2017 Opioid Overdose & Death in Orange County
Overview

- Global Drug Deaths
- U.S. Drug Death Trends
- Drug Deaths in California & Orange County
- Opioids in Orange County
  - Prescriptions: California DOJ CURES Database
  - Morbidity: ED Visits & Hospitalizations
  - Mortality: Deaths
# America Has The Highest Drug-Death Rate in the World

Estimated number of drug-related deaths and mortality rate 2015

<table>
<thead>
<tr>
<th>Region</th>
<th>Per million people*</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>USA</td>
<td>245.8</td>
<td>52,400</td>
</tr>
<tr>
<td>North America</td>
<td>172.2</td>
<td>55,300</td>
</tr>
<tr>
<td>Oceania</td>
<td>102.3</td>
<td>2,600</td>
</tr>
<tr>
<td>Asia</td>
<td>61.9</td>
<td>66,100</td>
</tr>
<tr>
<td>Latin America and the Caribbean</td>
<td>55.6</td>
<td>5,000</td>
</tr>
<tr>
<td>World average</td>
<td>39.6</td>
<td>190,900</td>
</tr>
<tr>
<td>Western and Central Europe</td>
<td>26.4</td>
<td>8,400</td>
</tr>
<tr>
<td>Eastern and South-Eastern Europe</td>
<td>22.5</td>
<td>12,600</td>
</tr>
<tr>
<td>Africa</td>
<td>14.9</td>
<td>40,800</td>
</tr>
</tbody>
</table>

* mortality rate per million persons aged 15–64

Best estimates according to source

Source: UNODC
Drug Overdose Deaths in the U.S.
Drug Death Rates

- West Virginia
- New Hampshire
- United States
- California
- Orange Co

Drug Deaths per 100,000

- 2015
- 2010
Between 2005 and 2015, the increases in the opioid overdose death rate were particularly prominent in CT, DE, MS, NH, NY, OH, and WV.

SOURCE: Kaiser Family Foundation analysis of Centers for Disease Control and Prevention (CDC), National Center for Health Statistics. Multiple Cause of Death 1999-2015 on CDC WONDER Online Database
Opioid Prescriptions in Orange County

California DOJ Controlled Substance Utilization Review & Evaluation (CURES) Database

- Almost half (45%) of the four million prescriptions to OC residents for narcotics reported in 2015 were for opioid analgesics.

- A total of 1,711,809 prescriptions for opioids (e.g., hydrocodone, oxycodone) were dispensed to OC residents in 2015.

- The average prescription was for 72 pills which corresponded to over 122,000,000 pills in one year alone (~40 pills per resident/year)
Opioid-Related Emergency Department (ED) Visits and Hospitalizations in Orange County (2005-2015)
Opioid-Related Emergency Department Visits and Hospitalizations (2005-2015)
Opioid-Related Emergency Department Visits by Gender (2011-2015)

**MALE**
- Average number of males per year: 906
- Average 5-year male rate per 100,000 persons: 59.1
- Male percentage of all Emergency Department visits: 61%

**FEMALE**
- Average number of females per year: 585
- Average 5-year female rate per 100,000 persons: 37.4
- Female percentage of all Emergency Department visits: 39%
Opioid-Related Emergency Department Visits by Race/Ethnicity (2011-2015)

- **Non-Hispanic White**: 78%
- **Hispanic**: 15%
- **Asian/Pacific Islander**: 4%
- **African American**: 2%
- **Other/Unknown**: 1%

Rate per 100,000 persons:
- **Non-Hispanic White**: 73.2
- **Hispanic**: 21.5
- **Asian/Pacific Islander**: 41.8
- **Other/Unknown**: 4.6

*Rate should be interpreted with caution due to small population size.
Opioid-Related ED Visits by ZIP Code (2011-2015)

Rate of Opioid Related ED Visits by ZIP Code

<table>
<thead>
<tr>
<th>Rate per 100k</th>
<th>Color</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt; 30.8</td>
<td>Lightest Green</td>
</tr>
<tr>
<td>30.9 - 45.7</td>
<td>Light Green</td>
</tr>
<tr>
<td>45.8 - 72.8</td>
<td>Medium Green</td>
</tr>
<tr>
<td>72.0 - 126.0</td>
<td>Dark Green</td>
</tr>
</tbody>
</table>

Source: OSHPD ED, 2011-2015
Opioid-Related Overdose Deaths in Orange County (2011-2015)

Source: OC Coroner, 2011-2015
Opioid-Related Overdose Deaths by Gender (2011-2015)

MALE
- Average number of male overdose deaths per year: 149
- Average 5-year male rate per 100,000 persons: 9.7

FEMALE
- Average number of female overdose deaths per year: 93
- Average 5-year female rate per 100,000 persons: 5.9

MALE: 62%
FEMALE: 38%
Opioid-Related Overdose Deaths by Race/Ethnicity (2011-2015)

- **Non-Hispanic White**: 82% (Rate: 14.8 per 100,000 persons)
- **Hispanic**: 14% (Rate: 3.2 per 100,000 persons)
- **Asian/Pacific Islander**: 3% (Rate: 1.1 per 100,000 persons)
- **African American**: 1% (Rate: 6.2* per 100,000 persons)

*Rate should be interpreted with caution due to small population size.
Opioid-Related Overdose Deaths by Gender and Age Group (2011-2015)

- **65+ Years**
  - Rate per 100,000 persons: 3.9
  - Average OD deaths per year: 15
- **55-64 Years**
  - Rate per 100,000 persons: 12.9
  - Average OD deaths per year: 46
- **45-54 Years**
  - Rate per 100,000 persons: 13.8
  - Average OD deaths per year: 62
- **35-44 Years**
  - Rate per 100,000 persons: 9.5
  - Average OD deaths per year: 40
- **25-34 Years**
  - Rate per 100,000 persons: 11.5
  - Average OD deaths per year: 49
- **18-24 Years**
  - Rate per 100,000 persons: 8.2
  - Average OD deaths per year: 26
- **10-17 Years**
  - Rate per 100,000 persons: 0.5
  - Average OD deaths per year: 2

Age group distribution:
- 6%: 65+ years
- 19%: 55-64 years
- 26%: 45-54 years
- 17%: 35-44 years
- 20%: 25-34 years
- 11%: 18-24 years
- 1%: 10-17 years
Opioid-Related Overdose Deaths by Opioid Type and Intent (2011-2015)

Opioid subtype percentages*

Natural/Semi-Synthetic Opioids 66%

- Heroin 20%
- Methadone 15%
- Other Synthetic Opioids 12%

*Drug cause of death may indicate more than one type of opioid found prior to overdose.
Opioid-Related Overdose Deaths by City (2011-2015)

Rate of Opioid-related Overdose Deaths by City

Rate per 100,000 persons

- 2.5 - 3.6
- 3.7 - 7.0
- 7.1 - 9.6
- 9.7 - 13.7

Source: OC Coroner, 2011-2015
Opioid-Related ED Visits, Hospitalizations, & Deaths in Orange County

- ED Visit Rate
- Hospitalization Rate
- Death Rate

Rate per 100,000 persons

Years: 2005 to 2016