

CCAO Summer Symposium NG911 & MARCS Updates/Panel

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**Department of
Administrative
Services**

Ohio NG9-1-1

On July 3, 2023, Governor Mike DeWine signed Ohio's Fiscal Year 2024-2025 budget into law. This budget includes funding for Ohio's upgrade to Next Generation 9-1-1 (NG9-1-1) services, providing more efficient and reliable emergency services to Ohioans. With this funding, the Ohio 9-1-1 Program Office within the Department of Administrative Services is overseeing a contract with NextGen Communications, Inc. (part of Comtech Telecommunication Corp.) to implement and then maintain the NG9-1-1 Core Services for the state. Ohio's NG9-1-1 system will utilize the state's Emergency Services Internet Protocol Network (ESInet) to deliver services to any Public Safety Answering Point (PSAP) that elects to join

§128.26: When Next Generation 9-1-1 Service Required (new)

Not later than five years after the date that the statewide next generation 9-1-1 core services system is operationally available to all counties in the state, each county or, as applicable, each regional council of governments, shall provide next generation 9-1-1 service for all areas to be covered as set forth in the county's final plan or the council's agreement.

Ohio NG9-1-1 Timelines

Event	Date
Initial RFP Released	February 17, 2017
First Award Cancelled	December 19, 2018
Updated RFP Released	June 28, 2019
Contract Signed with Contingency	March 3, 2020
Funding Contingency Removed	July 3, 2023
NG9-1-1 Services Accepted & Ready	January 31, 2025
ORC Five-year Compliance Deadline	February 1, 2030 (Estimated)
Contract Expiration	June 30, 2031

Roadshow Schedule

Date	Focus	Location
October 17, 2023	Northeast Ohio	Medina County, Seville, Ohio
October 18, 2023	Southeast Ohio	Athens Communication Center, Athens, Ohio
October 19, 2023	Southwest Ohio	Warren County, Lebanon, Ohio
October 20, 2023	Northwest Ohio	Ohio Means Jobs, Allen County, Lima, Ohio
October 23, 2023	Statewide	4200 Surface Road, Columbus, Ohio

Recording available on our website at 911.Ohio.gov

Ohio NG9-1-1 Timelines

Vote early and vote often (Election Forms) – 67 of the 88 counties have turned in their election forms

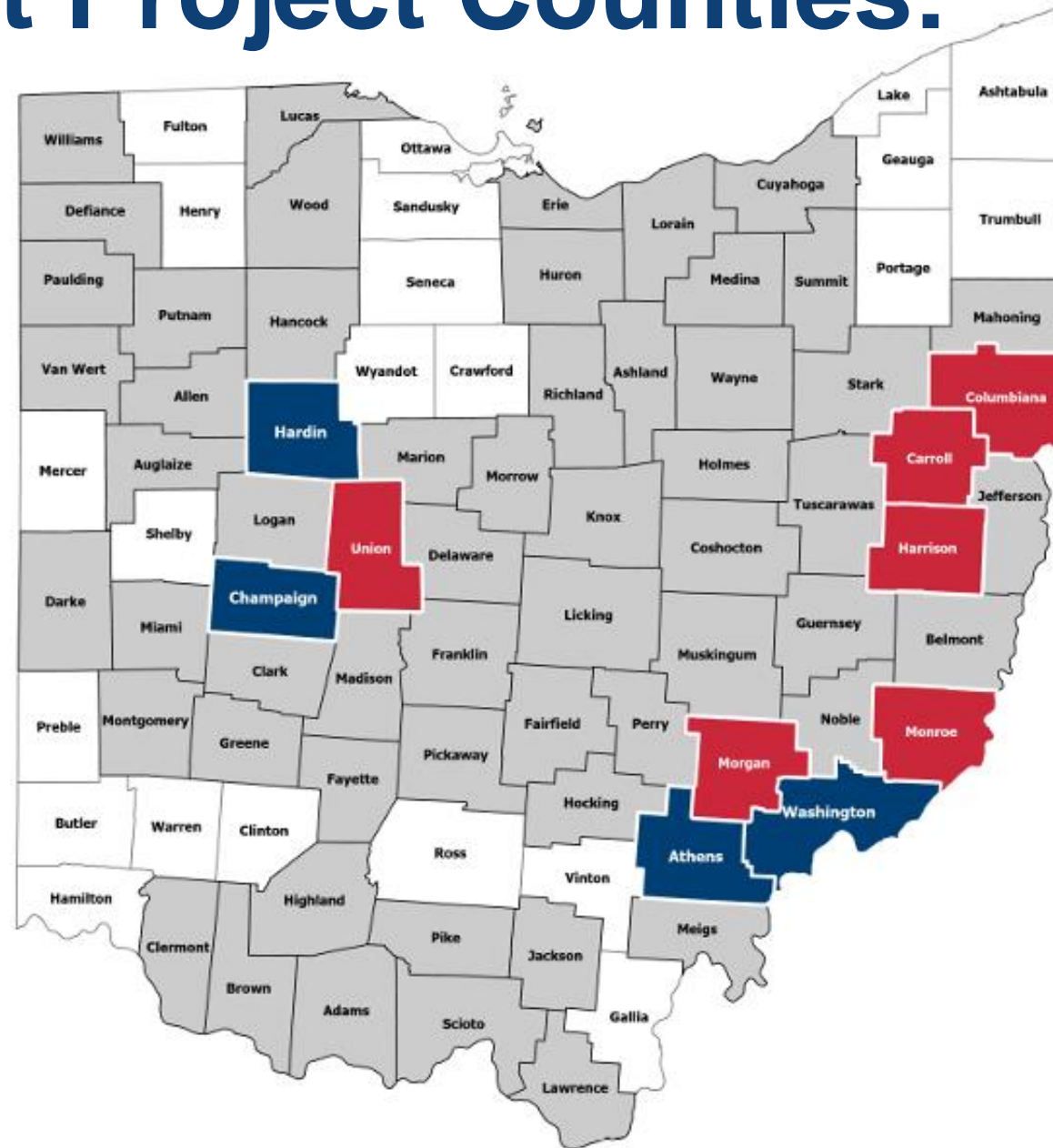
We are in Phase 3 of 5 phases – currently the “Build and Construction and Test Phase” (testing to begin next week)

Next phase will be the running of the pilot – 10 counties, Groups 1A and 1B

Certified after running 120 days w/o “critical fail” by 1/31/25

Makes it “operationally available by 2/1/25 (starting the clock for a 1/31/30 migration of all other counties to NG911)

9-1-1 Pilot Project Counties:



§128.41: Next generation 9-1-1 access fee - 40 cents on subscribers as of January 2, 2024

(A) As used in this section, "communications service" means any **wireless service, multiline telephone system, and voice over internet protocol system** to which both of the following apply:

.....(2) The service or system is capable of initiating a direct connection to 9-1-1.

(B) After the expiration of the charge described in division (A)(1) of section 128.40 of the Revised Code and except as provided in sections 128.413 and 128.42 of the Revised Code, there is imposed a next generation 9-1-1 access fee of **forty cents per month** on each communications service, which shall be imposed as follows:

(1) In the case of wireless telephone service, a subscriber shall pay a separate next generation 9-1-1 access fee for each wireless telephone number assigned to the subscriber.

(2)The maximum number of separate fees imposed on a subscriber's system shall not exceed one hundred voice channels per network.

(3)The maximum number of separate fees imposed on a single subscriber with a multiline telephone system shall not exceed one hundred per building with a unique street address or physically identifiable location.



§128.54: Funds established for receipt, distribution, and accounting for amounts received from charges and fees

The following funds are created in the state treasury:

- (a) The 9-1-1 government assistance fund (72%)
- (b) The 9-1-1 administrative fund (1%); (TAX COMMISSIONER) – for costs incurred in carrying out this chapter
- (c) The 9-1-1 program fund (2%); (STEERING COMMITTEE) – for costs incurred in carrying out this chapter
- (d) The next generation 9-1-1 fund (25%).

At the direction of the steering committee, the tax commissioner shall transfer the funds remaining in the 9-1-1 government assistance fund to the credit of the next generation 9-1-1 fund.

The department of administrative services may move funds between the next generation 9-1-1 fund and the 9-1-1 government assistance fund to ensure funding remains sustainable for both funds.

§128.55: Disbursement of Government Assistance Fund Monies

*Disbursements shall occur not later than the tenth day of the month succeeding the month in which the wireless 9-1-1 charges imposed are remitted.

*The next generation 9-1-1 fund (25%) shall be administered by the department of administrative services and used exclusively to pay costs of installing, maintaining, and operating the call routing and core services statewide next generation 9-1-1 system.

*Nothing in this chapter affects the authority of a subdivision operating or served by a public safety answering point of a 9-1-1 system or a regional council of governments operating a public safety answering point of a 9-1-1 system to use, as provided in the final plan for the system, any other authorized revenue of the subdivision or the regional council of governments for the purposes of providing basic or enhanced 9-1-1



§128.35: Imposing charges on improved realty to pay for public safety answering points (new)

(A)(1) For the purpose of paying the costs of establishing, equipping, and furnishing one or more public safety answering points as part of a countywide 9-1-1 system effective under division (B) of section 128.08 of the Revised Code and paying the expense of administering and enforcing this section, the board of county commissioners of a county, in accordance with this section, may fix and impose, on each lot or parcel of real property in the county that is owned by a person, municipal corporation, township, or other political subdivision and is improved, or is in the process of being improved, reasonable charges to be paid by each such owner. The charges shall be sufficient to pay only the estimated allowed costs and shall be equal in amount for all such lots or parcels.

(F) All money collected by or on behalf of a county under this section shall be paid to the county treasurer of the county and kept in a separate and distinct fund to the credit of the county. The fund shall be used to pay the costs allowed in division (A) of this section and specified in the resolution adopted under that division. In no case shall any surplus so collected be expended for other than the use and benefit of the county.

§128.37: Election on adding monthly charge to telephone bills to fund 9-1-1 system (new)

(A) This section applies only to a county that meets both of the following conditions:

(1) A final plan for a countywide 9-1-1 system either has not been approved in the county under section 128.08 of the Revised Code or has been approved but has not been put into operation because of a lack of funding;

(2) The board of county commissioners, at least once, has submitted to the electors of the county the question of raising funds for a 9-1-1 system under section 128.35, 5705.19, or 5739.026 of the Revised Code, and a majority of the electors has disapproved the question each time it was submitted.

(B) A board of county commissioners may adopt a resolution imposing a monthly charge on telephone access lines to pay for the equipment costs of establishing and maintaining no more than three public safety answering points of a countywide 9-1-1 system, which public safety answering points shall be only twenty-four-hour dispatching points already existing in the county. The resolution shall state the amount of the charge, which **shall not exceed fifty cents per month**, and the month the charge will first be imposed, which shall be no earlier than four months after the special election held pursuant to this section. Each residential and business telephone company customer within the area served by the 9-1-1 system shall pay the monthly charge for each of its residential or business customer access lines or their equivalent.

Before adopting a resolution under this division, the board of county commissioners shall hold at least two public hearings on the proposed charge. Before the first hearing, the board shall publish notice of the hearings once a week for two consecutive weeks in a newspaper of general circulation in the county or as provided in section 7.16 of the Revised Code. The notice shall state the amount of the proposed charge, an explanation of the necessity for the charge, and the date, time, and location of each of the hearings.

(C) A resolution adopted under division (B) of this section shall direct the board of elections to submit the question of imposing the charge to the electors of the county at a special election on the day of the next primary or general election in the county. The board of county commissioners shall certify a copy of the resolution to the board of elections not less than ninety days before the day of the special election. No resolution adopted under division (B) of this section shall take effect unless approved by a majority of the electors voting upon the resolution at an election held pursuant to this section.

In any year, the board of county commissioners may impose a lesser charge than the amount originally approved by the electors. The board may change the amount of the charge no more than once a year. The board may not impose a charge greater than the amount approved by the electors without first holding an election on the question of the greater charge.

(D).... In complying with this division, any county may seek the assistance of the steering committee with regard to operating and maintaining a 9-1-1 system.



§128.38: Election on monthly on telephone access lines to fund certain systems (new)

Very similar to former section except:

(B) A board of county commissioners may adopt a resolution imposing a monthly charge on telephone access lines to pay for the operating and equipment costs of establishing and maintaining no more than one public safety answering point of a countywide 9-1-1 system. The resolution shall state the amount of the charge, which shall not exceed fifty cents per month, and the month the charge will first be imposed, which shall be no earlier than four months after the special election held pursuant to this section. Each residential and business telephone company customer within the area of the county served by the 9-1-1 system shall pay the monthly charge for each of its residential or business customer access lines or their equivalent.



§128.57: County systems receiving disbursements to provide wireless 9-1-1 service

(A) shall be used solely for the purpose of paying either or both of the following:

- > Designing, upgrading, purchasing, leasing, programming, installing, testing, or maintaining the necessary data, hardware, software, and trunking required for the public safety answering point or points of the 9-1-1 system to provide wireless, enhanced, or next generation 9-1-1 service;
- > Processing 9-1-1 emergency calls from the point of origin to include any expense for interoperable bidirectional computer aided dispatch data transfers with other public safety answering points or emergency services organizations and transferring and receiving law enforcement, fire, and emergency medical service data via wireless or internet connections from public safety answering points or emergency services organizations to all applicable emergency responders, exclusive of mobile radio service costs.
- > Any costs of training the staff of the public safety answering point or points to provide wireless enhanced 9-1-1.

(B) A subdivision or a regional council of governments that certifies to the steering committee that it has paid the costs described in divisions (A)(1) and (2) of this section and is providing countywide wireless enhanced 9-1-1 may use disbursements received under section 128.55 of the Revised Code to pay any of its personnel costs of one or more public safety answering points providing countywide wireless enhanced 9-1-1.

(D) The costs described in divisions (A), (B), (C), and (E) of this section may include any such costs payable pursuant to an agreement under division (I) of section 128.03 of the Revised Code.

(E)(1) No disbursement to a countywide 9-1-1 system for costs of a public safety answering point shall be made from the 9-1-1 government assistance fund or the next generation 9-1-1 fund unless the public safety answering point meets the standards set by rule of the steering committee under section 128.021 of the Revised Code.

(2) The steering committee shall monitor compliance with the standards and shall notify the tax commissioner to suspend disbursements to a countywide 9-1-1 system that fails to meet the standards. Upon receipt of this notification, the commissioner shall suspend disbursements until the commissioner is notified of compliance with the standards.

(F) The auditor of state may audit and review each county's expenditures of funds received from the 9-1-1 government assistance fund to verify that the funds were used in accordance with the requirements of this chapter. All funds generated from the next generation 9-1-1 access fee imposed under sections 128.41 and 128.42 of the Revised Code may be used only for 9-1-1 related expenses.



§128.02: 9-1-1 Steering Committee

(D)(2) Any entity operating a public safety answering point shall provide to the steering committee:

(a) The geographic location and population of the area for which the entity is responsible;

(b) Statistics detailing the number of 9-1-1 calls received;

(c) A report of expenditures made from disbursements for 9-1-1;

(d) An inventory of and the technical specifications for the current 9-1-1 network and equipment;

(e) Any other information requested by the steering committee that is deemed necessary to support the transition to next generation 9-1-1.*

(both (D)(1) and (D)(2) – they must do so w/i 45 days of the request)

§128.021: Adoption of rules establishing technical and operational standards for PSAPS.

(C) Upon the effective date of the amendments to this section by this act , all public safety answering points that answer 9-1-1 calls for service from wireless services shall be subject to the public safety answering point operations rules. Public safety answering points not originally required to be compliant shall comply with the standards not later than two years after the effective date of the amendments to this section by this act .

§128.022: Guidelines for Disbursements

(A) The steering committee shall establish guidelines for the tax commissioner to use when disbursing money from the 9-1-1 government assistance fund to countywide 9-1-1 systems in the state, as well as guidelines for the use of funds from the next generation 9-1-1 fund.

(B) The committee shall report any adjustments to the guidelines described in division (A) of this section to the department of taxation. The adjustments shall take effect six months from the date the department is notified of the adjustments.

→ Subcommittee formed in January and looking at this – likely going to increase the minimum and factor in ACTUAL calls handled

§128.06: County 9-1-1 program review committee; final plan for countywide system

(A) Except as provided in divisions (B) and (C) of this section, every county shall maintain a county 9-1-1 program review committee, which shall serve without compensation and shall consist of six voting members as follows:

- (1) A member of the board of county commissioners, or a designee, who shall serve as chairperson of the committee;
- (2) The chief executive officer of the most populous municipal corporation in the county;
- (3) A member of the board of township trustees of the most populous township in the county as selected by majority vote of the board of trustees;
- (4) A member of a board of township trustees selected by the majority of boards of township trustees in the county pursuant to resolutions they adopt;
- (5) A member of the legislative authority of a municipal corporation in the county selected by the majority of the legislative authorities of municipal corporations in the county pursuant to resolutions they adopt;
- (6) An elected official from within the county appointed by the board of county commissioners.

When determining population under division (A)(2) of this section, population residing outside the county shall be excluded.

§128.06: County 9-1-1 program review committee; final plan for countywide system

(B) In counties with fewer than five townships, a population in excess of seven hundred fifty thousand, and which contains more than one public safety answering point, the composition of the 9-1-1 program review committee shall consist of five members as follows:

- (1) A member of the board of county commissioners, or a designee, who shall serve as chairperson of the committee;
- (2) The chief executive officer of the most populous municipal corporation in the county. Population residing outside the county shall be excluded when making this determination.
- (3) A member from one of the following, whichever is more populous:
 - (a) The chief executive officer of the second most populous municipal corporation in the county;
 - (b) A member of the board of township trustees of the most populous township in the county as selected by majority vote of the board of trustees.
- (4) The chief executive officer of a municipal corporation in the county selected by the majority of the legislative authorities of municipal corporations in the county pursuant to resolutions they adopt;
- (5) A member of a board of township trustees selected by the majority of boards of township trustees in the county pursuant to resolutions they adopt.

§128.06: County 9-1-1 program review committee; final plan for countywide system

(C) In counties that contain only one public safety answering point, the composition of the 9-1-1 review committee shall consist of three members as follows:

(1) If the public safety answering point is not operated by the board of county commissioners, the committee shall be composed of the following:

(a) A member of the board of county commissioners, or the member's designee, who shall serve as chairperson of the committee;

(b) One of the following:

(i) If the public safety answering point is operated by a township, then a member of the board of township trustees;

(ii) If the public safety answering point is operated by a municipal corporation, then the chief executive officer of the municipal corporation;

(iii) If the public safety answering point is operated by a subdivision that is not a township or municipal corporation or is operated by a regional council of governments, then an elected official of that subdivision or regional council of governments.

(c) A member who is an elected official of the most populous township or municipal corporation in the county that does not operate the public safety answering point. When determining population under this division, population residing outside the county shall be excluded.

§128.06: County 9-1-1 program review committee; final plan for countywide system

(C) In counties that contain only one public safety answering point, the composition of the 9-1-1 review committee shall consist of three members as follows:

(2) If the public safety answering point is operated by the board of county commissioners, then the board of county commissioners shall serve as the 9-1-1 program review committee.

(D) Each committee shall maintain and amend a final plan for implementing and operating a countywide 9-1-1 system. Any amendment to the final plan shall require a two-thirds vote of the committee. Each committee shall convene at least once annually for the purposes of maintaining or amending a final plan described in this section.

§128.06: County 9-1-1 program review committee; final plan for countywide system

Requirements and guidelines regarding a “County 9-1-1 program review committee” along w/ “final plans”.

(E) Each committee shall, **not later than the first day of March of each year**, submit a report to the political subdivisions within the county and to the 9-1-1 program office detailing the sources and amounts of revenue expended to support and all costs incurred to operate the countywide 9-1-1 system and the public safety answering points that are a part of that system for the previous calendar year. A county shall provide the county's committee with any clerical, legal, and other staff assistance necessary.

*much more robust and defined

§128.07: Final plan contents, filing

Further requirements and guidelines the final plans.

Additionally:

(B)(2) The 9-1-1 program review committee shall file a copy of its current final plan with the Ohio 9-1-1 program office not later than six months after the effective date of this amendment . Any revisions or amendments shall be filed not later than ninety days after adoption.

§128.08: Resolution to Approve or Disapprove Plan

- (A) Within sixty days after receipt of the final plan pursuant to division (B)(1) of section 128.07 of the Revised Code, the board of county commissioners of the county and the legislative authority of each municipal corporation in the county and of each township whose territory is proposed to be included in a countywide 9-1-1 system shall act by resolution to approve or disapprove the plan
- (C) After a countywide plan approved in accordance with this section is adopted, all of the telephone companies, subdivisions, and regional councils of governments included in the plan are subject to the specific requirements of the plan and to this chapter.

§128.12: Resolution to Approve or Disapprove Plan

(A) Within sixty days after receipt of the final plan pursuant to division (B)(1) of section 128.07 of the Revised Code, the board of county commissioners of the county and the legislative authority of each municipal corporation in the county and of each township whose territory is proposed to be included in a countywide 9-1-1 system shall act by resolution to approve or disapprove the plan

(C) After a countywide plan approved in accordance with this section is adopted, all of the telephone companies, subdivisions, and regional councils of governments included in the plan are subject to the specific requirements of the plan and to this chapter.

*very similar to former version

§128.12: Amendment of Plan

*use this for any versions AFTER the submission of the original “Final Plan” (due 4/3/24)

§128.21: Next generation 9-1-1 core services system requirements and coordination (new)

(A) The 9-1-1 program office shall coordinate and manage a statewide next generation 9-1-1 core services system. The office shall interoperate the system with Canada and the states that border this state. The office shall also manage the vendors supplying the equipment and services for the system to the department of administrative services.

(B)(1) The statewide next generation 9-1-1 core services system shall be capable of providing 9-1-1 core services for all of the territory of all the counties within this state, over both land and water. The system shall route all 9-1-1 traffic using location and policy-based routing to legacy enhanced 9-1-1 public safety answering points, next generation 9-1-1 public safety answering points, and local next generation 9-1-1 systems. The system shall be designed to provide access to emergency services from all connected communications sources and provide multimedia data capabilities for public safety answering points and other emergency service organizations.

(2) The emergency services internet protocol network that supports the statewide next generation 9-1-1 core services system shall be capable of being shared by all public safety agencies. It may be constructed from a mix of dedicated and shared facilities. It may be interconnected at local, regional, state, federal, national, and international levels to form an internet-protocol-based inter-network, or network of networks.



§128.211: Ohio 9-1-1 Plan (new)

(A) Not later than six months after the effective date of this section, the 9-1-1 program office shall draft, submit, or update a state of Ohio 9-1-1 plan to the steering committee. The plan shall include all of the following:

- (1) A specific plan to address the amendments to this chapter by this act ;
- (2) Specific system details describing interoperability among counties, the states bordering this state, and Canada;
- (3) A progression plan for the system and sustainability within the funding method encompassed by sections 128.41 to 128.422 of the Revised Code.

(B) Not later than six months after the plan is submitted under division (A) of this section, the steering committee shall review and may approve the plan.

*we submitted on April 3, 2024, steering committee approved on July 15, 2024

The approved plan is available to download at 911.Ohio.Gov

§128.212: Letter of coordination for state or federal 9-1-1 grant (new)

(A) Any entity in this state that operates a 9-1-1 system, emergency services internet-protocol network, or public safety answering point and that pursues a 9-1-1 grant from the state or federal government shall present a letter of coordination from the 9-1-1 program office.

(B) The letter of coordination shall state all of the following:

.....

(5) The system, equipment, software, or any component to be procured with the grant and the purpose of the grant do not inhibit, conflict, or reduce interoperability with the statewide next generation 9-1-1 core services system and emergency services internet-protocol network and is consistent with the state of Ohio 9-1-1 plan.

§128.25: County contact for 9-1-1 discrepancies, misroutes, and boundary disputes

*single point of contact

§128.27: Service Provider Duty to Deliver 9-1-1 Traffic (new)

A service provider that operates within a county that participates in the statewide next generation 9-1-1 core services system or within the area served by a regional council of governments that participates in that system shall deliver the 9-1-1 traffic that originates in that geographic area to the next generation 9-1-1 core for that geographic area.

§128.28: Adherence to 9-1-1 Program Office Standards (new)

If a service provider or county participates in the statewide next generation 9-1-1 core services system, the service provider or county shall adhere to standards of the 9-1-1 program office, which may include standards created by the national emergency number association (NENA) and the internet engineering task force.

(service provider and/or counties)

§128.412: Next generation 9-1-1 access fee -
25 cents on subscribers as of October 1, 2025
(new)

Back to the 25 cents

State Auditor's Office ordered to conduct an
evaluation of the fees and submit by February 2025
with a recommendation of increasing, decreasing, or
keeping the same

§128.98: Proceedings to Enforce Compliance (new)

(A) The attorney general, upon request of the steering committee, or on the attorney general's own initiative, shall begin proceedings against a telephone company that is a wireline service provider to enforce compliance with this chapter or with the terms, conditions, requirements, or specifications of a final plan as to wireline or wireless 9-1-1.

(B) The attorney general, upon the attorney general's own initiative, or any prosecutor, upon the prosecutor's initiative, shall begin proceedings against a subdivision or a regional council of governments as to wireline or wireless 9-1-1 to enforce compliance with this chapter or with the terms, conditions, requirements, or specifications of a final plan as to wireline or wireless 9-1-1.

§128.99: Penalties (new)

(A) Whoever violates division (F) of section 128.96 of the Revised Code is guilty of a misdemeanor of the fourth degree.

(B) Whoever violates division (G) or (H) of section 128.96 or division (B)(2) of section 128.60 of the Revised Code is guilty of a misdemeanor of the fourth degree on a first offense and a felony of the fifth degree on each subsequent offense.

+financial penalties for not filing returns

SOCC & Bluebridge:



Next Generation 9-1-1

Potential Expenses:

9-1-1 Phone System

Configuration – Change from Phone Line to IP

Upgrade – Some systems will require an upgrade

Last Mile

Connection to OARnet

Costs vary based on provider

Install costs also vary

Potential Savings:

State of Ohio Next Generation 9-1-1 will provide you text to 9-1-1 at no cost to your community.

MARCS 101: What is the Multi-Agency Radio Communication System?



The Multi-Agency Radio Communication System (MARCS) is Ohio's wireless, digital communication network for first responders, providing fiber optic and microwave technology that enables State, local, and federal agencies to communicate instantly with one another during public safety events.

MARCS is recognized nationally as a premier P25 public safety two-way radio communication system.

MARCS 101:Background



The need for a modernized first-responder communication system was made apparent by the 1990 Shadyside flood and the 1993 Lucasville prison riot. These events revealed gaping holes in communication through existing radio systems, affecting the ability of emergency personnel to coordinate efforts during emergencies. Following these events, the Ohio General Assembly authorized the development of what was to become MARCS. Construction began in 2000. (BEFORE 9/11/01)

In 2013 the state embarked on a \$90 million upgrade because the system had reached its service capacity. The upgrade was completed in July 2015, a year ahead of schedule and \$10 million under budget. This upgrade provides Ohio with an Internet-protocol (IP) based, integrated system with the coverage and capacity to provide voice and data service for up to 256,000 devices in the state, saving localities the millions of dollars that would have been required to modernize and maintain their communication systems. The upgraded MARCS platform was developed with a lifecycle that will keep it viable through 2039.

MARCS 101: System details



MARCS must operate at all times and under all weather conditions. The use of microwave and fiber optic technology allows the system to remain connected. Using multiple network connections provides redundancy to minimize the risk of an outage.

More than 320 towers located throughout Ohio provide the infrastructure for connectivity to the MARCS system.

System Components:

Mobile Voice – operating on the 700/800 MHz digital trunked technology

Mobile Data – allowing data transmissions, Law Enforcement Automated Data (LEADS) inquiries, reformatting of data from mobile data terminals (MDT)

Computer-Aided Dispatch – providing GPS-based auto vehicle location, resource recommendation, and display

MARCS 101:Reliability



Reliability, Performance, and Usage

Mobile Coverage – 99.71 percent (required 97.5%)

Grade of Service – 99.5 percent

Minutes of Airtime – More than 4 million minutes each month

Successful Push-to-talk Attempts – More than 50 million each month

The MARCS development contract required 97.5% mobile voice and data in street coverage. 99.71% aggregate voice coverage was realized, and 98.13% aggregate data coverage was achieved. This allows maximum statewide interoperability and enhanced safety and protection for public safety service providers through secure digital transmissions.

MARCS 101:Mission



To provide a state-of-the art communication system and to promote interoperability to save lives and maximize effectiveness in both normal operations and emergency situations.

(and make it as affordable as possible down to the volunteer FDs across the state)

MARCS 101: Participants



More than 155,000 radios and more than 1,800 unit-computers are on the system.

More than 3,300 public safety/public service agencies participate in MARCS.

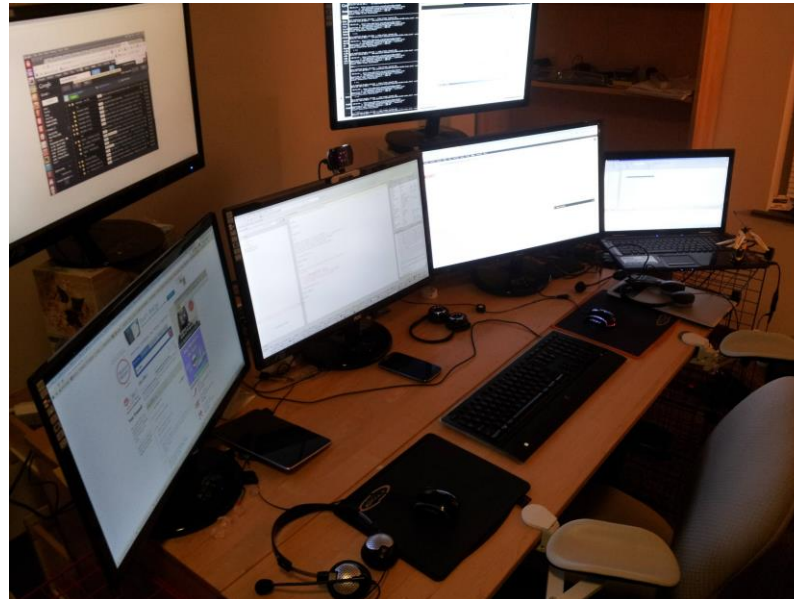
Users make a capital investment in equipment for radios and in-car computers. Many agencies seek grant funding to cover some or all of these costs.

Low monthly subscription fees for radios, computer-aided dispatch, and mobile computer terminals. (10.5 million from HB33 allows to reduce to \$5 per mo. for local users)

Local agencies have the ability to tailor the functionality of their radios to best fit their specific operational needs.

MARCS 101: NOC

The MARCS Program Office is responsible for the oversight, maintenance, and repair of the MARCS network. The network operations center operates 24x7.



MARCS 101: Towers on Wheels



Three 80-foot “Towers on Wheels” can be requested for events or emergencies requiring increased coverage and capacity for interoperable communications.



MARCS 101: MARCS in Schools Radios

A special MARCS radio was developed specifically for schools through a collaboration among school officials, law enforcement and the MARCS Program Office. The specially designed radio has an easy-to-operate emergency button, which when pressed, sends an alert to the appropriate law enforcement dispatch center. In addition, there is a paddle microphone attached which can be used for voice communications during an emergency.



MARCS in Schools Radios

Programmers are completing Link Layer Radio Authentication of each MIS radio – have completed 22 of the 68 counties (by the end of today) that currently have MIS radios, and partially completed an additional 13 counties.

Just over half of the counties that have MIS radios are completed or partially completed.

MARCS in Schools Radios

Director Madden made MIS one of the priorities in the Capital Budget, but also just rolled out a new grant process, in conjunction w/ OFCC, targeting the 20 counties that currently have no MIS radios in their jurisdiction.

That went live August 1 and is available thru the end of September.

MARCS in Schools Radios

The target counties include Wood, Fairfield, Shelby, Darke, Paulding, Defiance, Huron, Ottawa, Miami, Seneca, Sandusky, Williams, Wyandot, Pickaway, Harrison, Van Wert, Holmes, Erie, Morgan, and Vinton.



MARCS 101: Broadband Connectivity

A side benefit of MARCS towers is they provide the infrastructure for the private sector to extend cell phone and internet services to underserved areas of the state, such as southeastern Ohio.



MARCS by the Numbers:

USER INFORMATION

Active IDs

- **155,000 +** (system maximum capacity is 256,000)

ID Subscriber Mix

- 20% Full-use (Statewide- State, Federal, and Private Entities)
- 80% Local user (Includes Tier Partner Populations)

Subscriber Agencies (FY24 Q2 Invoices) (Adjusted for Agencies consolidated under one Subscriber Account) ≈ 3,300

- Local agencies represent 86% of invoice population
- Hamilton, Warren, Butler, Cincinnati, Columbus, Jefferson, Lake, Geauga = Tier partners

MARCS by the Numbers:

TOWERS

320 Towers (includes 10 towers in-flight)

Tower Ownership/Responsibility Mix (...ish +/- 1-3 towers per category)

- 1/3 - Tier Partner
- 1/3 - State
- 1/3 - Private Landowners (Land leases and all tower maintenance
Commercial Colocation Agreements (License Fees only)
*FY24 Lease/License Expense over \$1.5M

Tower Projects In-flight

- **10** (Champaign, Defiance, Fairfield, Highland, Holmes, Portage (3), Trumbull, Wayne, Auglaize)

MARCS by the Numbers:

OPERATING BUDGET

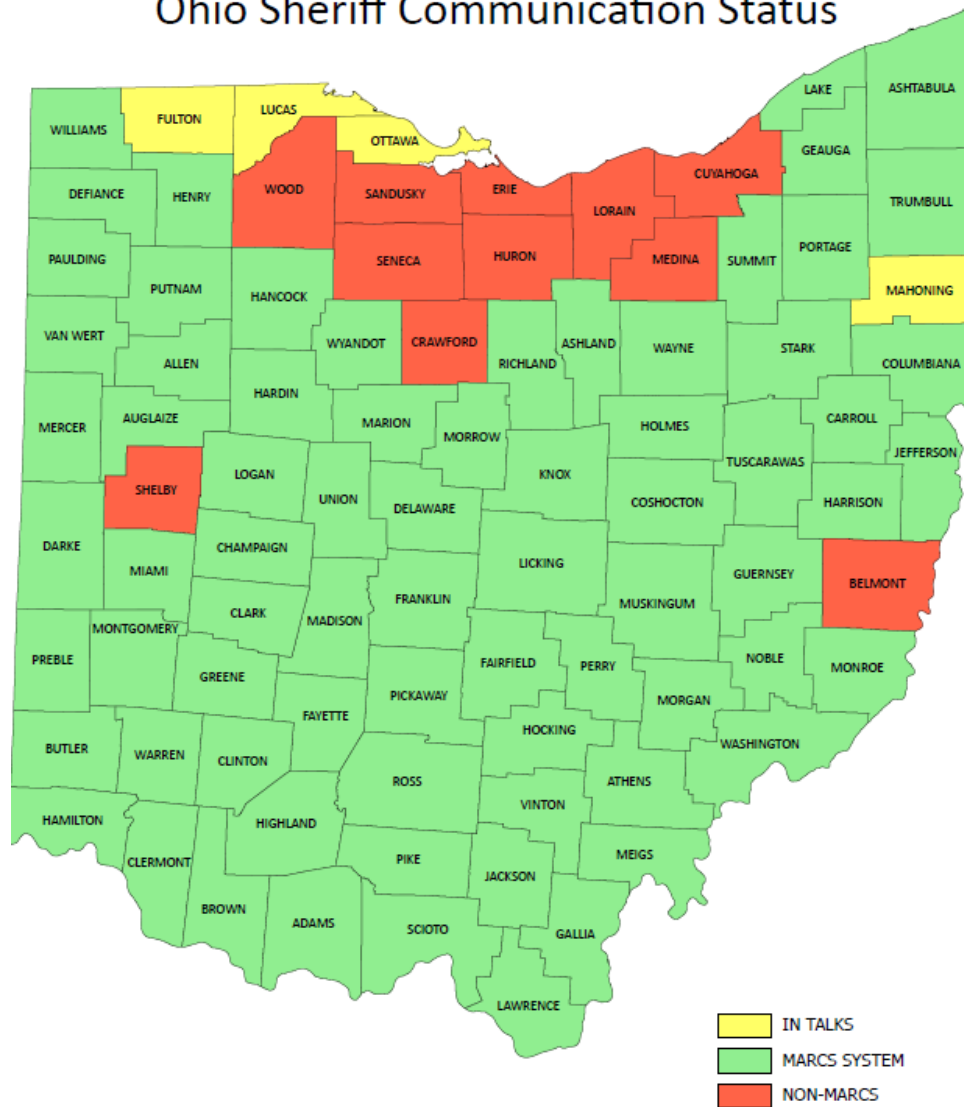
FY24 Operating Budget = \$31.5M

FY25 Operating Budget = \$31.5M

FY24 Breakdown %

- Tower Services 80% ≈ \$25.2M
- Admin Services 19.2% ≈ \$6.055M
 - Payroll = \$4.062M or 13%
- Misc (Enterprise) .8% ≈ \$245K

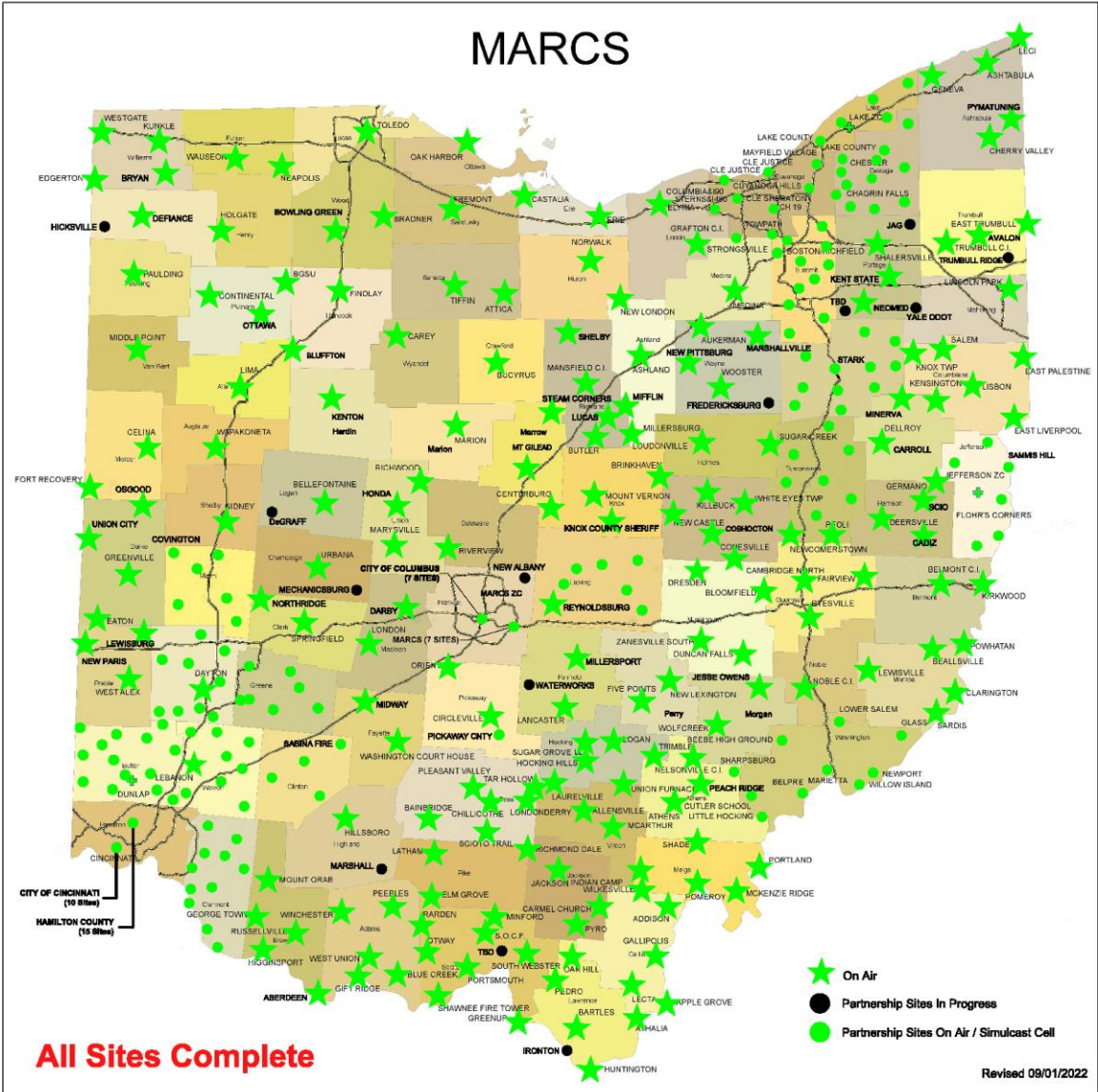
Ohio Sheriff Communication Status



Last Updated: 04/06/2023



MARCS



All Sites Complete

Revised 09/01/2022

Alternative Funding Sources (Local Projects)

- **Ohio – House Bills 110 and 687 Appropriated \$3.225M in Capital Improvement Project to 5 Local Recipients wishing to expand interoperability through MARCS within their counties**
 - **Richland, Wayne, Bowling Green, Highland, Lawrence**
- **Local Entities are leveraging American Rescue Plan (ARPA) Funding to expand MARCS within their counties**
 - **Champaign, Defiance, Fairfield, Portage, Trumbull**

Radio Rodeo and MARCS Radio Workshop

Thirteen (13) vendors participated

October 25, 2023, from noon – 2 pm (after the SIEC meeting)

State Fire Academy in Reynoldsburg

Ashley Campbell was present as well

Great feedback – will keep annually



New items added to Fire Marshal's grant's approved items

Repeaters

MARC's pagers

GRANT = September 25th – November 3rd

OFCC New Process:

Trying to streamline process

Thank you to our partners at OBM!

Hope to cut off 17 weeks from total process

Using CMR (Construction Manager at Risk) (v. a GC)

MARCS towers as a program v. stand-alone projects

Going to the September controlling board (\$4MILL)



Radio authentication reminder: aka, Link Layer Authentication

- On December 20, 2020, the Steering Committee voted to adopt the policy that includes the implementation of the P25 radio authentication
- Subscribers have been told starting in 2019, and all radios sold after 2019 had to have RA ability in them
- Completion date is July 1, 2025
- As of 8/13/24: 58,661 (Total Radios on the system: 155,308)

Staff updates:

- **MARCS Program Director, Larry McCoy (2/26/24)**
- **Devan Phillis – Frequency Coordinator (ultimately replacing Bob Bill) (4/8/24)**
- **Network Engineer & Special Projects person – coming soon!**

Ongoing and New Partnerships

Auglaize County:

building a new (second) tower, enabling more to come onto MARCS system and improving coverage

Henry County: Up and running as of 4/26/24

Lorain County: bi-weekly meetings, sites have been selected; shelters and channels went thru April 15 CB

Lancaster: they have built a tower – finishing shelter/installing equipment – fiber has been laid

Hicksville: Up and running as of 8/15/24

City of Wadsworth: moving onto an existing tower, improve coverage, more subscribers coming on

Scioto County: Met 5/1/24; replacing condemned tower on Faurt Hill, will become a MARCS tower

In talks with: Lucas County, Fulton County, Mahoning County, New Albany, Newark



Towers in flight

Auglaize County:

A&E company engaged, study to start ASAP

Scioto County: A&E study underway (will be condensed version)

Portage County: 6 tower simulcast system – 3 new towers now built, now awaiting connectivity

Wayne County: up and running 8/14/24; opening ceremony 8/28/24

Highland County: Have selected a site; just need to negotiate w/ landowner and start studies, etc.

Champaign County: kick-off meeting held 4/29/24

City of Wadsworth: moving onto an existing tower, upgrading generator, replacing HVAC, etc.

Trumbull County: A&E study underway, funds have been released for build

Fredricksburg Tower 2-5-24 (Wayne Co)



MARCS Steering Committee and Statewide Communications System: Sub. H.B. No. 33 Section 213.10

(A) There is hereby continued a Multi-Agency Radio Communications System (MARCS) Steering Committee consisting of all of the following members:

(1) The directors, or designees thereof, of the Directors of Administrative Services, Public Safety, Natural Resources, Transportation, Rehabilitation and Correction, and Budget and Management, and the State Fire Marshal or the State Fire Marshal's designee;

(D) The Committee shall establish a subcommittee to represent MARCS users on the local government level. The chairperson of the subcommittee shall serve as a member of the MARCS Steering Committee.

(B) The Director of Administrative Services or the Director's designee shall chair the Committee

OUR ORIGINAL MEMBERS:

- 1) Director of Administrative Services, Kathleen Madden (Chair)
- 2) Assistant Director of Public Safety, Karen Huey
- 3) Department of Natural Resources, Chief Doug Young
- 4) Department of Transportation, Assistant Director of Operations, Mitch Blackford
- 5) Department of Rehabilitation and Corrections, CIO Matthew Williams
- 6) Ohio Budget and Management, COO Steve Harvey
- 7) State Fire Marshal Kevin Reardon
- 8) Chairperson of the Local Government Subcommittee, William Vedra

MARCS Steering Committee and Statewide Communications System: Sub. H.B. No. 33 Section 213.10

- Added eight NEW committee members:
 - (A)(2) The following (4) members appointed by the Governor:**
 - (a) One representative of the Ohio Chapter of the Association of Public Safety Communications Officials (APCO) or its successor organization;**
 - (b) One representative of the Buckeye State Sheriff's Association (BSSA) or its successor organization;**
 - (c) One representative of the Ohio Association of Chiefs of Police (OACP) or its successor organization;**
 - (d) One representative of the Ohio Fire Chiefs' Association (OFCA) or its successor organization.**

MARCS Steering Committee and Statewide Communications System: Sub. H.B. No. 33 Section 213.10

- Added eight NEW committee members (cont):
 - (A)(3) Two members of the House of Representatives appointed by the Speaker of the House of Representatives, one from the majority party and one from the minority party;**
 - (A)(4) Two members of the Senate appointed by the President of the Senate, one from the majority party and one from the minority party.**

Total Solar Eclipse



**Total eclipse of the sun, but not of
MARCS!!**

Nearly 2 million PTT on
this day, with only 46
busies statewide

Radio authentication reminder: aka, Link Layer Authentication

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THANK YOU!

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