Alaska Land Mobile Radio

FY2021 Request: **$7,661,300**
Reference No: **54931**

AP/AL: Appropriation
Project Type: Equipment / Commodities
Category: General Government
Location: Statewide
House District: Statewide (HD 1-40)
Impact House District: Statewide (HD 1-40)
Contact: Stephanie Richard
Estimated Project Dates: 07/01/2020 - 06/30/2025
Contact Phone: (907)428-7204

Brief Summary and Statement of Need:
The Alaska Land Mobile Radio (ALMR) network enables emergency communications across vast areas of Alaska. This project contributes towards lifecycle replacement of site repeaters and related infrastructure along with required upgrades to 911-dispatch and public safety radio communications system components in order to meet the state's requirements for its share of the ALMR system.

Funding:	FY2021	FY2022	FY2023	FY2024	FY2025	FY2026	Total
1004 Gen Fund	$3,181,800						$3,181,800
1197 AK Cap Inc	$4,479,500						$4,479,500
Total:	$7,661,300	$0	$0	$0	$0	$0	$7,661,300

☐ State Match Required ☐ One-Time Project ☐ Phased - new ☐ Phased - underway ☑ On-Going
0% = Minimum State Match % Required ☐ Amendment ☐ Mental Health Bill

Operating & Maintenance Costs:

	Amount	Staff
Project Development:	0	0
Ongoing Operating:	0	0
One-Time Startup:	0	
Totals:	0	0

Prior Funding History / Additional Information:
Sec1 Ch5 SLA2011 P2 L28 SB46 $3,000,000

Project Description/Justification:
The Alaska Land Mobile Radio (ALMR) network enables emergency communications across vast areas of Alaska. The network is relied on extensively to ensure that major routes between Alaska's major population areas guarantee that emergency services can coordinate responses that help protect people and resources. The State of Alaska (SOA) partners with the Department of Defense (DoD) and the
Municipal of Anchorage to own and operate this network. Each partner owns a portion of the network and is responsible for maintaining their respective assets.

Public safety mission critical communications systems typically run in five to fifteen-year life cycles for the hardware, software and equipment components. Like any other computer, the hardware and software components that make up the system require continuous refresh and replacement to maintain functionality and security protections.

The SOA owns and operates 75 site radio locations across 156,600 square miles of Alaska. Each site consists of a set of fixed mounted radios that are part of a contiguous network attached either by a microwave chain or a leased data circuit. The network's primary mission is to carry mission and safety critical voice communications for first responder public safety agencies. There are currently 16,703 subscribers on the ALMR network with 83 percent performing a public safety function and 76 percent of these subscribers are first responder users. It is the basic tenant of this network to operate as a safety and mission critical system. A safety critical system is a system that, if it fails, may result in serious environmental damage, injury, or loss of life. If a failure exists in a mission critical system, that may result in a failure in a high-priority, goal-directed activity.

Alaska Land Mobile Radio and State of Alaska Telecommunications System

FY2021 Request: **$5,000,000**
Reference No: **AMD 54931**

AP/AL: Appropriation
Project Type: Life / Health / Safety
Category: Public Protection
Location: Statewide
House District: Statewide (HD 1-40)
Impact House District: Statewide (HD 1-40)
Contact: Stephanie Richard
Estimated Project Dates: 07/01/2020 - 06/30/2025
Contact Phone: (907)428-7204

Brief Summary and Statement of Need:
This project replaces the one transmitted as part of the December Governor's budget by reducing the funding level by $2,661,300. This project provides for the maintenance of Alaska Land Mobile Radio (ALMR) communications coverage to address needs in rural areas. This project directly supports 9-1-1 dispatch/emergency communications. Project funds will also be used for The State of Alaska Telecommunications System (SATS), a network of public safety communications infrastructure sites.

Funding:	FY2021	FY2022	FY2023	FY2024	FY2025	FY2026	Total
1004 Gen Fund	$520,500						$520,500
1197 AK Cap Inc	$4,479,500						$4,479,500
Total:	$5,000,000	$0	$0	$0	$0	$0	$5,000,000

☐ State Match Required ☑ One-Time Project ☐ Phased - new ☐ Phased - underway ☐ Ongoing
0% = Minimum State Match % Required ☑ Amendment ☐ Mental Health Bill

Operating & Maintenance Costs:

	Amount	Staff
Project Development:	0	0
Ongoing Operating:	0	0
One-Time Startup:	0	
Totals:	0	0

Prior Funding History / Additional Information:
Sec1 Ch5 SLA2011 P2 L28 SB46 $3,000,000
Sec10 Ch11 SLA2008 P57 L10 SB256 $10,000,000

The system provides mission critical, Land Mobile Radio (LMR), and 9-1-1 dispatch services supporting most of the State's population. Daily reliability of the system has reached a point, after years of deferring routine preventative maintenance and required life-cycle refresh, of periods of inoperability in select areas.

Project Description/Justification:
The Alaska Land Mobile Radio (ALMR) project will fund implementations of new technologies to supplement services currently provided, which will be evaluated and implemented based on customer requirements and maturity of the technologies. Technologies to enable interoperability between FirstNet and other broadband providers to ALMR 9-1-1 dispatch and ALMR coverage are rapidly evolving. Expanded ALMR coverage to locations currently not served, such as the Tok cutoff and improving coverage and capacity in locations such as the Mat-Su Valley have long been unmet public safety requirements. There are evolving solutions to provide 9-1-1 dispatch connected public safety

communications to Western Alaska and other locations outside the current ALMR coverage that will begin to be addressed with this phased project.

The SATS network had degenerated into a “break and fix” state of unreliable operation. With the last of the FY15 deferred maintenance funding being exhausted, this project will provide funding to continue to respond to break/fix and outage situations. There are also several sites requiring basic work such as security fencing, significant cleanup, and in some cases the site will need to be decommissioned. This project will also help fund further inspection work to determine more accurate costs to bring the system up to industry standards. There are currently over 1,000 open work orders against the SATS infrastructure. Most locations have not had rigorous engineering inspections, preventative maintenance inspections, and the required analysis to document all issues and concerns. Initial indications are the remediation will require contract support to resolve.

Priorities and cost estimates may need to be changed to accommodate emergency maintenance projects not listed, actual project costs, and other considerations such as new and evolving requirements.

Additional Information:
The Alaska Land Mobile Radio (ALMR) network enables emergency communications across vast areas of Alaska. The network is relied on extensively to ensure that major routes between Alaska’s major population areas guarantee that emergency services can coordinate responses that help protect people and resources. The State of Alaska (SOA) partners with the Department of Defense (DoD) and the Municipal of Anchorage to own and operate this network. Each partner owns a portion of the network and is responsible for maintaining their respective assets.

Public safety mission critical communications systems typically run in five to fifteen-year life cycles for the hardware, software and equipment components. Like any other computer, the hardware and software components that make up the system require continuous refresh and replacement to maintain functionality and security protections.

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