

Health disparities and violence

81 INJURIES CAUSED BY LAW ENFORCEMENT AMONG YOUNG PEOPLE: DISPARITIES AND TRENDS AMONG CALIFORNIA EMERGENCY DEPARTMENT AND HOSPITAL PATIENTS, 2005–2014

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Police violence is an important public health issue. Although research on police violence has substantially grown, few studies have examined its burden among young people. Given a broader literature that documents lasting adverse effects of early-life exposure to trauma and disproportionate policing of Black youth linked to racialized constructions of their being older and dangerous, further inquiry is warranted. This study examined the demographic and temporal distributions of injuries caused by law enforcement, severe enough to require clinical care, among young people. Using statewide data on all hospitalizations and emergency department visits in California, 2005–2014, we identified patients, ages 19 years or younger, with ICD-9-CM external cause of injury codes for legal intervention (LI) injury, and calculated rates using Census population estimates. From 2005–2014, 13,855 young people in California were treated for LI injury. Non-Hispanic Black males, ages 15–19 years, had the highest rate overall (217.5 per 100,000 person-years [PYs]), over three times that among same aged non-Hispanic White males (64.1 per 100,000 PYs). Among 10–14-year-olds, Black boys had five times (22.2 per 100,000 PYs) the LI injury rate as White boys (4.3 per 100,000 PYs), and, notably, the rate among Black girls (8.9 per 100,000 PYs) was twice and six times the rates, respectively, among White boys and White girls (1.5 per 100,000 PYs). Trends in annual rates also varied by race. Rates among White youth increased by 29.3%, peaking in 2009, but returned below the 2005 rate by 2014, whereas rates among Black youth increased by 63.6% by 2009, but did not return to the 2005 level by 2014. Results indicate that the burden of LI injuries among young people substantially varies by minoritized identity; in particular, Black boys and girls experience dramatically greater rates of LI injury, and inequities are even greater at younger ages.

Policy efforts in substance use and abuse

82 EFFECT OF WASHINGTON AND COLORADO'S CANNABIS LEGALIZATION ON COMPLETED SUICIDES

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Statement of Purpose In the U.S., death by suicide is a leading cause of death and was the 2nd leading cause of death for ages 15 to 24 in 2017. Though incomplete, much of the scientific literature has found associations between cannabis use and death by suicide. As 8 states and the District of

Columbia now permit recreational sale of cannabis, we sought to evaluate whether cannabis legalization has impacted suicide rates in Washington State and Colorado, the earliest states to legalize.

Methods We used a quasi-experimental research design with annual, state-level deaths by suicide data to evaluate the legalization of cannabis in Washington State and Colorado. Outcome data was from the National Center for Health Statistics-Restricted Vital Statistics. We used synthetic control models to construct policy counterfactuals, controlling for time-invariant and time-variant factors as our primary method of estimating the effect of legalization, stratified by age, gender, and mechanism.

Results Preliminary results suggest that 3-years post-implementation of recreational sale of cannabis, Washington state saw 2.8% increase in suicides, while Colorado saw a 6.5% reduction in suicides. However, both states saw increases in deaths by suicide among youth age 15 to 24 years (WA=20.2%; CO=14.9%). Additional results will discuss suicide completion stratified by mechanism and gender.

Conclusion Preliminary results suggest that the overall effect of recreational cannabis on deaths by suicide is heterogenous. However, as deaths by suicides among 15 to 24-year olds increased post-implementation in both states, states with legalized cannabis, and states considering similar legislation, may need to consider the mental health implications of cannabis legalization for younger users

Social determinants of health and injury

85 THE ASSOCIATION BETWEEN STATE MINIMUM WAGE LAWS AND FATAL OCCUPATIONAL INJURIES

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Statement of Purpose Minimum wage laws (MWLs) have the potential to affect risk factors for occupational injury such as stress, job satisfaction, and health. A prior study found that increasing state MWLs was associated with an increase in non-fatal occupational injuries. This study evaluates the associations between state MWLs and fatal occupational injuries.

Methods Fatal occupational injury data from 2003–2017 were obtained from the national Census of Fatal Occupational Injuries. LawAtlas provided information about state MWLs. Fifty-state regressions were fitted, with state MWLs modeled as: 1) an indicator variable, when state law exceeded the federal minimum wage, in a comparative interrupted time series and 2) a continuous variable, representing the dollar value of the state minimum wage, in a Poisson regression. Model covariates included: measures of poverty, share of the state population in the riskiest industries, other laws that might affect fatal occupational injuries, and state demographic variables.

Results State MWLs higher than the federal rate are associated with a nonsignificant 1.63% decrease (CI: -9.18% to +5.91%) in fatal occupational injury rates. Every one dollar increase in the state minimum wage is associated with a nonsignificant 3.43% decrease (CI: -7.80% to +1.12%) in fatal occupational injuries.