

# SUPPORTING TRIBAL PARTNERS WITH FACTS: THE ALASKA NATIVE INJURY ATLAS

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## PURPOSE AND METHODS

### **Purpose:**

Provide information about the most frequent causes of injury mortality and hospitalization for Alaska Native and American Indian people in Alaska, what population groups have higher risk, and how injury rates trend over time.

### **Methods used:**

- Data are reported as frequencies, age-adjusted rates and trends over time.
- Frequencies were not reported for strata with less than 5 cases and rates were not calculated where there were fewer than 10 cases.
- Determination of statistically significant differences in rates were done using the chi-square and Mantel-Haenszel tests.

## DATA PROVIDERS

The primary data sources used to create the Atlas were:

- Alaska Trauma Registry (Hospitalizations)
- Alaska Health Facilities Data Reporting Program (Hospitalizations)
- Alaska Health Analytics and Vital Records (Deaths)
- Alaska Department of Labor (Populations)

## SUMMARY OF INJURY FATALITIES

During 2007-2016, 1,966 Alaska Native or American Indian people in Alaska died from an injury.

- More than half (56%) were from suicide, poisoning, and drowning combined.
- Between the periods of 1992-1996 and 2012-2016, significant rate decreases were seen for drowning and motor vehicle-related injuries.
- People ages 20-29 had the highest rate of intentional injuries, and those age 70 and older had the highest unintentional injury rate.

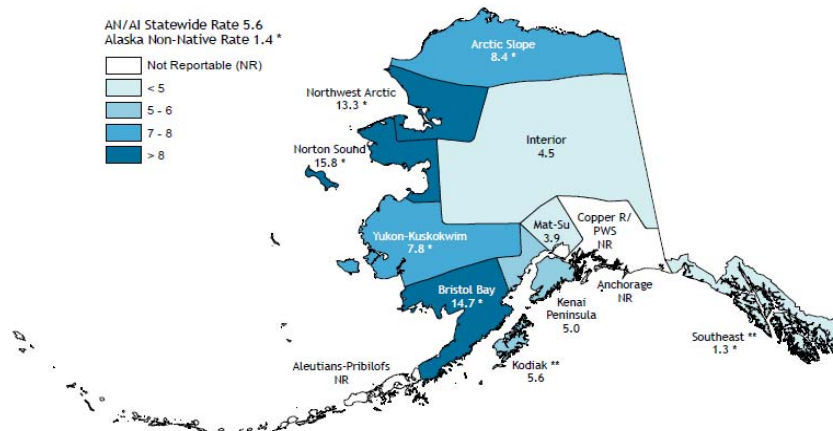
## SUMMARY OF INJURY HOSPITALIZATIONS

During 2007-2016, 13,527 Alaska Native or American Indian people in Alaska were hospitalized for an injury.

- Nearly two thirds (61%) were due to falls, suicide attempts, and assaults.
- Between the periods of 1992-1996 and 2012-2016, significant rate decreases were seen for injuries from falls, assaults, and snowmachines.
- People ages 20-29 had the highest rate of intentional injuries, and those age 70 and older had the highest unintentional injury rate.

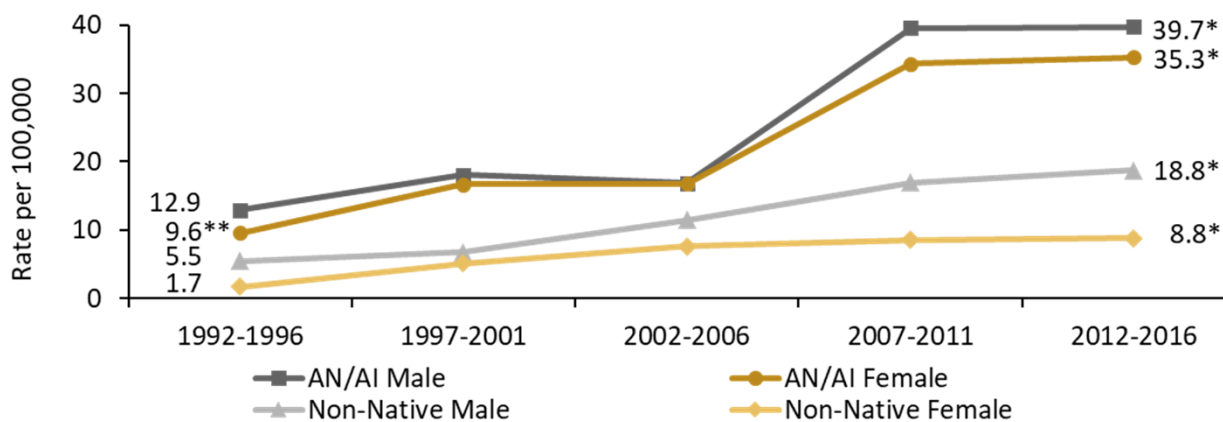
## REGIONAL RATES

ATV Hospitalization Rate by Region, AN/AI People, 2007-2016



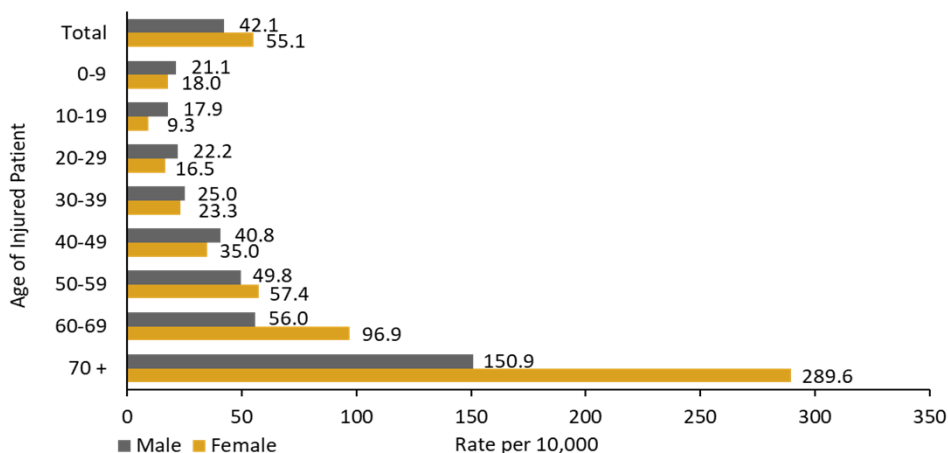
# TIME TRENDS

**Poisoning Death Rate by Gender, Race and Year, 1992-2016**



# AGE AND GENDER

**Fall Injury Hospitalization Rate by Gender and Age, Alaska Native People, 2007-2016**



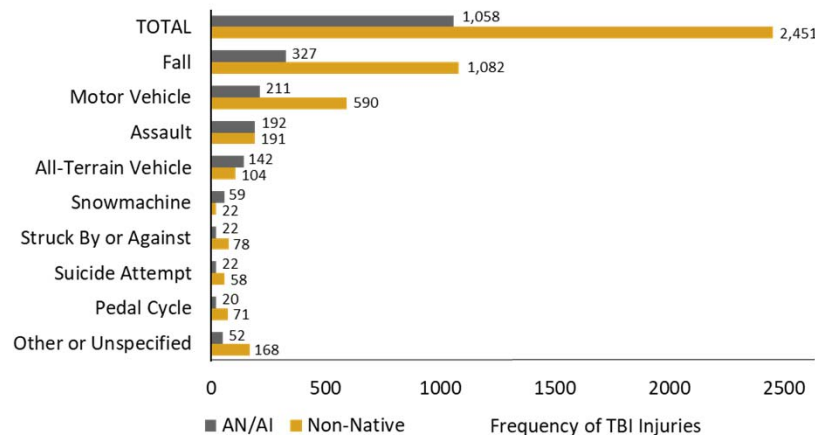
## SPECIAL TOPIC: TRAUMATIC BRAIN INJURY

Traumatic Brain Injury (TBI) was included as a special interest topic due to limited resources and care in rural communities.

- The 2012-2016 TBI rate for Alaska Native/American Indian people in Alaska was twice the 2014 national rate (18.1 and 8.5 per 10,000, respectively).
- In Alaska, patients 70 and older had the highest rate of TBI by age group and the leading cause of TBI for all ages combined was falls.
- A high frequency of pediatric TBI due to all-terrain vehicle (ATV) crashes led to a collaboration between trauma and injury prevention staff to develop an ATV safety toolkit to be taught in school.

## SPECIAL TOPIC: TRAUMATIC BRAIN INJURY

**Causes of Traumatic Brain Injuries in Alaska, 2012-2016**



## INJURY ATLAS AS A TOOL

The *Alaska Native Injury Atlas* has been referenced by Tribal and non-profit organizations within and outside of Alaska:

- In grant applications for Injury Prevention funds.
- In planning, prioritizing and tailoring Injury Prevention efforts.
- In peer-reviewed papers and articles.
- As a guide for other Tribal areas to produce local Atlases.
- In outreach materials that raise awareness of injury concerns.

## CONTACTS

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Alaska Native Injury Atlas, 3<sup>rd</sup> Ed. can be accessed on the Alaska Native Epidemiology Center website at: <http://anthctoday.org/epicenter/publications.html>

