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List of Terms and Abbreviations

American Association of Poison Control Centers (AAPCC)
Adult Tobacco Survey (ATS)
Council of State and Territorial Epidemiologists (CSTE)
Consortium of Occupational State-based Surveillance (COSS)
Georgia Board of Workers' Compensation (GBWC)
Georgia Department of Public Health (DPH)
Georgia Poison Center (GPC)
Georgia Behavioral Risk Factor Surveillance System (BRFSS)
Georgia Violent Death Reporting System (GVDRS)
National Institute for Occupational Safety and Health (NIOSH)
National Occupational Mortality Surveillance (NOMS)
Occupational Health (OH)
Occupational Health Indicators (OHI)
Occupational Health Surveillance (OHS)
Occupational Safety and Health Administration (OSHA)
School Health Profiles Survey (SHPS)
State-Based Occupational Health Surveillance in Georgia (OHS-GA)

Georgia Occupational Health Surveillance System; PI: A. Rana Bayakly; 404-657-2617;
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Abstract

The Georgia Department of Public Health (DPH) has maintained a successful fundamental Georgia Occupational Health Surveillance System (GA-OHS) in order to document the burden of occupational illnesses, injuries, and related factors. This surveillance is based on the occupational health indicators that are recommended by the National Institute for Occupational Safety and Health (NIOSH) and the Council of State and Territorial Epidemiologists (CSTE). The occupational health surveillance data was collected, analyzed, and submitted in a timely manner to NIOSH. During this past year, Georgia published a data summary entitled "Tobacco Use Worksite Wellness Policies in Georgia Public Schools" and collaborated with the state's Tobacco Use Prevention Program to include a comprehensive section on occupation in the 2016 Georgia Adult Disparities in Tobacco Use Report. Each of these publications involved the use of data sources not traditionally used in occupational health surveillance, which attests to the innovation of this fundamental surveillance program. Two data summaries on the 2013 Georgia Occupational Health Indicators have been created and submitted for DPH publication review. These summaries provide baseline data and trends and help to monitor occupational health related morbidity and mortality in Georgia. They are widely disseminated to the Georgia Department of Public Health occupational health collaborators, partners, and stakeholders.

The Georgia DPH Environmental Health Program provided the OH Surveillance Program with detailed data that were used to create a data summary of describing the burden of adults with elevated blood lead levels in Georgia. The summary has been submitted for DPH publication review and will help to increase awareness of the problem and further show the need to conduct elevated blood lead follow-back activities the state.

The GA-OHS began conducting the 2016 Worksite Wellness Survey. The survey will help to determine existing policies and work environments affecting physical activity, nutrition, tobacco use, injuries, health screenings, etc. In addition, employers who complete the survey and are interested in implementing worksite health programs or policies at their site will be connected with the *Georgia Working on Health* initiative.

The GA-OHS Unit maintained an active Advisory Committee that includes representatives of key partners and stakeholder organizations and agencies. The Advisory Committee met in February 2016 and reviewed Georgia's occupational health indicators, as well as provided feedback and consultation on major activities that needed to be addressed.

In summary, the primary goals of GA-OHS were to maintain a fundamental surveillance system for occupational health and safety, provide timely and ongoing data on all the

recommended indicators, and use these data as the basis to inform partners, stakeholders, policymakers, and the public about leading causes of morbidity and mortality from occupational injuries and illnesses in Georgia. The GA-OHS was successful in achieving its primary goals and greatly enhanced Georgia's capabilities to analyze traditional and non-traditional data sources to further advance Georgia's worker safety and health. The GA-OHS has increased awareness regarding occupational health and safety issues and informed public health programs and Georgia's scientific community on occupational health issues and priorities.

Section 1

Significant (Key) Findings

Specific Aim 1: Maintain, collect, analyze, interpret, and disseminate data on the 23 occupational health indicators in Georgia

Georgia has collected and analyzed data on 21 of the 23 Occupational Health Indicators (OHI) recommended by NIOSH and CSTE. This includes the new OHI for Occupational Heat-Related Emergency Department Visits. Georgia includes all the recommended indicators as part of its surveillance in order to obtain a broad and well-informed perspective of occupational health and safety in Georgia. In addition to the recommended indicators, GA-OHS used non-traditional occupational health data sources to collect state-specific indicators on two additional indicators: arthritis among employees and workplace secondhand smoke exposure. A 2013 OHI data table and 2006-2013 data summary are being prepared for DPH publication review.

Specific Aim 2: Conduct follow-back and intervention activities for cases of elevated adult blood lead among adults reported to the DPH

Planning discussions have started between GA-OHS, DPH Environmental Health, and Georgia Tech Occupational Safety and Health Administration (OSHA) Consultation Program about planning for blood lead follow-up activities and educating industries about the program. The Georgia DPH Environmental Health Program provided the GA-OHS Program with detailed data that was used to create a data summary of describing the burden of adults with elevated blood lead levels in Georgia. The summary has been submitted for DPH publication review.

Specific Aim 3: Conduct a statewide Worksite Wellness Survey of medium-sized businesses (defined as a worksite with 100-249 employees)

The GA-OHS is conducting the 2016 Worksite Wellness Survey, a mixed mode sample survey of about 3,000 medium sized businesses. The survey will help to determine existing policies and work environments affecting physical activity, nutrition, tobacco use, injuries, health screenings, etc. To date, over 500 employers have participated in the survey.

Specific Aim 4: Maintain an Advisory Committee representing partner organizations and stakeholders to guide priorities for surveillance

The GA-OHS Program has established and maintained an active Advisory Committee since 2011. Advisory Committee members include members of the public, private, and research communities, such as the Georgia Poison Center, Georgia Board of Workers' Compensation, Georgia Worksite Health Initiative, University of Georgia, Emory University, Region IV

OSHA, Georgia Hospital Association, and the DPH Emergency Preparedness, Environmental Health, and Chronic Disease programs. Some of the Advisory Committee members are “owners” of the OHI data sources.

Translation of Findings

The GA-OHS provides the basic data to quantify and characterize leading causes of work-related injury and illness in Georgia. Partners and stakeholders regularly use GA-OHS reports, executive summaries, and data summaries, which are disseminated during OH Advisory Committee meetings and posted on DPH website and the NIOSH State-Based Occupational Health Surveillance Clearinghouse. The data summary on tobacco use worksite wellness policies in Georgia public schools was shared with the state Tobacco Use Prevention Program and with the 18 District Health Promotion Coordinators across the state. Results from the summary confirmed the need to focus on the school’s faculty/staff, which has led to a revamping of enforcement and cessation activities for faculty/staff in Georgia schools with tobacco-free policies. Inclusion of industry/occupation in nontraditional occupational surveillance health data sources, such as the Behavioral Risk Factor Surveillance System (BRFSS) and Georgia Violent Death Registry (GVDRS), has led to increased recognition of occupation as an important demographic variable for surveillance and has reached audiences outside of occupational health. By conducting the 2016 Georgia Worksite Wellness Survey, we were able to show that there is a strong desire from businesses to create work environments that encourage healthy behaviors. Employers across the state have been informed about opportunities for developing worksite wellness programs and policies at their worksite. Thus far, over 40% of the businesses completing the survey have expressed great interest in receiving technical assistance from DPH by providing their contact information for follow-up. Creation of a DPH data summary based on the occupational health indicator for elevated adult blood lead levels was the first step in showing the need to conduct blood lead follow-back activities within the state, provide priority focus areas, and educate workers and industries at risk.

Outcomes/Impact

The major impact of the project has been the maintenance of fundamental occupational health surveillance in Georgia. This information base has provided the foundation for informing partners, stakeholders, policy makers, and the public about leading causes of morbidity and mortality from occupational injuries and illnesses in the state. A new collaboration between GA-OHS, DPH Environmental Health, and Georgia Tech OSHA Consultation has formed for elevated blood lead follow-up activities and education of industries about the program. The collaboration between GA-OHS and the *Georgia Working on Health* initiative can help employers implement comprehensive worksite wellness programs and policies, which can improve the health and productivity of working adults in

Georgia. These partnerships have potential for lasting impact as they allow for outreach that can directly impact workers and employers beyond the fundamental occupational health surveillance system.

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Success Story

Assessment of Tobacco-Free Policies as Worksite Wellness Policies for Faculty/Staff in Georgia Public Schools

There is no safe level of exposure to secondhand smoke—2006 Surgeon General's Report

The Challenge

Tobacco smoke contains a mixture of over 7,000 chemicals; many of which are known to cause cancer, heart disease, respiratory diseases, adverse pregnancy outcomes, and infertility. Nonetheless, each day workers are still being exposed to secondhand tobacco smoke at work. According to the 2014 Adult Tobacco Survey, about 12% of non-smoking employees in Georgia were exposed to secondhand smoke at work, during the 7 days prior to the survey. The National Institute for Occupational Safety and Health recommends that all workplaces become tobacco-free and provide tobacco cessation support for employees. Similarly, the CDC *Guidelines for School Health Programs to Prevent Tobacco Use and Addiction* recommends increasing tobacco-free environments in schools. The extent to which Georgia public schools have developed, implemented, and enforced a policy that creates a totally tobacco-free environment or faculty/staff had not been assessed.

The Response

In 2015, the Georgia Department of Public Health (DPH) OH Surveillance Unit analyzed data from the Georgia School Health Profiles Survey (SHPS), which is used to monitor and assess health policies and practices among public middle and high schools in the state. The

SHPS has been conducted by the GA DPH every two years since 2014. This was the first time GA SHPS data was used to assess how tobacco-free policies affect faculty/staff as worksite wellness policies. A detailed data summary of the results was created and shared with the Tobacco Use Prevention Program (TUPP) staff and the 18 District Health Promotion Coordinators across the state and was posted on DPH website.

The Impact

The analysis showed the utility of the SHPS in assessing how school policies affect faculty/staff. In addition, the results have helped to confirm the need to focus more on faculty/staff in enforcement and cessation efforts when implementing tobacco-free school policies. This has led to a complete revamping of enforcement and cessation activities for faculty/staff in Georgia public schools with tobacco-free policies. Beginning with the 2016-2017 school year, TUPP in collaboration with the school districts and health promotion coordinators, will implement new strategies for communicating the policy to faculty/staff, such as conducting tobacco free school enforcement webinars and including policy information in staff newsletters. In addition, resources for tobacco cessation programs, such as the Georgia Tobacco Quit Line, will be provided to faculty/staff.

Section 2: Scientific Report

Background

Over 4 million people aged 16 years and older comprise Georgia's workforce. According to the Bureau of Labor Statistics (BLS), approximately 78,000 workers in Georgia were injured on the job or became ill from exposures to hazards at work in 2013. That equates to nearly 214 workers per day who became ill or injured due to work-related exposures on the job. The state spent over \$1.5 billion in workers' compensation benefits paid to workers with occupational injuries or illnesses. In 2013, there were 117 work-related injury deaths in Georgia, a 16% increase from the number observed the previous year. Some workers are employed in occupations or industries that may put them at higher risk of work-related injuries or illnesses or being exposed to harmful substances such as lead, pesticides, or asbestos. Injuries, illnesses, and exposures on the job can affect workers' health for the rest of their lives. Many of these injuries and illnesses are preventable. The Georgia Department of Public Health proposed under CDC PAR-14-275, to continue the development of a fundamental surveillance program for occupational illnesses, injuries, and related factors, based on the indicators for occupational health (OH) surveillance recommended by the National Institute for Occupational Safety and Health (NIOSH) and the Council of State and Territorial Epidemiologists (CSTE). This fundamental OH surveillance system provides a foundation for improving the health and safety of workers, as it increases public awareness and informs prevention programs and guides their priorities.

The occupational health indicators (OHI) have been designed to enable state-based surveillance programs to focus on important occupational health and safety problems, including the leading causes of work-related injuries, illnesses, hospitalizations, and deaths in the state.^{1,2} The ability to conduct surveillance for all the recommended OHI relies on having access to the relevant data. DPH has ready access to the relevant data and we are able to conduct surveillance for all 23 recommended indicators. Georgia included all the recommended surveillance indicators in order to develop a broad and well-informed perspective on occupational health and safety in Georgia. In addition, Georgia has collected data for two state-specific indicators: 1) arthritis among employees; and 2) workplace secondhand smoke exposure.

The primary goal of our project was to maintain a fundamental surveillance system for occupational health and safety in Georgia. The surveillance system provides the basic data to quantify and characterize leading causes of work-related injury and illness in Georgia. This information base has provided the basis for informing partners, stakeholders, policy makers, and the public about leading causes of morbidity and mortality from occupational injuries and illnesses in Georgia. In addition, GA-OHS proposed to conduct follow-back and intervention activities for cases of elevated adult blood lead among adults reported to the

Department of Public Health. The program also proposed to conduct a statewide worksite wellness survey of medium-sized businesses (worksites with 100-249 employees).

Engaging and involving stakeholders is key to the success of the program. In order to ensure stakeholder involvement, representatives from internal and external stakeholder organizations and agencies and key partners were invited to participate on the Occupational Health Surveillance Advisory Committee. We have also established collaborations with partners outside the traditional occupational health infrastructure, such as the *Georgia Working on Health* initiative, which will yield benefits in disseminating prevention strategies to reduce the incidence of occupational injuries and illnesses.

Specific Aims

Specific Aim 1: Maintain, collect, analyze, interpret, and disseminate data on the 23 occupational health indicators in Georgia

Specific Aim 2: Conduct follow-back and intervention activities for cases of elevated adult blood lead among adults reported to the DPH

Specific Aim 3: Conduct a statewide Worksite Wellness Survey of medium-sized businesses (defined as a worksite with 100-249 employees)

Specific Aim 4: Maintain an Advisory Committee representing partner organizations and stakeholders to guide priorities for surveillance

Specific Aim 1: Maintain, collect, analyze, interpret, and disseminate data on the 23 occupational health indicators in Georgia

Methodology

The Occupational Health Epidemiologist has systematically collected and analyzed the necessary data for the recommended occupational health indicators based on the CSTE guidance document, *Occupational Health Indicators: A Guide for Tracking Occupational Health Conditions and Their Determinants*.² The majority of data needed for the occupational health indicators can be accessed online or are available internally at DPH. The GA-OHS Epidemiologist accessed the publicly-available data required for the indicators, such as the Bureau of Labor Statistics (BLS) Geographic Profiles, BLS Current Population Survey, the Census of Fatal Occupational Injuries, the Annual BLS Survey of Occupational Illnesses and Injuries, the National Academy of Social Insurance estimate of workers covered by workers compensation, Bureau of the Census data, member directories and rosters of occupational safety and health professional organizations, and Occupational Safety and Health Administration (OSHA) annual reports. The state data required for the recommended indicators are accessible at DPH and are regularly used by the GA-OHS

Epidemiologist. These include: 1) hospital discharge data from the Georgia Hospital Association; 2) cancer registry data available through the Georgia Comprehensive Cancer Registry (GCCR), which is overseen by the Principal Investigator; 3) data on elevated adult blood lead levels from the DPH Environmental Health Section; 4) Vital Records data accessible from the DPH Office of Vital Records; and, 5) data on pesticide poisoning available from the Georgia Poison Center (GPC). Additionally, other data sources, including the Georgia Adult Tobacco Survey (ATS) and the Georgia BRFSS, were analyzed to obtain data for two identified state-specific indicators, workplace secondhand smoke exposure and arthritis among employees. Workers' Compensation claims data is located external to DPH. These data are obtain through direct communication with the Georgia Board of Workers' Compensation (GBWC). Over the past year, the GBWC data system has gone through a major upgrade. During this time, access to the data required for two of the occupational health indicators (claims for amputations and indicator claims for carpal tunnel syndrome with lost work time) has been delayed. GA-OHS is currently reaching out to Worker Compensation staff to obtain these data and inviting staff to attend the OH Advisory Committee Meeting. We plan to create a memorandum of understanding between DPH and Worker's Compensation for data sharing once their new system is upgraded and fully functional.

Results and Discussion

All of the recommended occupational health indicators have been collected and analyzed, except for indicator 5 (claims for amputations with lost work time) and indicator 8 (claims for carpal tunnel syndrome with lost work time). Occupational indicator data for calendar year 2013 were submitted to NIOSH for quality check and will be uploaded onto CSTE's website for state occupational health indicators. These data have also been summarized in data summaries that include graphs, tables, and narratives. These summaries are currently in DPH publication review and will be shared with the GA-OHS Advisory Committee and posted on the DPH website and the NIOSH State-Based Occupational Health Surveillance Clearinghouse. Findings from analysis of the occupational health indicators are provided below.

According the BLS Current Population Survey, about 4.4 million civilians were employed in Georgia in 2013. The incidence rate of non-fatal work-related injuries and illnesses in Georgia declined from 4,000 per 100,000 full-time workers in 2006 to 2,800 per 100,000 full-time workers in 2013. Georgia had 2,485 work-related hospitalizations in 2013, a decline from the 5,675 work-related hospitalizations observed in 2006. There were 117 fatal work-related injuries in 2012, a rate of 2.7 per 100,000 full-time workers. This was an increase from the 101 fatalities and rate of 2.4 per 100,000 observed in 2012.

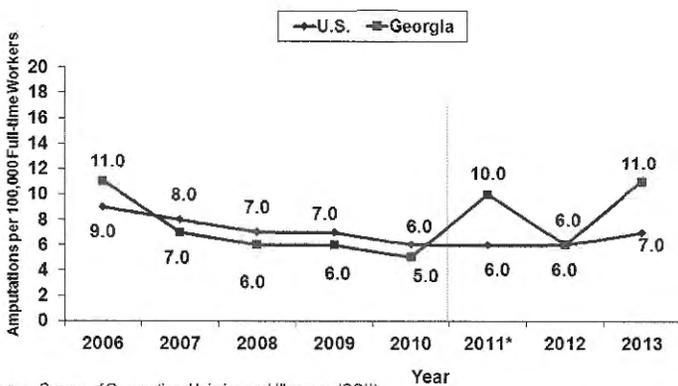
Data from the BLS Survey of Occupational Injuries and Illnesses (SOII) show the number of work-related amputations reported by employers nearly doubled from 170 cases (6.0 per 100,000 full-time workers) in 2012 to 310 cases (11.0 per 100,000 full-time workers) in 2013 (Figure 1).

The annual number of reported pesticide poisonings per 100,000 employed people aged 16 years and older in Georgia increased from 96 in 2009 to 151 in 2010, then decreased to 87 in 2013. There was a corresponding increase in the incidence rate of pesticide poisoning cases, which increased from 2.8 per 100,000 in 2009 to 3.6 per 100,000 in 2010, before it declined to 2.0 per 100,000 in 2013. The rate of work-related pesticide poisonings in Georgia was slightly higher than the national rate during 2006-2013 (Figure 2).

Analysis of the 2014 Adult Tobacco Survey, showed about 84% of employed adults in Georgia are nonsmokers. An estimated 12% of these non-smoking employees (approximately 782,000 individuals) were exposed to secondhand smoke at work during the seven days prior to the survey. Exposure to secondhand smoke was higher among employees who were female, were non-Hispanic black, were between ages 18-34 years, or earned an annual household income less than \$70,000.

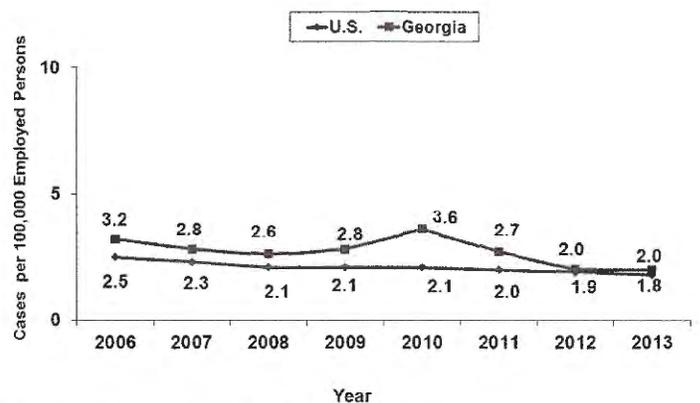
Analysis of the BRFSS showed an estimated 15% of employees in Georgia had doctor-diagnosed arthritis in 2013 (approximately 680,000 individuals), which represents a slight increase from the prevalence observed in 2011 (13%) and 2012 (14%). About 29% of these employees (approximately 169,000 individuals) reported that arthritis or joint symptoms affects whether they work, the type of work they do, or the amount of work they do.

Figure 1. Rate of work-related amputations with days away from work, Georgia and U.S., 2006-2013



Source: Survey of Occupational Injuries and Illnesses (SOII)
 *Data from 2011–2013 may not be directly comparable to data from previous years due to changes in coding structures for injuries and illnesses

Figure 2. Annual incidence rate of reported pesticide poisoning cases, Georgia and U.S., 2006-2013



Source: American Association of Poison Control Centers

Georgia's 2008-2012 Occupational Health Surveillance Indicators Report and an Executive Summary were published and posted on DPH website. The surveillance report estimates the burden of work-related injuries and illnesses in Georgia and was based on the 23 recommended occupational health indicators. The report also included the state-specific indicators for arthritis among employees and workplace secondhand smoke exposure. In addition, two data summaries for the 2013 occupational health indicators have been created and are currently in DPH publication review. Dissemination of these reports and summaries can increase awareness of occupational injuries, illnesses, and fatalities in Georgia, as well as increase program collaborations and interventions.

Use of Non-Traditional Data for Occupational Health Surveillance

Data from the 2014 Georgia School Health Profiles Survey were used to assess the extent to which Georgia public middle and high schools have developed, implemented, and enforced a policy that creates a 100% tobacco-free environment for faculty/staff. Results of the analysis entitled, "Assessing Tobacco-Free School Policies as Worksite Wellness Policies in Georgia Public Schools," were presented at the 87th Annual GPHA Conference and the 2016 CSTE Annual Conference. A data summary of the results was created and posted on DPH website. This summary was also shared with the state Tobacco Use Prevention Program and with the 18 District Health Promotion Coordinators across the state. Results from the analysis confirmed the need to focus on faculty/staff which has led to a complete revamping of enforcement and cessation activities for faculty/staff in Georgia schools with tobacco-free policies.

GA-OHS hosted two MPH students from Emory University and Georgia Southern University to analyze data from the Georgia Behavioral Risk Factor Surveillance System (BRFSS) industry/occupation module as part of their practicums. The students used the BRFSS to assess: 1) influenza vaccination among Georgia healthcare workers and 2) obesity among Georgia workers by occupation. Data summaries from the analyses are being prepared for DPH publication review. The OH epidemiologist collaborated with the Tobacco Use Prevention epidemiologist to include a comprehensive section on occupation in the 2016 Georgia Adult Disparities in Tobacco Use Report. This report will lead to increased recognition of occupation as an important demographic variable and can show how disparities in tobacco use exist by occupation in Georgia.

The OH epidemiologist, PI and Georgia Violent Death Reporting System epidemiologists submitted a manuscript entitled "Violent Deaths among Georgia Workers: An Examination of Suicides and Homicides by Occupation, 2006-2009" to the American Journal of

Preventive Medicine. The manuscript has been approved for publication. This manuscript will help to bring attention to risk of violent deaths by occupation and show the need to create a new variable for work-relatedness in the Violent Death Reporting System. The PI and OH epidemiologist have begun discussions for creating this new variable with the NIOSH Division of Safety Research and the National Center for Injury Prevention and Control Division of Violence Prevention. In addition, the OH epidemiologist presented this data to members of the Georgia Suicide Prevention Coalition. This was the first time an analysis of the risk of suicide by occupation was available to this key group of suicide prevention stakeholders in the state. The presentation brought much needed awareness and discussion on the prevention of suicide for workers.

Conclusions

The occupational health indicators have been instrumental in identifying leading causes of work-related injuries, illnesses, and fatalities in Georgia. Collecting data for these indicators has enabled DPH to establish working relationships with internal and external partners, which will help when seeking opportunities for collaborations on future occupational health surveillance and prevention and intervention projects. Although there have been declines in work-related injuries and fatalities in Georgia, some indicators are of special interest because the rates are higher than national rates or because statewide declines in rates or number of cases were not observed. These indicators include: 1) Work-related amputations with days away from work, reported by employers; 2) Acute work-related pesticide poisonings reported to poison control centers; and, 3) Elevated blood lead levels among adults. Use of non-traditional data sources such as the SHPS, BRFSS, and GVDRS provide innovative methods of assessing the occupational health needs of Georgia's workers beyond what the OHI can show.

Specific Aim 2: Conduct follow-back and intervention activities for cases of elevated adult blood lead among adults reported to the DPH

Methodology

Pursuant to State of Georgia requirements, all blood lead level (BLL) screening test results must be reported electronically or in writing within seven (7) days to the Environmental Health Section of the DPH.³ The average BLL in the general population is less than 1.5µg/dL. Since November 2015, the surveillance case definition for elevated blood lead levels used by CDC/NIOSH includes workers age 16 years and older with blood lead concentrations of ≥ 5 µg/dL. Elevated blood lead levels have the potential to cause adverse health effects in adults with chronic exposures, even at low levels of lead exposure. Most elevated BLL among adults in the United States are due to occupational exposures.²

The Georgia OH Surveillance Unit staff will work collaboratively with the Georgia DPH Environmental Health Section, Lead Program staff to implement follow-back investigations of resident incident cases age 16 years and older with elevated blood lead levels of ≥ 25 $\mu\text{g}/\text{dL}$ reported to DPH within six months of exposure. Data on the source(s) of exposure and occupation will be collected to monitor potentially high-risk lead exposure sites in Georgia. For cases in which the source of exposure is determined to be work-related, OH Surveillance Unit staff will contact the employer of an incident case with a blood lead level of ≥ 25 $\mu\text{g}/\text{dL}$ to recommend an on-site inspection by the Georgia Tech Research Institute Occupational Safety and Health Administration (OSHA) Consultation Program. Prevention of adult occupational lead poisoning will be promoted through referral to the OSHA Consultation Program, which is a program for companies that want help in meeting OSHA's requirements for the entire facility. The OSHA Consultation Program will: 1) identify physical hazards throughout the facility, including lead exposure; 2) evaluate all technical programs; and, 3) review the safety and health program management. Recommendations will then be made on how to correct physical hazards and improve both the technical programs and the safety and health management system in the facility.

Results and Discussion

During this first year, the GA-OHS met with DPH Environmental Health and Georgia Tech OSHA Consultation Program to discuss plans for elevated blood lead follow-up activities and educating industries about the program. The Georgia DPH Environmental Health Program provided the OH Surveillance Program with detailed data that was used to create a data summary describing the burden of adults with elevated blood lead levels in Georgia. The Adult Blood Lead Epidemiology Surveillance (ABLES) database was reviewed to assess its completeness for elevated blood lead follow-up activities. In addition, the DPH Division of Health Protection Director paved the way for the Georgia Occupational Health Surveillance program to communicate with major industries in Georgia that are at risk for lead exposures by linking the program with a key industry stakeholder.

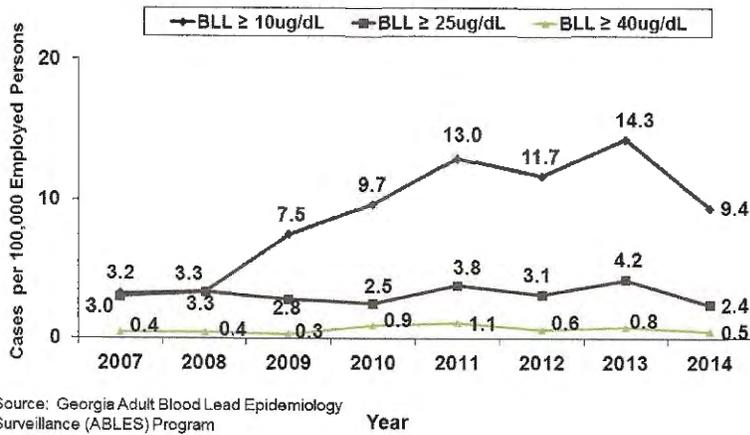
Data provided by the DPH Environmental Health section shows the annual number of incident cases aged 16 years or older with elevated blood lead levels of ≥ 10 $\mu\text{g}/\text{dL}$ increased from 148 in 2007 to 625 in 2013; it then decreased to 415 in 2014 (Table 1).

Table 1. Number of Incident Cases of Elevated* Blood Lead Levels, Georgia, 2007-2014

	2007	2008	2009	2010	2011	2012	2013	2014
Incident cases blood lead levels ($\geq 10\mu\text{g}/\text{dL}$)	148	151	323	411	555	514	625	415
Incident cases blood lead levels ($\geq 25\mu\text{g}/\text{dL}$)	140	151	120	108	163	137	182	107
Incident cases blood lead levels ($\geq 40\mu\text{g}/\text{dL}$)	18	20	15	38	46	27	33	20

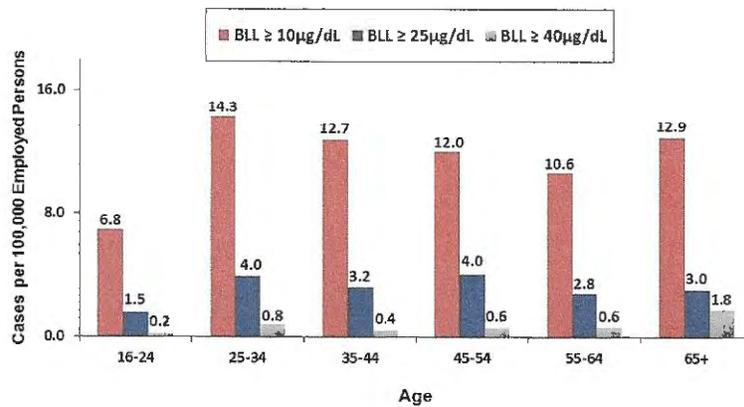
*Note: Elevated among persons aged 16 years or older

Figure 3. Annual incidence rate of elevated blood lead levels among persons aged 16 years and older, Georgia, 2007-2014

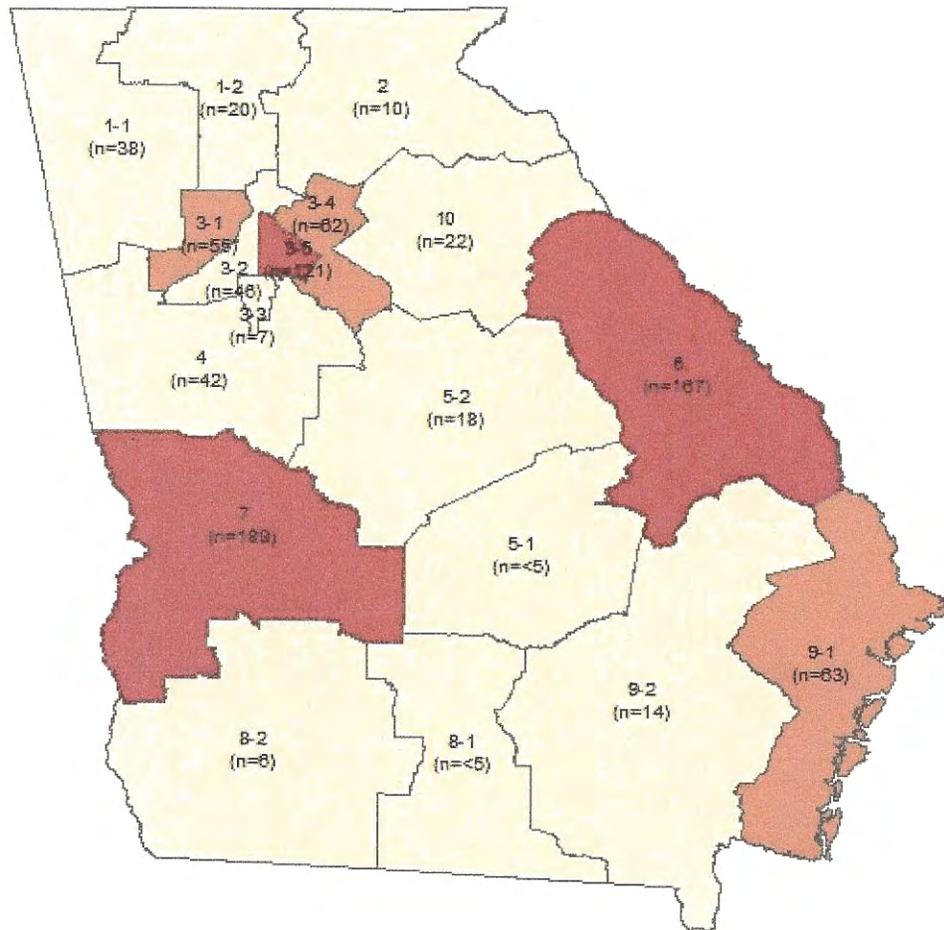


The incidence rate of elevated BLL $\geq 10 \mu\text{g/dL}$ among employed persons aged 16 years or older increased from 3.2 per 100,000 in 2007 to 14.3 per 100,000 in 2013, then decreased to 9.4 per 100,000 in 2014 (Figure 3). During 2013-2014, the incidence rate of elevated BLL $\geq 10 \mu\text{g/dL}$ was highest among Georgia workers aged 25-34 years (Figure 4). Exposures were highest among male workers (19.4 per 100,000) compared to female workers (3.0 per 100,000). During 2013-2014, the DeKalb, East Central (Augusta), and West Central (Columbus) Health Districts had the highest number of elevated blood lead exposures among residents aged 16 years and older (Map 1).

Figure 4. Age-specific incidence rate of elevated blood lead levels among persons aged 16 years and older, Georgia, 2013-2014



Map 1. Number of Incident Cases of Elevated Blood Lead Levels ($\geq 10 \mu\text{g}/\text{dL}$) by Public Health District, 2013-2014



Conclusions

To achieve greatest program impact, a strong working relationships must be established between GA DPH, the OSHA Consultation Program, and key industry stakeholders. In addition, GA-OHS has to raise awareness of work-related adult lead poisoning and state/federal regulations for occupational lead exposures by disseminating reports, data summaries, and educational materials and resources to employers, workers, health care providers, and the public. These are major first steps to establishing elevated adult blood lead follow-up activities in the state. The elevated adult blood lead data summary will be used to help show the need for follow-up activities and provide focus areas for creation and dissemination of educational materials.

Specific Aim 3: Conduct a statewide Worksite Wellness Survey of medium-sized businesses (defined as a worksite with 100-249 employees)

Methodology

GA-OHS proposed to conduct a Worksite Wellness Survey to assist DPH in determining the proportion of worksites that offer their employees comprehensive health promotion programs and to develop health promotion tools that will support employers' implementation of health promotion programs. Since larger worksites are more likely to provide health promotion programs than medium and smaller worksites, the survey was targeted to medium-sized businesses (100-249 employees) statewide. The survey questionnaire was based on the 2002 and 2008 *Georgia Worksite Health Promotion Policies and Practices in Georgia Surveys*.⁴ In 2014, the OH Surveillance Unit staff revised the survey questionnaire in collaboration with the DPH Worksite Wellness Coordinator and Health Promotion, Cardiovascular Health, Tobacco Use Prevention, and Injury Prevention Programs. In addition, the revised questionnaire includes new questions on policies and practices surrounding workplace injuries that align with NIOSH's *Total Worker Health Initiative*.⁵ A version of the online survey was piloted in summer 2014, with 50 employers completing the survey. This pilot was conducted in collaboration with the Georgia Institute of Technology's *EmployersLikeMe*, a group of employers in Georgia that work together to help each other have the healthiest employees at a fair cost through open discussions, shared resources, and new innovations. The survey was further revised based on this pilot.

Through a data sharing agreement with the Georgia Department of Labor (DOL), DPH obtained a database of all employers in Georgia with 100-249 employees. A stratified random sample of 3,058 Georgia employers was selected from of a population of 5,726 medium-sized Georgia employers. The sample was selected using SAS SurveySelect without replacement and stratified by the major two-digit NAICS industry groups. Employers listed with NAICS code of 92-Public Administration or 61-Educational Services were excluded from the survey. Other governmental agencies were also excluded. The sample was selected based on a desired confidence level of 95% and margin of error 5%.

From January through April 2016, GA-OHS collected employer contact information (i.e., email address and phone number), which was not provided in the database provided by DOL. Mailing addresses were also collected if they were missing from the database. This was done by contacting employers directly or by performing Google and Yellow Page searches. A part-time, temp employee and three MPH epidemiology interns from Georgia State University and Emory University assisted the OH epidemiologist in this effort. A total of 235 employer email addresses were collected. During May and June 2016, employers were invited to participate via a letter from DPH and surveys were mailed out to all

sampled businesses. The expected survey response rate is 60%. The survey was designed to be completed by employers' human resources, general managers, or the persons responsible for making decisions regarding health benefits. Employers were able to submit the survey via mail, fax, email, or online. The first 400 employers who submitted the survey were eligible to receive a \$25 Visa incentive card.

Results and Discussion

Currently, over 500 employers have completed the survey. About 400 surveys were returned undeliverable due to incorrect addresses in the database. In effort to increase the survey response rate, surveys will be re-mailed to these businesses using a second address that was provided in the database. Also, a second round of surveys will be re-mailed during October and November 2016 to all businesses that did not respond to the first mailed survey. Using the email addresses that were collected, reminder emails will also be sent out to the employers that did not respond.

Another major objective of this survey was to identify opportunities for technical assistance to employers interested in developing wellness programs at their worksite through collaboration with the *Georgia Working on Health* initiative. DPH health promotion staff will work directly with Georgia employers to implement comprehensive worksite wellness programs that will improve the health and productivity of working adults in Georgia. This will be done through health promotion activities, policies, and environmental changes that target risk factors for chronic diseases. Employers interested in learning more about implementing worksite wellness programs or policies, based on the survey, will be connected with the appropriate Georgia DPH program and/or provided with resources from the *Work Healthy Georgia Toolkit*. Currently, over 200 employers that completed the survey have expressed interest in being connected with the program and provided their contact information for DPH Health Promotion staff to follow-up and provide technical assistance. This aspect of the survey supports goals of the state's *Georgia Working on Health* initiative as well as other Chronic Disease and Health Promotion programs. GA-OHS has met with Health Promotion staff to discuss creating a plan for follow-up.

Conclusions

The 2016 Georgia Worksite Wellness Survey, a mixed-mode sample survey of about 3,000 medium sized businesses (100-249 employees) across the state, is still in progress. Currently, over 500 employers have participated in the survey. Results of the survey will be used to: 1) document the existing policies and environments affecting physical activity, nutrition, injuries, health screenings, and tobacco use in Georgia worksites; 2) measure Georgia's progress towards accomplishing the worksite health promotion objectives in *Healthy People 2020* and establish baseline estimates (Table 3); and, 3) publish findings in reports, data summaries, or peer-reviewed journals. In addition, connecting businesses with the *Georgia Working on Health* initiative will help to create or modify workplace policies that support healthy behaviors across the state.

Table 3. Healthy People 2020 Objectives Related to Worksite Health Promotion

Healthy People 2020 Objective	U.S. Baseline (Number/Percent)
<i>Educational and Community-Based Programs</i>	
ECBP-8.4 Increase the proportion of worksites with 100-249 employees that offer an employee health promotion program to their employees	ECBP-8.4 developmental
ECBP-9.0 Increase the proportion of employees who participate in employer sponsored health promotion activities	ECBP-9.0 developmental
<i>Nutrition and Weight Status</i>	
NWS-7.0 Increase the proportion of worksites that offer nutrition or weight management classes or counseling	NWS-7.0 developmental
<i>Tobacco Use</i>	
TU-13.1 Establish laws in States and the District of Columbia on smoke-free indoor air that prohibit smoking in private worksites.	TU-13.1 30
<i>Occupational Safety and Health</i>	
OSH-7.0 Increase the proportion of employees who have access to workplace programs that prevent or reduce employee stress	OSH-7.0 developmental

Specific Aim 4: Maintain an Advisory Committee representing partner organizations and stakeholders to guide priorities for surveillance

Methodology

The GA-OHS Unit has maintained an active OH Advisory Committee since 2011. Invitations to participate on the Committee were sent to internal DPH programs as well as external stakeholders and partners, including representatives from various agencies such as the Georgia Poison Center, Georgia Board of Workers' Compensation, *Georgia Working on Health* Initiative, University of Georgia, Emory University, Georgia Southern University, Georgia Institute of Technology, Region IV OSHA, Georgia Hospital Association, and the DPH Epidemiology Emergency Preparedness and Environmental Health programs. The Advisory Committee held a meeting in February 2016 to share knowledge, identify relevant state-specific issues, and make recommendations to enhance the use and impact of the data provided by the surveillance system.

Current members of Georgia's Occupational Health Advisory Committee are: Governor's Office of Highway Safety--Jim Andrews, Deputy Director; Georgia Board of Workers' Compensation--Pamela Carter, IT Services Director; GA DPH Injury Prevention Program—Lisa Dawson, Director; GA Poison Center—Robert Geller, MD, Medical Director; OSHA-Region IV—Monica McKenzie, Industrial Hygienist; GA DPH Emergency Preparedness and Response—Betsy Kagey, PhD, Director; GA Tech Research Institute—Daniel Ortiz, Director Occupational Safety and Health; GA Tech Research Institute—Jenny Houlroyd, Manager Environmental, Safety, and Occupational Health Programs; GA DPH Environmental Health—Jane Perry, Director Chemical Hazards Program; GA DPH Environmental Health—Renee Perro, Program Consultant Chemical Hazards Program; Agnes Scott College—Li Qi, Professor of Economics; GA DPH Office of Tobacco, Policy, System, and Environmental Change—Kenneth Ray, Deputy Director; GA DPH Acute Disease Epidemiology—Wendy Smith, Epidemiology Preparedness Director; Georgia Southern University—Chris Rustin, Assistant Professor Environmental Health Science; Emory University School of Public Health—Kyle Steenland, Professor Department of Environmental and Occupational Health; Emory University School of Public Health—Paige Tolbert, Professor and Chair Department of Environmental Health; GA State Fire Marshall's Office—Keith Shadix, Manager BLS-OSHA Section; University of Georgia—Zolinda Stoneman, Ph.D., Director and Professor Institute on Human Development and Disability; and Georgia Hospital Association--Karen Waters, Senior Vice President.

Results and Discussion

During the Advisory Committee meeting, the Principal Investigator provided an update on the surveillance program and the Epidemiologist presented the latest OHI data and the results of analysis from special studies. Separate meetings will be convened with members who are interested in further discussion of specific topics. For example, the GA-OHS Epidemiologist and Principal Investigator discussed the need to create a case definition for work-relatedness in the Georgia Violent Death Reporting System. Representatives from Georgia Tech Research Institute and Region IV OSHA expressed interest in assisting with project. The availability of newly coded industry/occupation fields in Georgia's 2011 mortality data (through partnership with the National Occupation Mortality Surveillance (NOMS)) and 2012-2014 BRFSS data was also discussed during this meeting.

Representatives from Emory University were eager to learn more about how students can use this data for their practicum projects or thesis. Lastly, a lively discussion around occupationally-related Campylobacter and Salmonella infections and the source of exposures took place. Even though Georgia has the highest number of poultry plants in the south (a major source of exposure), the state does not routinely collect occupation through our infectious disease reporting system to fully capture potential occupation-related cases.

Plans to add occupation text fields to the infectious disease reporting system was discussed. Stakeholders were also given the opportunity to discuss their organization's need for OH data.

Conclusions

Having an Advisory Committee with representation from various entities has allowed different perspectives related to the occupational health surveillance needs of the state to be shared. The Committee has also helped to identify priorities for state surveillance, develop collaborations to enhance the surveillance, and increase visibility for the program. Presenting data and disseminating reports to the Committee has also helped facilitate dissemination of the occupational health indicator data.

References Cited

1. Stanbury M, Anderson H., et al. Guidelines for Minimum and Comprehensive State-Based Public Health Activities in Occupational Safety and Health. DHHS NIOSH Publication No.2008-148, September 2008.
2. Council of State and Territorial Epidemiologists. Occupational Health Indicators: A Guide for Tracking Occupational Health Conditions and Their Determinants. March 2016.
3. Georgia Department of Public Health. Notifiable Disease Reporting Requirements. <https://dph.georgia.gov/disease-reporting>.
4. Choi HS, Bricker SK, Troy K, Kanny D, Powell KE. Worksite Health Promotion Policies and Practices in Georgia: 2002 Georgia Worksite Survey. Georgia Department of Human Resources, Division of Public Health, January 2004. Publication Number DPH03/156HW.
5. Institute of Medicine. 2014. Promising and Best Practices in Total Worker Health™: Workshop Summary. Washington, DC: The National Academies Press.

Publications

1. Georgia Department of Public Health. *Tobacco Use Worksite Wellness Policies in Georgia Schools: Results from the 2014 Georgia School Health Profiles Survey (SHPS)*. October 2015.
2. Chung A, Lavender A, Bayakly AR. *2016 Georgia Adult Disparities in Tobacco Use Report*. Georgia Department of Public Health, Health Protection, Epidemiology, Chronic Disease, Healthy Behaviors and Injury Epidemiology Section. April 2016.
3. Lavender A, Ramirez-Irizarry V, Bayakly AR, Koplan C, Bryan JM. Violent deaths by occupation: An examination of suicides and homicides by occupation, 2006-2009. *Am J Prev Med*. 2016, In press.
4. Georgia Department of Public Health. Georgia Occupational Health Surveillance Data Series Part 1, *2013 Georgia Occupational Health Indicators: Demographics and Summary Tables*. (In DPH publication review).

5. Georgia Department of Public Health. Georgia Occupational Health Surveillance Data Series Part 2, *2013 Occupational Health Indicators: A Look at Key Trends*. (In DPH publication review).
6. Georgia Department of Public Health. *Elevated Blood Lead Levels among Adults, Georgia, 2013-2014*. (In DPH publication review).
7. Georgia Department of Public Health. *Overweight and Obesity among Georgia Workers, 2012-2014*. (In DPH publication review).

Data Sets

Data sets used by the OHS-GA Unit were collated from publicly-available data sets. These include: the BLS Current Population Survey (CPS); BLS Geographic Profiles of Employment and Unemployment; BLS Survey of Occupational Injuries and Illnesses (SOII); BLS Census of Fatal Occupational Injuries (CFOI); Georgia Board of Workers' Compensation (GBWC) claims data; American Association of Poison Control Centers (AAPCC)/ Georgia Poison Center (GPC); U.S. Census Bureau County Business Patterns (CBP); American Board of Preventive Medicine (ABPM); Annual roster of members of the ACOEM; American Board of Occupational Health Nurses Directory; Annual roster of members of the AAOHN member directory; American Board of Industrial Hygiene; AIHA member directory; BCSP member directory; ASSEE member directory; OSHA annual reports of total inspections and number of workers covered; BLS Covered Employers and Wages; and, National Academy of Social Insurance. These data sets are well documented and have known degrees of completeness, accuracy and potential limitations.

Additionally, OHS-GA uses internal DPH data sources. These include the Hospital Discharge data; Georgia Mortality data; the Georgia Cancer Registry; Georgia Adult Blood Lead Exposure Surveillance data; the Georgia BRFSS Asthma Call-Back Survey; the Georgia Adult Tobacco Survey (state-specific); the Georgia BRFSS (state-specific); the Georgia Violent Death Reporting System (state-specific); and the Georgia School Health Profiles Survey (state-specific). These data sets are well documented and the extent of the completeness, accuracy, and potential limitations of these data are available from each program that collects these data. These data sets are collected using federal funds, therefore data are made available based on the CDC/ATSDR Policy on Releasing and Sharing Data (CDC Data Policy.)

Other Materials available for other investigators

Substantive research materials and results are published on the OHS-GA public health website. Reports, data tables, and data summaries are all uploaded to the OHS-GA created website <http://dph.georgia.gov/georgia-occupational-health-and-safety-surveillance-program> for wide distribution.

Inclusion of gender and minority study subjects

The OHS-GA does not involve any subjects based on their membership in a special class, such as fetuses, neonates, pregnant women, children, prisoners, institutionalized individuals, or others who may be considered vulnerable populations. If data on persons in these categories is included in the surveillance system, it is because they are members of the Georgia workforce, and not because of their status as members of vulnerable populations. In addition, Georgia is only collecting de-identified, existing data that are currently available on public websites and data from various data sources that cannot be linked. Only aggregated data reports are published and made available to the public.

Inclusion of Children

The OHS-GA includes the entire working population aged 16 years and older in Georgia; therefore, Georgia includes data on children that are 16 to 21 years of age. The Bureau of Labor Statistics (BLS) Current Population Survey estimates that about 5.7% of Georgia's 4.4 million workers are between the ages of 16-21 years. Most data required for this project are de-identified data currently available on public websites. These de-identified data from various data sources cannot be linked to individuals. Only aggregated data reports will be published and made available to the public.

Additionally, the data Georgia collects from external data sources that are not publicly available contain only de-identified and aggregated information; information about age is not provided. Internal DPH datasets used for this project contain information about age; however, our experience with these data over the past five years has shown that less than 1% of the records are from workers aged 16-21 years.

Data Sources Used for Occupational Health Surveillance Indicators

List of external data sources:

- BLS Current Population Survey (CPS)
- BLS Geographic Profiles of Employment and Unemployment
- BLS Survey of Occupational Injuries and Illnesses (SOII)
- BLS Census of Fatal Occupational Injuries (CFOI)
- Georgia Board of Workers' Compensation (GBWC) claims data
- American Association of Poison Control Centers (AAPCC)/ Georgia Poison Center (GPC)
- U.S. Census Bureau County Business Patterns (CBP)
- American Board of Preventive Medicine (ABPM)
- Annual roster of members of the ACOEM
- American Board of Occupational Health Nurses Directory
- Annual roster of members of the AAOHN member directory
- American Board of Industrial Hygiene
- AIHA member directory

- BCSP member directory
- ASSEE member directory
- OSHA annual reports of total inspections and number of workers covered
- BLS Covered Employers and Wages
- National Academy of Social Insurance

DPH data sources:

- Hospital Discharge Data
- Georgia Mortality Data
- Georgia Cancer Registry
- Georgia ABLES data
- Georgia BRFSS Asthma Call-Back Survey
- Georgia Adult Tobacco Survey (state-specific)
- Georgia BRFSS (state-specific)
- Georgia Violent Death Reporting System (state-specific)

All data are maintained in a secure, password-protected information network environment accessible only to project staff. Any data in paper form is maintained in locked file cabinets. All these measures were in effect for the entire project period.

Equipment Inventory List Authorization/Purchased

Report Date: [9/16/2016]
Project Title: Georgia Occupational Health Surveillance System
Grantee Name: GA Department of Public Health
Grants Management Officer: Kathleen Robinson

Grant Number: 1U60OH010908-01
Project Period: [07/01/2015] to [06/30/2016]
Project Officer: Steve Inserra
Grants Specialist: Sharon Cassell

Description of Item: i.e. pH Meter	Mfr. ¹ i.e. Fischer	Serial Number	Quantity	Condition ²	Location ³	Purchase Cost	Date Received [mm/dd/yyyy]
NA	NA	NA	NA	NA	NA	NA	NA

¹Mfr. (Manufacturer)

²Condition: (Excellent) (Good) (Fair) (Poor) (Inoperable)

³Location: complete physical address

Property Administrator & PO Disposition Recommendation and Instructions:

Description of Item	Disposition ¹	Address ²
[Copy from above]	<input type="checkbox"/> Transfer Title <input type="checkbox"/> Retain and Compensate Awarding Agency <input type="checkbox"/> Return to Program Office <input type="checkbox"/> Other (explain)	Attn: [Steve Inserra] Centers for Disease Control & Prevention Peachtree Distribution Center 3719 North Peachtree Road, #100 Chamblee, GA 30341
[Copy from above]	<input type="checkbox"/> Transfer Title <input type="checkbox"/> Retain and Compensate Awarding Agency <input type="checkbox"/> Return to Program Office <input type="checkbox"/> Other (explain)	

¹Check the appropriate disposition

²The CDC Warehouse is the central receiving point for the delivery of all non-hazardous and non-perishable supplies and equipment, CDC – AM – 2004-03, update 2010



DEPARTMENT OF HEALTH AND HUMAN SERVICES

**Procedure for Submission of
Final Invention Statement and Certification (For Grant or Award)
Form HHS 568**

A Final Invention Statement and Certification (Form HHS 568) shall be executed and submitted within 90 days following the expiration or termination of a grant or award. The Statement shall include all inventions which were conceived or first actually reduced to practice during the course of work under the grant or award, from the original effective date of support through the date of completion or termination. The Statement shall include any inventions reported previously for the grant or award as part of a non-competing application. This reporting requirement is applicable to grants and awards by Department of Health and Human Services in support of research.

The Final Invention Statement and Certification does not in any way relieve the person responsible for the grant or award, or the institution, of the obligation to assure that all inventions are promptly and fully reported directly to the National Institutes of Health, as required by terms of the grant or award. Information regarding the reporting of inventions, including the reporting form to be followed, may be obtained from the Office of Policy for Extramural Research Administration, Division of Extramural Inventions and Technology Resources, 6705 Rockledge Drive MSC 7980, Bethesda, Maryland 20892-7980, Telephone: (301) 435-1986.

The original of the completed Final Invention Statement and Certification is to be returned to the awarding component that funded the grant or award. The entire grant or award number must appear in the designated box on the form. The period covered by the Final Invention Statement is the project period of the grant or award at a particular grantee institution. If no inventions were involved, insert the word "None" in the first block under item Title of Invention. Each Statement requires the signature of an institution official authorized to sign on behalf of the institution.

The PHS estimates that it will take from 5 to 10 minutes to complete this form. This includes time for reviewing the instructions, gathering needed information, and completing and reviewing the form. An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number. If you have comments regarding this burden estimate or any other aspects of this collection of information, including suggestions for reducing this burden, send comments to: NIH, Project Clearance Office, 6701 Rockledge Drive MSC 7730, Bethesda, MD 20892-7730, ATTN: PRA (0925-0002). *Do not send this form to these addresses; they are for comments only.*

Privacy Act Statement. The NIH maintains application and grant records as part of a system of records as defined by the Privacy Act: NIH 09-25-0036, *Extramural Awards and Chartered Advisory Committees (IMPAC 2)*, *Contract Information (DCIS)*, and *Cooperative Agreement Information*, HHS/NIH: <http://oma.od.nih.gov/ms/privacy/pa-files/0036.htm>.

Instructions for Final Report: SF-428 Attachment B

A. General Instructions:

This Attachment is to be used by recipients when required to provide a final property report for closeout of Federal assistance awards. The Attachment allows recipients to request specific disposition of Federally-owned property and acquired equipment. The attachment also provides a means for calculating and transmitting appropriate compensation to the awarding agency for residual unused supplies.

Requirements for final reporting are based on individual award provisions and the type of property. Generally, at the end of a Federal assistance award, recipients are required to:

- a. submit a report of Federally-owned property.
- b. provide a listing of equipment items, with an acquisition cost of \$5,000 or more, when the awarding agency has reserved the right to transfer title to the equipment to the Federal Government or a third party.
- c. compensate the awarding agency for residual unused supplies with a total aggregate fair market value greater than \$5,000 that are not needed for any other Federally sponsored programs or projects.

Federal Grant or Other Identifying Number Assigned by Federal Agency. Enter the Federal grant, cooperative agreement or other Federal financial assistance award instrument number or other identifying number assigned to the Federal financial assistance award.

1. **Report.** Check applicable lines a-c to indicate the type of property that is being reported. Note: Federally-owned property includes items provided by the awarding agency, regardless of dollar value. Check line d to indicate no property to report, if the awarding agency requires a negative report.

2. Complete the relevant sections to correspond with the property reported in Block 1.

2a. **Federally-owned Property.**

- (i) To request transfer of the property for use on a specific Federal award.
- (ii) To request Federal agency disposition instructions for unneeded Federally-owned property.
- (iii) To request a disposition other than (i) or (ii). For example, requests for transfer of title under authority of the Stevenson-Wydler Act.

2b. **Acquired Equipment with acquisition cost of \$5,000 or more for which the awarding agency has reserved the right to transfer title.**

- (i) When statutory authority exists, the Federal awarding agency has the option to vest title to equipment acquired with award funds in the recipient with no further obligation to the Federal government and under conditions the Federal awarding agency considers appropriate.
- (ii) To request Federal agency disposition instructions for equipment acquired with award funds.

2c. **Reportable Residual Unused Supplies.** Indicate whether the supplies have been sold or if they will be retained for use solely on non Federally-funded projects.

- (i) Enter the total amount of sales proceeds or an estimate of the current fair market value if the supplies will be retained. Note: Fair market value means the best estimate of the gross sales proceeds if the property were to be sold in a public sale.
- (ii) Enter the percentage of Federal Government participation in the award under which the supplies were acquired.
- (iii) Enter the dollar amount of sales proceeds (or estimate of current fair market value) multiplied by the percentage of Federal Government participation listed in (ii).
- (iv) If the supplies were sold, enter the amount of selling and handling expenses. Enter zero if the supplies will be retained for use on non Federally funded projects.
- (v) Enter the amount of the Federal share in (iii) less the selling and handling expense listed in (iv). Indicate in Block 3 how the funds are being returned to the government (e.g., attached check made out to the Awarding Agency/U.S. Treasury or electronic remission).

3. **Comments.** Provide any explanations or additional information in this block. Attach additional sheets if necessary.

Agency use only. This section is reserved for Federal agency use only.

TANGIBLE PERSONAL PROPERTY REPORT Final Report SF-428- B

Federal Grant or Other Identifying Number Assigned by Federal Agency (Block 2 on SF-428).

1U60 OH010908-01

1. Report (Select all that apply)

- a. Federally-owned Property (List on Supplemental Sheet SF-428S or recipient equivalent and complete Section 2a below.)
- b. Acquired Equipment with acquisition cost of \$5,000 or more for which the awarding agency has reserved the right to transfer title (List on Supplemental Sheet SF-428S or recipient equivalent and complete Section 2b below.)
- c. Residual Unused Supplies with total aggregate fair market value exceeding \$5,000 not needed for any other Federally sponsored programs or projects. (Complete Section 2c below)
- d. None of the above

2. Complete relevant section(s)

For Agency Use Only

2a. Federally-owned Property
(Select one or more.)

- (i) Request transfer to Award _____
- (ii) Request Federal Agency disposition instructions
- (iii) Other (Provide detail in Block 3 or attach request)

Agency response to requested disposition of Federally owned property:

- (i) Recipient request approved ___ denied ___
- (ii) Dispose in accordance with attached instructions ___.

2b. Acquired Equipment (Select one or more.)

- (i) Request unconditional transfer of title with no further obligation to the Federal Government.
- (ii) Request Federal Agency disposition instructions

Agency response to requested disposition of acquired equipment:.

- (i) Recipient request approved ___ denied ___
- (ii) Dispose in accordance with attached instructions ___

Authorized Awarding Agency Official

Signature:	Date:
Name:	Phone:
Title	Email

Note: If the awarding agency does not provide disposition instructions within 120 days the recipient may continue to use the equipment for Federally supported projects or dispose in accordance with the applicable property standards.

2c. Reportable Residual Unused Supplies

- (i) Sale proceeds or Estimate of current fair market value \$ _____
- (ii) Percentage of Federal participation _____ %
- (iii) Federal share \$ _____
- (iv) Selling and handling allowance \$ _____
- (v) **Amount remitted to the Federal Government**..... \$ _____

3. Comments

FEDERAL FINANCIAL REPORT

DRAFT

1. Federal Agency and Organizational Element to Which Report is Submitted NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH		2. Federal Grant or Other Identifying Number Assigned by Federal Agency 1U60OH010908-01						
3. Recipient Organization (Name and complete address, including Zip code) GEORGIA DEPARTMENT OF PUBLIC HEALTH 2 PEACHTREE STREET NW, FLOOR 15th Floor ATLANTA GA 303033141								
4a. DUNS Number 968217559	4b. EIN 1900676388A1	5. Recipient Account Number or Identifying Number F/S 14142	6. Report Type <input type="checkbox"/> Quarterly <input type="checkbox"/> Semi-Annual <input type="checkbox"/> Annual <input checked="" type="checkbox"/> Final	7. Basis of Accounting <input checked="" type="checkbox"/> Cash <input type="checkbox"/> Accrual				
8. Project/Grant Period From: 07/01/2015 To: 08/30/2016			9. Reporting Period End Date 06/30/2016					
10. Transactions (Use lines a-c for single or multiple grant reporting)					Cumulative			
Federal Cash (To report multiple grants, also use FFR Attachment):								
a. Cash Receipts						0.00		
b. Cash Disbursements						0.00		
c. Cash on Hand (line a minus b)						0.00		
(Use lines d-o for single grant reporting)								
Federal Expenditures and Unobligated Balance:								
d. Total Federal funds authorized						145,000.00		
e. Federal share of expenditures						117,362.02		
f. Federal share of unliquidated obligations						0.00		
g. Total Federal share (sum of lines e and f)						117,362.02		
h. Unobligated balance of Federal funds (line d minus g)						27,637.98		
Recipient Share:								
i. Total recipient share required						0.00		
j. Recipient share of expenditures						0.00		
k. Remaining recipient share to be provided (line i minus j)						0.00		
Program Income:								
l. Total Federal program income earned						0.00		
m. Program income expended in accordance with the deduction alternative						0.00		
n. Program income expended in accordance with the addition alternative						0.00		
o. Unexpended program income (line l minus line m or line n)						0.00		
	11. Indirect Expense	a. Type	b. Rate	c. Period From	Period To	d. Base	e. Amount Charged	f. Federal Share
					g. Totals:	0.00	0.00	0.00
12. Remarks: Attach any explanations deemed necessary or information required by Federal sponsoring agency in compliance with governing legislation:								
13. Certification: By signing this report, I certify to the best of my knowledge and belief that the report is true, complete, and accurate, and the expenditures, disbursements and cash receipts are for the purposes and intent set forth in the award documents. I am aware that any false, fictitious, or fraudulent information may subject me to criminal, civil, or administrative penalties. (U.S. Code, Title 18, Section 1001)								
a. Typed or Printed Name and Title of Authorized Certifying Official Kathleen Robinson Grants Management Director						c. Telephone (Area code, number and extension) 404-657-6318		
b. Signature of Authorized Certifying Official						d. Email address kathleen.robinson@dph.ga.gov		
						e. Date Report Submitted (Month, Day, Year) 09/27/2016		
						14. Agency use only:		

Standard Form 425
 OMB Approval Number: 0348-0061
 Expiration Date: 10/31/2011



Brenda Fitzgerald, MD, Commissioner | Nathan Deal, Governor

Peachtree Street NW, 15th Floor
Atlanta, Georgia 30303-3142
www.health.state.ga.us

September 16, 2016

Sharon Cassell
Grants Management Specialist
Centers for Disease Control & Prevention (CDC)
OCOO/Procurement and Grants Office (PGO)
KOGR Bldg STANF Rm 2107, MS K98
Atlanta, Georgia 30341

RE: 1U600H010908-01

Dear Ms. Cassell:

Please find the attached the Georgia Occupational Health and Safety Surveillance close out report for the Grant Number 1U600H010908-01, the Equipment Inventory List, and the Final Invention Statement,

If you have any questions, please contact A. Rana Bayakly at rana.bayakly@dph.ga.gov or call at 404-657-2617.

Sincerely,

A handwritten signature in black ink, appearing to read 'A. Rana Bayakly'.

Rana Bayakly, MPH
Principal Investigator and Director
Georgia Occupational Surveillance System
Chronic Disease, Healthy Behaviors and
Injury Epidemiology Section

A handwritten signature in black ink, appearing to read 'Kate Pfirman'.

Kate Pfirman
Chief Financial Officer



We Protect Lives.