

NUNAKAUYARMIUT TRIBE TRIBAL TRANSPORTATION SAFETY PLAN



2021

PREPARED FOR
NUNAKAUYAK
TRADITIONAL COUNCIL



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TRIBAL TRANSPORTATION PROGRAM SAFETY FUNDS



SUMMARY

Each year under the FAST Act, 2% of the available TTP funds are set aside to address transportation safety issues in Native America. TTPSF grants are available to federally recognized Indian tribes through a competitive, discretionary program. Awarded annually, projects are chosen whose outcomes will address the prevention and reduction of death or serious injuries in transportation related incidents, such as motor vehicle crashes. Transportation fatalities and injuries severely impact the quality of life in Indian country. Statistics are consistently higher than the rest of the nation as a whole.

FHWA advocates the development of strategic Transportation Safety Plans as a means for tribes to determine how transportation safety needs will be addressed in and around tribal communities.

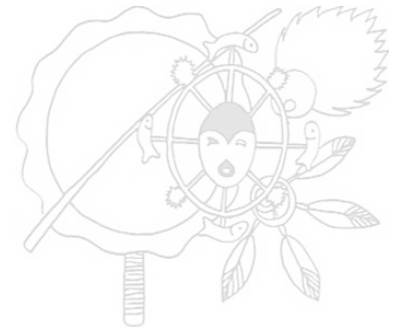
SAFETY PLANS

Transportation safety plans are a tool used by Tribes to identify and plan to address transportation risk factors that have a potential of leading to serious injury or death. Safety Plans also organize the efforts of a variety of

entities to more effectively reduce risk. Safety plans can cover multiple transportation modes (roads, maritime, trails, air travel, and others). Safety plans may lead to implementation of a project or program, renewed efforts in an existing program, or further study of a roadway section (using an engineering study or Road Safety Audit).

Transportation safety plans should not focus on any one funding source. Instead, a transportation safety plan should demonstrate the safety concerns in a community and the prioritized strategies that will be explored to implement the plan. To the greatest extent possible the concerns demonstrated by a safety plan should be selected based on incident history (data). Data can help funding entities understand the needs and may even compel the funding of a project or program. Safety plans can provide a forum for utilizing data sets that are not otherwise considered by funding agencies such as public testimony when formal crash data does not exist.

INTRODUCTION



TRIBAL TRANSPORTATION SAFETY PLAN UPDATE

Nunakauyak Traditional Council is committed to improving transportation safety in Toksook Bay, Alaska in an ongoing effort to reduce the occurrence of deaths and critical injuries throughout the transportation system. This Tribal Transportation Safety Plan update will identify the vision of the tribal council as it relates to safety, the existing state of transportation safety in the village, and will evaluate safety needs and goals of the community through the following four emphasis areas: Education, Enforcement, Engineering, and Emergency Medical Services (EMS).

The purpose of this document is to provide an update of the transportation safety plan that was developed in 2016 for the Nunakauyarmiut Tribe. This plan was developed as part of an ongoing effort to prioritize safety in transportation and to make safety improvements with input from several safety partners.

DEMOGRAPHIC OVERVIEW

LOCATION INFORMATION:

Nelson Island, Alaska
512 Miles West of Anchorage

REGIONAL DEMOGRAPHICS:

Population – 1,724
Per Capita Income – \$15,211
Unemployment Rate – 12.2%
Poverty Rate – 32.35%

ECONOMICALLY DISTRESSED:

Nelson Island villages qualify as federally designated economically distressed areas.

AREA OF PERSISTENT POVERTY:

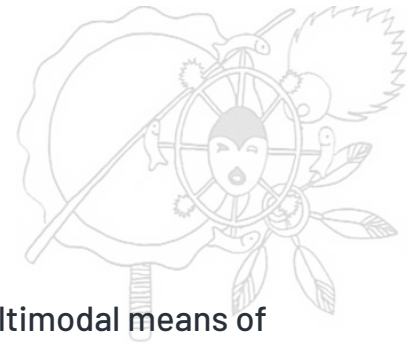
Nelson Island is in Census Tract 1 of the Bethel Census Area, and is defined as an Area of Persistent Poverty.

REGION OVERVIEW

The Nunakauyarmiut Tribe is one of five villages located on Nelson Island, which lies 115 miles west of Bethel, Alaska. With an area of 843 square miles, Nelson Island is the 15th largest island in the United States. It is separated from the Alaska mainland to its north by the Ningaluk River, to its east by the Kolavinarak River and from Nunivak Island to its southwest by the Etolin Strait. Toksook Bay is considered the regional hub of Nelson Island, as it is the most populous of the villages, and houses the regional clinic.



VISION & GOALS



VISION

To advance transportation safety for village members in all multimodal means of transportation used within the village and among regional entities.

MISSION

Develop, implement, and evaluate a community-supported, data-driven plan for maximizing transportation safety through collaboration with law enforcement, community members, tribal leaders, and other partners that can help implement education, engineering, enforcement, and emergency services strategies.

GOALS

- Reduce the number of transportation related incidents by 50% by 2024.
- Enhance tribal members' awareness of traffic safety.

SAFETY PARTNERS

The following are safety partners that have been involved with the development of this safety plan or will be active participants in the implementation of this safety plan:

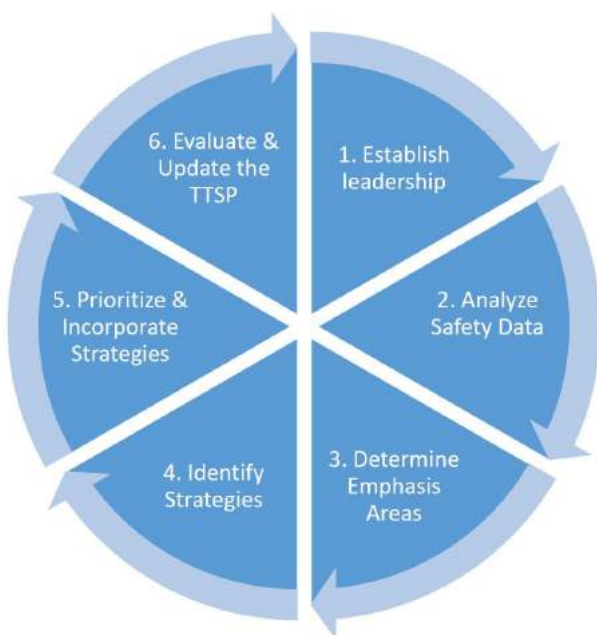
- Alaska Department of Transportation (AKDOT)
- Local Law Enforcement – Village Police Officers (VPOs)
- Yukon-Kuskokwim Health Corporation Toksook Bay Subregional Clinic
- Search & Rescue
- Nunakauyak Traditional Council
- Nunakauyak Traditional Council Transportation Department
- Nelson Island School
- Nelson Island Communities – the Native Villages of Nightmute, Tununak, and Umkumiut
- Federal Highway Administration (FHWA)
- Bureau of Indian Affairs Department of Transportation (BIADOT)
- Center for Tribal Transportation
- Indian General Assistance Program (IGAP)



PROCESS

The planning process initiated with this safety plan is guided by the U.S. Department of Transportation's guide entitled *Developing a Transportation Plan*, by public meetings held to determine transportation related safety needs, and by the safety analysis completed for the Nelson Island Subregional Transportation Plan.

TRIBAL TRANSPORTATION SAFETY PLAN DEVELOPMENT PROCESS



1. **Establish Leadership** - Identifying a champion to go through the process of creating an effective and worthwhile TTSP.
2. **Analyze Safety Data** - Conduct research (local police reports/records, state trooper reports/records, health clinic reports/records) to assist in determining problem areas in the transportation network in and around the village.
3. **Determine Emphasis Areas** - Develop and distribute questionnaires to the community to collect information about what they see as transportation issues and priorities. The community's input in conjunction with accident data will serve the basis for developing emphasis areas.
4. **Identify Strategies**

EXISTING EFFORTS

The tribe has several programs in place which contribute to the overall transportation safety of its members. The implementation strategies outlined in this report will help to coordinate efforts between tribal programs and maximize their resources. The existing efforts are listed below.

- Collaboration with Village Police Officers (VPOs)
- Collaboration with the Nelson Island communities in the Nelson Island Road and Port Project, a project developed to increase the safety of those traveling between the communities

DATA ANALYSIS & SUMMARY

NTC does not have a formal crash database. All safety concerns and areas of emphasis were determined through the public involvement process at the community safety plan meeting and collaboration with the Nunakauyak Traditional Council Transportation Department and the City of Toksook Bay. The most critical safety needs were assessed in the following emphasis areas.

EMPHASIS AREAS



1

SAFETY DATA IMPROVEMENT

Safety Data Improvement will help NTC focus on improving data tools used to inform their policy and decision-making, and will on helping with NTC's processes and practices for collecting, managing, and utilizing their roadway data.

2

OFF ROAD TRANSPORTATION SAFETY

Off Road Transportation Safety will help NTC reduce injuries and save lives through interactive, outdoor safety & environmental awareness education programs. Learning safe travel techniques is critical to reduce injuries and deaths from preventable injuries.

3

CULVERT SAFETY

Culvert Safety will help NTC increase awareness regarding the dangers of playing on or near culverts.

4

ROADWAY SAFETY

Roadway Safety will address the number of safety concerns on roads and trails including pedestrian safety, shelters, markers, and bridge upgrades.

5

SPEED MANAGEMENT

Speed Management will help NTC address the incidence of speeding within the village.

6

BLIND CORNERS

Blind Corners will help NTC address the incidence of motor vehicle accidents on village roadways where blind corners are contributing factors.

7

INSTALL SIGNAGE

Installing Signage will reduce incidence of motor vehicle accidents within the village and on trails linking the Nelson Island communities that have questionable right-of-ways or restricted views.

8

BOAT SAFETY

Boat Safety will highlight the need for increased safety in this mode of transportation and will further emphasize the need to initiate the boat harbor project and the boat portage project.

9

SEAL HUNTER SAFETY

Seal Hunter Safety will help NTC reduce the incidence of seal hunting related injuries and fatalities.

10

PERSONAL TRANSPORTATION MODES

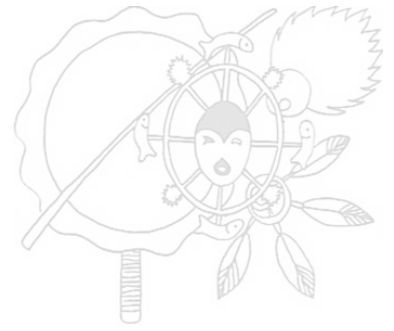
The lack of alternative transportation modes may be contributing to safety concerns for pedestrians and off-road vehicle users.

11

EMERGENCY/FIRE SERVICES

The lack of emergency/fire services compounds village safety concerns.

EMPHASIS AREAS



The Nunakauyarmiut Tribe 2021 Transportation Facility Inventory contains 109.8 miles in 139 transportation facilities. The NTC Transportation Facilities are comprised of gravel roads, trails, boardwalks, bridges, and portage facilities. With the lack of funding and adequate resources to fully develop the Tribal Transportation Program, collaborative efforts have been established to partner together effectively to address all safety deficiencies in Toksook Bay, Alaska.

Many of the roads and trails lack proper signage and trail markers. Within each program, limited funding resources have prohibited completion of the corrective measures to improve safety. However, by working together and collaborating with the other entities within Toksook Bay, the Transportation Safety Plan Steering Committee can collectively address and improve these safety deficiencies.

EMPHASIS AREA 1: SAFETY DATA IMPROVEMENT

DESCRIPTION

Solid data collection methods are lacking that would allow NTC to better understand, identify, and share tribal transportation safety issues. Refinement and improvement of data collection, sharing, and analysis processes is recommended as part of the safety improvements. Data collection is a critical component in identifying and responding to safety improvement needs. NTC does not currently collect or analyze violation or crash data.

GOAL

Improve data availability and completeness to allow for a better and broader understanding of the crash-related safety problems in Toksook Bay. Use the results of data analyses to identify focus areas for safety improvement, identify location based and systemic roadway issues, plan safety efforts and support funding requests—including grant funding justifications

STRATEGIES

- Identify critical pieces of crash data
- Secure a data collection system
- Train VPOs, transportation, and other safety personnel how to use and interpret the data/crash reporting system
- Combine crash data with roadway features and traffic volume
- Share crash data reporting with Alaska State DOT for integrated datasets
- Connect village clinic records with crash records

EMPHASIS AREA 2: OFF ROAD TRANSPORTATION SAFETY

DESCRIPTION

Tribal citizens use off road transportation to travel throughout Toksook Bay and Nelson Island. Off-road transportation typically consists of ATVs, boats, and snow machines; significant subsistence and recreational areas exist on Nelson Island. The majority of serious injuries occur while utilizing ATVs, boats, or snow machines. The amount of time it takes first-responders to help people in distress is unpredictable. Because some accidents occur so quickly, self rescue is often the only chance of survival.

GOAL

Reduce the number of injuries, while utilizing off road vehicles.

STRATEGIES

- Conduct community-wide survival and emergency preparedness training
- Implement community-wide off road vehicle operation and maintenance training
- Maintain trails, trail markers, and signage



EMPHASIS AREA 3: CULVERT SAFETY

DESCRIPTION

Children often play in or near culverts in the village. This dangerous past time proved fatal in 2020, when a child drowned in an unmaintained and flooded culvert. Village residents (primarily children) need to be informed of the hidden dangers of culverts, and that they should not play in or go near culverts.

GOAL

Eliminate incidence of culvert related accidents within the village.

STRATEGIES

- Promote awareness of culvert safety
- Educate children about the dangers of playing in or near culverts
- Design and install culvert safety grates
- Promote consistent culvert maintenance and cleaning
- Secure funding to offer alternative play structures/playgrounds in the village

EMPHASIS AREA 4: ROADWAY SAFETY

DESCRIPTION

NTC would like to improve community public safety on local roadways. Toksook Bay is a small community with a multi-modal transportation network that is used by residents, including minors, and visitors. Community-wide roadway safety awareness is important because of these various types of users.

GOAL

Reduce the number of roadway injuries and fatalities in and near Toksook Bay.

STRATEGIES

- Improve lighting around the community
- Install appropriate signage and trail markers
- Maintain sight distance along streets and trails
- Prioritize pedestrian safety
- Implement emergency trail shelters
- Ensure trail markers are present and maintained
- Evaluate bridge conditions and monitor for necessary upgrades



EMPHASIS AREA 5: SPEED MANAGEMENT

DESCRIPTION

NTC has identified that excessive speeds are a major causal factors of motor vehicle crashes. Residents are concerned about speeding in the village, specifically identifying concerns about speeding near schools and in the village center. Excessive speeds make village roads and intersections prone to collisions.

GOAL

Reduce incidence of speeding within the village and on trails linking the Nelson Island communities.

STRATEGIES

- Promote awareness of the dangers & consequences of maintaining excessive speeds on roadways
- Incorporate VPO's in conducting focused patrols on speeding in school zones and other speed zones
- Reduced speed limits throughout the village
- Implement traffic calming measures in high speed areas to help reduce speeding by helping drivers recognize excessive speed and respond appropriately
- Develop and deliver public service announcement/information campaigns to inform residents and guests about speeding concerns and enforcement initiatives

EMPHASIS AREA 6: BLIND SPOTS & BLIND CORNERS

DESCRIPTION

NTC has identified several locations where blind corners exist on the village roadways. Blind corners are problematic, as they increase the likelihood of collisions.

GOAL

Reduce incidence of motor vehicle incidents on roadways within the village that have blind corners, and increase blind spot awareness and education.

STRATEGIES

- Promote awareness of blind corner locations and blind corner navigation
- Incorporate VPO's
- STOP/YIELD/BLIND SPOT Signs for increased awareness in blind corner zones
- Safe speed education for increased awareness of the potential dangers related to improper speed management and encountering blind corners
- Promote safe driving education in order to prevent blind spot collisions

EMPHASIS AREA 7: INSTALL SIGNAGE

DESCRIPTION

NTC has identified that traffic signs are an essential part of keeping drivers and pedestrians safe on the road, as they are designed to provide necessary information and warning of potential dangers. There are few traffic/street/mileage signs in the village, and NTC plans on implementing road signs used according to principles found in the Manual for Uniform Traffic Control Devices (MUTCD). Road signs provide road users with clear instructions on roadway use.

GOAL

Install and maintain village signage to reduce the number of motor vehicle accidents related to the poor/nonexistent signage.

STRATEGIES

- Implement an asset management system to inventory and track signs
- Install retro-reflective regulatory traffic signs
- Install street name signs
- Maintain road sign inventory with installation date, engineering information, status, and repair orders
- Assess signs and repair or replace on an ongoing basis and conduct at least one network-wide assessment per year
- Incorporate work order activation based on reports from the public and public safety
- Establish clear sign installation guidelines or ordinances based on MUTCD guidance to avoid excessive signing or installations that do not address relevant road user needs

EMPHASIS AREA 8: BOAT SAFETY

DESCRIPTION

Boating is a primary means of transportation for residents of Toksook Bay. Every year, however, boating related accidents and fatalities affect the Nelson Island communities. Boat Safety will highlight the need for increased safety in this mode of transportation and will further emphasize the need to initiate the boat harbor project and the boat portage project.

GOAL

Reduce incidence of boating related accidents and fatalities in Toksook Bay.



Boats in Toksook Bay
<https://cnn.it/3Dt3EsU>

STRATEGIES

- Promote the Alaska Boating Safety Program, and other boating safety programs
- Promote drowning awareness and education
- Ensure all community members have access to and uses flotation devices when near water
- Keep young children away from water unless supervised by an adult
- Promote the use of life jackets when in an open boat or on an open deck, regardless of weather, boating experience or swimming ability
- Promote these Boater Safety strategies:
 - Attach the engine cut-off device when underway, especially when boating solo
 - When boating, carry an emergency signaling device to notify rescuers, such as a whistle or GPS.
 - Equip boats with at least one means of re-boarding (e.g. swim step, ladder, foot sling)
 - If boating, file a plan so someone knows where you are and when you are expected back
 - Have your family members attend a water safety class such as those provided by AMSEA or the Alaska Office of Boating Safety

EMPHASIS AREA 9: SEAL HUNTER SAFETY

DESCRIPTION

Seal hunting is an important subsistence practice in Toksook Bay. Though the tradition is deeply rooted and critical to the culture of the Nunakauyarmiut Tribe, it can be very dangerous if hunters are not knowledgeable and well prepared.

GOAL

Reduce seal hunting related accidents and fatalities.

STRATEGIES

- Provide and promote seal hunter safety educational opportunities and programs
- Engage village elders in the education of seal hunters



Simeon and Paul John pull a bearded seal onto an ice pan – Nelson Island.
James Barker, <https://bit.ly/3dfV99Z>

EMPHASIS AREA 10: PERSONAL TRANSPORTATION MODES

DESCRIPTION

Alternatives to privately-owned vehicles provide all citizens with reliable, safe, and environmentally conscious transportation. The lack of alternative transportation modes may be contributing to safety concerns for pedestrians and off-road vehicle users.

GOAL

Transit services will offer a safe and reliable non-personal transportation options for village residents.

STRATEGIES

- Develop a tribal transit plan
- Identify and secure alternative transit funding opportunities

EMPHASIS AREA 11: EMERGENCY/FIRE SERVICES

DESCRIPTION

Emergency response is a critical component in the overall traffic safety effort. Public safety services provide enforcement, education, and response to incidents using public and private roadways, and those roadways should provide prompt, safe access to all residents and buildings when emergencies occur. NTC does not have any full time Emergency Response Personnel or a Fire Department.

GOAL

Reduce preventable accidents and fatalities by increasing the presence of emergency and fire services.

STRATEGIES

- Update the Emergency Operations Plan
- Seek and secure additional funding for safety projects
- Update plans for emergency preparedness, planning and preservation
- Work with Alaska DHS&EM
- Seeking training in emergency response, mitigation, and recovery
- Update the Pre-Disaster Mitigation plan
- Seek continuing education and training in emergency management
- Improve telecommunications for emergencies





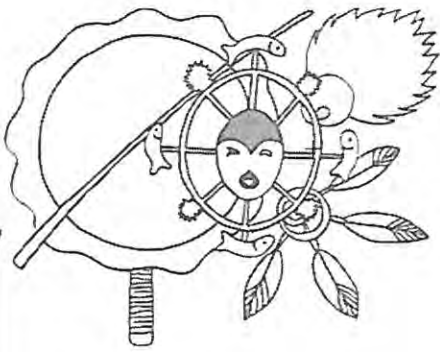
EVALUATION & IMPLEMENTATION

- The Nunakauyak Traditional Council will measure the success of the safety plan annually.
- The Nunakauyak Traditional Council Tribal Transportation Safety Plan will be treated as a living document to be updated every 5 years.
- The Nunakauyak Traditional Council will incorporate the involvement of its primary stakeholders to update the Tribal Transportation Safety Plan.
- The Nunakauyak Traditional Council Transportation Department will be responsible for facilitating the annual review and update of the Tribal Transportation Safety Plan.

CONCLUSION

This safety plan is intended to identify traffic safety concerns from multiple data sources, including citizen feedback and observational studies. The results of this data analysis provided the listing of safety concerns and their ranking in this document. Addressing behavioral safety issues is best addressed by developing a community-wide understanding and acknowledgement of the risks related to the emphasis areas identified in this safety plan. Many of the recommendations in this plan are intentionally general and are intended to help the reader develop an understanding of how a culture of safety can be built and maintained throughout the Tribe and neighboring communities.





Nunakauyak Traditional Council

"The Governing Body for the Nunakauyarmiut Tribe"

Resolution No 2021-12-01

Adopting the

2021 NUNAKAUYARMIUT TRIBE TRIBAL TRANSPORTATION SAFETY PLAN

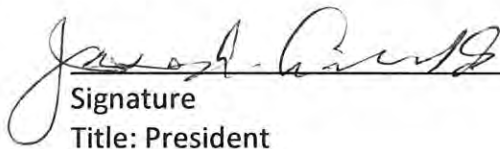
- WHEREAS, the Nunakauyarmiut Tribe of Toksook Bay, Alaska, hereafter "Tribe" is a federally recognized Tribe; and
- WHEREAS, the Nunakauyak Traditional Council is the governing body of the Tribe; and
- WHEREAS, the Tribe recognizes the importance of improving transportation safety for its tribal members and all residents of Toksook Bay; and
- WHEREAS, the Tribe has gained community input on identifying transportation safety concerns and priorities for Toksook Bay
- WHEREAS, the Tribe has identified and prioritized strategies to improve transportation safety throughout the community, and upon approval and adoption of the **2021 Nunakauyarmiut Tribe Tribal Transportation Safety Plan**, the Tribe also approves implementing the priorities identified in this plan.


NOW, THEREFORE, BE RESOLVED, that the Tribe hereby adopts the **2021 Nunakauyarmiut Tribe Tribal Transportation Safety Plan**.

CERTIFICATION

The Nunakauyak Traditional Council had adopted this resolution during a meeting held on December, the 13th day of December 2021 in Toksook Bay, Alaska, with a quorum present.

For 6 Against 0 Abstain 0 Present 6 Absent 1 Vacant


Signature
Title: President


Signature
Title: Secretary



NUNAKAUYARMIUT TRIBE TRIBAL TRANSPORTATION SAFETY PLAN ACKNOWLEDGEMENTS

The compilation of the Nunakauyarmiut Tribe Tribal Transportation Safety Plan would not be possible without the contributions of those who worked on the efforts mentioned within. Below is a list of those who have committed to these projects:

Nunakauyak Traditional Council Leadership

Nunakauyak Traditional Council Roads Department

Nunakauyarmiut Tribe Community Members

Prepared by Lenea Corporation

2021

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NUNAKAUYAK
TRADITIONAL
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