

**Colorado Department of Public Health and Environment (CDPHE)  
Occupational Health and Safety Surveillance Program (Fundamental Program)  
Annual Report: July 2014 – June 2015**

Principal Investigator: Mike Van Dyke, PhD, CIH – (303) 692-6375, [mikevandyke@state.co.us](mailto:mikevandyke@state.co.us)

Program Manager: Meredith Towle, MPH (July-December 2014)

Website: <https://www.colorado.gov/pacific/cdphe/workplace-safety>

**MAJOR OUTPUTS/PRODUCTS**

**Surveillance Data**

- Reported Colorado’s 2012 data for 18 of 22 Occupational Health Indicators to NIOSH for publication by the Council of State and Territorial Epidemiologists (CSTE)
- Reported Colorado’s 2014 data for 73 cases of adult elevated blood lead to NIOSH’s Adult Blood Lead Epidemiology and Surveillance (ABLES) Program
- Reported Colorado’s 2013 Census of Fatal Occupational Injuries (CFOI) cases to the Bureau of Labor Statistics (BLS)

**Publications**

Date	Title
Sept 2014	Census of Fatal Occupational Injuries in 2013 (CDPHE press release)
Jan 2015	Occupational Health Indicators in Colorado, 2015 Update (CDPHE report)
Feb 2015	FAQ: Oil and Gas Extraction Occupational Health and Safety Surveillance (CDPHE report)
Mar 2014	Adding industry and occupation questions to the Behavioral Risk Factor Surveillance System provides new opportunities in public health surveillance ( <i>Public Health Reports</i> )
May 2015	Protect Yourself & Your Family From Lead in Your Home (two versions, CDPHE brochures)

**Presentations and Outreach Events**

We presented surveillance findings and program overviews at numerous conferences and meetings, resulting in the education and awareness of professionals from various disciplines. We also partnered with WorkSafe Colorado to hold an event in September 2014 to support a worker health and safety proclamation signed by Governor Hickenlooper.

Date	Conference/Meeting	Title
8/12/2014	CDC BRFSS Data Users’ Webinar	Colorado 2012 BRFSS: Adding Value by Adding Occupation
9/12/2014	Western Occupational Network 2014 Annual Conference	Violent Deaths and Occupation in Colorado
10/29/2015	Colorado Coroners Association	Census of Fatal Occupational Injuries (CFOI)

12/12/2014	New Coroner Institute	Census of Fatal Occupational Injuries (CFOI)
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## PROGRAM ACTIVITIES

### Public Health Surveillance

**OHI data:** We annually report Colorado's state-wide Occupational Health Indicators (OHI) data for 18 of 22 measures. For indicators we are unable to collect using NIOSH standard methods, similar data are published in our report using alternate methods. We also continue annual reporting of adult elevated blood lead level cases to the NIOSH ABLES national dataset. Colorado's Census of Fatal Occupational Injuries (CFOI) also operates under our surveillance program. This unique arrangement allows us to have an active role in improving the CFOI data used for OHI surveillance.

**ABLES data:** Weekly surveillance ensures we call every adult with a blood lead level of 30 µg/dL or higher in a timely manner to ensure these high blood lead levels are appropriately addressed. Beginning in 2015, we began surveying adults with blood lead levels of 10 µg/dL and above to determine the most common sources of adult lead exposure in Colorado. We will mail these surveys every six months as part of on-going surveillance. In addition to the survey, we include educational brochures to educate those with elevated blood lead levels on how to reduce their levels. When we find a cluster of workers from the same workplace with elevated blood lead levels, we notify the employer. In collaboration with the local public health agency in June 2015, we sent a letter to a mine that had several workers with elevated blood lead levels asking the mine to reduce lead exposure and offering our assistance in the matter.

**BRFSS data:** Our report of industry and occupation (I/O) data from the 2012 Colorado Behavioral Risk Factor Surveillance Survey (BRFSS) was published in Public Health Reports. Findings from this analysis showcase numerous public health opportunities, such as validating reports of influenza vaccination rates among healthcare facility workers, identifying groups of workers that would benefit from health promotion activities (e.g. tobacco cessation and obesity prevention), and identifying occupations and industries that are prime candidates for safety interventions (e.g. seatbelt use policies). We were successful in adding the NIOSH I/O module on Colorado's 2015 survey.

**Worksite investigations:** In May 2015, we responded at the request of a local public health agency for an investigation of rashes among employees at a driver license office. With local public health, we completed a report with recommendations to halt the outbreak of rashes. The employer implemented the recommendations, and no other employees developed rashes after the site visit.

In March 2015, we began work to address the indoor air quality concerns at Casey Middle School in Boulder, Colorado. We conducted our first survey to obtain rates of health symptoms among employees in April. To continue to monitor health symptoms through all seasons, we will conduct three more surveys throughout this upcoming school year.

*Potential Outcomes: Our surveillance efforts have expanded the availability of surveillance data at the local, state and national level. Findings can be used to identify trends, showcase the burden of work-related injury and illness, identify data gaps and future research and surveillance needs, and recognize and address employment factors contributing to injury and illness. Our OHI report also contains several recommendations for improving surveillance systems and further analysis of OHI and other relevant data.*

*Intermediate Outcomes: It is difficult to track use of the data we make publically available. However, we have used the data internally and with external partners to target intervention efforts.*

*End Outcomes: We successfully secured cross-divisional funding support to add the I/O questions on the 2015 BRFSS. Our investigation at the driver license office prevented more rashes from developing among the workers.*

**Training and Program Development:** We continue to train occupational health and safety professionals and initiate projects to expand our program and impact. Our CSTE Applied Epidemiology Fellow began work in our program July 2015. We hosted an occupational medicine resident who developed a profile of injury, illness and fatality among Colorado's oil and gas workers. Finally, in partnership with a local day labor organization (El Centro Humanitario) we hosted two Occupational Health Internship Program (OHIP) fellows who provided safety training to El Centro's clients during the summer of 2014.

*Intermediate Outcomes: Our program creates opportunities for occupational health and safety trainees to apply learned principles in epidemiology, research and surveillance.*

*End Outcomes: Our OHIP fellows provided El Centro's worker and employer clients the knowledge and resources to identify common workplace risks, understand health and safety standards, and have awareness about worker rights and employer responsibilities.*

**Partnerships and Collaboration:** Several new targeted partnerships have been established this period. We continue to lead a multidisciplinary workgroup to identify and address health and safety issues of Colorado's new retail marijuana industries. We are also serving as co-investigators on a funded pilot research grant to analyze Colorado's infectious disease surveillance system through the lens of occupation.

*Potential outcomes: End products of these collaborations provide additional and more targeted information for the prevention of injury and illness in certain industries and among certain populations. Knowledge gained may also facilitate efforts to improve data collection and recording.*

*Intermediate Outcomes: We contributed to successful procurement of funding for occupational health and safety research in Colorado. Partnerships and collaborations raise awareness and*

*facilitate knowledge sharing about the impact of occupation on health and work-place risks and opportunities for injury and illness prevention. Partnerships also lead to more efficient use and sharing of existing data and resources to advance surveillance and research.*

*End Outcomes: Creation of new partnerships demonstrates our active role in Colorado's occupational health and safety community. Our advisory committee provides a valuable decision making forum for priority setting.*