

CBJ Radio Project Overview



POLICE CHIEF ED MERCER



Radios are Necessary for First Responders

- ▶ Police officers, firefighters, medics, other public safety workers, and other agencies use radios to communicate everything from routine situations to disasters.
- ▶ The dynamic nature of being a first responder often requires immediate communications that are not possible through other forms, like cell phones.
- ▶ Radio logs are recorded and time stamped and can provide valuable evidence or information.
- ▶ By improving radio communications and the enhancing technologies, our responders can perform their jobs better and more safely.

Current Radio System

- The current conventional analog system was installed between 2006-2008.
- The system was deemed “end of life” in 2014 with no manufacturer guarantee of support.
 - Many components and replacement parts are no longer available.
- Coverage is provided by 9 radio sites.



2020 Radio Study

- ▶ The study focused on:
 - ▶ Evaluating the current system
 - ▶ Providing conceptual design information
 - ▶ Addressing improved coverage
 - ▶ Recommending improved interoperability
 - ▶ Moving CBJ into the next generation, supportable configuration for 15+ years
 - ▶ Providing cost savings to CBJ by leveraging existing systems and expanding user groups



Current System Deficiencies

- ▶ Lack of coverage
 - ▶ Only 57% radio coverage inside typical wood frame residences
 - ▶ Only 49% radio coverage in commercial buildings
 - ▶ JPD officers & CCFR firefighters depend on radio for emergency backup & mayday situations
- ▶ Lack of dependability (high sites with no access, no replacement parts)
- ▶ Lack of options (no encryption, limited interoperability, no GPS in portables)

What happens if we do nothing?

- ▶ The current system and components will break at some point.
- ▶ Our only back up is ALMR, which has limitations:
 - ▶ JPD and CCFR portable and vehicle radios are not compatible with ALMR planned upgrades.
 - ▶ The current ALMR system is not recorded or time stamped
 - ▶ The current ALMR system uses only four radio sites and has limited coverage.
 - ▶ The current circuit does not have enough bandwidth for CCFR & JPD
- ▶ Emergency communications and capacity will be severely limited until a new system is engineered and installed.

Radio Study Options

- ▶ The study provided three options:
 - ▶ 1 – CBJ Stand alone analog system for \$15,385,000
 - ▶ 2 – CBJ Stand alone digital system for \$ 17,436,000
 - ▶ 3 – Coordination with the State's ALMR digital system for \$13,590,000

Recommendations

- ▶ Joining and expanding the State's Alaska Land Mobile Radio system (ALMR)
 - ▶ Capitalizes on existing towers/sites (4)
 - ▶ Select CBJ sites will be upgraded and added to the existing ALMR system
 - ▶ Will provide greater radio coverage and building penetration
 - ▶ Potential long term cost savings/sharing
 - ▶ Increased interoperability
 - ▶ Expanding to other CBJ agencies (subscriber radios required)

Funding Status

- ▶ General Fund Appropriation: \$500,000
 - ▶ Project Planning, Design, Initial Construction
- ▶ Temporary 1% Sales Tax Proposition: \$2,000,000
 - ▶ Additional Construction Phase
- ▶ Funding Gap: ~\$11,000,000
 - ▶ Grants may be available
 - ▶ We will have more detail to present as the project proceeds through initial phases



Questions?

THANK YOU