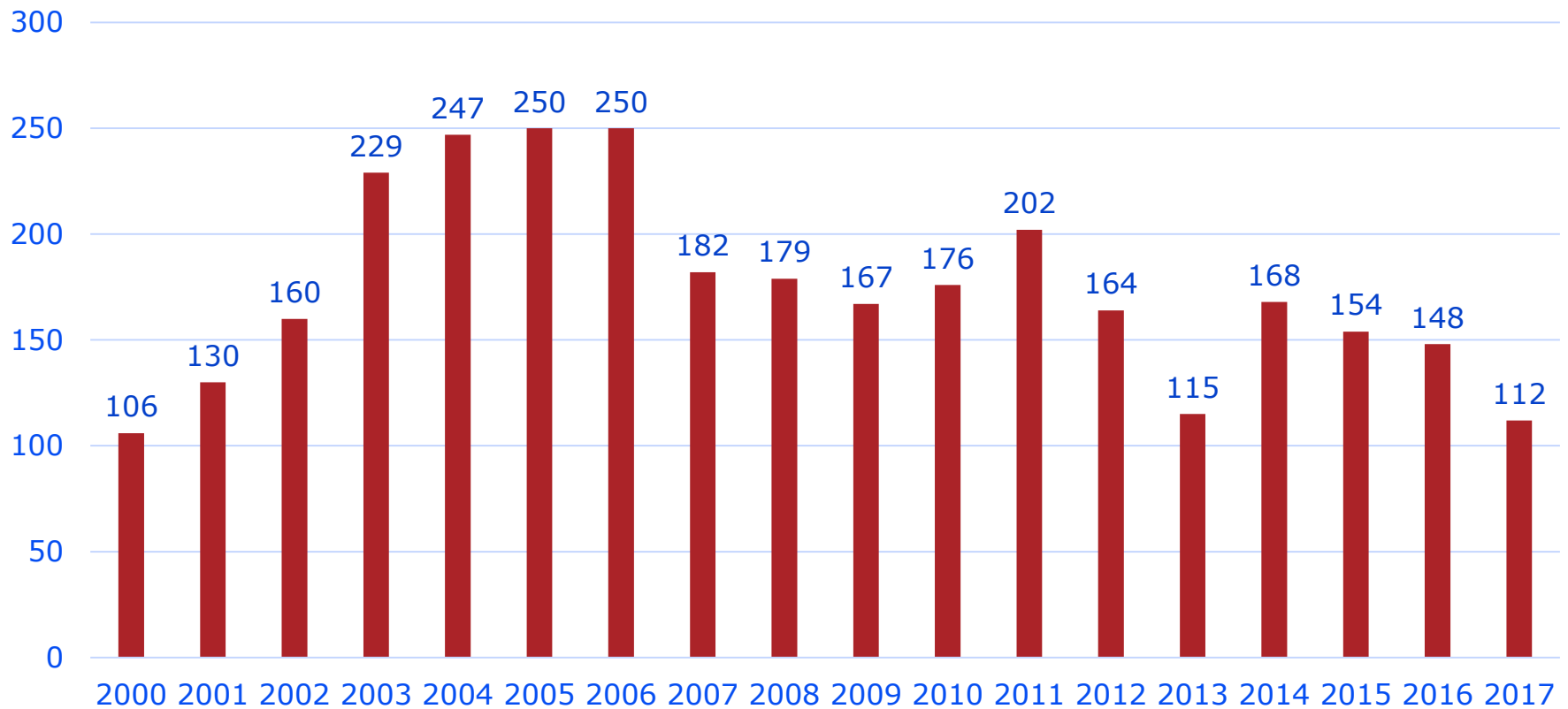


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Public Health Region 9 (Midland):

Opioid-Related Calls to the Texas Poison Center Network in Region 9 by Year, 2000-2017

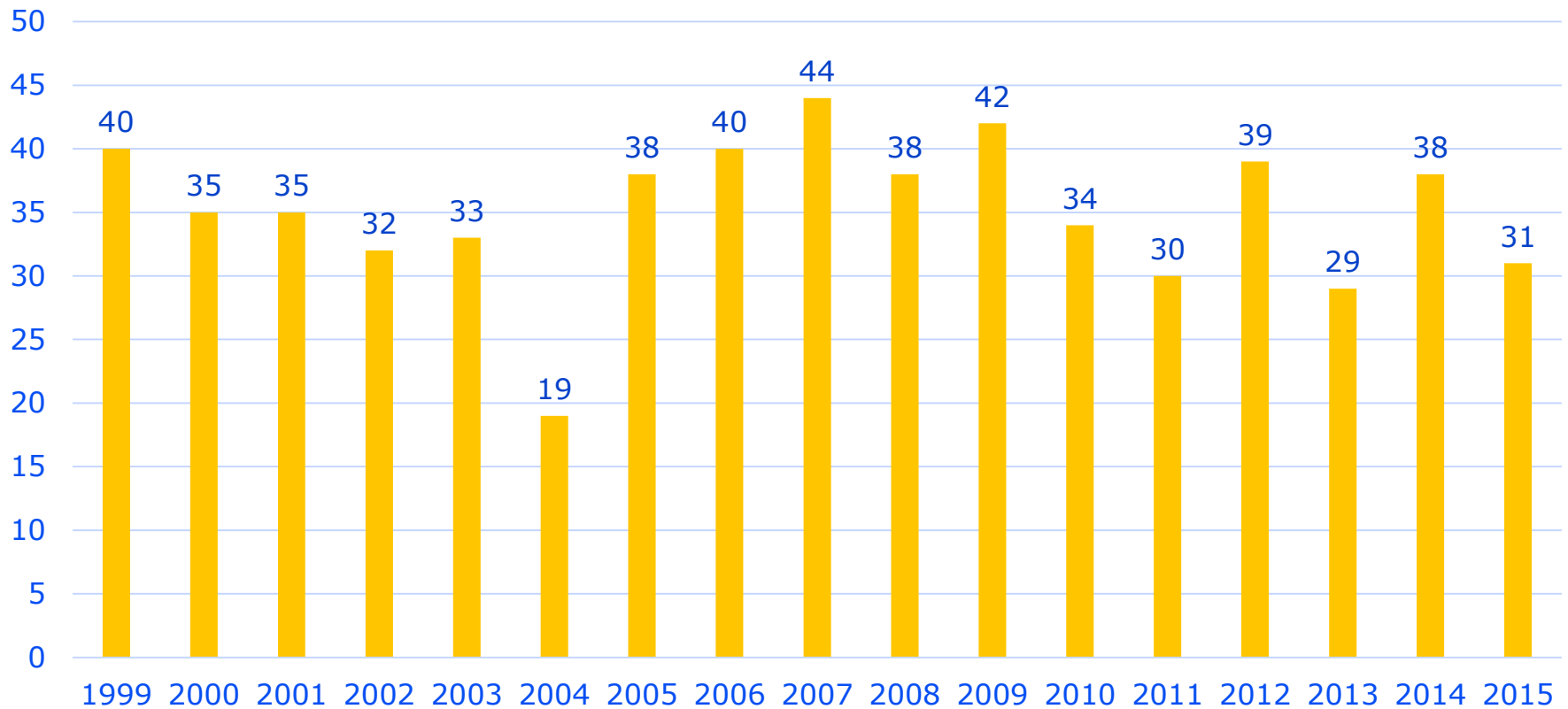


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Public Health Region 10 (El Paso):

Accidental Overdose Deaths involving Opioids in Region 10 by Year, 1999-2015



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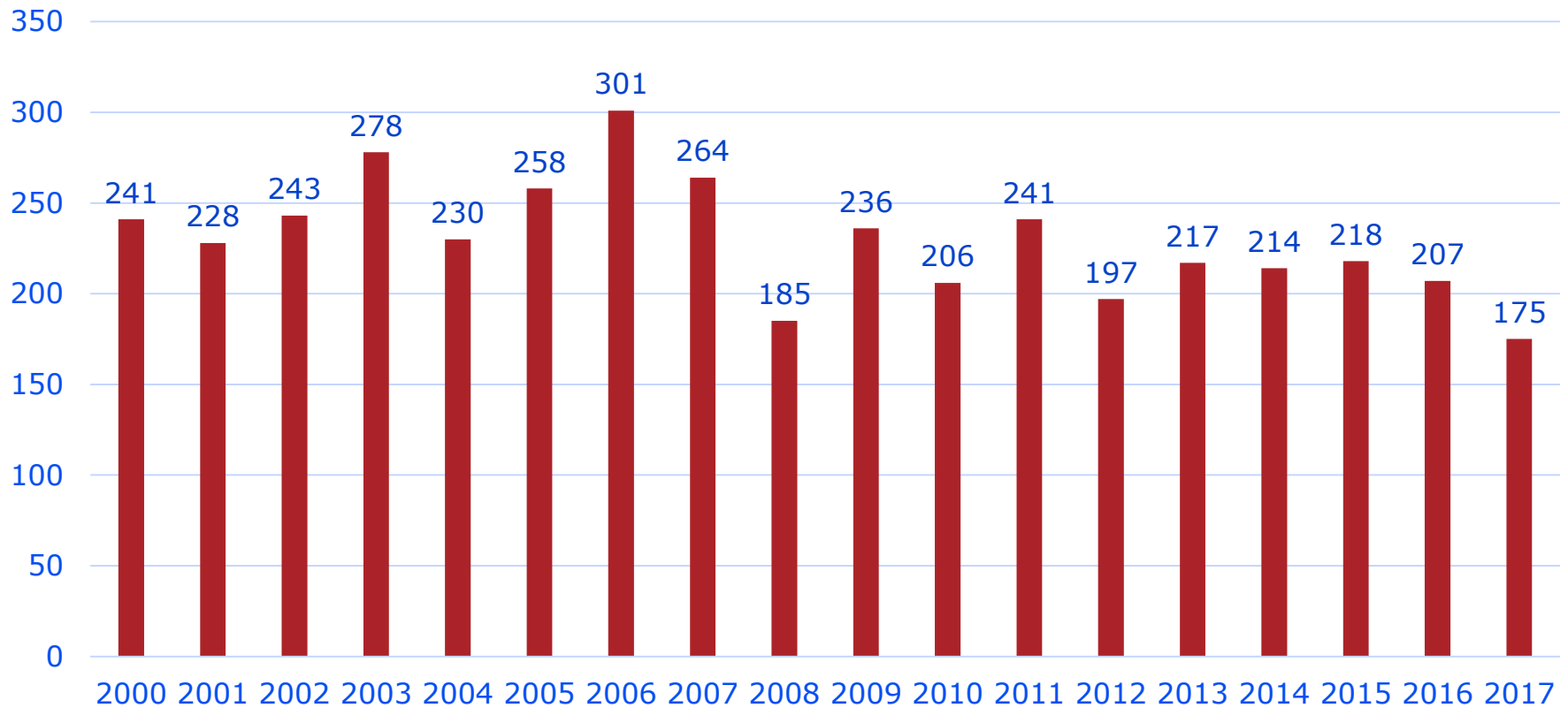


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Public Health Region 10 (El Paso):

Opioid-Related Calls to the Texas Poison Center Network in Region 10 by Year, 2000-2017



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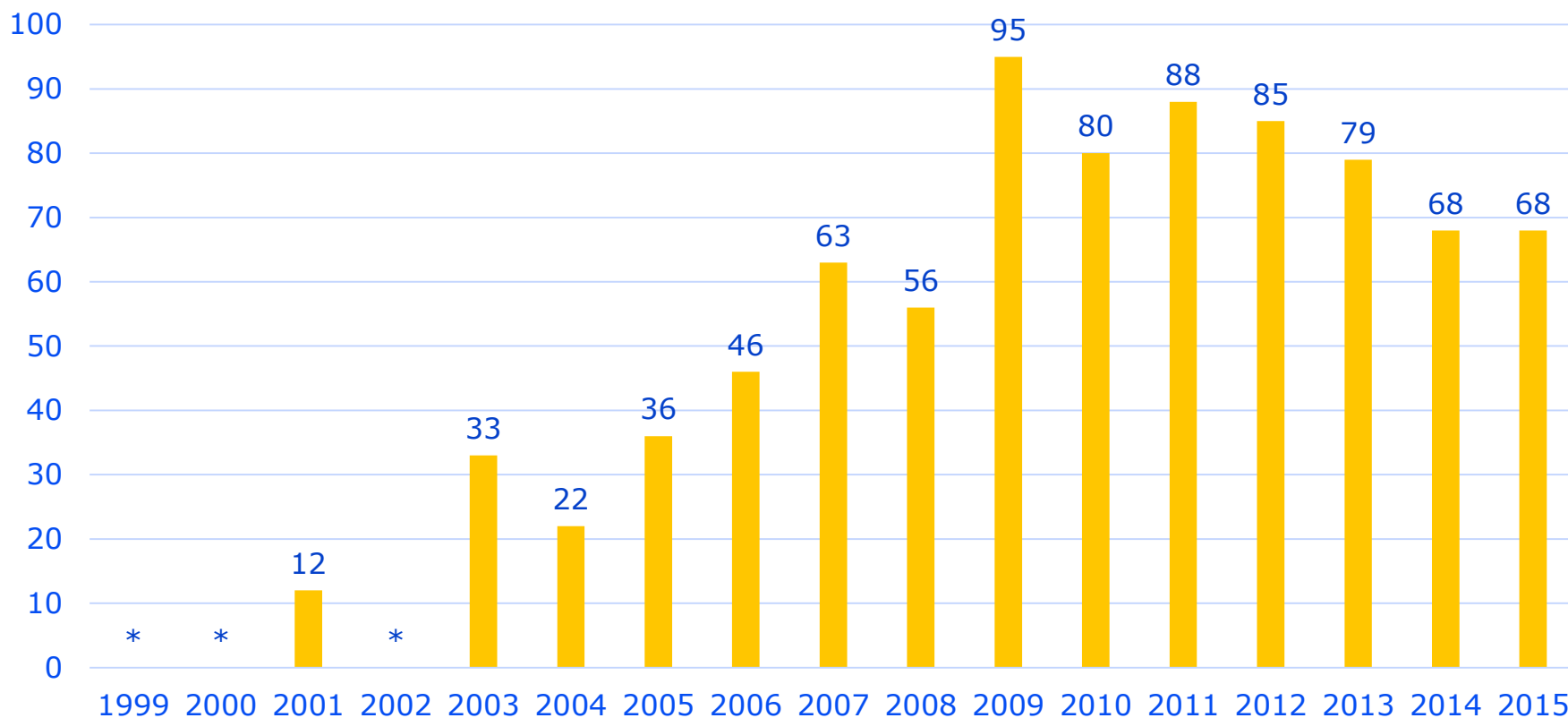


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Public Health Region 11 (Lower Rio Grande Valley):

Accidental Overdose Deaths involving Opioids in Region 11 by Year, 1999-2015



* Counts of 1-9 are suppressed to prevent the identification of individuals in confidential data.

^ Value suppressed to prevent back calculation of suppressed small count

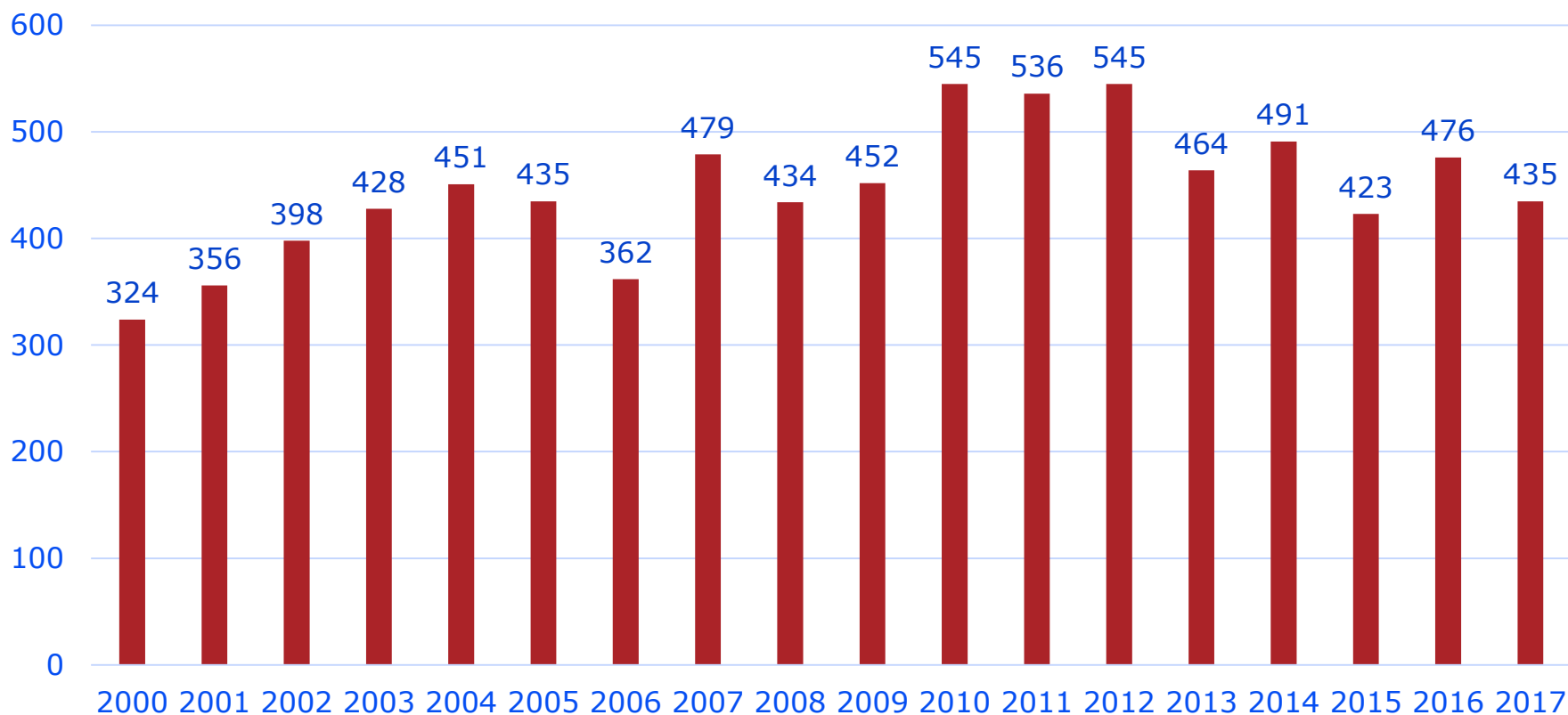


TEXAS
Health and Human
Services

Texas Department of State
Health Services

Public Health Region 11 (Lower Rio Grande Valley):

Opioid-Related Calls to the Texas Poison Center Network in Region 11 by Year, 2000-2017



* Counts of 1-4 are suppressed to prevent the identification of individuals in confidential data.



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