

FINAL DRAFT

January 2021



Photos by the Denali Commission

Newtok Relocation to Mertarvik

2020 – 2022

MASTER PLAN UPDATE

An Update to the 2018 Master Plan

Purpose of Document

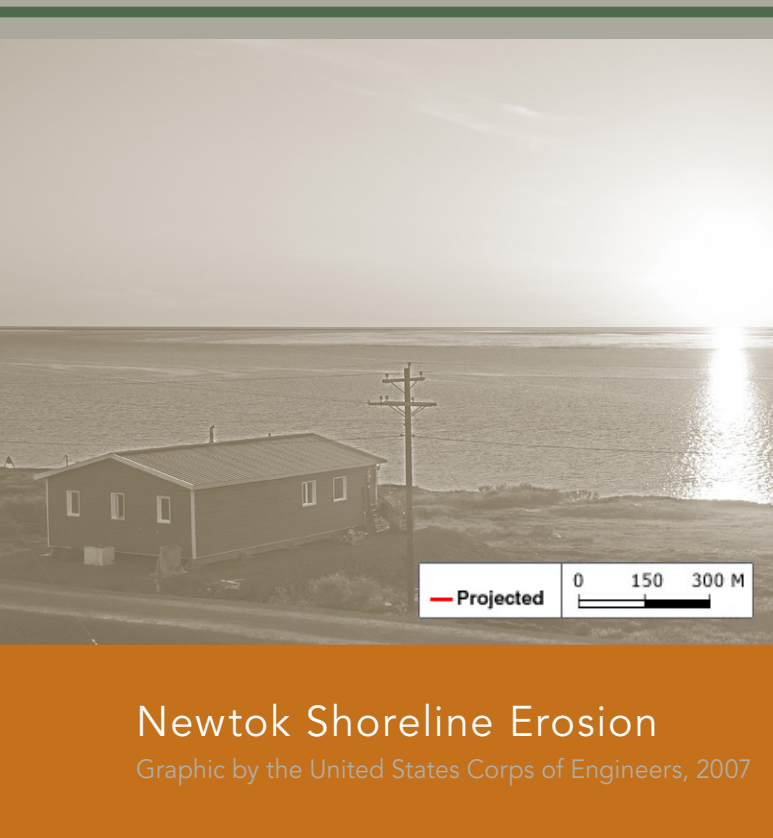
The purpose of this document is to establish the Newtok Village Council's (NVC's) highest project priorities for the relocation effort and the Master Implementation Plan. This document also serves as an update to the overall Mertarvik Master Implementation Plan (MIP), which sets a vision for the Newtok/Mertarvik Relocation Project for the next two years. The MIP considers the existing conditions of the relocation effort, including funding and other resources available to move the project forward, and identifies project needs as well as the resources needed to complete the relocation effort, with a focus on 2021 and 2022 relocation activities. NVC's goal is to update this MIP at the end of each construction season so the goals for the following year's construction efforts will be realistic and achievable. Project summaries detailing NVC's



Newtok, AK - 2017

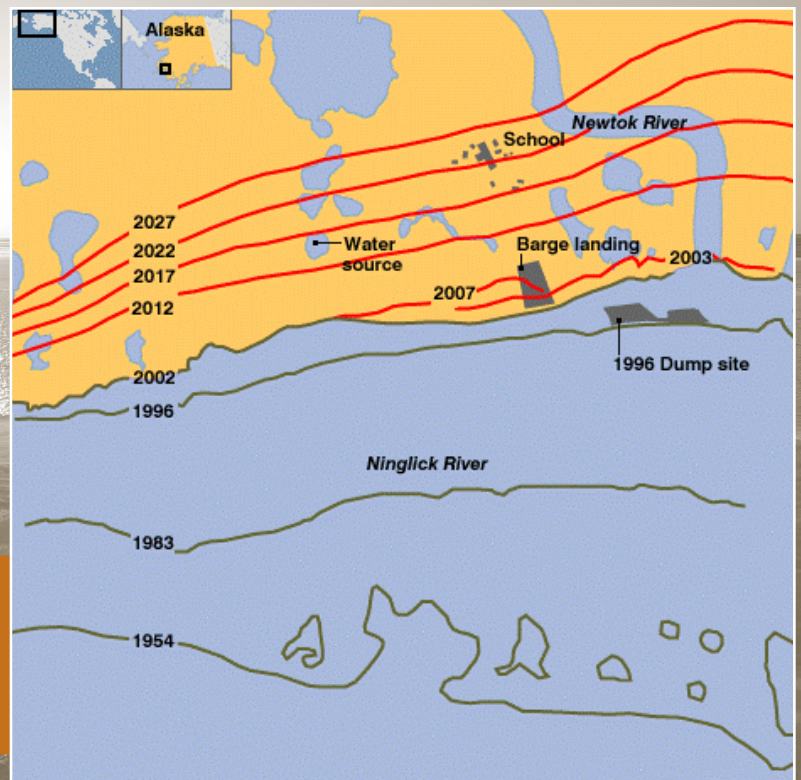
Photo by Romy Cadiente, The Atlantic

most urgent funding needs during their relocation efforts are listed below, and align with current or upcoming funding opportunities. NVC's top priority is to secure funding so projects that will complete the relocation effort can be constructed as soon as possible.



Newtok Shoreline Erosion

Graphic by the United States Corps of Engineers, 2007





Newtok, AK - 2005

Photo by the Denali Commission

Background

The Ningliq River is consuming community land and facilities as it advances toward the community of Newtok's infrastructure. Newtok is below sea level and sinking, and not considered to be a viable place to live. A 2019 vulnerability assessment based on permafrost melt, erosion, and flooding ranked Newtok as the seventh most vulnerable village in Alaska in all of these factors and most vulnerable in terms of permafrost melt (UAF and Army Corps 2019). The first assessment of erosion along the Ningliq River was conducted in the 1980s; it concluded the erosion along the river banks could not be stopped or slowed for a reasonable cost and the only option was for the community to relocate. In 1993, the Newtok community made a cohesive decision to relocate and the tribe initiated a relocation site selection process. A new village site known as the Mertarvik Subdivision, Yup'ik for "getting water from the spring," is located approximately nine miles from Newtok on Nelson Island, the only high ground in the vicinity.



Permafrost degradation is destroying foundations and buildings; roads (boardwalks) at old site are becoming unusable.

Newtok, AK - 2005 Flood

Photo by the Denali Commission



Pioneer Road

Photo by LeMay Engineering & Consulting, Inc.



Barge Landing Staging Area

Photo by LeMay Engineering & Consulting, Inc.

Relocation Accomplishments

To date, NVC has worked with many agencies to establish the new Mertarvik village site and has developed a new subdivision; constructed 21 homes and an emergency center; installed a diesel-fired electrical distribution system; built a townsite roads system, a start-up school, and innovative water and sewer infrastructure.

The following is a list of all existing infrastructure in Mertarvik that may be considered available for use during the relocation efforts.

1. Pioneer Road – NVC and its partners have completed the full design for the community streets project. Due to lack of funding, only some of the pioneer road has been constructed to support the development of house pads, houses, and temporary facilities.

2. Homes – There are a total of 21 homes in Mertarvik which house approximately 130 people; 32 of which are children.



New Homes Constructed
Since 2018

Photo by LeMay Engineering & Consulting, Inc.

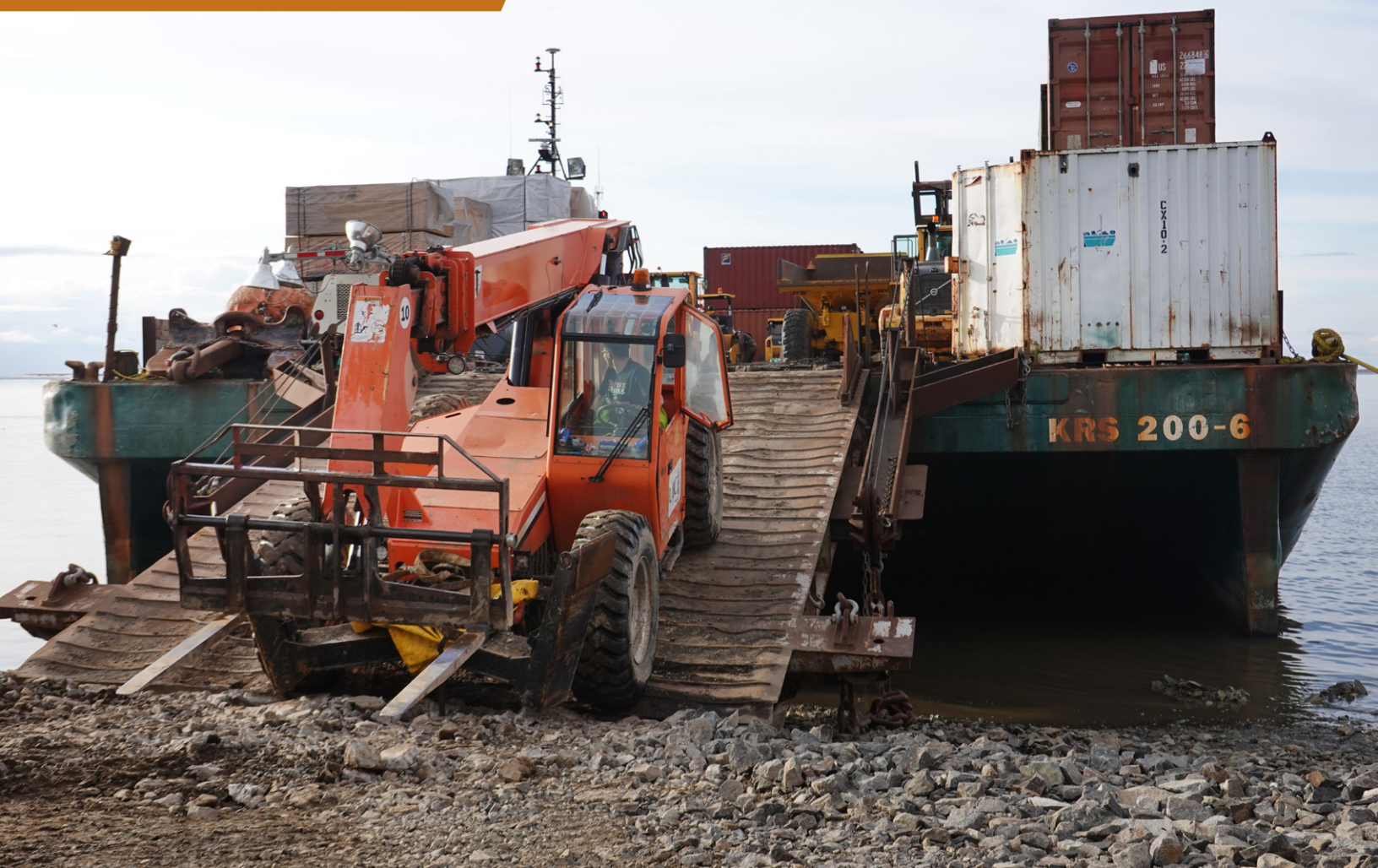


Mertarvik Homes and Community Facilities

Photos by Patrick LeMay

Barge Landing Staging Area

Photo By Romy Cadiente



Fuel Barge

Photos by Patrick LeMay



Rock Quarry



3. Five COVID-19 Isolation Units –

The purpose of these units are to allow residents a safe place to quarantine in case they are sick or need to isolate from family members or other members of the community. These units were not anticipated in the original master plan – they were made possible by the March 2020 CARES Act funding for addressing potential COVID-19 community outbreaks.

4. Temporary Community

Facilities – This facility has seven bunkrooms with two beds each. A laundry facility is attached to this camp with one shower, one toilet, and three washers/dryers. The bed and laundry facilities were rented to previous contractors at \$5,000 per month. The health clinic (operated by the Yukon-Kuskokwim Health Corporation) and store (operated by NVC) are also located here.

5. Tribally Owned and Operated Construction Camp Facility –

This facility has 35 beds and is expandable to 52 beds, a rec room, and an office, as well as a commercial kitchen with a dining room. The building has eight toilets, six showers, four washers, and four dryers. This facility has been operated by the NVC at \$200 per day per worker, including food and lodging.

6. Barge Landing and Staging

Area – This facility provides an area for barge companies, and NVC and its contractors, to load and offload equipment to/from the barge. The staging area is where all materials and equipment for construction are kept during the summer and winter seasons.

Wastewater Treatment Facility- Membrane Bioreactor

Photos by LeMay Engineering & Consulting, Inc.



Uugun Ciuniurumaut Yuk'egcilriit -

Elitnauraput, Angagugait, Elitnauristeput, Paqtesteput-llu

7. Rock Quarry – The rock quarry was developed in 2018 and has potential to be an economic driver for Newtok and the surrounding villages. Gravel is being sold to Toksook Bay and surrounding villages. In the past, any construction projects happening in the region obtained gravel from Nome, Platinum, or Mertarvik.

8. Mertarvik Evacuation Center (MEC) – The MEC is a 6,000-square-foot facility which includes three toilets, one shower, a semi-commercial kitchen, and three classrooms. This facility can reasonably accommodate a number of cots and could likely serve as a kitchen facility. There is sufficient storage space, a multipurpose room for eating/social events/ etc., and an upstairs room. This facility also has telecommunications connectivity. This facility is currently being used by the Lower Kuskokwim School District for the purpose of the temporary school.



Water Facility



Power Plant

This will be inadequate space to support the temporary school once the remaining 47 homes move over. A temporary power plant and water facility is located near the MEC.

9. Pioneer Runway – Access to the site via air is currently limited to planes able to land on a 2000-foot by 35-foot runway. The community has completed a 2000-foot by 35-foot “widened road” which serves as an additional landing strip for small, mostly single engine planes by charter only (there is no scheduled seat fare into Mertarvik); this is the primary access. The road is unfortunately crosswind to the prevailing winds, and is also the access to the rock quarry. Careful safety procedures must be undertaken to operate the road as an aircraft landing location. Due to the crosswind orientation and regular weather challenges of coastal sub-Arctic Alaska, weather restrictions for flight access are common. The most common flights into Mertarvik are five-seat, 1,050-pound-capacity, Cessna 207 aircraft based in Bethel. Additional nine-seat, 2,000-pound-capacity flights are possible with Cessna 208B Grand Caravans out of Bethel or Anchorage. Some twin engine King Air flights with nine-seat capacity can make the flight



Pioneer Runway

Photos by Patrick LeMay

Temporary Bulk Fuel Storage Tanks



into Mertarvik as well from Anchorage, though landing restrictions are increased. Lastly, cargo flights with relative light loading using CASA C212's have landed at the site.

10. Bulk Fuel Storage – Four bulk fuel storage tanks are currently located in Mertarvik, which have been used to provide temporary fuel storage in support of past construction projects. Three single-wall tanks are located in the shallow-draft barge laydown area. The fourth double-wall tank is located by the MEC foundation. This temporary facility will need to be moved.

11. Solid and Liquid Waste Disposal Facility –

There is a shallow trench and fill landfill, and a dedicated seepage disposal site with a septic pumping trailer and lime on hand to treat sewer. The construction camps, MEC, and community laundry facility are served by a membrane bioreactor (MBR) sewage treatment unit that is pumped quarterly and maintained daily. This unit will likely fail with daily inputs exceeding 4,000 gallons per day (GPD).



Solid and Liquid Waste Disposal Facility

12. Equipment – NVC has several pieces of equipment which can be used for construction activities managed by NVC or other contractors working in Mertarvik. A list of NVC's heavy equipment and rental rates appears on the following page.

Challenges

A number of challenges have impeded the relocation effort. New challenges are constantly arising and changing daily. Below is a list of issues that NVC and its partners are working hard to overcome to advance the relocation effort. The current pandemic is the most challenging when it comes to construction and maintenance efforts that need to take place. These efforts require people and materials to be flown into Newtok and Mertarvik, which is increasing the risk of residents contracting COVID-19. NVC is proceeding with construction and maintenance activities with strict rules

on travel and testing. Below is a list of other challenges associated with the relocation effort:

- Seasonal Storms
- Permafrost Melting
- Construction Cost
- Remote Location
- Construction Season
- Lack of Infrastructure
- No Airport
- State of Alaska Economic Status

NVC Equipment List and Rental Rates

Newtok Village Council Equipment In Mertarvik		Rental Rates		
Equipment Type	Model	Daily	Weekly	Monthly
Crawler Mounted Hydraulic Excavator	Bobcat E85	\$ 587	\$ 1,806	\$ 4,552
Standard Crawler Dozer	CAT D8 II	\$ 1,674	\$ 5,026	\$ 14,834
Articulated Rear Dump	Doosan DA30	\$ 1,512	\$ 4,676	\$ 13,854
4-WD Articulated Wheel Loader	Doosan DL 420-5	\$ 1,711	\$ 4,817	\$ 14,060
4-WD Articulated Wheel Loader	Doosan DL 450-5	\$ 1,711	\$ 4,817	\$ 14,060
Crawler Mounted Hydraulic Excavator	Doosan DX490LC-3	\$ 2,230	\$ 6,660	\$ 19,572
Generator	Doosan G450WCU-2C-T2	\$ 655	\$ 1,644	\$ 4,777
Telescoping Boom Truck	Gradall 534D9-45	\$ 280	\$ 1,120	\$ 4,000
Crawler Dozer	Komatsu D39EX-22	\$ 787	\$ 2,255	\$ 6,211
Portable Welder	Miller Bobcat 225 Kohler	\$ 100	\$ 276	\$ 681



Crawler Mounted Hydraulic Excavator - Bobcat E85



Articulated Rear Dump - Doosan DA30



4-WD Articulated Wheel Loader - Doosan DL 420-5



4-WD Articulated Wheel Loader - Doosan DL 450-5



Standard Crawler Dozer - CAT D8 II



Crawler Dozer - Komatsu D39EX-22



Telescoping Boom Truck - Gradall 534D9-45



Generator - Doosan G450WCU-2C-T2



Portable Welder - Miller Bobcat 225 Kohler



Crawler Mounted Hydraulic Excavator - Doosan DX490LC-3

Project Needs

The village of Newtok still has 47 households in need of relocation to Mertarvik and several project needs (provided in the following section); as a result, funding and further project development to support the community is required.

This section lists out NVC's project priorities and includes brief project summaries and costs. All cost estimates and scopes of work were developed using existing planning documents prepared by stakeholders and agencies currently performing planning/design work for the Mertarvik project. Background information on each project is available upon request.

Project Title: Housing

Project Budget: \$18.8 million

Match Required: Varies Per Funding Agency

Project Scope of Work: NVC's number one priority is housing. NVC plans to construct up to 52 single-family homes which will serve

low-or-moderate income (LMI) households of less than 80 percent of area median income (AMI). In total, NVC is proposing to fund the planned Mertarvik Affordable Single-Family Homes Project in the amount of \$18.8 million. The project will consist of constructing 20, three-bedroom, single-family homes and 20, four-bedroom, single-family homes which will be constructed and operated at Mertarvik, Alaska. NVC is working on developing a housing plan in accordance with HUD Affordable Housing Policies focused on creating housing payment options for various home owners.

Project Title: Community Streets Construction

Project Budget: Approximately \$1 million

Project Scope of Work: NVC has a completed design for the Community Streets Construction Project. The total estimated cost to complete the construction of the entire community streets and subdivision is approximately \$4 million. Roads are 12-foot to 20-foot-wide gravel roads comprised of fill material, aggregate subbase, and aggregate



surface course placed on geotextile stabilization fabric. Work will include construction of townsite community roads within the platted right-of-ways and all necessary storm water culverts, ditches, piping, and structures. To date BIA has provided ~ \$2.5 million for the completion of the pioneer road to the rock quarry, pioneer roads to access the homes constructed in 2019 and 2020. These funds can be provided as match to other funding for infrastructure projects such as FEMA Housing. The townsite roads include the following:

- Quiraun Street (Main Road and Lagoon Access Road): 4,294 feet, approximate station 10+00 to Station 52+94.
- Ungusrag Street (Lower Road): 4,320 feet, approximate station 100+00 to 143+20.
- Arnapagaq Street (Upper Road): 4,026 feet, approximate station 150+35 to 193+46.

Project Title: Water and Sewer Distribution

Project Budget: Approximately \$22 million

Match Required: Varies Per Funding Agency

Project Scope of Work: With the COVID-19 pandemic, the Centers for Disease Control (CDC) has set guidelines regarding hand washing to help stop the spread of the virus and to save lives. The CDC is recommending that individuals wash their hands:

- Before, during, and after food prep
- Before eating
- Before and after tending to someone who is sick
- Before and after treating a cut or other wound
- After going to the bathroom
- After changing diapers or helping a child in the bathroom
- After blowing your nose, coughing, or sneezing
- After touching an animal, or handling pet food/treats or pet waste
- After touching garbage

NVC Water and Sewer Phased Approach Cost Table

	Water	Sewer	Total
Phase 1	\$4.2 million	\$6 million	\$10.2 million
Phase 2	\$2.2 million	\$4 million	\$6.2 million
Phase 3	\$3.2 million	\$2 million	\$5.6 million
Total	\$9.6 million	\$12.4 million	\$22 million

This amount of hand washing in communities that lack the infrastructure to have safe drinking water, as well as water to wash hands and clothes, can have a significant impact on any existing system. The water and sewer system in Mertarvik does not have the capacity to ensure the residents are able to wash their hands and not run out of water for drinking or washing their clothes. Currently, the community of Mertarvik only has a modular water treatment plant which provides treated water to the community school, clinic, construction camp, and a washeteria. All three facilities discharge wastewater or sewerage through aboveground gravity sewer mains to an MBR wastewater treatment module. The MBR is pumped quarterly to semi-annually; the pumped solids are transported to the community landfill, covered in lime, and buried in a dedicated disposal area. Each household operates a PASS, which provides a 100-gallon, raw water storage tank; direct filtration system; and a sink for drinking water and hand washing.

Wastewater treatment is accomplished via use of a separating, drying toilet. Liquids are discharged to a seepage pit outside the homes and solids are dried and disposed of alongside household trash in the community class III landfill. The current water and sewer system in Mertarvik is not safe to help fight COVID-19. Although residents are being educated on how to wash their hands and social distancing practices, if COVID-19 arrives in the community and a sufficient water distribution system, which has the capacity to provide safe drinking water and enough water to continuously wash hands, is unavailable, lives can be lost.

A detailed, phased approach to complete this project has been developed and is available upon request. Below is a summary table with costs

associated to each phase. If funding is made available via COVID-19 relief funds, NVC and its partners will prepare a revised plan to complete the project in a timelier manner.

Project Title: Phase 1 & 2 Bulk Fuel Facility

Project Budget: \$6 million

Match Required: Varies Per Funding Agency

Project Scope of Work: Construction and implementation of bulk fuel and power plant facilities in Mertarvik to meet the demand of the phased community development is critical to the success of the village relocation. The existing temporary bulk fuel facility will also need to be relocated to a permanent facility as part of the scope. The power plant and bulk fuel improvements constructed under this phase will include an Alaska Energy Authority (AEA)-style generator module and a small electrical distribution system to supply power to the houses, washeteria, and cafeteria building. The generator module will have automated switchgear and controls, and provide recovered generator heat to the adjacent community buildings via a small district heat loop. The houses will have continuous prime power and be suitable for year-round residency. Bulk fuel storage will consist of expanding and improving the temporary construction tank farm to accommodate usable tanks relocated from Newtok. A 10,000-gallon, double-wall tank will be provided for the power plant intermediate tank.

Project Title: Long-Term Telecommunications Infrastructure

Match Required: Varies Per Funding Agency

Project Scope of Work: NVC will be working in partnership with GCI to secure funding from the United States Department of Agriculture (USDA) Rural Utilities Service (RUS) to purchase the following items for the new townsite in Mertarvik.

1. Broadband transmission facilities
2. Audio, video and interactive video equipment
3. Terminal and data terminal equipment
4. Computer hardware, network components, and software

5. Inside wiring and similar infrastructure that further DLT services

6. Acquisition of instructional programming that is a capital asset

7. Acquisition of technical assistance and instruction for using eligible equipment

Project Title: Public Safety Program

Match Required: TBD

Project Scope of Work: NVC is seeking funding in order to maintain public safety, traditional customs, values, the good order, and wellbeing of Newtok and Mertarvik residents. At this time, Newtok has one police officer on duty for four hours a day and Council, an acting tribal court. Newtok desperately needs programs to bring wellness to the community. With COVID-19 concerns and travel/work reductions within the community, public safety is NVC's top priority in order to keep the community healthy and safe. It is difficult to obtain a prompt response from state troopers – when they are able to come out to the community it may be too late to adequately address a problem. The local police officer can respond, but without a tribal court (and few ordinances/laws) the crimes may be difficult to adequately address. A public safety officer is needed to avoid unlawful activity, particularly alcohol sales. Newtok is a dry community and does not wish to have alcohol in the community.

Project Title: Marine Support Facility

Project Budget: \$6,748,776

Project Scope of Work: This project involves construction of a marine support facility at Mertarvik, which will provide boat/ship repair and maintenance capacity and serve a portion of the west coast of Alaska. Also, construction of a marine port at Mertarvik will stimulate regional coastal economic activities by establishing a safe harbor for the western Alaska coastal ocean fishing industry and facilitate gravel exports to surrounding communities. The project's total development cost is \$6,748,776. The design is complete.

2021-2022 Construction Plan

To make significant progress on relocation efforts in 2021 and 2022, approximately \$18,450,000 is needed. All projects listed below have completed designs and are construction ready. NVC has approximately 20-30 employees who are skilled at performing carpentry, maintenance, machinery operation, general construction labor, housekeeping, and cooking.

In 2021 and 2022, NVC plans to construct the following projects:

Construct Houses – Total cost to complete the construction of 25 homes is approximately \$8 million (@ \$400,000 per home). The homes will be constructed utilizing a mix of Association of Village Council Presidents Housing Authority and LeMay Engineering & Consulting, Inc.'s design with force account labor.

Community Streets Project – Total cost to complete the entire community streets project is approximately \$4 million. Roadways are 12-foot to 20-foot-wide gravel roads comprised of fill material, aggregate subbase, and aggregate surface course placed on geotextile stabilization fabric. This project involves construction of townsite community roads within the platted right-of-ways and all necessary storm water culverts, ditches, piping, and structures. The townsite roads include the following:

- Quiraun Street (Main Road and Lagoon Access Road): 4,294 feet, approximate station 10+00 to Station 52+94.
- Ungusrag Street (Lower Road): 4,320 feet, approximate station 100+00 to 143+20.
- Arnapagaq Street (Upper Road): 4,026 feet, approximate station 150+35 to 193+46.

Phase 2 Sewer – Total cost to complete is approximately \$5.7 million. West Quiraun and West Ungusrag residential sewer service to include the following:

- Lift Station
- Installation of 1,500 linear feet force main from lift station to gravity sewer main on Quiraun Street

- Installation of 1,500 linear feet of sewer collection main along Quiraun Street
- Installation of 1,500 linear feet of sewer collection main on Ungusrag Street
- Installation of 25 sewer service connections along Quiraun Street and Ungusrag Street

Equipment Shop Construction Completion –

Total cost to complete is approximately \$950,000. Materials have been procured and are on site. A foundation is needed for the building and then construction and installation can take place. The Heavy Equipment Shop has a 100% completed design and all materials for the facility have been procured and transported to Mertarvik. Remaining construction tasks include procurement of gravel for a gravel pad; construction of the gravel pad; installation of a helical pier foundation; erection of the pre-engineered, pre-insulated metal building; installation of mechanical and electrical systems; and installation of a bi-fold door system for the two-bay shop. An additional alternative which may be worth completing would be an extension of the gravel pad in order to provide a parking area for heavy equipment and a fence for the enclosure. A structural engineer should be secured for construction administration services to provide critical inspections of the foundation system and erection of the pre-engineered building package.

Phase 1 – Landfill Completion – Total cost to complete is \$150,000. There are two alternatives for finalizing construction of the landfill: a partial and a full completion of Phase I. The partial completion of Phase I includes installing the entry and septage disposal site separation gates, completing the southern fence line up to the existing western fence line, improving the landfill road slopes, adjusting all of the fencing mesh, installing all tensioning appurtenances, installing all signage, and providing the secondary hazmat container.

The following maps and tables demonstrates a comprehensive list of projects planned for relocation.

Relocation Accomplishments to Date

1 House Pads (24)

Project Cost	\$1,350,644
Status	FEMA
Pending Grant Apps	Funded
	95% Complete

2 Two Bedroom Homes (4)

Project Cost	\$560,000
Status	BIA for 2017 & 2020 HIP
Pending Grant Apps	Funded
	75% Complete

3 Two Bedroom Isolation Units (3)

Project Cost	\$450,000
Status	Under Construction
Pending Grant Apps	Funded
	100% Complete

4 Four Bedroom Isolation Units (2)

Project Cost	\$325,000
Status	Under Construction
Pending Grant Apps	Funded
	100% Complete

5 Water Wells, Tank, & Distribution System

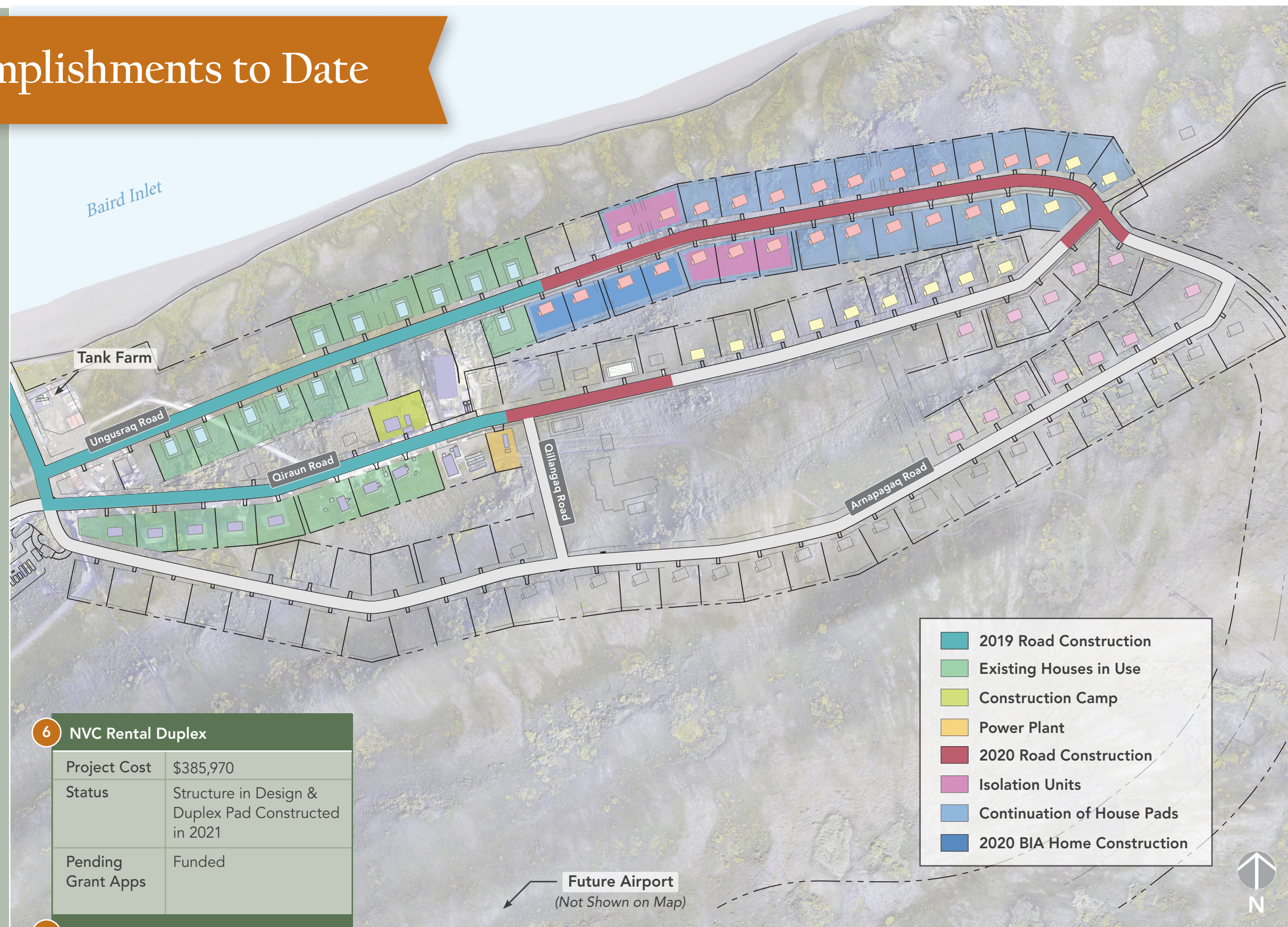
Project Cost	\$4,088,816
Status	FEMA, Design in Progress Wells Under Construction
Pending Grant Apps	Funded

6 NVC Rental Duplex

Project Cost	\$385,970
Status	Structure in Design & Duplex Pad Constructed in 2021
Pending Grant Apps	Funded

7 2020 Roads Project

Project Cost	\$320,000
Status	BIA Tribal Transportation Program
Pending Grant Apps	Funded
	100% Complete



Total Cost
\$7,480,430

2021 Construction - Funded Projects

1 2021 BIA Pioneer Roads

Project Cost	\$460,000
Status	Connects the Lower and Middle Roads, and provides a connection to the Airport Road
Pending Grant Apps	Funded

2 Homes (Up to 18)

Project Cost	\$7,200,000
Status	Short Listed for funding; various sources
Pending Grant Apps	Pending

3 House Pads 2021 FEMA PDM (13)

Project Cost	\$874,661
Status	Short Listed for funding
Pending Grant Apps	FEMA PDM

4 2021 Power Distribution (Remainder of the Community)

Project Cost	\$492,755
Status	Short Listed for funding
Pending Grant Apps	FEMA PDM

5 2021 Washeteria

Project Cost	\$1,513,490
Status	Short Listed for funding
Pending Grant Apps	FEMA PDM

6 E Street Construction

Project Cost	\$300,000
Status	Denali-Transportation Project Grant
Pending Grant Apps	Funding Secured



Total Cost
\$11,291,906

2021-2022 - Construction Ready Projects

FUNDING NEEDED

1 Construction of Homes (25)

Project Cost	\$5,000,000
Status	Funding Needed
Funding Options	HUD/Others

2 Community Streets Project

Project Cost	\$4,000,000
Status	Construction Ready
Funding Options	FHWA/BIA/ Denali Commission

3 Water and Sewer

Project Cost	\$5,700,000
Status	Construction Ready
Funding Options	IHS/EPA/USDA - PDM

4 Equipment Shop Construction

Project Cost	\$1,000,000
Status	Materials Procured - \$1,000,000 needed for Installation
Funding Options	None

5 Landfill

Project Cost	\$150,000
Status	Materials Procured - \$150,000 needed for Finalization
Funding Options	IHS/EPA/USDA



Master Plan Housing Needs:

As of May 2020, 47 households remain in Newtok, needing to be relocated to the Mertarvik Subdivision. Therefore, 47 homes are needed to complete the residential relocation component of the plan.

The ongoing housing needs include the following:

In 2020, four homes were constructed using the BIA HIP funds.

In 2021, pending funding, up to 18 homes will be constructed.

In 2022 to 2023, pending funding, the remaining 25 homes will be constructed.

The five isolation units constructed in 2020 are reserved for COVID and other vulnerable needs populations.

Total Funding Needed
\$15,850,000

Other projects planned for 2021-2022 Construction but are administered through other cooperating agencies include:

- 1. State of Alaska DOT&PF Federal Aviation Administration Airport Project** – Project will be advertised in November 2020 with construction planned for 2021-2022. Funding is secured for this effort.
- 2. LKSD School Construction** – Funding is not secured for this project. The school project was included on the State of Alaska Capital

Improvement Program List but has not been awarded funding yet. Currently the MEC is housing a temporary school which will be inadequate for the planned 47 homes to be relocated.

- 3. Yukon Kuskowkim Health Clinic Construction** – Funding is not secured for this project. Currently the old mancamp is housing a temporary health clinic which will be inadequate for the planned residents moving to Mertarvik in over the next few years.

Additional Information

For additional information on Newtok and Mertarvik, please see the following:

<https://www.commerce.alaska.gov/web/dcra/planninglandmanagement/newtokplanninggroup.aspx>

<https://www.theatlantic.com/business/archive/2015/08/alaska-village-climate-change/402604/>

<https://www.youtube.com/watch?v=NtL8POlzkEg&sns=em>

<https://www.today.com/video/newtok-alaska-is-relocating-due-to-climate-change-what-it-s-like-to-live-there-1083635779757>

<https://news.vice.com/story/climate-change-is-killing-this-alaskan-village>

Contact

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907-237-6056

Acknowledgments

Newtok Village

- Newtok Village Council
- Newtok Native Corporation

Regional/Nonprofit/Post-Secondary Education Organizations

- Association of Village Council Presidents, Regional Housing Authority
- Alaska Native Tribal Health Consortium
- Cold Climate Housing Research Center
- Harvard Law School
- Lower Kuskokwim School District
- Rural Alaska Community Assistance Corporation
- Yukon-Kuskokwim Health Corporation

State of Alaska

- Department of Commerce, Community, and Economic Development
- Division of Community and Regional Affairs - group coordinator
- Department of Environmental Conservation
- Village Safe Water Program
- Department of Military and Veterans Affairs
- Division of Homeland Security and Emergency Management

- Department of Education and Early Development
- Department of Labor and Workforce Development
- Department of Transportation and Public Facilities
- Alaska Energy Authority
- Alaska Governor's Office
- Alaska Housing Finance Corporation

Alaska Legislative Representatives

- Tiffany Zulkosky, Alaska House of Representatives, District 38

Federal

Alaska Congressional Delegation

- Senator Lisa Murkowski's Office
- Senator Dan Sullivan's Office
- Representative Don Young's Office

Denali Commission

U.S. Department of Agriculture

- Natural Resources Conservation Service
- Rural Development

U.S. Department of Commerce:

- Economic Development Administration
- National Oceanic and Atmospheric Administration

U.S. Department of Defense

- Army Corps of Engineers
- Innovative Readiness Training Program

U.S. Department of Energy

- U.S. Department of Homeland Security
- Federal Emergency Management Agency

U.S. Department of Housing and Urban Development

U.S. Department of the Interior

Bureau of Indian Affairs

Fish and Wildlife Service

U.S. Department of Transportation

Federal Aviation Administration

U.S. Environmental Protection Agency