

American Indian and Alaska Native Worker Safety and Health Strategic Plan



Centers for Disease Control and Prevention
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American Indian and Alaska Native Worker Safety and Health Strategic Plan

DEPARTMENT OF HEALTH AND HUMAN SERVICES
Centers for Disease Control and Prevention
National Institute for Occupational Safety and Health

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Foreword

The American Indian and Alaska Native Worker Safety and Health Strategic Plan is the result of several years of collaboration between the Centers for Disease Control and Prevention's National Institute for Occupational Safety and Health and partners, including tribes, tribal leaders, and tribal-serving organizations. While NIOSH facilitated its development, the content and scope of the plan was informed by visits to reservations, attending tribal public health conferences, convening workshops, and interactions with tribes and partners. The plan serves as a guide for the nation to develop research and outreach activities to prevent injuries, illnesses, and fatalities to American Indian and Alaska Native workers. The plan should be viewed as a starting point to stimulate collaboration and activities to improve American Indian and Alaska Native worker safety and health.

Although American Indian and Alaska Native workers account for 2.7 million or 1.8% of the total U.S. workforce, little is known about occupational safety and health among American Indian and Alaska Native workers. Data describing the American Indian and Alaska Native workforce and workplace hazards among American Indian and Alaska Native workers is scarce. As sovereign nations, all 574 federally recognized American Indian and Alaska Native tribes maintain a government-to-government relationship with the U.S. federal government.

In 2013, the National Institute for Occupational Safety and Health, launched an initiative to partner with American Indian and Alaska Native tribes, communities, organizations, and other stakeholders to identify priority issues, conduct outreach, and determine how the National Institute of Occupational Safety and Health could best provide occupational safety and health support to tribal communities.

The National Institute for Occupational Safety and Health appreciates the time and effort of the tribal leaders and others whose input helped inform and strengthen this strategic plan.

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Executive Summary

This strategic plan defines and prioritizes occupational safety and health (OSH) research related to American Indian and Alaska Native (AI/AN) workers for 2023–2032. This strategic plan focuses on conducting priority research and outreach activities to prevent injuries, illnesses, and fatalities to AI/AN workers. The objectives are organized by four focus areas: (1) research, (2) practice, (3) policy, and (4) capacity building. The four focus areas were developed based on input received at the Improving Worker Safety and Health Among American Indians and Alaska Natives: Partnership Workshop in 2015, the Building Bridges to Enhance the Well-Being of American Indian and Alaska Native Workshop in 2019, a review of relevant strategic plans, and input collected from tribes during a formal Centers for Disease Control and Prevention (CDC) tribal consultation process in 2022.

Acronyms

AI/AN	American Indian and Alaska Native
CDC	Centers for Disease Control and Prevention
CHWE	Center for Health, Work and Environment
CSTLTS	Center for State, Tribal, Local, and Territorial Support
NIOSH	National Institute for Occupational Safety and Health
NIHB	National Indian Health Board
OSH	Occupational Safety and Health



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Introduction

National Institute for Occupational Safety and Health

The National Institute for Occupational Safety and Health (NIOSH) is the U.S. federal agency that conducts research and makes recommendations to prevent worker injury and illness. NIOSH was established under the Occupational Safety and Health Act of 1970. It is part of the CDC in the U.S. Department of Health and Human Services. NIOSH guided the development of this strategic plan and hopes it will serve as a blueprint to enhance the health, safety, and well-being of AI/AN workers across the United States. This strategic plan can serve as a springboard for developing partnerships and collaborations, guiding grant writing and development efforts, establishing research priorities, examining and enhancing internal capacities, and developing and implementing local worker safety and health activities.

NIOSH American Indian/Alaska Native (AI/AN) Initiative

In 2013, NIOSH launched an initiative to partner with AI/AN communities, tribal-serving organizations, and others to improve OSH for AI/AN workers. The initiative's main goal is to maximize resources to build and strengthen capacity to assure that AI/AN workers return home safely to their families and communities. All activities are coordinated with the Center for State, Tribal, Local, and Territorial Support (CSTLTS).

Background and Context

Improving Worker Safety and Health Among American Indian and Alaska Natives: A Partnership Workshop

To enhance worker safety and health in tribal communities and develop partnerships, NIOSH and the Center for Health, Work and Environment (CHWE), a Center within the Colorado School of Public Health, convened a partnership workshop on OSH issues of AI/AN workers in August 2015 in Denver, Colorado. Thirty-two attendees from tribes, tribal-serving organizations, academia, and state and federal government agencies came together to advance worker safety and health in tribal communities. Of those attendees, 15 participants represented tribes or tribal-serving organizations. This was the first such AI/AN-specific gathering of this nature, and proved successful in providing information, sharing resources, establishing new relationships, and strengthen existing ones among the participants. Additionally, an AI/AN OSH network was created to nurture relationships and build capacity.

Building Bridges to Enhance the Well-Being of American Indian and Alaska Native Workshop

To further advance worker safety and health in tribal communities, NIOSH, in partnership with the CHWE and the National Indian Health Board (NIHB), organized a second workshop in July 2019 in Denver, Colorado. This workshop focused on worker safety and health activities in tribal communities. The over 50 participants included tribal, academic and government partners.

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Of those participants, 25 represented tribes or tribal-serving organizations. Discussions included a variety of OSH topics ranging from data sharing to tribal OSH codes. Participants also helped guide the development of this strategic plan by providing specific input on areas of focus, helping to identify needs, and discussing elements, such as the appropriate audience, and obtaining support and buy-in for a national strategic plan.

Tribal Sovereignty

There are currently 574 federally recognized tribes throughout the contiguous U.S. and Alaska.⁶ Each is a sovereign nation and maintains a government-to-government relationship with the U.S. federal government.⁷ In addition to exercising political sovereignty, tribes exercise cultural sovereignty through traditions and religious practices unique to each tribe's history and culture.⁸ Cultural sovereignty "encompasses the spiritual, emotional, mental, and physical aspects" of Native people's lives and is a foundation to the tribal exercise of political sovereignty.⁸

Tribal Workforce Data

Although they account for 2.7 million or 1.8% of the total U.S. workforce, little is known about OSH among AI/AN workers.³ These workers are employed in a wide variety of occupations, with the highest numbers in office and administrative support, sales and related occupations, management, transportation and material moving, and food preparation and serving.³ Many AI/AN workers are also employed through tribal enterprises such as medical care, housing, manufactured products, food production, livestock, and tourism. Tribes are often the largest employer on tribal lands and support local and state economies.

Fatal Occupational injuries among non-Hispanic American Indian and Alaska Native workers by industry group, United States, 2012 to 2021

Industry Group	Number of Fatalities (%)
Construction	87 (24.0)
Agriculture, Forestry, Fishing and Hunting	50 (13.8)
Transportation and Warehousing	37 (10.2)
Public Administration	29 (8.0)
Administrative and Support and Waste Management and Remediation Services	9 (2.5)
Manufacturing	9 (2.5)
Mining, Quarrying, and Oil and Gas Extraction	8 (2.2)
Arts, Entertainment, and Recreation	7 (1.9)
Health Care and Social Assistance	4 (1.1)
Accommodation and Food Services	3 (0.8)
Retail Trade	3 (0.8)
Wholesale Trade	3 (0.8)
Not available/unknown	114 (31.4)
Total	363

Bureau of Labor Statistics. [2021] Census of Fatal Occupational Injuries. Washington, DC: U.S. Bureau of Labor Statistics; 2022

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According to the Bureau of Labor Statistics, 363 AI/AN workers were killed on-the-job during 2012–2021, an average of 36 fatalities each year.⁴ The proportion of AI/AN workers living on tribal land is unknown; therefore, the number of worker deaths are likely underrepresented. National data on occupational injuries, illnesses, and fatalities among AI/AN workers are scarce, and there is limited research on worker safety, health, and well-being in tribal communities. Given the lack of data, the true numbers of workers injuries, illnesses, and fatalities are likely much higher.

Focus Areas for American Indian and Alaska Native Workers

This plan is intended to identify the research, information, and actions needed to prevent occupational injuries, illnesses, and fatalities among AI/AN workers. This plan provides a vehicle for partners to describe the most relevant issues, gaps, and safety and health needs in tribal communities. OSH initiatives are best implemented and most effective when incorporating or wholly utilizing the cultural practices of the relevant community.

Because the strategic plan is intended to guide national OSH efforts for AI/AN workers through a strategic focus on four topic areas, it cannot at the same time be an inventory of all OSH issues worthy of attention. Those who contributed to the development of this agenda believed that the number of priority topics should be limited in scope so that resources could be focused on a manageable set of objectives, thereby increasing the likelihood of substantial impact in the workplace. These objectives are organized into four areas of focus: (1) research, (2) practice, (3) policy, and (4) capacity building, which were established based on input from both the 2015 and 2019 workshops and a review of other relevant strategic plans.

These objectives are listed in no specific order, and no prioritization is placed upon any item; rather, they capture the array of opportunities available to engage in the work outlined in this strategic plan. It is acknowledged that tribes are approaching these issues with varying capacities and resources, and their own internal priorities established by their community and their governments. NIOSH encourages tribes and their partners to examine the list of objectives to determine what is feasible to achieve locally and constitutes the best path forward.

Who are the intended audiences?

This plan was developed to provide relevant objectives for tribes, tribal OSH professionals, tribal-serving organizations, tribal epidemiologists, government agencies, state and local health departments, academia, and physicians. Some focus areas, and certainly some of the objectives, will appeal to specific audiences and consequently create a path for bringing together many of the potential and intended partners.

How was the strategic plan developed?

The strategic plan was developed in collaboration with tribes, tribal-serving organizations, NIOSH researchers, academia, state and local health departments, and government agencies. Based on input and discussions at the 2015 and 2019 tribal worker safety and health workshops and a review of relevant strategic plans, four focus areas were established. Tribes had the opportunity to provide input on the plan during the formal CDC tribal consultation process. Other partners and the public were given the opportunity to provide input when the plan was shared on the Federal Register notice.

The Four Focus Areas

Because OSH resources are limited, this agenda focuses on priority OSH operations, workers, and issues based on what is currently known about safety and health risks in industries within tribal communities. Previous discussions on leading causes of fatalities, injuries, and hazardous exposures—along with partner experience and expertise—were all considered when selecting objectives contained within these four focus areas. This plan is meant to be flexible to account for diversity and uniqueness of each tribe. The plan is a collaborative model that includes tribal partners and other collaborators. The concept of collaboration was inspired by input from workshop participants who stressed that traditional indigenous models, such as the medicine wheel, are built around ideas of coming together and finding similarities and linkages.

1. Research

Research related to AI/AN worker safety, health, and well-being is vital. Considering the safety and health of all workers, there is a lack of information and data on injury, illness, and fatality related to AI/AN workers. We must identify objectives to frame how the work in this area should move forward. An increase in basic, public health surveillance, and translational research will provide needed information to better determine how best to serve AI/AN workers. Basic research builds a foundation of scientific knowledge to base future interventions. Most laboratory research falls into this category, as well as exposure assessment. Public health surveillance research develops new methods, tools, and analytical techniques to improve the identification of existing and emerging safety and health outcomes as well as tracking these outcomes over time. Translational research involves studying processes for putting research outputs into practice. Data are critical, driving both decisions and policy. We also use data for evaluating the impact of programs, quantifying progress towards objectives, and identifying barriers to issues related to AI/AN worker health, safety, and well-being. Given that scientific research involving unethical treatment has occurred in Indian Country, tribes should be fully engaged in all phases of research development, and ultimately research should be directed and managed by tribes.

Research (RE) Objectives

- RE1.** Identify and evaluate data sources that can be used or enhanced to describe OSH risk factors among AI/AN workers.
- RE2.** Conduct basic research to identify OSH risks among AI/AN workers.
- RE3.** Conduct research to characterize the AI/AN workforce.
- RE4.** Identify factors (e.g., social, legal, economic, and environmental) that contribute to occupational injuries, illnesses, and fatalities among AI/AN workers.
- RE5.** Conduct translational research to identify barriers and aids to implementing OSH interventions and programs in tribal communities.
- RE6.** Incorporate participatory and traditional indigenous approaches (e.g., ancestral wisdom; Indigenous Knowledge) when designing, implementing, and evaluating safety, health, and well-being initiatives.
- RE7.** Conduct economic analyses to better understand the impact of worker safety and health in tribal communities.

2. Practice

This focus area centers on adopting and adapting knowledge, interventions, and technologies within the workplace to improve the safety, health, and well-being of AI/AN workers, and to strengthen workplace safety and health practices. As tribes enter the field of worker safety and health, they will present with different resources, infrastructure, capacity, and experience. As previously mentioned, tribes are best positioned to determine the most beneficial and feasible practices to undertake.

Practice (PR) Objectives

- PR1.** Complete a preliminary assessment to create a priority list of AI/AN OSH topics to guide materials and partnership development.
- PR2.** Share existing information about OSH and benefits of OSH programs among AI/AN workers, employers, professional associations, and others.
- PR3.** Collaborate with partners on adopting and using health and safety workplace practices, interventions, and technologies that are tailored for AI/AN workers.
- PR4.** Scan for existing materials that could be adapted, and develop toolkits, guidelines, assessments, and other resources that address worker safety, health, and well-being for practitioners in tribal communities.
- PR5.** Create a clearinghouse of tribal OSH materials that can be adapted and used by other tribes.
- PR6.** Implement effective and culturally appropriate strategies to integrate worker safety and health protection with activities that advance the overall well-being of AI/AN workers.
- PR7.** Evaluate and demonstrate the impact of health and safety initiatives on improving worker safety, health, and well-being.
- PR8.** Provide feedback to AI/AN workers and other partners who may use resources.

3. Policy

As sovereign nations, tribes have inherent authority to protect the public health and welfare of their citizens and “to make their own laws and be ruled by them.”⁵ Thus, in the context of OSH, tribes have the authority and insight into how to promote OSH using methods most appropriate for their communities.⁶ Tribes have exercised this authority by passing laws, codes, and policies related to OSH and by providing OSH services through tribal agencies and programs.⁷ This focus area refers to all aspects of implementing policy on OSH not only at the tribal level, but also at the local, state, and federal levels. This includes, but is not limited to, policy research, development, advocacy, implementation, and evaluation.

Policy (PO) Objectives

- PO1.** Identify and assess the prevalence and effectiveness of existing OSH laws, codes, or policies in tribal communities.
- PO2.** Develop, monitor, evaluate, and provide technical assistance in developing OSH laws, codes, and policies that address worker safety, health, and well-being of AI/AN workers.
- PO3.** Facilitate information sharing between tribal leaders, workers, communities, and other internal and external partners on effective OSH laws, codes, or policies.
- PO4.** At the direction of tribal leadership, incorporate participatory and traditional Indigenous approaches when developing policy change to positively impact the safety, health, and well-being of AI/AN workers.
- PO5.** Encourage and facilitate meaningful tribal consultation regarding OSH laws, codes, or policies among external partners.
- PO6.** Integrate a work agenda into economic development policy and projects on tribal land.

4. Capacity Building

This focus area refers to a broad range of objectives that will raise the collective or individual ability of tribes to promote and practice OSH in their communities. This can take the shape of workforce development, training, technology transfer, or even financial support—and it can span raising the capacity across the three previously discussed focus areas. OSH training is one way to reduce the risk of occupational illness, injury, and death. Furthermore, AI/AN people are underrepresented in the public health and OSH workforce. Addressing the needs of AI/AN populations in fellowships, internships, trainings, and volunteer opportunities for students and professionals could increase the pipeline of AI/AN workers in OSH.

Capacity (CA) Building Objectives:

- CA1.** Increase professional development opportunities for AI/AN workers.
- CA2.** Collaborate with relevant state and federal agencies and academic and professional organizations to conduct outreach with tribes for applicable internships, trainings, and certification opportunities.
- CA3.** Create a tribal “train the trainer” program for key OSH topical areas.
- CA4.** Increase the number of AI/AN enrolled in OSH training programs.
- CA5.** Conduct symposia on local worker safety, health, and well-being in tribal communities.
- CA6.** Engage with industry partners to formulate complementary and/or best practices for OSH.
- CA7.** Provide technical assistance in drafting OSH laws, codes, and policies.

Evaluate Progress

As mentioned previously, this strategic plan is written as guidance for the nation, and it can serve as a resource to tribes, tribal leaders, tribal-serving organizations, government agencies, academic institutions, and others who wish to improve safety and health for the AI/AN workforce.

NIOSH will evaluate and report on progress towards achieving the objectives identified in this plan at both the midpoint of the plan (2027) and at the end (2032). The midpoint evaluation will be an opportunity for NIOSH to ask tribal partners and others to share any new safety and health priorities that may have emerged since the plan was first published and where adjustments and additions to the plan need to be made.

The primary purpose of the midpoint and final evaluation will be to assess the influence of this strategic plan on stimulating activities that improve the safety and health of the AI/AN workforce. To determine the impact of the strategic plan, NIOSH will track any type of activity (e.g., new partnerships, new OSH tribal laws, trainings, research projects, communication campaigns) whose aim is to improve worker safety and health in tribal communities. Activities may be deemed relevant even if they are beyond the scope of traditional worker safety and health to reflect the more holistic approach to AI/AN worker health as described previously.

NIOSH will continue to closely communicate and collaborate with partners to be made aware of activities and to determine if this plan played an influential role in these identified activities. NIOSH will also periodically bring partners from across the nation together to share successes and challenges being encountered and discuss the nation's progress towards meeting plan objectives.

A midpoint and final evaluation report will be published by NIOSH outlining identified activities and specific success stories that met plan objectives. The two reports will also include a path forward for the second half of the time period and the next decade beyond the time frame of this plan.

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More Information

NIOSH Research to Practice (r2p)

<https://www.cdc.gov/niosh/r2p/>

NIOSH Training and Workforce Development

<https://www.cdc.gov/niosh/training/>

Occupational Health Equity: Burden Need and Impact

<https://www.cdc.gov/niosh/programs/ohe/>

Partnering to Promote Workplace Safety and Health in Tribal Communities

<https://blogs.cdc.gov/niosh-science-blog/2016/04/21/ai-an-partnership/>

Safe • Skilled • Ready Workforce Program

<https://www.cdc.gov/niosh/programs/ssrw/>

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