

Hawaii Drug Overdose Surveillance & Epidemiology (DOSE) Statewide Quarterly Report | Quarters 1-2, 2022 (Jan - Jun)

Overdose Data to Action (OD2A) is a program administered by the Centers for Disease Control and Prevention (CDC) that supports state, territorial, county, and local health departments to acquire more comprehensive and timely data on overdose morbidity and mortality. Furthermore, the goal of the program is to improve opioid overdose surveillance, reporting, and dissemination efforts through innovation to better inform preventive and early intervention methods. This annual report is comprised of information on overdose within the state of Hawaii based on emergency department (ED) and hospitalization data from the Laulima Data Alliance, a nonprofit subsidiary of the Healthcare Association of Hawaii.

KEY FINDINGS:

- Opioid-involved ED visits (0.29%) exceeded stimulant-, and heroin-involved ED visits (0.10%, 0.07%) in Qtrs. 1-2, 2022.
- **Stimulant-involved hospitalizations** (0.81%) **exceeded** opioid-involved hospitalizations (0.52%) in Qtrs. 1-2, 2022.
- Monthly rates for All Drug-related ED visits (per 10,000 ED visits) decreased overall (-51%) in Qtrs. 1-2, 2022.
- Annual percent difference in monthly rates for opioid-involved ED visits steadily increased between Qtrs. 1-2 in 2021 vs.
 2022 with the greatest percent changes occurring between April 2021/2022 (+61.42%) & February 2021/2022 (+54.55%).
- Demographically, All Drug-related ED visits in Qtrs. 1-2, 2022 were mostly White/Caucasian, female (+4.7%), and 55 years and older (Qtr. 1: 39%; Qtr. 2: 30%).
- An increase in opioid-involved ED visits occurred in 25-34 (+11%) and 0-14 year age groups (+4%) in Qtr. 1-2, 2022.
- Monthly rates for All Drug-related hospitalizations increased (16%) overall in Qtrs. 1-2, 2022.
- Of All Drug-related hospitalizations, the mean percentage of **stimulant-involved visits** (36%) was **nearly double** that of **opioid-involved hospitalizations** (23%).
- Stimulant-involved hospitalizations (of All Drug-related hospitalizations) were highest in February 2022 (41%) and lowest in March 2022 (31%) with a mean percent change of -8.5% in Qtrs. 1-2, 2022.
- Opioid-involved hospitalizations (of All Drug-related hospitalizations) were highest in April 2022 (33%) and lowest in January 2022 (11%) with a mean percent change of +85.71% in Qtrs. 1-2, 2022.

Figure 1. Number of ED Visits vs % All Drug, Opioid, Heroin and Stimulant-involved ED Visits in Hawaii, Qtrs 1-2, 2022

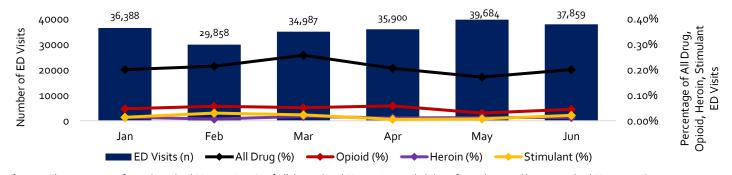


Figure 1. The percentage of opioid-involved ED visits (22.9% of All drug-related ED visits) exceeded that of stimulant- and heroin-involved ED visits in Qtrs. 1-2, 2022: 7.9% and 6.1% respectively . Note: y-axes are scaled differently—with a 40k max and zero minimum to capture the number of ED visits in Qtrs. 1-2, 2022 and 0.4% max and 0% minimum to capture All drug, opioid, heroin, and stimulant-involved ED visits.

<u>Data Sources</u>: Laulima Data Alliance, a non-profit subsidiary of the Healthcare Association of Hawaii (HAH) that maintains hospitalization and emergency department (ED) data for all hospitals across the state of Hawaii. Data is collected on a quarterly basis and includes all drug, all opioid, heroin, and all stimulant overdoses stratified by month, county, sex and age group.

<u>Case Definitions</u>: Please see 'Technical Guidance for the Drug Overdose Surveillance and Epidemiology (DOSE) System; Section: Syndromic Surveillance Definitions ' – <u>Link Here</u>.

<u>Analysis</u>: ED and Hospital cases ≤11 are suppressed for any variable and not included. Rate calculations for each time period is per 10,000 ED or hospitalizations.

<u>Limitations</u>: The syndromic surveillance data provided by Laulima Data Alliance is not available real-time and is collected and analyzed on a quarterly basis. Not all overdoses make it to the ED, which can contribute to an underestimation of the total overdose burden across the state of Hawaii.

Figure 2. Monthly Rates for All Drug-related ED Visits, Qtrs. 1-2, 2022 (per 10,000 ED visits)

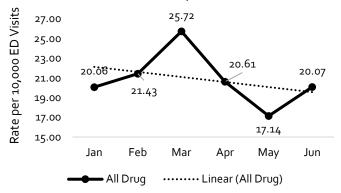


Figure 2. Monthly rates for All drug-related ED visits decreased overall in Qtrs. 1-2, 2022 (-51.2%). Increases were observed from January to March 2022 (Qtr. 1) and from May to June 2022 (Qtr. 2). March 2022 saw a max peak (25.72) and min in May (17.14) in All drug-related ED visits.

Figure 3. Annual Percent Change in Monthly Rates for Opioid-involved ED visits, Qtrs. 1-2, 2021 vs Qtrs. 1-2, 2022 (per 10,000 ED visits)

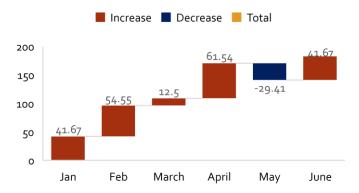


Figure 3. The annual percent difference in monthly rates between Qtrs. 1 & 2, 2021 and Qtrs. 1-2, 2022 for opioid-involved ED visits increased from Jan through Apr 2022 with the greatest annual percent change between April 2021 and April 2022 (61.54%).

Figure 4. All Drug, Opioid, Heroin, and Stimulant-involved ED visits by Gender,

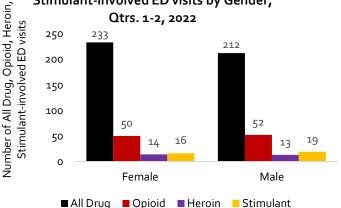


Figure 4. Females accounted for 51.4% of All Drug, opioid, and stimulant-involved ED visits combined and retained percent majority in the opioid and stimulant-involved ED visit categories: 51%, and 54% respectively. Females had percent majority in All Drug and heroin-involved ED visits: 52.3% and 51.8% respectively

Figure 5. Opioid-involved ED visits (%) by Age Group, Qtrs. 1-2, 2022 (n=102)

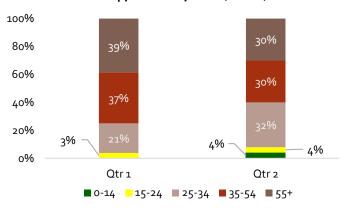


Figure 5. The age group with the greatest percentage of opioid-involved ED visits was 55+ years (mean: 34.5%); followed by 35-54 (33.5%). The greatest increases between the quarters occurred in the o-14 years (0% to 4%) and 25-34 years (21% to 32%) age groups.

Figure 6. Number of All Drug, Opioid, Stimulant, and Heroin-involved ED Visits by Race/Ethnicity, Qtrs. 1-2, 2022

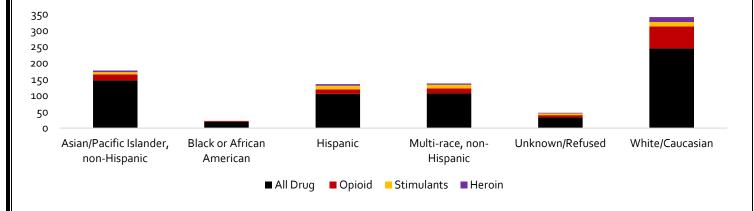


Figure 7. Number of Hospitalizations vs % All Drug, Opioid, and Stimulant-involved Hospitalizations, Qtrs. 1-2, 2022

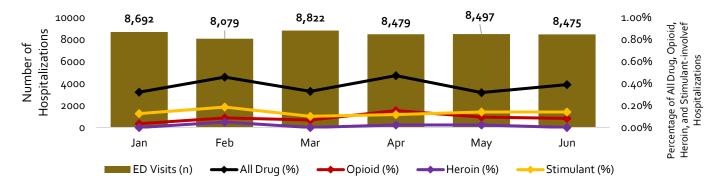


Figure 7. The number of stimulant-involved hospitalizations exceeded that of opioid-involved hospitalizations overall (+12.8%) apart from April 2022 when opioid-involved hospitalizations exceeded those of stimulant-involved visits by 7.5%. Note: y-axes are scaled differently—with a 10k max to capture the number of hospitalizations in Qtr. 1, 2022 and 1% max and zero (%) minimum to capture all drug, opioid, and stimulant-involved hospitalizations in Qtr. 1, 2022.

Figure 8. Monthly Rates for All Drug-related Hospitalizations in Hawaii, Qtrs. 1-2, 2022 (per 10,000 Hospitalizations)

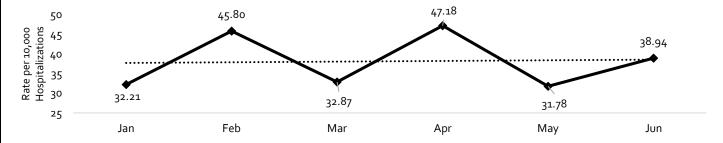


Figure 8. Monthly rates for All drug-related hospitalizations increased from January to February 2022 (+13.59), March to April 2022 (+14.31), and May to June 2022 (+7.16). Rates decreased between February and March 2022 (-12.93) and April and May 2022 (-15.40). April 2022 saw a max peak in rate of All drug-related hospitalizations (47.18) with monthly rates increasing (16.8%) overall in Qtrs. 1-2, 2022.

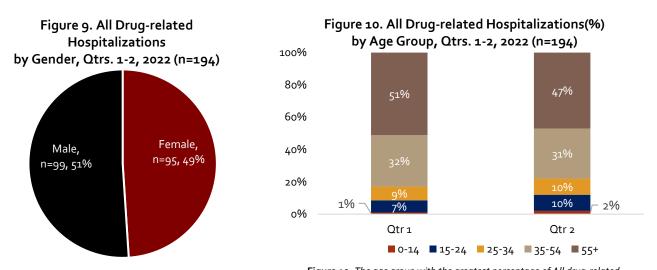


Figure 9. Males accounted for 51% (n=99) of all drug-related hospitalizations while females comprised the remaining 49% (n=95) visits in Qtrs. 1-2, 2022.

Figure 10. The age group with the greatest percentage of All drug-related hospitalizations was 55+ years (mean: 49%); followed by 35-54 (31.5%). The greatest increase between Qtrs. 1 and 2 occurred in the 25-34 years (9 to 10%) and 0-14 years (1% to 2%) age groups.

Direct questions and commentary to Hawaii OD2A CDC Foundation Epidemiologist, Valencia Waller, MSc at valencia.waller.NSW@doh.hawaii.gov.

This publication is supported by the Behavioral Health Administration (BHA) as part of the Hawaii State Department of Health (henceforth denoted as 'HI DOH') through a Cooperative Agreement between the HI DOH and the CDC Foundation. Its contents are the sole responsibility of the authors and do not necessarily represent the official views of the Laulima Data Alliance, HI DOH, CDC Foundation including the Centers for Disease Control and Prevention.