



# Winnebago County All Departments Subscriber Unit Radio Replacement

2023 CIP - ARPA



# Public Safety Communications System

- ▶ In simplest terms, this is the radio system used by all public safety entities in Winnebago County – all police and fire agencies, and then some
- ▶ Ensures mission critical communications & interoperability occurs
  - ▶ WC Sheriff (all Divisions), WC Highway, WC Facilities, WC Public Health, WC Emergency Management, DA's Office all use the system.
- ▶ Approx. 400 subscribers belong to County Departments today
  - ▶ Approx. 1,550 total subscribers belong to public safety radios in Winnebago County
  - ▶ Many local police and fire have begun to replace theirs already
- ▶ Average 1.7 million radio transmissions annually



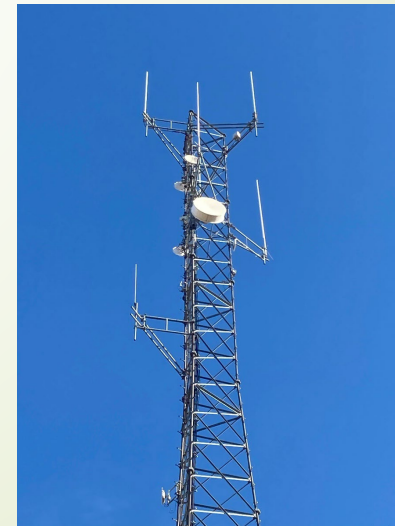
# Communications System History

- Major county-wide project began in 2010
  - Stakeholders involved, feasibility study, RFP's
  - A Motorola radio system was selected
- Federally mandated narrow banding of all radio systems was required by 2013.
- From 2011-2012, Winnebago County:
  - Invested \$5 million for radio infrastructure (800 MHz and P25 compliant Motorola Astro 25)
  - Invested an additional \$5.5 million on 1,500 subscriber unit radios for ALL public safety entities in the county. Those subscriber units are nearing end of life now.



# Communications System History

- Components have a shelf life
  - The first focus was on the infrastructure upgrades
- 2021 CIP Project replaced 4 microwave links \$330,000
  - Other legacy components have been gradually replaced



# Communications System History

- ▶ Narrow banding mandate – entered into a joint cost savings measure with Outagamie County -- the radio and recording system infrastructure is jointly owned and shared with Outagamie County – signed agreement through **December 31, 2031**
- ▶ 2023 is Year 4 of a 10-year maintenance agreement for the Motorola Astro 25 (with 11-year-old equipment)
  - ▶ \$5.1 million in maintenance over 10 years
  - ▶ Able to replace/repair/upgrade/update as needed
  - ▶ Major software upgrade occurred over one month in September/October 2022 as part of this maintenance agreement

# Today – End of Life (7-10 years =2022)

- Subscriber Units are at end of life – Winnebago County Departments must replace:
  - 80 Mobiles (radios permanently mounted in vehicles)
  - 325 Portables (hand-held radios)
  - 12 Consolettes (back up systems and DVRS boosters)



**NOW –  
MUST  
PURCHASE**

COUNTY DEPT	TYPE	QUANTITY		UNIT COST	TOTAL COST
DIST ATTORNEY	APX4000	3		\$3,696.00	\$11,088.00
EMER MGMT	APX8000	6		\$7,572.00	\$45,432.00
EMER MGMT	APX6500	1		\$5,061.00	\$5,061.00
EMER MGMT	APX8500	2		\$10,000.00	\$10,000.00
FACILITIES	APX4000	40		\$3,696.00	\$147,840.00
HIGHWAY	APX4000	28	Portables	\$3,696.00	\$103,488.00
HIGHWAY	APX4500	69	Mobile/Vehicles	\$3,647.00	\$251,643.00
PUBLIC HEALTH	APX4000	10		\$3,696.00	\$36,960.00
MED EXAMINER	APX4000	4		\$3,696.00	\$14,784.00
SHERIFF	APX4000	32	Clerk/Res/HS	\$3,696.00	\$118,272.00
SHERIFF	APX6000	75	Corrections	\$5,414.00	\$406,050.00
SHERIFF	APX6500	39	Squads	\$5,061.00	\$197,379.00
SHERIFF	APX8000	98	Admin/Pat/Det	\$8,219.00	\$805,462.00
SHERIFF	APX8500	2	Bearcat/DVRS	\$13,375.00	\$26,750.00
SHERIFF	APX6500	1	DVRS	\$13,375.00	\$13,375.00
SHERIFF	APX800 Con	12	BUCS / Jail Cns	\$11,533.00	\$138,396.00

**\*\*\*All Items NASPO Contract Pricing (as of April 2022)**

**\$2,339,980.00**



# Additional Costs

- ▶ Programming – approx. \$85.00/unit (Vendor direct quote)
  - ▶ Total \$35,870
- ▶ Installing Mobiles – approx. \$500.00/vehicle (Vendor direct quote – flat rate vs hourly – saves us money)
  - ▶ Total \$56,000
- ▶ Accessories – Earpieces - \$50 each
  - ▶ \$14,880
- ▶ Bank chargers – 8 @ \$1,050 each = \$8,400
- ▶ Reporting software \$22,000
- ▶ Other current accessories will still fit (leather or nylon holders; extra batteries)
  - ▶ This plan does NOT involve replacing radio holders. The 10-year-old ones can easily be replaced piecemeal by the departments.



# Plan

- ▶ Purchase the (approx.) 422 radios for ALL county Departments
- ▶ Current CIP books 2021-2025 and 2022-2026 both list \$700,000 for each year 2023-2024-2025 to spread out bonding
  - ▶ \$2.1 million --- Based upon 2020/2021 pricing
  - ▶ Now \$2.47+ million – based on 2022 pricing – plus 10% contingency
- ▶ “Trade in” old ones – erase/wipe them and pay us for the parts ~~ approx. \$65,000



Grand Total

\*\*\*If purchased as one in 2023

\$2,477,050.00

+ 10% = **\$2,725,000.00**

\*\* Materials total has increased \$350,000+ since Fall 2021 CIP planning



# Alternatives Considered

- Motorola selected as the vendor in 2011
- Significant infrastructure investments into Astro P25 System; the features are crucial, and known to us
  - Construction and Durability
  - Battery Life
  - Range, Frequency, and Audio Quality
  - Mobile Installation and Wiring
  - Vendor relationship
  - Maintenance Contracts - congruence

# Alternatives Considered

- Replace radios with Motorola's new APX NEXT Smart Radio
  - Base price is higher (approx. \$1,000 each)
  - Must include monthly service fee (\$75 a month), per device, for the *life of the device* (10 years) ~ **\$9,000**
- Use non-Motorola products
  - Separate vendors, different radio programming procedures, and additional ongoing maintenance agreements
  - Would need to replace ALL accessories
  - Limited and unsuccessful track records
  - Loss of proprietary features

# CIP Plan --- or ARPA???

- ▶ Alternative plan – split amongst 2 years (2023 – 2024)
  - ▶ 2023 – Sheriff's Office only (262 radios ~ \$1.8 million)
  - ▶ 2024 – All other County Departments (159 radios = \$690,000 + **13%? Increase again ??? ~ \$780,000**)
- ▶ Would need 2 separate maintenance agreements to account for 2 sets of radios (separate pricing?)
- ▶ Would need a second schedule of mobile installs by the vendor (price increase?)



Questions??

Capt. Lara Vendola-Messer  
lvendola@winnebagoountywi.gov  
920-236-7337

