

2019

Annual Report to the Michigan Legislature

State 911 Committee

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GRETCHEN WHITMER
GOVERNOR



State of Michigan
STATE 911 COMMITTEE
LANSING

JEFF TROYER
CHAIR

July 27, 2019

Dear Michigan Legislators:

As the 2019 Chair of the State 911 Committee (SNC), I am pleased to present the State 911 Committee's Annual Report to the Michigan Legislature. Consistent with Section 412 of P.A. 32 of 1986, as amended, each year the SNC provides the Legislature with data about Michigan's 911 systems. It is the goal of the SNC to provide the Legislature with information about 911 as required by statute, but it's also our goal to provide additional information that is useful to you and the citizens of Michigan. This year our report once again reflects Michigan's steady steps forward to Next Generation 911 (NG911).

In addition to the Annual Report to the Michigan Legislature, the State 911 Committee also has statutory duties and responsibilities regarding 911 funding and best practices for 911 systems in Michigan. To meet the growing demands and streamline processes, the State 911 Office is embarking on a significant automation project that will enhance tracking and reporting capabilities.

This past year the State 911 Committee has continued to put Public Act 51 of 2018 into action, facilitating its multifaceted requirements in 911 funding and policies with regards to NG911, service fee changes, collection of the service fees, and the modified distribution of service fees collected. The SNC has also been collecting data to assist the Michigan Public Service Commission with its legislatively required report on the status of NG911 to the Legislature by December 1, 2020, to ensure the entire State of Michigan can move to NG911.

The Multi-Line Telephone Systems (MLTS) requirements and the deadline for compliance recently saw changes when Public Act 30 of 2019 was passed. The act provides for extensions of time and additional exemptions under certain circumstances. The SNC's MLTS Guidelines and the MLTS Frequently Asked Questions documents on the SNC's website of www.michigan.gov/snc are under review and revision based on the new legislation. Once revised and approved by the State 911 Committee, both documents are expected to be added to the website in mid-September to assist MLTS owners in understanding the updates to the legislation.

The State 911 Committee continues to strive to ensure that the 911 services provided to the citizens of Michigan are performed by highly trained, dedicated public safety employees. Please be proud of our State's progress, willingness, and commitment to the betterment of 911. I would also like to take this opportunity to thank you for your continuing support of Michigan 911.

Sincerely,

A handwritten signature in black ink, appearing to read "Jeff Troyer".

Mr. Jeff Troyer, Chair
State 911 Committee

Association of Public Safety Communications Officials • Commercial Mobile Radio Service • Department of Licensing and Regulatory Affairs
Department of State Police • Deputy Sheriff's Association • Fraternal Order of Police • Michigan Association of Ambulance Services
Michigan Association of Chiefs of Police • Michigan Association of Counties • Michigan Communications Directors Association
Michigan Association of Fire Chiefs • Michigan Professional Firefighters Union • Michigan Public Service Commission • Michigan Sheriff's Association Michigan State
Police Troopers Association • National Emergency Number Association • Telecommunications Association of Michigan • Upper Peninsula Emergency Medical Services
• Members of the general public appointed by the Governor, Speaker of the House, and Majority Leader of the Senate

An Overview of 911 in Michigan

This background helps to give readers an “at-a-glance” picture of the 911 operations in Michigan.

State 911 Committee

The State 911 Committee (SNC) has 21 members representing local public safety, private industry, elected officials, and state services. (See Appendix A) The SNC was established in accordance with the Emergency 911 Service Enabling Act to promote the successful development, implementation, and operation of 911 systems across the state of Michigan. The SNC meets quarterly, however, its subcommittees may meet more frequently.

Subcommittees of the SNC include:

Certification
Dispatcher Training
Emerging Technology
Legislative Action
Policy

What do PSAPs do?

In Michigan, 911 calls are answered at Public Safety Answering Points (PSAPs). A PSAP is a 24-hour, seven-days a week public safety emergency and non-emergency entity that responds for police, fire, and emergency medical services. PSAPs may also perform other important public safety services such as Law Enforcement Information Network (LEIN) entry, poison control transfers, and the activation of community alerts.

As of June 1, 2019, there are 137 PSAPs in Michigan, operating at various levels:

- Cities/Municipalities: 62
- County: 64
- Multi-county: 5
- State: 3
- Universities: 3

In 2018, Michigan PSAPs reported answering 6,647,344 calls on 911 lines (wireline, wireless, and VoIP combined).(*100% of PSAPs reported call volumes)

A detailed record of call volumes, as reported by each county, is available in Appendix B.

Under the Emergency 911 Service Enabling Act, 911 is established at the county level by implementing a county 911 plan. Each county determines locally how its 911 operations are funded.

As reported by Michigan’s counties, funding resources of \$263,363,404.30 for PSAPs approximately included:

- State 911 Fee Distribution Received: \$27,824,374.21 (10.6%)
- Local 911 Fee Received: \$81,917,828.32 (31.1%)
- Millage Receipts: \$38,396,100.65 (14.6%)
- General Fund Monies: \$92,274,641.06 (35.0%)
- Other Receipts: \$22,950,460.06 (8.7%)

Note: Some PSAPs are under the operating budget of a larger public safety entity. In such a situation, some operating costs are not reflected in the reported budget amount.

The “Other Receipts” figure contains additional revenues such as fees and rental income but, it may also indicate non-revenue funding such as loans and contracts with other counties using 911 revenue already reported.

Technical Costs

Even though some landline providers do not participate in the technical surcharge pooling process (based on the annual accounting of the landline providers and the “true up” performed by a contracted quality assurance vendor), reported technical costs in 2018 were \$11,685,847.00.

The cost of wireless 911 delivery to landline service providers (AT&T, Frontier, and Peninsula Fiber Network) reimbursed through MCL 484.1408(4)(b), as approved by the Michigan Public Service Commission under Case No. U-14000, totaled \$3,640,933.25 for calendar year 2018. This is an increase of \$34,006.04 from the \$3,606,927.21 reimbursed in 2017.

Emergency 911 Service Enabling Act Reporting Requirements

MCL484.1412 states: (1) The committee shall make a report annually on the 911 system in this state, and the state and county 911 charge required under MCL484.1401, 484.1401a, 484.1401b, 484.1401c, 484.1401d, and 484.1401e, and distributed under MCL484.1408 not later than August 1 of each year. The report shall include, at a minimum, all of the following:

A. The extent of emergency 911 service implementation in this state.

All of Michigan's 83 counties are both Phase I and Phase II compliant. At this time, all counties are delivering Enhanced 911 on both wireless and landline communications. Currently, 62 counties and the Conference of Western Wayne are providing text-to-911 services.

B. The actual 911 service costs incurred by Public Safety Answering Points (PSAP) and counties.

Each county was asked to report 911 costs and any other allowable 911 fund expenditures for calendar year 2018. A detailed list of responses can be found in Appendix C.

The reported annual allowable expenses from 911 surcharge funds by the PSAPs and counties combined was \$108,682,400.95.

Overall, counties reported receiving \$81,917,828.32 in local 911 surcharge funding during 2018. Other funding sources reported included \$92,274,641.06 in general funds, and \$38,396,100.65 from 911 dedicated millage generated funding. Treasury reported distributing \$26,080,641.00 to counties in State 911 Funds during January through December 2018. (See Appendix D)

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C. The state 911 fee required under MCL484.1401a and a recommendation of any changes in the state 911 fee amount, or in the distribution percentages under MCL484.1408.

The State 911 Committee is making no recommendations to changes in the state 911 fee or the distribution percentages at this time.

D. A description of any commercial applications developed as a result of implementing the Emergency 911 Service Enabling Act, 1986 PA 32.

No providers reported any commercial applications in 2018.

E. The charge allowed under sections MCL484.1401, 484.1401a, 484.1401b, 484.1401c, 484.1401d, and 484.1401e, and a detailed record of expenditures by each county relating to this act.

County reports indicate the total revenue generated for use of 911 was \$109,742,202.53. A detailed record is set forth in Appendix C and the 911 surcharges for each county are contained in Appendix E.

Michigan 911 Milestones

Next Generation 911:

In 2016, the State 911 Committee (SNC) began reporting on several independent local projects that were being developed throughout the state to create regions for IP-based Next Generation 911 (NG911) systems. Those projects have continued to progress and expand. As of July 1, 2019, 43 counties have deployed the IP-based 911 network provided by Peninsula Fiber Network (PFN) with 22 more counties in progress (See Appendix F and Appendix G for more information on NG911). There are also 16 additional counties plus the Downriver Consortium and Conference of Western Wayne that are under contract with PFN for IP-based NG911 deployment. However, the deployment dates for those counties have not yet been reported to the SNC (See Appendix H).

Text-to-911:

Last year, when the SNC issued its Annual Report to the Legislature, 41 Michigan counties had deployed text-to-911 services. At the time of this report, there are 62 counties, plus the Conference of Western Wayne, providing text-to-911 services to their citizens. There are also 18 more counties, plus the Downriver Community Conference actively working to implement text-to-911 and two including the Conference of Eastern Wayne and the Detroit Service District that will begin planning soon. (See Appendix I). At present, more than 65% of Michigan's population is served by text-to-911 services.

Multi-Line Telephone Systems (MLTS):

In June of 2019, Governor Whitmer signed HB 4249 into law. The law (P.A. 30 of 2019) moves the detailed requirements of MLTS from the Michigan Public Service Commission's administrative rules to state statute. The new statute extends the compliance deadline to December 31, 2020. It also provides limited exemptions for small businesses, places of worship and farms that meet certain definition, square footage and device number criteria and requirements. It also established new provisions for other MLTS systems meeting certain square footage and device number criteria. Updated MLTS Guidelines and Frequently Asked Questions (FAQ) documents are currently being written and will be issued by the SNC late this summer.

NG911 Grant Application:

The NG911 Grant Program was authorized by the NG911 Advancement Act of 2012 (Middle Class Tax Relief and Job Creation Act of 2012, Pub. L. 112-96, Title VI, Subtitle E (codified at 47 U.S.C. 942)). The grant program is administered at the federal level by National Telecommunications and Information Administration (NTIA) and the National Highway Traffic Safety Administration (NHTSA), acting through the Implementation Coordination Office (ICO), which is staffed by the NTIA and the National 911 Program.

After qualifying in September of 2018, at the first step of the two-step process, Michigan was eligible for a \$3.9 million non-competitive NG911 grant. With the support of the SNC and the other statewide 911 organizations - the Michigan Chapters of the Association of Public-Safety Communications Officials (APCO) and the National Emergency Number Association (NENA), and the Michigan Communications Directors Association (MCDA) - the State 911 Office completed the second step in March of this year with a grant submission for \$3.9 million to accomplish the following objectives:

- Customer Premise Equipment (CPE) for PSAPs in Need of NG911 CPE (\$2,875,000)
- Upgrade 9-1-1 GIS Repository Code (\$487,000)
- Statewide Address Points Gap Fill (\$577,000)

At the time of this report the final award notices to the states have not been made.

State 911 Plan:

The SNC updated its comprehensive State 911 Plan in June of 2019. An outline of the Plan is included in the Emerging Technology Subcommittee Report.

Department of State Police

In accordance with MCL484.1714, the Michigan State Police (MSP) provides staff assistance to the State 911 Committee (SNC) as necessary to carry out its responsibilities. Assistance comes from the State 911 Administrative Office, which is housed within the Field Support Bureau (FSB) of the MSP. The commander of the FSB serves as the Michigan State Police representative to the SNC. The State 911 Administrative Office provides a number of services to the SNC and the 911 community, including:

- Presentations on 911 issues to various public and private stakeholder groups.
- Coordination and oversight of the State 911 Dispatcher Training program and funds.
- Maintenance of the SNC website (www.michigan.gov/snc), which includes items such as:
 - List of Michigan primary PSAPs.
 - Funds distributed to counties and PSAPs by the Michigan Department of Treasury.
 - State and local 911 surcharge amounts.
 - Allowable and disallowable expenditures of 911 funds.
 - List of approved training courses.
 - Posting of meetings and minutes of the SNC and its subcommittees.
- Maintenance of centralized 911 data collection and reporting.
- Management of the Dispatcher Training/Tracking Program to ensure compliance with the Dispatcher Training Standards.
- Compliance reviews and facilitation of best practice standards.
- Statutory notices on state and local surcharges to communication providers, counties, and PSAPs.
- Assistance to members of the public, industry, and all levels of government with questions regarding 911.
- Coordination of the Annual Emerging 911 Technology Forum.
- Coordination of the activities of the SNC and its subcommittees.

Michigan State Police-Managed PSAPs

Upper Peninsula Dispatching

The Michigan State Police (MSP) Negaunee Regional Communication Center (NRCC) serves as the primary Public Safety Answering Point (PSAP) and provides full dispatching services for the counties of Keweenaw, Houghton, Baraga, Ontonagon, and Schoolcraft.

From January 1 through December 31, 2018,
NRCC answered 20,417 calls on 911.

Michigan State Police Detroit Metro-Area Wireless 911 Services

At times, wireless 911 calls cannot be processed directly to local PSAPs for reasons that include trunk loading and network outages. The MSP Detroit Regional Communication Center (DRCC) serves as one of the default routing points for these calls in the Detroit Metro area.

From January 1 through December 31, 2018,
DRCC answered 85,598 calls on 911.

Michigan State Police Northern Lower Peninsula

Effective January 2014, the MSP Gaylord Regional Communication Center (GRCC) became the primary PSAP providing full dispatching services for Otsego County.

From January 1 through December 31, 2018,
GRCC answered 12,559 calls on 911.

Michigan State Police Central and Southwest Michigan – Lansing Regional Communication Center

Michigan State Police dispatch operations for West Michigan are consolidated and located within the MSP Lansing Regional Communication Center (LRCC). Due to the reorganization, the LRCC does not receive 911 calls at this time.

Department of Treasury

For questions, contact Ms. Juanita Sarles at SarlesJ1@michigan.gov

The Department of Treasury is responsible for the financial administration of the Emergency 911 Fund. Financial administration tasks include:

- Processing remittances received from telecommunication suppliers and prepaid wireless telecommunication service sellers.
- Making distributions to counties and PSAPs as directed by the State 911 Committee.
- Making distributions to local exchange providers as directed by the Michigan Public Service Commission.
- Accounting for these transactions.

Cash receipts from telecommunication suppliers, prepaid wireless telecommunication service sellers, and interest earnings for January 1, 2018, through December 31, 2018, total \$38.1 million. Treasury's Bureau of Investments invests the Emergency 911 Fund balance as part of the State's common cash fund.

Treasury processes four types of payments for the Emergency 911 Fund:

- 1. & 2. County payments** made quarterly to counties that have a final 911 plan in place. The January 2018 and April 2018 payments were based on 82.5% of the money deposited in the Emergency 911 Fund. Of the 82.5%, 40% is equally distributed to each qualifying county and 60% is distributed on a per capita basis to each qualifying county. The July 2018 and October 2018 payments were based on 65% of the money deposited in the Emergency 911 Fund (not exceeding \$37 million annually) with 40% equally distributed to each qualifying county and the remaining 60% distributed on a per capita basis to each qualifying county. Money deposited in the Emergency 911 Fund in excess of \$37 million is allocated for supplier reimbursement payments.
- 3. Supplier reimbursement payments** made to local exchange providers for costs related to wireless emergency service. Payments are made for reimbursements in accordance with the Michigan Public Service Commission's June 29, 2004, order in Case No. U-14000 for wireless emergency service costs recoverable pursuant to MCL 484.1408(4)(b). Prior to passage of Public Act 51 of 2018, revenues were based on 7.75% of the money deposited in the Emergency 911 Fund. After passage of Public Act 51 of 2018, 25.56% of the first \$37 million is deposited in the Emergency 911 Fund and 100% of the amount exceeding \$37 million is deposited in the Emergency 911 Fund. As of December 31, 2018, a balance of \$6.9 million remains in the fund for disbursement.
- 4. PSAP training fund payments** made semi-annually are based on 5.5% of the money deposited in the Emergency 911 Fund, not exceeding \$37 million annually. Money deposited in the Emergency 911 Fund in excess of \$37 million is allocated for supplier reimbursement payments. Prior to passage of Public Act 51 of 2018, revenues were based on 6% of the money deposited in the Emergency 911 Fund. The 34th training fund payment of \$1,004,428 was made in January 2019 and was distributed to 125 PSAPs. The Spring 2019 training fund payment was distributed to 123 PSAPs in May of 2019. The next payment will occur in the Fall of 2019.

(Report as of June 2019)

See Appendix D for the distribution report of Emergency 911 funds to counties. An overview of the emergency 911 funds is reported in Appendix J.

Legislative Action Subcommittee Report

The Legislative Action Subcommittee (LAS) met on the following dates in 2018: May 3, 2018 and September 4, 2018. A complete listing of the LAS meeting minutes may be found on the State 911 Committee (SNC) website at www.michigan.gov/snc. Mr. Shawn Sible, Deputy Director of the Office of Administrative Services (formerly the Administrative Services Bureau) of the Michigan State Police, served as chair of the Legislative Action Subcommittee in 2018. In 2019, Lt. Col. W. Thomas Sands, Deputy Director of the Field Support Bureau of the Michigan State Police, became the new chair of the Legislative Action Subcommittee.

Legislative Action Subcommittee Chair: Lt. Col. W. Thomas Sands, State 911 Committee, Michigan State Police

Legislative Action Subcommittee Members:

- Ms. Cherie Bartram, South East Regional Emergency Services Authority (SERESA)
- Mr. Dale Berry, State 911 Committee, Huron Valley Ambulance
- Ms. Patricia Coates, Oakland County's Court and Law Enforcement Management Information System (CLEMIS)
- Mr. Greg Clark, Public Member
- Ms. Jennifer Greenburg, State 911 Committee, Telecommunications Association of Michigan
- Ms. Lisa Hall, Midland County Central Dispatch
- Ms. April Heinze, State 911 Committee, National Emergency Number Association (NENA)
- Ms. Jordyn Sellek, State 911 Committee, Conference of Western Wayne
- Mr. Jeff Troyer, State 911 Committee, Kalamazoo County Consolidated Dispatch Authority
- F/Lt. Jay Poupard, Michigan State Police
- Mr. Steven Berenbaum, State 911 Committee, AT&T
- Mr. Bryce Tracy, Mackinac County 911
- Mr. Scott Temple, INdigital

Over the past 12 months, Public Act 30 of 2019 was passed. The act provides an extension of the deadline for the owner/operators of multi-line telephone systems (MLTS) to provide detailed 911 location information for 911 calls. The statute also allows for additional exemptions under certain circumstances. Updated MLTS Guidelines and Frequently Asked Questions (FAQ) documents are currently being written and will be available on the SNC website after September 18, 2019.

Additionally, letters addressing SNC concerns about the recently introduced House Bill 4523 (safe delivery of newborns) and Sec. 97 of Senate Bill 146 (school safety appropriation for panic button software) were sent to the Legislature. Those letters are included as Appendix K and L, respectively.

Certification Subcommittee Report

The Certification Subcommittee met on the following dates in 2018: February 8, May 15, August 21, and December 4. Mr. Richard Feole, Director at Calhoun County Consolidated Dispatch Authority, serves as chair of the Certification Subcommittee.

Certification Subcommittee Chair: Mr. Rich Feole, State 911 Committee, Calhoun County Consolidated Dispatch Authority

Certification Subcommittee Members:

- Mr. Greg Clark, Public Member
- Mr. Philip Bates, INdigital
- Mr. Ray Hasil, Mason Oceana 911
- Mr. Chris Izworski, Bay County 911
- Mr. Gary Johnson, State 911 Committee, Marquette County Central Dispatch
- Mr. Scott Temple, INdigital
- Mr. Tim Smith, Ottawa County Central Dispatch Authority
- Mr. Robert Stewart, Frontier Communications
- Mr. Vance Stringham, Roscommon County Central Dispatch
- Ms. Phyllis Fuller, Peninsula Fiber Network
- Mr. Jeremy Ludwig, Allegan County Central Dispatch
- Ms. Joni Harvey, Livingston County 911 Central Dispatch

The Certification Subcommittee is a subcommittee of the State 911 Committee (SNC) that serves to ensure requirements and deadlines in the 911 statute are met. Its tasks include:

- 911 compliance reviews of counties/PSAPs.
- Recommending the criteria established by the SNC as allowable expenditures. (See Appendix M for the complete “Allowable/Disallowable Usage of 911 Surcharge Funds” listing.)
- Reviewing county 911 plans.
- Making recommendation to the SNC for quarterly certifications for 911 fund distribution.
- An initial place for appeal for expenditure issues.

As stated above, the Certification Subcommittee is tasked with conducting compliance reviews, which is the process of examining a county/PSAP accounting and use of 911 funds collected under P.A. 32. There are three different types of reviews:

- **For cause reviews** may be initiated based on reasonable suspicion of questionable practices. Reasonable suspicion is defined as “objective and specific facts that are capable of being articulated.”
- **Random reviews** will be conducted as determined by the SNC (through a random draw process by the Certification Subcommittee) for the following reasons:
 - To develop best practices regarding the implementation of 911 services and on-going operational processes.
 - To assure compliance with the emergency services order and the 911 Act.
 - Other reviews deemed appropriate by the State 911 Committee.
- **By request reviews** made through a county’s chief administrative official, chair of an SNC subcommittee, or other appropriate authority may be conducted upon the approval of the SNC. Requests will be made to the Certification Subcommittee and approved on a per county basis.

The following is a brief overview of compliance reviews conducted during 2018:

1. Manistee County: This random review was selected in February of 2017, and the final report with its addendums were approved by the SNC in September of 2018.
2. Shiawassee County: This random review was selected in August of 2017 and remained open due to an external audit that was conducted to review the Municipal Employees' Retirement System (MERS) accounts. The external audit was requested to determine the increase in costs was not solely attributed to the 911 employees.
3. Ingham County: This random review was selected in November of 2017, and the final report was approved by the SNC in June of 2018.
4. Montcalm County: This by request review was approved by the SNC at the December 2017 meeting. The final report with an addendum was approved by the SNC in September of 2018.
5. Livingston County: This random review was selected in February of 2018, and the final report was approved by the SNC in September of 2018.
6. Oakland County: This random review was selected in February of 2018, and the final report was approved by the SNC in December 2018.
7. Lake County: This for cause review consideration resulted in a meeting with Lake County in May of 2018. After meeting with officials from Lake County, it was determined that a review was not needed.
8. Gratiot County: This by request review was approved by the SNC at the June 2018 meeting. The final report was approved by the SNC in December of 2018.
9. Allegan County: This random review was selected in August of 2018, and the final report was approved by the SNC in December of 2018.
10. Kalamazoo County: This random review was selected in August 2018, and a six-month extension was requested due to a consolidation taking place within the county. Therefore, the review remained open through 2018.
11. Lapeer County: This random review was selected in December of 2018, and therefore remained open through 2018.
12. Delta County: This random review was selected in December of 2018, and therefore remained open through 2018.

The Certification Subcommittee welcomed new members, Jeremy Ludwig from Allegan County Central Dispatch, Scott Temple from INdigital, and Joni Harvey from Livingston County Central Dispatch.

A complete listing of the Certification Subcommittee meeting minutes may be found on the State 911 Committee website at www.michigan.gov/snc.

Dispatcher Training Subcommittee Report

For the period of January 1, 2018, through December 31, 2018, the Dispatcher Training Subcommittee (DTS) held five meetings on the following dates: February 12, February 22, May 16, August 22, and November 7.

Dispatcher Training Subcommittee Chair: Mr. Marc Gramlich, State 911 Committee, Monroe County Central Dispatch

Dispatcher Training Subcommittee Members:

- Mr. Jeff Troyer, State 911 Committee, Kalamazoo County Consolidated Dispatch Authority
- Ms. Karen Chadwick, Grand Rapids Police Department
- Ms. Christine Collom, Clinton County Central Dispatch
- Ms. Cherie Bartram, South East Regional Emergency Services Authority (SERESA)
- Mr. Brian McEachern, Michigan State Police - Negaunee Regional Dispatch
- Lt. David Aungst, Lenawee County Sheriff's Office
- Ms. Tammy Smith, Ottawa County Central Dispatch
- Mr. Sam Kalef, Troy Police Department
- Ms. Amy Thomas, Montcalm County Central Dispatch Authority
- Ms. Kimberly Grafton, Calhoun County Consolidated Dispatch Authority
- Ms. Melissa Harris, Ingham County 911 Central Dispatch Center
- Ms. Jennifer Robertson, Farmington Hills Police Department

On February 12, 2018, the DTS reviewed 133 applications received from Michigan Public Safety Answering Points (PSAPs) for Dispatcher Training funds. Two appeals were heard on February 22, and both were granted by the subcommittee. Of the 133 applications, 126 PSAPs were approved for training funds equating to a total of 1,962 full-time equivalents (FTE's). A total of seven PSAP applications were denied; five failed to spend down its previous years' funds, one submitted all 302 funded officers on its FTE count and an incomplete application, and one was denied due to the hours on the employee worksheet not totaling one FTE. (See Appendix N for the Dispatcher Training Fund Program and Appendix O for the Allowable/Disallowable Usage Of Funds For Training)

The first distribution of 2018 Dispatcher Training Funds was distributed on June 4, at a rate of \$459.40 per FTE for a total distribution of \$901,339.

At the May 16, 2018, DTS meeting, the following issues were discussed:

- Three appeals to denials of training courses were heard. Two of the appeals were granted, and the third was denied since it was an agency-specific training course.
- Suggested modifications to the DTS-34 sign-in sheet policy were discussed and approved.
- A discussion was held to consider adding a Next Generation 911 (NG911) training section to the Telecommunicator Training Manual.

The DTS discussed the following items at the August 22 meeting:

- Continued discussions regarding NG911 training.
- Approval of the FTE count for the November 2018 Dispatcher Training Fund distribution (1,957).
- The 2019 subcommittee meeting schedule was presented and approved.
- Applications for open seats on the DTS were reviewed and discussed.

At the November 7 meeting, discussions involved:

- The DTS approved revisions to the Telecommunicator Training Manual regarding next NG911 to forward to the State 911 Committee (SNC). The SNC sent it back to the DTS for further review and no updates were made.
- The 2019 Dispatcher Training Fund Application forms were reviewed and approved to be presented to the SNC. The SNC approved the application forms at the December meeting.
- Staff presented training course audit findings, a Dispatcher Training Database update and lean process improvement (LPI) recommendations to be further discussed in 2019.

The second distribution of Dispatcher Training Funds was distributed on January 8, 2019, at a rate of \$513.25 per FTE for a total distribution of \$1,004,428. (See Appendix P for the Training Fund Payment History)

During 2018, the DTS Course Review Team considered 192 requests for training course approval from various training providers. Of those requests, 178 were approved or renewed, and 14 were denied.

Emerging Technology Subcommittee Report

The Emerging Technology Subcommittee (ETS) researches and addresses new and emerging technologies that affect Michigan's Public Safety Answering Points (PSAPs). This includes providing training and documentation for PSAPs such as best-practice white papers, the annual Emerging Technology Forum, and Public Service Announcements to name a few.

The ETS met on the following dates in 2018: January 3, February 7, March 7, May 7, June 6, August 1, September 5, October 3, and December 5. A complete listing of the ETS meeting minutes may be found on the State 911 Committee's website at www.michigan.gov/snc.

Emerging Technology Subcommittee Chair: April Heinze, State 911 Committee, National Emergency Number Association (NENA)

Emerging Technology Subcommittee Members:

- Ms. Patricia Coates, CLEMIS
- Mr. Mike Muskovin, Motorola
- Mr. Carl Rodabaugh, Midland County Central Dispatch
- Mr. Matt Groesser, Kent County Sheriff Department
- Mr. Tim McKee, Peninsula Fiber Network
- Ms. Jaime Seling, Oakland County Sheriff's Office
- Mr. Michael Armitage, Eaton County Central Dispatch
- Mr. Jerry Nummer, Michigan Public Safety Communications System
- Mr. Steven Stryd, Kalamazoo County Sheriff's Office Dispatch Center
- Mr. Steven Berenbaum, State 911 Committee, AT&T
- Mr. Mark Holmes, Department of Technology, Management and Budget

During 2018, a variety of topics and issues were brought to the subcommittee for action or discussion. Below is a high-level overview of the main issues.

IP Deployment Best Practices document

- The ETS, with facilitating Public Act 51 of 2018, recognized the need for focus on available resources, contacts and considerations as Next Generation 911 (NG911) technology is implemented at the PSAPs.
- An IP Deployment Best Practices document was created to provide summaries of resources and guidelines for PSAPs working on deploying NG911 technology.

State 911 Plan (Update)

- The State 911 Plan, revised in 2017, required updates including the references of the 2018 legislation.
- A workgroup collaborated on sections of the plan and collectively went through each change for approval.
- The State 911 Plan with its revisions was approved at the State 911 Committee's June 2019 meeting. (See Appendix Q)

Statewide Communications Interoperability Plan (SCIP) Planning

- The Statewide Interoperability Coordinator for Michigan appeared before the State 911 Committee and requested assistance with the SCIP to submit information.
- The ETS prepared 911 related components in bullet point format and submitted in February.
- For future revisions and updates, the ETS will begin an annual review each August in order to have the opportunity to present information to the SNC in December. Geographical Information Systems may be a future consideration for communication between multiple agencies.

Annual Emerging Technology Forum

- The ETS coordinates and plans an annual forum on emerging technology trends and available resources for 911. (See Appendix R for Glossary of 911 Terms)
- Provides two-days of training for PSAP directors, IT staff, dispatchers, fire, law, and ambulance on emerging technology pertaining to 911 and public safety.
- Includes a variety of speakers from all over the nation and our own statewide communication centers on typically 12 topics.
- Held at the same location for two years then rotated around the state.
- Average attendance of 120 participants over two-days of training. (Record attendance for 2019 at 152 registered).
- Tech Talk Monday dinner is held before the start of the forum to review upcoming topics and discuss acronyms to help new attendees understand more of what they will be learning.

State 911 Committee Membership
As of May 2019

Association of Public Safety Communications Officials

Mr. Rich Feole

Commercial Mobile Radio Service

Mr. Steven Berenbaum

Department of Licensing and Regulatory Affairs

Ms. Jeanette Doll

Department of State Police

Lt. Col. W. Thomas Sands

Deputy Sheriffs' Association

Mr. Michael Grodi

Fraternal Order of Police

Mr. Michael Sauger

Governor's Appointee, Public Member

Mr. John Bawol

House Appointee, Public Member

Mr. Jeff Troyer, Chair

Michigan Association of Ambulance Services

Mr. Dale Berry

Michigan Association of Chiefs of Police

Chief Dale Greenleaf

Michigan Association of Counties

Mr. Christian Marcus

Michigan Association of Fire Chiefs

Chief Mark Barnes

Michigan Communications Directors Association

Ms. Jordyn Sellek

Michigan Professional Firefighters Union

Mr. Mark Docherty

Michigan Public Service Commission

Ms. Wendy Thelen

Michigan Sheriffs' Association

Sheriff Richard Behnke

Michigan State Police Troopers Association

Sgt. Frank Williams

National Emergency Number Association

Mr. Marc Gramlich

Senate Appointee, Public Member

Ms. April Heinze, Vice Chair

Telecommunications Association of Michigan

Ms. Jennifer Greenburg

UP Emergency Medical Services Corporation

Mr. Gary Johnson

Appendix B
County Call Information Detail

County	Total Wireline 911 Calls Received	Total Wireless 911 Calls Received	Total VoIP Calls Received	Total Texts-to-911 Received	Total PSAP Non- Emergency Admin Calls (non 911 lines)	Total Incidents Dispatched
Alcona	1,058	2,940	56	0	19,200	4,401
Alger	807	2,271	47	27	21,352	3,152
Allegan	7,443	40,800	1,301	-	94,570	63,085
Alpena	2,762	7,151	112	100	16,567	26,692
Antrim	3,334	6,174	5	0	21,541	23,257
Arenac	10,022	-	-	-	50,000	13,438
Baraga *	676	1,853	40	20	76,023	9,959
Barry	3,486	15,731	181	75	49,483	48,449
Bay	70,630	53,623	1,280	-	53,514	85,425
Benzie	949	5,415	52	0	20,778	14,592
Berrien	7,231	146,399	8,054	191	191,171	145,140
Branch	54,298	55,843	12,000	3	98,882	57,342
Calhoun	34,293	150,425	6,087	59	101,315	182,358
Cass	1,800	16,130	1,363	56	143,158	46,236
CCE (Charlevoix, Cheboygan, Emmet)	13,391	55,192	3,795	99	68,963	139,168
Chippewa **	5,389	14,344	441	52	43,821	29,549
Clare	2,988	10,110	169	0	9,648	37,960
Clinton	10,618	28,869	1,247	Unknown	38,963	122,104
Crawford	940	2,397	4	0	5,596	14,761
Delta	2,491	8,307	395	7	83,558	19,676
Dickinson	1,390	5,225	264	551	34,951	18,925
Eaton	6,064	37,862	2,709	55	91,621	94,705
Genesee	34,529	299,496	25,106	657	112,578	523,030
Gladwin	7,942	3,744	-	-	49,236	19,424
Gogebic	1,673	1,431	208	21	14,019	7,625
Grand Traverse	7,118	32,358	1,004	75	88,543	74,843
Gratiot	3,246	14,610	180	-	43,880	54,686
Hillsdale	8,278	16,551	2,759	2	24,638	36,369
Houghton *	2,940	9,035	525	51	-	27,995
Huron	1,089	8,350	600	0	60,262	29,126
Ingham	19,755	134,109	9,307	0	319,156	252,704

County	Total Wireline 911 Calls Received	Total Wireless 911 Calls Received	Total VoIP Calls Received	Total Texts-to-911 Received	Total PSAP Non- Emergency Admin Calls (non 911 lines)	Total Incidents Dispatched
Ionia	3,890	18,414	610	36	54,291	39,830
Iosco	1,779	9,383	327	0	22,952	22,477
Iron	888	5,403	152	21	14,019	6,542
Isabella	1,713	11,144	76	-	73,843	69,190
Jackson	55,613	97,802	9,397	11	43,791	139,458
Kalamazoo	12,105	139,690	3,612	168	165,048	311,790
Kalkaska	1,938	7,198	92	-	33,114	10,053
Kent	23,213	223,462	15,436	-	372,581	291,701
Keweenaw *	211	682	6	7	-	1,473
Lake	1,659	6,968	218	354	13,174	13,271
Lapeer	5,460	24,889	N/A	55	41,482	80,733
Leelanau	2,469	7,173	6	0	23,901	13,688
Lenawee	5,479	58,219	4,795	123	109,060	78,231
Livingston	32,415	42,578	2,857	Unknown	64,082	196,663
Luce **	490	1,289	44	-	-	3,140
Mackinac **	5,059	3,817	220	-	-	9,123
Macomb	196,020	422,976	39,731	422	393,509	537,220
Manistee	15,652	21,425	325	0	33,595	28,240
Marquette	5,982	20,839	492	88	59,792	55,717
Mason Oceana	4,107	23,261	801	21	38,423	74,571
Meceola (Mecosta-Osceola)	N/A	33,028	N/A	-	86,825	52,942
Menominee	889	4,708	880	24	29,383	12,757
Midland	10,573	32,762	962	-	21,846	71,755
Missaukee	832	3,817	123	-	9,865	5,478
Monroe	8,415	104,774	1,939	-	Unknown	99,122
Montcalm	2,682	19,181	563	-	137,667	55,902
Montmorency	663	1,899	37	112	2,200	8,318
Muskegon	15,633	111,511	12,314	-	159,016	280,542
Newaygo	416	17,817	931	0	50,623	41,825
Oakland	59,405	457,061	43,356	576	1,063,274	1,016,572
Ogemaw	1,994	5,943	309	0	38,277	29,801
Ontonagon	534	966	21	15	*	3,881

County	Total Wireline 911 Calls Received	Total Wireless 911 Calls Received	Total VoIP Calls Received	Total Texts-to-911 Received	Total PSAP Non-Emergency Admin Calls (non 911 lines)	Total Incidents Dispatched
Oscoda	712	2,336	59	0	Unknown	2,965
Ostego	2,396	9,999	148	16	13,097	24,212
Ottawa	24,027	74,474	4,829	50	112,720	120,944
Presque Isle	N/A	4,426	N/A	24	Unknown	7,803
Roscommon	2,990	10,912	134	23	47,628	61,106
Saginaw	26,579	113,958	14,916	-	132,509	210,433
Sanilac	2,016	12,001	389	-	91,624	39,225
Schoolcraft	1,054	2,466	16	22	*	9,413
Shiawasee	1,524	7,333	N/A	Unknown	31,822	61,417
St. Clair	6,381	68,024	5,039	83	203,986	147,935
St. Joseph	4,472	20,988	1,240	1379	66,106	56,986
Tuscola	4,587	17,435	464	0	24,491	41,145
Van Buren	5,336	26,651	1,508	92	81,548	65,006
Washtenaw	23,199	228,060	21,564	-	653,192	349,382
Wayne - Conf. of Western Wayne	56,174	348,588	25,344	567	710,204	456,244
Wayne - Conf. of Eastern Wayne	4,691	21,428	-	-	72,850	14,272
Wayne - Downriver Mutual Aid	38,288	334,443	12,309	-	Unknown	250,531
Wayne - Detroit Service District	57,843	775,673	47,634	-	17,857	787,795
Wexford	2,529	13,946	257	0	49,636	35,111
TOTAL	1,071,606	5,219,965	355,773	6390	7,511,890	8,630,107
<p>* Refers to an undivided total for five (5) Counties (Baraga, Houghton, Keweenaw, Ontonagon, Schoolcraft) for the Total PSAP Non-Emergency Admin Calls (non 911 lines). The combined final figure is noted under Baraga County.</p> <p>** Refers to an undivided totals for Total Texts-to-911 Received and Total PSAP Non-Emergency Admin Calls (non 911 lines) for Chippewa, Luce and Mackinac Counties. The combined final figures are noted under Chippewa County.</p>						

Appendix C
County Financial Information Detail

County	Total State 911 Fee Distribution Received	Total Local 911 Fee Distribution Received	Total 911 Millage Receipts	Total General Fund Monies	Total Other Receipts	Total Expenses	Total State 911 Fee Spent	Total Local 911 Fee Spent	Total 911 Millage Monies Spent	Total General Fund Monies Spent	Total Other Monies Spent
Alcona	\$ 143,008.00	\$ 343,145.44	\$ -	\$ -	\$ 14,065.60	\$ 512,115.53	\$ 143,008.00	\$ 343,145.44	\$ -	\$ -	\$ 25,962.09
Alger	\$ 141,804.00	\$ 41,807.62	\$ 131,371.40	\$ -	\$ 1,724.82	\$ 274,191.51	\$ 141,804.00	\$ 19,070.58	\$ 113,316.93	\$ -	\$ -
Allegan	\$ 302,075.00	\$ 3,563,035.51	\$ -	\$ -	\$ -	\$ 3,865,110.51	\$ 302,075.00	\$ 3,563,035.51	\$ -	\$ -	\$ -
Alpena	\$ 172,547.00	\$ 818,061.00	\$ -	\$ -	\$ 1,386.00	\$ 798,755.00	\$ 798,755.00	\$ -	\$ -	\$ -	\$ -
Antrim	\$ 170,728.00	\$ -	\$ 893,172.28	\$ -	\$ 24,918.59	\$ 997,199.43	\$ 121,767.17	\$ -	\$ 875,432.26	\$ -	\$ -
Arenac	\$ 150,857.00	\$ 63,784.31	\$ 437,705.52	\$ 50,000.00	\$ 8,940.00	\$ 628,891.35	\$ 150,857.00	\$ 63,784.31	\$ 413,450.04	\$ -	\$ 800.00
Baraga	\$ 139,711.00	\$ 9,049.56	\$ -	\$ -	\$ -	\$ 76,978.00	\$ 76,978.00	\$ -	\$ -	\$ -	\$ -
Barry	\$ 219,373.00	\$ -	\$ 1,369,517.82	\$ -	\$ 14,438.99	\$ 1,637,808.52	\$ 259,808.88	\$ -	\$ 1,377,999.64	\$ -	\$ -
Bay	\$ 331,732.00	\$ -	\$ 2,059,529.00	\$ -	\$ 542,611.00	\$ 2,933,872.00	\$ 331,732.00	\$ -	\$ 2,059,529.00	\$ -	\$ 542,611.00
Benzie	\$ 153,431.00	\$ 751,929.00	\$ -	\$ -	\$ 7,781.00	\$ 719,156.00	\$ 719,156.00	\$ -	\$ -	\$ -	\$ -
Berrien	\$ 373,966.00	\$ 669,466.40	\$ 3,514,979.00	N/A	\$ 33,886.00	\$ 4,195,495.40	\$ 373,966.00	\$ 669,466.40	\$ 3,118,177.00	\$ -	\$ 33,886.00
Branch	\$ 197,325.00	\$ 119,719.13	\$ 1,358,415.75	\$ -	\$ -	\$ 1,675,459.88	\$ 197,325.00	\$ 119,719.13	\$ 1,358,415.75	\$ -	\$ -
Calhoun	\$ 357,385.00	\$ 762,974.00	\$ -	\$ 1,983,160.00	\$ 10,915.00	\$ 3,153,064.00	\$ 357,385.00	\$ 762,974.00	\$ -	\$ 1,983,160.00	\$ 49,545.00
Cass	\$ 213,074.00	\$ 690,023.00	\$ 410,184.00	\$ -	\$ -	\$ 1,656,210.00	\$ 213,074.00	\$ 690,023.00	\$ 753,113.00	\$ -	\$ -
CCE (Charlevoix, Cheboygan, Emmet)	\$ 511,308.00	\$ 730,246.74	\$ -	\$ 2,323,400.50	\$ 117,667.55	\$ 3,682,622.79	\$ 511,308.00	\$ 730,246.74	\$ -	\$ 2,323,400.50	\$ 117,667.55
Chippewa	\$ 195,502.00	\$ 493,021.49	\$ -	\$ 70,873.39	\$ 188,799.10	\$ 948,195.98	\$ 195,502.00	\$ 493,021.49	\$ -	\$ 70,873.39	\$ 188,799.10
Clare	\$ 174,650.00	\$ 278,275.16	\$ 358,483.66	\$ -	\$ 26,879.50	\$ 786,778.24	\$ 174,650.00	\$ 278,275.16	\$ 306,973.58	\$ -	\$ 26,879.50
Clinton	\$ 256,626.00	\$ 2,271,112.00	\$ -	\$ -	\$ 79,419.00	\$ 1,696,223.00	\$ 1,696,223.00	\$ -	\$ -	\$ -	\$ -
Crawford	\$ 147,966.00	\$ 328,183.43	\$ -	\$ -	\$ 6,315.00	\$ 482,410.61	\$ 147,966.00	\$ 328,129.61	\$ -	\$ -	\$ 6,315.00
Delta	\$ 242,173.60	\$ 305,957.47	\$ 275,826.65	\$ -	\$ 3,890.64	\$ 827,848.36	\$ 242,173.60	\$ 305,957.47	\$ 275,826.65	\$ -	\$ 3,890.64
Dickinson	\$ 175,020.00	\$ 201,988.32	\$ 344,910.52	\$ -	\$ -	\$ 661,371.78	\$ 175,020.00	\$ 201,988.32	\$ 284,363.46	\$ -	\$ -
Eaton	\$ 296,299.00	\$ 390,457.00	\$ 3,278,058.60	\$ -	\$ 49,799.00	\$ 3,820,953.00	\$ 296,299.00	\$ 17,066.00	\$ 3,457,789.00	\$ -	\$ 49,799.00
Genesee	\$ 799,837.00	\$ 7,070,472.51	\$ -	\$ 146,857.00	\$ 145,103.22	\$ 8,162,269.73	\$ 799,837.00	\$ 7,070,472.51	\$ -	\$ 146,857.00	\$ 145,103.22
Gladwin	\$ 166,362.00	\$ 124,572.55	\$ 760,244.16	\$ -	\$ 11,608.29	\$ 915,537.35	\$ 15,795.69	\$ 82,525.66	\$ 817,216.00	\$ -	\$ -
Gogebic	\$ 151,693.00	\$ 192,822.66	\$ -	\$ -	\$ 240.00	\$ 321,307.65	\$ 321,067.65	\$ -	\$ -	\$ -	\$ 240.00
Grand Traverse	\$ 275,869.00	\$ 2,064,406.39	\$ -	\$ 78,332.18	\$ 51,091.14	\$ 2,469,698.71	\$ 275,869.00	\$ 2,064,406.39	\$ -	\$ 78,332.18	\$ 51,091.14
Gratiot	\$ 192,936.00	\$ 984,139.00	\$ -	\$ -	\$ -	\$ 1,308,238.00	\$ 192,936.00	\$ 1,007,296.00	\$ -	\$ -	\$ 108,006.00
Hillsdale	\$ 199,605.00	\$ 988,278.00	\$ -	\$ -	\$ 53,332.00	\$ 1,208,875.00	\$ 1,208,875.00	\$ -	\$ -	\$ -	\$ -
Houghton	\$ 145,466.00	\$ 312,127.00	\$ -	\$ -	\$ 2,072.00	\$ 357,182.00	\$ 113,365.00	\$ 243,817.00	\$ -	\$ -	\$ -
Huron	\$ 186,544.00	\$ 781,812.00	\$ -	\$ 17,128.00	\$ 1,537.00	\$ 987,021.00	\$ 186,544.00	\$ 781,812.00	\$ -	\$ 17,128.00	\$ 1,537.00
Ingham	\$ 597,408.00	\$ 1,152,020.10	\$ 6,128,649.24	\$ -	\$ 87,025.96	\$ 7,904,432.05	\$ 597,408.00	\$ 1,152,020.10	\$ 6,067,977.99	\$ -	\$ 87,025.96
Ionia	\$ 237,595.00	\$ 1,230,933.22	\$ -	\$ -	\$ 3,247.75	\$ 1,551,142.98	\$ 41,226.40	\$ 1,509,916.58	\$ -	\$ -	\$ -
Iosco	\$ 174,554.00	\$ 578,478.00	\$ 61,308.00	\$ -	\$ 50,000.00	\$ 864,340.00	\$ 174,554.00	\$ 578,478.00	\$ 61,308.00	\$ -	\$ 50,000.00
Iron	\$ 115,841.00	\$ 310,331.34	\$ -	\$ 118,000.00	\$ 98,166.00	\$ 642,338.34	\$ 115,841.00	\$ 310,331.34	\$ -	\$ 118,000.00	\$ 98,166.00
Isabella	\$ 237,008.00	\$ 1,448,590.00	\$ -	\$ -	\$ -	\$ 1,500,484.00	\$ 237,008.00	\$ 1,263,476.00	\$ -	\$ -	\$ -
Jackson	\$ 390,089.50	\$ 2,325,913.95	\$ -	\$ -	\$ 4,336.00	\$ 2,923,561.73	\$ 2,923,561.73	\$ -	\$ -	\$ -	\$ -
Kalamazoo	\$ 546,727.00	\$ 1,087,628.00	\$ -	\$ 4,795,397.00	\$ 3,662,067.00	\$ 8,426,699.00	\$ 139,381.00	\$ 2,648,138.00	\$ -	\$ 2,028,849.00	\$ 3,610,331.00
Kalkaska	\$ 160,071.00	\$ 488,577.00	\$ -	\$ -	\$ 11,762.00	\$ 509,738.00	\$ 160,071.00	\$ 349,667.00	\$ -	\$ -	\$ -
Kent	\$ 1,130,896.00	\$ 6,992,215.00	\$ -	\$ 4,419,233.00	\$ 1,451,481.00	\$ 13,993,825.00	\$ 1,130,896.00	\$ 6,992,215.00	\$ -	\$ 4,419,233.00	\$ 1,451,481.00
Keweenaw	\$ 135,203.00	\$ -	\$ -	\$ -	\$ -	\$ 134,478.00	\$ 134,478.00	\$ -	\$ -	\$ -	\$ -
Lake	\$ 186,868.00	\$ -	\$ 890,628.77	\$ -	\$ -	\$ 957,417.00	\$ 218,383.00	\$ -	\$ 739,034.00	\$ -	\$ -
Lapeer	\$ 278,079.00	\$ 1,477,050.00	\$ -	\$ -	\$ 15,847.00	\$ 1,899,065.00	\$ 278,079.00	\$ 1,470,887.00	\$ -	\$ -	\$ 150,099.00
Leelanau	\$ 167,624.00	\$ 114,335.96	\$ -	\$ 1,085,603.04	\$ 120,000.00	\$ 1,487,563.00	\$ 167,624.00	\$ 114,335.96	\$ -	\$ 1,085,603.04	\$ 120,000.00
Lenawee	\$ 297,269.00	\$ 2,840,485.10	\$ -	\$ -	\$ 41,191.18	\$ 2,612,446.45	\$ 2,612,446.45	\$ -	\$ -	\$ -	\$ -

County	Total State 911 Fee Distribution Received	Total Local 911 Fee Distribution Received	Total 911 Millage Receipts	Total General Fund Monies	Total Other Receipts	Total Expenses	Total State 911 Fee Spent	Total Local 911 Fee Spent	Total 911 Millage Monies Spent	Total General Fund Monies Spent	Total Other Monies Spent
Livingston	\$ 431,707.00	\$ 4,250,325.41	\$ -	\$ -	\$ 106,717.96	\$ 6,423,487.64	\$ 6,423,487.64	\$ -	\$ -	\$ -	\$ -
Luce	\$ 105,938.00	\$ 53,597.70	\$ -	\$ -	\$ 11,288.53	\$ 123,048.68	\$ 92,492.74	\$ 30,555.94	\$ -	\$ -	\$ -
Mackinac	\$ 153,656.00	\$ 174,465.00	\$ -	\$ -	\$ 28,000.00	\$ 360,297.00	\$ 161,808.00	\$ 198,489.00	\$ -	\$ -	\$ -
Macomb	\$ 1,526,138.00	\$ -	\$ -	\$ 14,611,575.43	\$ 6,589,558.00	\$ 16,012,213.67	\$ 1,400,638.24	\$ -	\$ -	\$ 14,611,575.43	\$ -
Manistee	\$ 164,844.00	\$ -	\$ 1,192,766.00	\$ 175,244.00	\$ 15,312.00	\$ 1,548,166.00	\$ 164,844.00	\$ -	\$ 1,192,766.00	\$ 175,244.00	\$ 15,312.00
Marquette	\$ 242,509.00	\$ -	\$ 1,169,045.00	\$ -	\$ 6,254.00	\$ 1,200,725.00	\$ 242,509.00	\$ -	\$ 951,962.00	\$ -	\$ 6,254.00
Mason Oceana	\$ 354,915.00	\$ 1,121,177.45	\$ 415,623.26	\$ -	\$ 36,784.13	\$ 1,762,793.49	\$ 1,347,170.23	\$ -	\$ 415,623.26	\$ -	\$ -
Meceola (Mecosta-Osceola)	\$ 356,382.00	\$ 1,194,460.00	\$ -	\$ -	\$ 55,675.00	\$ 1,606,517.00	\$ 356,382.00	\$ 1,194,460.00	\$ -	\$ -	\$ 55,675.00
Menominee	\$ 163,730.00	\$ 496,352.21	\$ -	\$ 525,766.01	\$ 12,475.00	\$ 1,198,323.22	\$ 660,082.21	\$ -	\$ -	\$ 525,766.01	\$ 12,475.00
Midland	\$ 270,404.00	\$ -	\$ 2,733,024.00	\$ -	\$ 3,003,428.00	\$ 1,861,631.00	\$ 270,404.00	\$ -	\$ 1,591,227.00	\$ -	\$ -
Missaukee	\$ 149,195.00	\$ 62,304.00	\$ -	\$ 376,184.62	\$ 2,458.00	\$ 653,167.94	\$ 214,679.32	\$ 62,304.00	\$ -	\$ 376,184.62	\$ -
Monroe	\$ 366,379.00	\$ 706,599.00	\$ -	\$ 1,283,269.00	\$ -	\$ 2,356,247.00	\$ 366,379.00	\$ 706,599.00	\$ -	\$ 1,283,269.00	\$ -
Montcalm	\$ 225,973.00	\$ 1,509,888.00	\$ -	\$ -	\$ 13,355.00	\$ 1,871,245.00	\$ 361,357.00	\$ 1,509,888.00	\$ -	\$ -	\$ -
Montmorency	\$ 143,638.76	\$ 231,191.00	\$ -	\$ 82,658.00	\$ -	\$ 457,487.76	\$ 143,638.76	\$ 231,191.00	\$ -	\$ 82,658.00	\$ -
Muskegon	\$ 398,549.00	\$ 646,999.00	\$ 1,298,807.00	\$ -	\$ 1,400,327.00	\$ 3,952,952.00	\$ 398,549.00	\$ 646,999.00	\$ 1,298,807.00	\$ 177,298.00	\$ 1,431,299.00
Newaygo	\$ 211,984.00	\$ 774,936.23	\$ -	\$ -	\$ -	\$ 897,691.31	\$ 200,616.11	\$ 697,075.20	\$ -	\$ -	\$ -
Oakland	\$ 2,125,384.00	\$ 5,205,983.04	\$ 1,735,423.00	\$ 22,425,062.00	\$ 2,990,181.00	\$ 34,953,659.84	\$ 7,111,356.84	\$ -	\$ 1,735,423.00	\$ 23,116,699.00	\$ 2,990,181.00
Ogemaw	\$ 160,039.00	\$ 277,607.08	\$ -	\$ 138,699.00	\$ 137,996.46	\$ 714,341.54	\$ 160,039.00	\$ 277,607.08	\$ -	\$ 138,699.00	\$ 137,996.46
Ontonagon	\$ 78,741.00	\$ 24,098.29	\$ -	\$ -	\$ 1,387.91	\$ 48,681.87	\$ 45,073.79	\$ 3,608.08	\$ -	\$ -	\$ -
Oscoda	\$ 139,364.00	\$ 38,028.87	\$ -	\$ 96,559.58	\$ 494.01	\$ 364,397.72	\$ 267,838.14	\$ -	\$ -	\$ 96,559.58	\$ -
Ostego	\$ 163,943.00	\$ 346,464.00	\$ -	\$ -	\$ 32,564.00	\$ 799,097.00	\$ 163,943.00	\$ 346,464.00	\$ -	\$ -	\$ 288,690.00
Ottawa	\$ 569,063.00	\$ -	\$ 4,615,937.27	\$ -	\$ 666,057.80	\$ 5,438,090.47	\$ 569,063.00	\$ -	\$ 4,615,937.27	\$ -	\$ 253,090.20
Presque Isle	\$ 148,863.00	\$ 271,656.84	\$ -	\$ -	\$ 418,519.84	\$ 371,440.21	\$ 371,440.21	\$ -	\$ -	\$ -	\$ -
Roscommon	\$ 164,457.00	\$ -	\$ 845,777.60	\$ -	\$ 54,209.98	\$ 1,077,114.06	\$ 164,457.00	\$ -	\$ 858,447.08	\$ -	\$ 54,209.98
Saginaw	\$ 463,548.00	\$ 5,329,403.00	\$ -	\$ -	\$ 1,560.00	\$ 6,715,724.00	\$ 5,792,951.00	\$ -	\$ -	\$ -	\$ 922,773.00
Sanilac	\$ 203,119.00	\$ 176,169.82	\$ 337,929.90	\$ 250,282.32	\$ 4,800.00	\$ 806,061.28	\$ 203,119.00	\$ 176,169.82	\$ 171,690.14	\$ 250,282.32	\$ 4,800.00
Schoolcraft	\$ 139,118.00	\$ 28,827.00	\$ -	\$ -	\$ 1,442.00	\$ 159,593.00	\$ 159,593.00	\$ -	\$ -	\$ -	\$ -
Shiawasee	\$ 237,541.00	\$ 1,779,032.23	\$ -	\$ -	\$ 4,376.81	\$ 1,746,922.77	\$ 237,541.00	\$ 1,505,004.96	\$ -	\$ -	\$ 4,376.81
St. Clair	\$ 401,981.00	\$ 1,038,549.97	\$ -	\$ 762,774.52	\$ 15,549.77	\$ 2,218,855.26	\$ 401,981.00	\$ 1,038,549.97	\$ -	\$ 762,774.52	\$ 15,549.77
St. Joseph	\$ 233,280.00	\$ -	\$ 1,395,154.00	\$ -	\$ 352,964.00	\$ 1,748,118.00	\$ -	\$ -	\$ 1,395,154.00	\$ -	\$ 352,964.00
Tuscola	\$ 224,037.00	\$ 1,107,096.01	\$ -	\$ -	\$ 25,532.24	\$ 1,192,532.09	\$ 1,192,532.09	\$ -	\$ -	\$ -	\$ -
Van Buren	\$ 246,424.00	\$ 1,344,873.36	\$ -	\$ -	\$ 6,546.49	\$ 1,234,764.97	\$ 246,424.00	\$ 988,340.97	\$ -	\$ -	\$ -
Washtenaw	\$ 703,361.00	\$ 1,714,564.74	\$ -	\$ 6,827,184.87	\$ -	\$ 9,078,062.37	\$ 536,312.76	\$ 1,714,564.74	\$ -	\$ 6,827,184.87	\$ -
Wayne - Conf. of Western Wayne	\$ 1,079,596.00	\$ 2,656,440.00	\$ -	\$ 12,679,177.00	\$ -	\$ 16,415,213.00	\$ 1,079,596.00	\$ 2,656,440.00	\$ -	\$ 12,679,177.00	\$ -
Wayne - Conf. of Eastern Wayne	\$ 125,980.81	\$ 257,647.48	\$ 383,629.25	\$ 985,494.82	\$ -	\$ 1,752,752.36	\$ 125,980.81	\$ 257,647.48	\$ 383,629.25	\$ 985,494.82	\$ -
Wayne - Downriver Mutual Aid	\$ 1,804,608.67	\$ -	\$ -	\$ 3,242,718.94	\$ -	\$ 5,143,559.31	\$ 1,900,840.47	\$ -	\$ -	\$ 3,242,718.94	\$ -
Wayne - Detroit Service District	\$ 1,215,607.87	\$ 3,002,493.21	\$ -	\$ 12,724,006.84	\$ -	\$ 17,697,627.87	\$ 1,215,607.87	\$ 3,002,493.21	\$ -	\$ 12,724,006.84	\$ 755,519.95
Wexford	\$ 90,271.00	\$ 699,174.02	\$ -	\$ -	\$ 11,100.80	\$ 846,787.00	\$ 90,271.00	\$ 699,174.00	\$ -	\$ -	\$ 57,342.00
TOTAL	\$ 27,824,374.21	\$ 81,917,828.32	\$ 38,396,100.65	\$ 92,274,641.06	\$ 22,950,460.06	\$ 249,977,760.58	\$ 54,513,077.80	\$ 54,169,323.15	\$ 36,690,588.30	\$ 90,327,027.96	\$ 14,277,743.37

Appendix D
Distribution of Emergency 911 Funds to Counties
Equal and Per Capita
Includes payments: January – December 2018

County	Net Payment
Alcona	\$ 143,008
Alger	140,885
Allegan	302,075
Alpena	172,547
Antrim	163,018
Arenac	150,857
Baraga	139,711
Barry	219,373
Bay	296,317
Benzie	153,431
Berrien	373,966
Branch	197,325
Calhoun	341,244
Cass	208,480
Charlevoix	166,770
Cheboygan	167,090
Chippewa	186,673
Clare	174,650
Clinton	245,036
Crawford	147,966
Delta	184,374
Dickinson	167,116
Eaton	296,299
Emmet	177,448
Genesee	799,837
Gladwin	166,362
Gogebic	151,693
Grand Traverse	263,409
Gratiot	192,936
Hillsdale	199,605
Houghton	183,677
Huron	178,119
Ingham	570,425
Ionia	226,865
Iosco	166,671
Iron	144,394
Isabella	237,008
Jackson	379,405
Kalamazoo	522,033
Kalkaska	152,842
Kent	1,079,816
Keweenaw	129,097

County	Net Payment
Lake	\$ 143,954
Lapeer	265,520
Leelanau	160,055
Lenawee	283,843
Livingston	412,209
Luce	136,183
Mackinac	143,279
Macomb	1,457,205
Manistee	164,844
Marquette	231,887
Mason	171,134
Mecosta	193,447
Menominee	163,730
Midland	258,093
Missaukee	149,195
Monroe	366,379
Montcalm	225,973
Montmorency	141,144
Muskegon	398,309
Newaygo	202,411
Oakland	2,029,383
Oceana	167,753
Ogemaw	160,039
Ontonagon	136,418
Osceola	162,935
Oscoda	139,364
Otsego	163,943
Ottawa	543,360
Presque Isle	146,863
Roscommon	164,394
Saginaw	442,611
Saint Clair	383,825
Saint Joseph	222,731
Sanilac	193,946
Schoolcraft	139,118
Shiawassee	237,541
Tuscola	213,919
Van Buren	246,424
Washtenaw	671,593
Wayne	3,008,320
Wexford	177,514
TOTAL	\$ 26,080,641

Michigan 9-1-1 County Surcharges

As Compiled by Michigan Public Service Commission Staff

Rates Effective 7/1/2019 - Posted 6/11/2019

For questions contact Josh McConkie at McConkieJ@Michigan.Gov

County	Technical Charge: Recurring*	Technical Charge: Nonrecurring*	County Charge**	Total
Alcona	\$0.48	\$0.02	\$3.00	\$3.50
Alger	\$0.48	\$0.02	\$0.42	\$0.92
Allegan	\$0.48	\$0.02	\$3.00	\$3.50
Alpena	\$0.48	\$0.02	\$3.00	\$3.50
Antrim	\$0.48	\$0.02	\$ -	\$0.50
Arenac	\$0.48	\$0.02	\$0.42	\$0.92
Baraga	\$0.48	\$0.02	\$0.42	\$0.92
Barry	\$0.48	\$0.02	\$ -	\$0.50
Bay	\$0.48	\$0.02	\$ -	\$0.50
Benzie	\$0.48	\$0.02	\$3.00	\$3.50
Berrien	\$0.48	\$0.02	\$0.42	\$0.92
Branch	\$0.48	\$0.02	\$0.42	\$0.92
Calhoun	\$0.48	\$0.02	\$0.60	\$1.10
Cass	\$0.48	\$0.02	\$1.39	\$1.89
Charlevoix	\$0.48	\$0.02	\$0.61	\$1.11
Cheboygan	\$0.48	\$0.02	\$0.61	\$1.11
Chippewa	\$0.48	\$0.02	\$1.50	\$2.00
Clare	\$0.48	\$0.02	\$1.00	\$1.50
Clinton	\$0.48	\$0.02	\$2.75	\$3.25
Crawford	\$0.48	\$0.02	\$2.35	\$2.85
Delta	\$0.48	\$0.02	\$0.80	\$1.30
Dickinson	\$0.48	\$0.02	\$0.68	\$1.18
Eaton	\$0.48	\$0.02	\$1.75	\$2.25
Emmet	\$0.48	\$0.02	\$0.61	\$1.11
Genesee	\$0.48	\$0.02	\$1.86	\$2.36
Gladwin	\$0.48	\$0.02	\$0.51	\$1.01
Gogebic	\$0.48	\$0.02	\$1.50	\$2.00
Grand Traverse	\$0.48	\$0.02	\$1.85	\$2.35
Gratiot	\$0.48	\$0.02	\$3.00	\$3.50
Hillsdale	\$0.48	\$0.02	\$2.50	\$3.00
Houghton	\$0.48	\$0.02	\$1.10	\$1.60
Huron	\$0.48	\$0.02	\$2.20	\$2.70
Ingham	\$0.48	\$0.02	\$1.80	\$2.30
Ionia	\$0.48	\$0.02	\$2.30	\$2.80
Iosco	\$0.48	\$0.02	\$0.20	\$0.70
Iron	\$0.48	\$0.02	\$2.70	\$3.20
Isabella	\$0.48	\$0.02	\$3.00	\$3.50
Jackson	\$0.48	\$0.02	\$1.50	\$2.00
Kalamazoo	\$0.48	\$0.02	\$0.42	\$0.92
Kalkaska	\$0.48	\$0.02	\$2.52	\$3.02
Kent	\$0.48	\$0.02	\$1.15	\$1.65
Keweenaw	\$0.48	\$0.02	\$ -	\$0.50
Lake	\$0.48	\$0.02	\$ -	\$0.50
Lapeer	\$0.48	\$0.02	\$1.55	\$2.05
Leelanau	\$0.48	\$0.02	\$0.42	\$0.92

County	Technical Charge: Recurring*	Technical Charge: Nonrecurring*	County Charge**	Total
Lenawee	\$0.48	\$0.02	\$3.00	\$3.50
Livingston	\$0.48	\$0.02	\$1.85	\$2.35
Luce	\$0.48	\$0.02	\$0.99	\$1.49
Mackinac	\$0.48	\$0.02	\$1.48	\$1.98
Macomb	\$0.48	\$0.02	\$ -	\$0.50
Manistee	\$0.48	\$0.02	\$ -	\$0.50
Marquette	\$0.48	\$0.02	\$ -	\$0.50
Mason	\$0.48	\$0.02	\$2.09	\$2.59
Mecosta	\$0.48	\$0.02	\$2.25	\$2.75
Menominee	\$0.48	\$0.02	\$2.12	\$2.62
Midland	\$0.48	\$0.02	\$ -	\$0.50
Missaukee	\$0.48	\$0.02	\$3.00	\$3.50
Monroe	\$0.48	\$0.02	\$2.00	\$2.50
Montcalm	\$0.48	\$0.02	\$2.85	\$3.35
Montmorency	\$0.48	\$0.02	\$3.00	\$3.50
Muskegon	\$0.48	\$0.02	\$2.75	\$3.25
Newaygo	\$0.48	\$0.02	\$3.00	\$3.50
Oakland	\$0.48	\$0.02	\$0.42	\$0.92
Oceana	\$0.48	\$0.02	\$2.09	\$2.59
Ogemaw	\$0.48	\$0.02	\$1.38	\$1.88
Ontonagon	\$0.48	\$0.02	\$0.51	\$1.01
Osceola	\$0.48	\$0.02	\$2.25	\$2.75
Oscoda	\$0.48	\$0.02	\$0.45	\$0.95
Otsego	\$0.48	\$0.02	\$1.72	\$2.22
Ottawa	\$0.48	\$0.02	\$ -	\$0.50
Presque Isle	\$0.48	\$0.02	\$2.00	\$2.50
Roscommon	\$0.48	\$0.02	\$ -	\$0.50
Saginaw	\$0.48	\$0.02	\$2.65	\$3.15
Sanilac	\$0.48	\$0.02	\$0.44	\$0.94
Schoolcraft	\$0.48	\$0.02	\$0.42	\$0.92
Shiawassee	\$0.48	\$0.02	\$2.65	\$3.15
St. Clair	\$0.48	\$0.02	\$0.60	\$1.10
St. Joseph	\$0.48	\$0.02	\$0.42	\$0.92
Tuscola	\$0.48	\$0.02	\$2.03	\$2.53
Van Buren	\$0.48	\$0.02	\$1.92	\$2.42
Washtenaw	\$0.48	\$0.02	\$0.43	\$0.93
Wayne:				
Detroit Emergency	\$0.48	\$0.02	\$0.42	\$0.92
Downriver	\$0.48	\$0.02	\$0.42	\$0.92
Wayne, Conf. East	\$0.48	\$0.02	\$0.42	\$0.92
Wayne, Conf. West	\$0.48	\$0.02	\$0.42	\$0.92
Wexford	\$0.48	\$0.02	\$2.25	\$2.75

NOTE:

Per PA 51 of 2018, the state 9-1-1 charge is set at \$0.25.

This charge is also to be included on customer bills and remitted to Michigan Department of Treasury.

*The Technical Charge is calculated by a third party accounting firm.

**The County Charges are reported by the counties.

The Status of the State 911 Committee Legislative Proposal for Michigan 911

In June of 2016, the State 911 Committee (SNC) adopted a set of legislative recommendations for the Michigan Legislature. Those recommendations were formally submitted to the Legislature as part of the SNC's Annual Report to the Legislature in August of 2016. In May of 2017, those recommendations were introduced as Senate Bill 400 and House Bill 4651. Senate Bill 400 was moved through the legislative process during this legislative session, and it was signed into law as Public Act 51 of 2018 by Governor Snyder on March 6, 2018.

There were some changes to the SNC's original recommendations as the bill made its way through the legislative process. The key aspects of those recommendations remained intact and the new statute will facilitate the continued deployment of Next Generation 911 (NG911) in Michigan. Key changes in the 911 statute include a 911 fee increase on both postpaid and prepaid services that will generate the needed funding to move the entire state to a digital NG911 network. NG911 will allow for greater technical advancements in 911. Additional features in Public Act 51 of 2018 include:

- 1) Makes the technical fee consistent across the State of Michigan, rather than county by county.
- 2) Provides the Michigan Public Service Commission (MPSC) with standing to take action if the 911 fees are not reported, charged, collected or remitted into the fund. It also requires the SNC to report instances of non-payment and provide the supporting documentation to MPSC for appropriate action.
- 3) Requires counties (not just PSAPs) to ascertain that the auditing of 911 funds is conducted. Also, it changes the State 911 Fund audit by the Office of the Auditor General from an annual to a biennial cycle.
- 4) Requires a case to be heard at the MPSC to establish a process for NG911 reimbursement for recurring and non-recurring network costs for IP-911 providers that meet the National Emergency Number Association (NENA) i3 standards for NG911.
- 5) Counties and 911 service districts seeking to have their IP-based 911 network costs reimbursed, by the State of Michigan under the act, will need to provide the MPSC with documentation that they have gone through a competitive bid process.
- 6) Allows a county or a service district to change 911 service providers in the 911 Plan by a board resolution.
- 7) Requires the MPSC to issue a report to the legislature and governor by December 1, 2020. The report must contain the following information:
 - The total costs incurred by counties or 911 service districts that have transitioned to an IP-based 911 service provider.
 - The estimated transition costs to be incurred by counties or 911 service districts that have not transitioned to an IP-based 911 service provider and the estimated dates for transition.
 - The estimated ongoing, annual costs of operating the 911 network after the transition to an IP-based 911 service provider has been completed by all counties or 911 service districts that chose to transition.
 - The current 911 funding system revenues as reported by the SNC.
 - The estimated costs of operating the IP-based 911 network.
- 8) Provides the State 911 Office with the funding levels to maintain its current level of services to the 911 community and to automate its processes.

- 9) Changes the distribution of the State 911 fees to reflect the increased revenue and costs for NG911 and creates a “spillover” provision requiring any revenue in excess of \$37 million to be directed to NG911. Projected fund increases with the changes in distributions are below:

Estimated annual prepaid at 5% =	\$22.4m annually (an increase of \$13.8m)
Estimated annual postpaid at \$0.25 =	\$26.4m annually (an increase of \$6.4m)
Total annual estimate =	\$48.8m annually (total increase of \$20.2m)

The figures below are for the distribution levels at \$37m annually, and the remainder above \$37m will go into the NG911 fund (see f. below).

- a. **New** 65% to counties (approx. \$24,050,000)
Now 82.5% to counties (approx. \$23,512,130)
- b. **New** 5.5% for training (approx. \$2,035,000)
Now 6% for training (approx. \$1,709,973)
- c. **New** 1.5% to MSP for regional 911 center (approx. \$555,000)
Now 1.88% to MSP for regional 911 center (approx. \$535,791)
- d. **New** 2.44% to State 911 Office (approx. \$902,800)
Now 1.87% to State 911 Office (approx. \$532,941)
- e. **New** 25.56% to MPSC Case No. U-14000 and NG911 MPSC Case No. U-20146 (approx. \$9,457,200)
Now 7.75% to MPSC Case No. U-14000 fund for wireless 911 (approx. \$2,208,715)
- f. **New** “spillover” the estimated funds above \$37m (approx. \$11,800,000).

Total for MPSC Case No. U-14000 and NG911 network under MPSC Case No. U-20146 (e + f) approx. \$21,257,200.

Next Generation 911 and Michigan

What is Next Generation 911?

Next Generation 911 -- known as NG911 in the public safety community -- is the future framework for 911 call delivery, an opportunity to upgrade the ability for people in distress to use modern technology and send data such as text messages and photos to help first responders more quickly locate people in need.

NG911 is a closed digital (IP-based) 911 network that is standards-based, scalable, secure, redundant, and built to meet the needs of public safety.

Why do we need to change to NG911?

- The current 911 system is reliable and effective, but it was designed for analog, voice-based landline calls.
- Communications technology has advanced dramatically, with new ways of transmitting information with mobile phones and other devices commonly carried by everyone from children to senior citizens. Public safety also needs to be able to take advantage of new data transmitted by these devices – including photos, videos, text messages, and web-based applications -- to better respond to people in need.
- The current 911 system is also limited in its ability to transfer calls from jurisdiction to jurisdiction, and to accommodate the advancing technologies and applications that are commonly used by people to receive information and communicate with one another. Which, in a very mobile society, is becoming increasingly important.
- To make this happen, changes are being made in technology, policy, and 911 communications management.

Benefits to upgrading to NG911

- Upgrades to the 911 system will allow Michigan residents access to 911 and public safety agencies using forms of communication and technology that are more robust, familiar, efficient, and easily accessible.
- Features such as sending texts, pictures, and videos through 911, will provide more information to first responders helping people in distress – this is only possible in a fully deployed NG911 environment.
- The upgrade will improve the ability to send callers' critical information such as on-scene accident information and special needs data from the 911 centers to emergency responders.
- NG911 will provide more opportunities for sharing data and for different systems and software applications to communicate, exchange data, and use information that has been exchanged.
- The upgrade also will mean increased network reliability and flexibility, such as:
 - Increased network reliability with improved network response times and redundant network infrastructure.
 - Direct connectivity for text-to-911.
 - Making it easier to transfer calls from one 911 center to another.
 - The ability to better route calls to additional locations to increase response levels in critical incidents and large-scale events.
 - Future ability to send photos of a crime in progress or the damage caused in a traffic crash along with a 911 call to the 911 center.

Status of IP-911 Deployments in Michigan

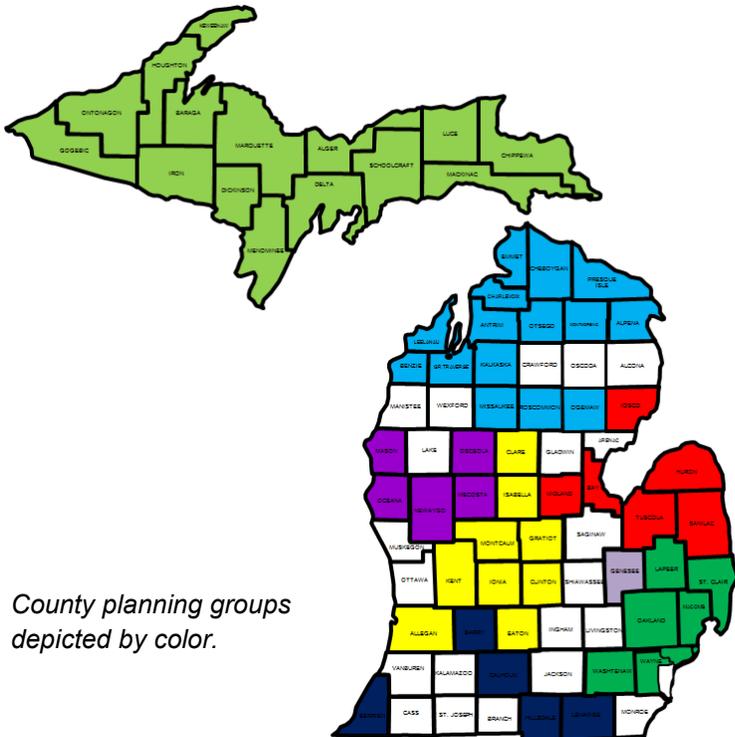
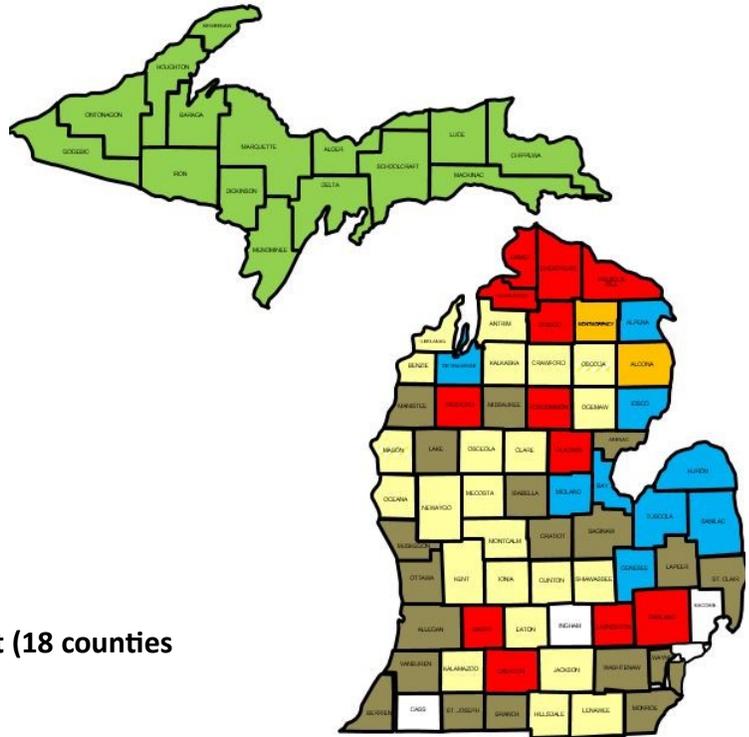
June 2019

Based on data that has been reported to the State 911 Office to date. All data is based on information available through current sources, including counties self-reporting through the SNC 301 forms.

IP Deployment Timeframes

Based on annual reporting data, 38 counties are currently receiving 911 calls via IP lines provided by Peninsula Fiber Network (PFN). An additional 41 counties plus two Wayne County service districts have agreements in place with PFN for future deployments.

- Deployed in 2015 (15 counties)
- Deployed in 2016 (9 counties)
- Deployed in 2017 (12 counties)
- Deployed in 2018 (2 counties)
- Deployment in process (23 counties)
- Agreement signed, unknown deployment (18 counties + 2 WCSD)

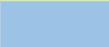


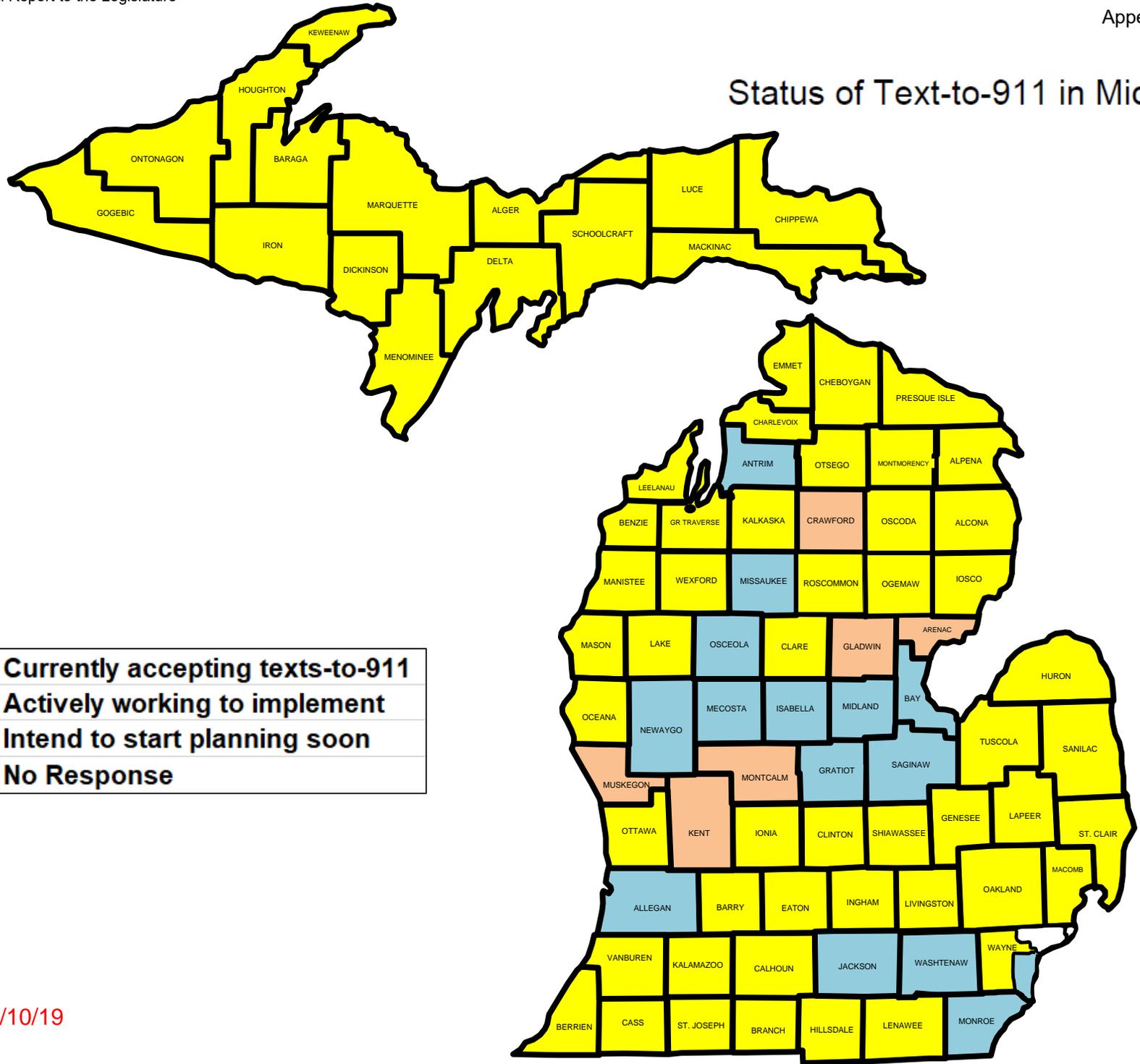
County planning groups depicted by color.

Regional Planning Groups

Currently, the State 911 Committee is aware of eight IP-911 planning groups within the state of Michigan. These groups vary in their level of structure and progress.

Status of Text-to-911 in Michigan

	Currently accepting texts-to-911
	Actively working to implement
	Intend to start planning soon
	No Response



As of 7/10/19

<p>State 911 Committee 2018 Annual Report to the Michigan Legislature OVERVIEW OF EMERGENCY 911 FUND (as of 12/31/18)</p>
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FUND	RECEIPTS	DISBURSEMENTS	BALANCE
CMRS	\$ 108,065,779.75	\$101,147,581.32	\$6,918,198.43
COUNTY	146,887,892.58	143,988,917.67	2,898,974.91
COUNTY/POP	220,357,019.87	216,005,887.51	4,351,132.36
TRAINING	25,624,498.85	24,301,335.50	1,323,163.35
MSP	1,956,624.43	1,956,624.43	0.00
MSP 911/ETSC Admin	8,452,458.12	8,413,740.56	38,717.56
MSP 911/Disp. Ctr	5,832,247.73	5,802,059.03	30,188.70
TREASURY Admin (1)	424,916.64	424,916.64	0.00
TOTALS	\$ 517,601,437.97	\$ 502,041,062.66	\$ 15,560,375.31

- (1) For FY 2012 through FY 2015, MCL 484.1408(6) authorized the Michigan Department of Treasury up to \$150,000 to fund a portion of the costs to administer the 9-1-1 Act. From FY 2012 through FY 2015, the Treasury Administration Fund revenue was transferred from the CMRS Fund.

GRETCHEN WHITMER
GOVERNOR



State of Michigan
STATE 911 COMMITTEE
LANSING

JEFF TROYER
CHAIR

June 12, 2019

Michigan State Senate
P.O. Box 30036
Lansing, Michigan 48909-7536

Michigan House of Representatives
P.O. Box 30014
Lansing, Michigan 48909-7514

Dear Members of the Michigan Senate and House of Representatives,

The State 911 Committee (SNC) of Michigan was established in accordance with P.A. 32 of 1986 to promote the successful development, implementation, and operation of 911 systems across the State of Michigan. Its 21 members represent local public safety, private industry, and state services. An important role of the SNC is to make recommendations and provide input to the Michigan Legislature on Public Policy impacting 911 in Michigan. Please accept this as the SNC's formal concerns on the proposed Newborn Safety Device legislation, House Bill 4523.

The SNC is committed to the health, safety and welfare of all citizens in Michigan. We support the concept of the newborn safety devices and understand the unfortunate need for them. The restriction to place the devices in hospitals, and not in other locations such as fire stations and police departments, is a sound restriction as other locations can present a myriad of issues. However, we do have concerns about the requirement on page 2 (lines 17 through 19) requiring an automatic 911 call be placed in the event an infant is put in one of the devices along with a notification to the hospital. There is also the additional language of concern in the bill that requires the device to be tested twice a day.

Automatic dialing of 911 is prohibited by statute under MCL 484.1207. A 911 call is normally used to generate a public safety response. A public safety response is not required or desired in these circumstances to allow for the safe and anonymous surrender of the infant. Furthermore, the twice daily testing of the device could potentially add more than 95,000 additional 911 calls to the system annually.

We appreciate the desire to have multiple alarms or notifications once an infant is placed in the device. Multiple notifications can be accomplished without the autodialing of 911, which is prohibited. For example, a hospital seeking to place a device could be required to have a 24/7 internal answering point such as a security office to receive the device notifications and/or alarms. The hospital could be required to have multiple means of notification such as the generation of an alarm and a phone notification to a 24/7 answering point within the hospital. Secondary notifications could be handled by an alarm notification to an alarm company where protocols for testing, activations, and response are set up with the hospital or by sending notification to a 24/7 answering point within the state agency responsible for the care and placement of the infants.

We hope you will consider our concerns, regarding HB 4523. Please feel free to contact the members of the SNC through the State 911 Administrator's Office at 517-243-2075.

Sincerely,

A handwritten signature in black ink, appearing to read "Jeff Troyer".

Jeff Troyer, Chair
Michigan State 911 Committee

Association of Public Safety Communications Officials • Commercial Mobile Radio Service • Department of Licensing and Regulatory Affairs
Department of State Police • Deputy Sheriff's Association • Fraternal Order of Police • Michigan Association of Ambulance Services
Michigan Association of Chiefs of Police • Michigan Association of Counties • Michigan Communications Directors Association
Michigan Association of Fire Chiefs • Michigan Professional Firefighters Union • Michigan Public Service Commission • Michigan Sheriff's Association Michigan
State Police Troopers Association • National Emergency Number Association • Telecommunications Association of Michigan • Upper Peninsula Emergency
Medical Services • Members of the general public appointed by the Governor, Speaker of the House, and Majority Leader of the Senate

GRETCHEN WHITMER
GOVERNOR



JEFF TROYER
CHAIR

State of Michigan
STATE 911 COMMITTEE
LANSING

June 12, 2019

Michigan State Senate
P.O. Box 30036
Lansing, Michigan 48909-7536

Michigan House of Representatives
P.O. Box 30014
Lansing, Michigan 48909-7514

Dear Members of the Michigan Senate and House of Representatives,

Please accept this as the State 911 Committee's (SNC) letter of concern regarding Section 97 of SB 146 for school safety funding. We will preface this by stating that the safety of children in our schools is paramount and that efforts to keep our state's children safe should be both effective and fiscally accountable.

Section 97 of SB 146 contains language for an appropriation for the pilot implementation of a panic button application on smart phones in schools. There is a combination of administrative, operational, and financial concerns that the SNC has with the language as listed below:

- The current payment language is merely tied to calendar dates and **not** actual performance or participation. This could lead to the vendor receiving payment even if no schools (or only a handful of them) were to implement this product:
 - The vendor is paid for the full appropriation regardless of actual participation. In fact, the vendor receives its first payment of \$2.5 million on October 1, 2019, prior to any deployments occurring.
 - It appears the vendor payments are not similar to those established for Rave Mobile Safety and its Smart911 product managed through a written statement of work (SOW) with the State 911 Administrative Office. Under the Smart 911 SOW, payment is tracked and tied to metrics for actual product deployment and participation in the program. There is no similar language allowing performance-based payments in Sec 97 of SB 146.
 - If the program is funded as a "pilot" project, what are the metrics for success, factors for improvement, or continuation?
 - Who reports on the above metrics, and who is responsible for the project management/administration?
 - How long is the pilot program good for? Annual project, biennial project? Sec. 97 of SB 146 is silent on these matters.
- Are all schools required to sign up for the same product or will multiple vendor solutions be funded? The payments indicate the appropriation is directed to a single vendor. There are similarly functional alerting products in the school safety market that other schools currently have.
- What is the definition of the "state's current supplemental 911 database"?
 - There is no existing state supplemental 911 database. If this is referring to an existing project involving Smart911, it should be noted that this is not the State's database, nor do all of Michigan's Public Safety Answering Points (PSAPs) participate in the Smart911 system.

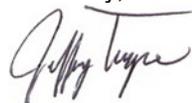
Association of Public Safety Communications Officials • Commercial Mobile Radio Service • Department of Licensing and Regulatory Affairs
Department of State Police • Deputy Sheriff's Association • Fraternal Order of Police • Michigan Association of Ambulance Services
Michigan Association of Chiefs of Police • Michigan Association of Counties • Michigan Communications Directors Association
Michigan Association of Fire Chiefs • Michigan Professional Firefighters Union • Michigan Public Service Commission • Michigan Sheriff's
Association Michigan State Police Troopers Association • National Emergency Number Association • Telecommunications Association of
Michigan • Upper Peninsula Emergency Medical Services • Members of the general public appointed by the Governor, Speaker of the House, and
Majority Leader of the Senate

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Michigan House of Representatives
June 12, 2019
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- Is there a Headlee issue involved if the local 911 centers are required to purchase Smart911 (a partner product) to optimize the panic button features, which includes the automatic display of facility information?
- Are the functionality requirements listed specific to the Rave Panic Button product?
 - If the intent of the pilot program and funding is to allow a school to choose a panic or emergency notification product, the list of functionality requirements need to be product neutral. This would allow a school to choose a product that works with their local needs, requirements and interfacing abilities with emergency contacts and local public safety.
 - If the intent of the pilot program and funding is to only allow the purchase of the Rave Panic Button product, the language requiring data from the application to “automatically appear to 911” is problematic. Not all PSAPs in Michigan have the Rave software, which would result in the notification being a voice 911 telephone call only. As currently written, the language creates false expectations and confusion.
- What is the definition of the “existing advanced 911 state contract”?
 - Is this referring to an existing project SOW with Rave Mobile Safety and the State 911 Office for a past appropriation? It should be noted that the existing project is not a State contract, but the terms of work with payment are tied to performance and actual deployments. Also, the SOW for SMART911 is for a narrow scope of work that does not include the elements listed in Sec. 97 of SB 146.
- Is there a procurement process involved? There are several vendors/companies that provide school alerting systems through smartphone apps, and there are opportunities to prevent a “one size fits all” approach to implementing an alerting system for schools.

We hope you will consider our questions and concerns, both fiscally and operationally regarding Section 97 of SB 146. Please feel free to contact the members of the SNC through the State 911 Administrator’s Office at 517-243-2075.

Sincerely,



Jeff Troyer, Chair
Michigan State 911 Committee

Allowable/Disallowable Usage of 911 Surcharge Funds

ALLOWABLE 911 SURCHARGE FUNDS 911 SURCHARGE EXPENDITURES

Personnel Costs directly attributable to the delivery of 911 service (i.e. directors, supervisors, dispatchers, call-takers, technical staff, support staff):

Salaries	MSAG Coordination
Uniforms	Addressing/Database
Fringe Benefits	EAP

Note: If 911 staff serves dual functions (i.e. a director who is also in charge of Emergency Management, a dispatcher who is also a police officer) then only those portions of personnel costs attributable to their 911 functions should be allowable.

Facility Costs of the dispatch center directly attributable to the delivery of 911 service:

- Capital improvements for construction, remodeling, or expansion of dispatch center
- Electrical/Heat/AC/Water
- Fire Suppression System
- Cleaning, Maintenance, Trash Removal
- Telephone
- Generator/UPS and Grounding
- Insurance
- Office Supplies
- Printing and Copying
- Furniture

Note: If a shared facility, only those portions of facility costs attributable to the 911 functions should be allowable.

Training and Memberships directly related to 911 service:

- On the job training
- Vendor provided training
- Conferences
- Travel and lodging as necessary
- Membership in associations (APCO, NENA, etc.)

THE BELOW DISALLOWABLE EXPENSES ARE MEANT TO SERVE AS EXAMPLES ONLY – PLEASE REFER TO THE STATE 911 COMMITTEE APPEALS PROCESS FOR QUESTIONS.

Personnel Costs of law enforcement, fire, and EMS responders, emergency management staff, shared support or technical staff, except for portions of time directly functioning as 911 allowable staff.

Facility Costs of law enforcement, fire, EMS, emergency management, or other municipal facilities, except for that portion housing the 911 center or backup center, or leased to the 911 center for allowable training or meeting facilities.

Capital costs and furnishing for facilities for which the primary purpose is other than 911 (i.e. a conference room used primarily for the City Council but occasionally leased/loaned to the 911 center for meetings.)

Training for staff not involved directly in the delivery of 911 service, or for any staff for courses not directly attributable to 911 or dispatching services.

Memberships for staff not involved directly in the delivery of 911 service, or for associations with a primary purpose other than public safety communications (i.e. sheriff's associations, police or fire chief associations, etc.)

**ALLOWABLE 911 SURCHARGE FUNDS
911 SURCHARGE EXPENDITURES**

Hardware, software, connectivity, and peripherals directly attributable to the delivery of 911 service:

- Customer Premise Equipment
- Remote CPE Hardware/Modems
- Computer-Aided Dispatch
- Radio system (consoles, infrastructure, field equipment)
- LEIN costs for dispatch purposes
- Paging System, pagers, and related costs
- Voice logging equipment
- Mobile Data Systems
- GIS/Mapping Systems/AVL Systems
- Alarms/Security Systems
- Connectivity for any of the above
- Maintenance and service agreements of above
- Software licensing of the above
- Associated database costs

Vehicle costs (staff vehicle, pool car, mileage reimbursement, fuel, etc.) directly attributable to the delivery of 911 service:

Travel for meetings, training, conferences
Travel for MSAG verification and testing
Travel for 911 public education purposes

Professional Services

Attorneys	Consultants	Insurance
Architects	Auditor	

Public Information/Education Expenses directly attributable to the delivery of 911 service.

**DISALLOWED 911 SURCHARGE FUNDS
911 SURCHARGE EXPENDITURES**

Hardware, software, connectivity and peripherals not attributable to the delivery of 911 service:

- Law Enforcement Record Management Systems
- Fire Records Management Systems
- EMS Records Management Systems
- Jail Records Management Systems
- LEIN costs for non-911 functions (e.g., records unit)
- Word processing, databases, etc. not directly attributable to 911 service
- GIS not directly related to the delivery of 911 service
- Court Information Systems
- Connectivity for any of the above
- Maintenance and service agreements for any of the above
- Software licensing for any of the above
- Non-Emergency 911 systems

Vehicle costs (fleet vehicle, pool car, mileage reimbursement, etc.) for law enforcement, fire, or EMS responders, such as patrol cars, fire apparatus, ambulances, etc.

Professional Services not directly attributable to the delivery of 911 service.

Public Information not directly attributable to the delivery of 911 service.

Miscellaneous:

Road signs/Addressing Implements

**Emergency Telephone Service Committee
6/21/2005**

**State 911 Committee revised
6/23/2009**

Dispatcher Training Fund Program

The Public Safety Answering Point (PSAP) training fund was created when Public Act No. 32 of 1986 was amended by Public Act No. 78 of 1999. As provided by Public Act No. 78 of 1999, the purpose of the Dispatcher Training Fund Program is to distribute training funds to eligible PSAPs for training 911 center personnel. The funds may be expended only for training expenditures approved by the State 911 Committee (SNC). A list of approved courses is published by the State 911 Office and is available on the SNC's website at www.michigan.gov/snc.

Public Act No. 165 provides that the SNC, "shall semi-annually authorize the distribution of money from the fund to eligible public safety agencies or counties." The SNC has established guidelines for eligible PSAPs and requires an annual application to establish or maintain eligibility to receive the semi-annual distributions from the Dispatcher Training Fund. Eligibility requirements include:

- Application
- Eligible PSAP (be a primary PSAP)
- Identification of personnel – date of hire
- Report of expenditures
- Internal accounting

Funds distributed under this program shall be expended by the PSAP for approved training within two calendar years following the year of distribution. For example, funds distributed in the calendar year 2018 would need to be expended by December 31, 2020.

If funds are not expended within the two-year time frame, the PSAP shall be ineligible to receive further distributions of training funds until the balance of funds from the preceding two-year time frame is expended. For example, if funds distributed in 2018 are not spent, the PSAP shall be ineligible for fund distributions during the calendar year 2021. Eligibility may be restored for the following year's distribution (2022) by utilizing the funds distributed during the years older than the two-year time frame.

If a PSAP is unable to spend down its training money within the allotted two-year period, the PSAP may return the excess money to the Dispatcher Training Fund by December 31 of that year, to qualify for the next year's funds.

Any funds not expended within five years must be returned to the Dispatcher Training Fund. For example, funds received by the PSAP in 2018 and not spent by December 31, 2022, must be returned for re-deposit into the Dispatcher Training Fund.

Dispatcher Training Funds shall be distributed to eligible PSAPs based on the number of full-time equivalent (FTE) 911 personnel employed. Each 2,080 hours worked by full-time and part-time personnel shall be treated as one FTE. The number of eligible PSAP FTEs shall be determined by dividing the total number of paid hours worked by 2,080 and then rounding to the whole number.

The distribution of PSAP training funds is calculated by the Michigan Department of Treasury at the time of the distribution. Distributions to eligible recipient PSAPs are determined by dividing the available funds by the total number of FTE's statewide to determine the FTE distribution rate. The FTE distribution rate is then multiplied by the number of FTE's for each eligible PSAP to determine the PSAP distribution.

Distributions come from the State 911 Fund, which is a mix of prepaid surcharge and the 25-cent state charge. Of those funds, 5.5% is designated for the training funds. Distributions are made in the spring for revenues collected in the last six months of the previous calendar year and in the fall for revenues collected in the first six months of the current calendar year.

**Information for this summary was obtained from the Dispatcher Training Fund Guidelines, which can be found in its entirety on the SNC website at www.michigan.gov/snc.*

ALLOWABLE/DISALLOWABLE USAGE OF FUNDS FOR TRAINING

BY WAY OF EXAMPLE, BUT NOT LIMITATION, THE FOLLOWING COSTS ARE ALLOWABLE OR DISALLOWABLE FUNDS FOR TRAINING (as approved by the State 9-1-1 Committee on 6/8/16):

ALLOWABLE 9-1-1 SURCHARGE EXPENDITURES FOR TRAINING FUNDS

Salaries and travel expenses - Allowed

Actual wages incurred after January 1, 2007 including overtime, not including benefits, of eligible Primary PSAP personnel to attend State 9-1-1 Committee approved training courses (either attendee wages OR backfill employee wages), including the hours of travel to and from the approved training and the hours of the approved course. Documentation of overtime wage use must be kept on site.

Travel expenses to attend approved training in-State or out-of-state for states/provinces adjacent to Michigan (Ohio, Indiana, Wisconsin, Ontario, Illinois, Minnesota) meals, mileage, lodging, parking, etc.

Salaries of instructors for time spent presenting approved 9-1-1 center personnel training.

Reasonable travel expenses for instructors (meals, mileage, lodging, parking, etc).

Flat rate fee or tuition paid to a training provider for presenting approved 9-1-1 center personnel training.

Facilities, Equipment, Supplies - Allowed

Reasonable rental costs for use of the training facilities for the express purpose of conducting approved 9-1-1 center personnel training.

Meal, beverage, and snack expenses provided to trainees during the training.

The cost of purchasing or leasing training materials, including the following: texts, bulletins, tests, writing materials, slides, films, video tapes, and other materials used to assist the eligible trainees in understanding training topics presented as part of State 9-1-1 Committee approved training.

DISALLOWABLE 9-1-1 SURCHARGE EXPENDITURES FOR TRAINING FUNDS

Salaries and travel Expenses – Not Allowed

Monetary incentives, bonuses or awards for completion of training.

Out-of-state travel expenses to states/provinces not adjacent to Michigan unless otherwise specifically approved by the State 9-1-1 Committee's Dispatcher Training Subcommittee.

No reimbursement for PSAP personnel used as trainers in their own PSAP.

Unreasonable travel expense

Facilities, Equipment, Supplies – Not Allowed

Alcoholic beverages

Computer software to be used operationally (i.e. EMD protocol software, CAD software, etc.); computer hardware; any capital investment such as pre-employment testing equipment or simulated console equipment.

ALLOWABLE/DISALLOWABLE USAGE OF FUNDS FOR TRAINING

Training Sessions - Allowed

State 9-1-1 Committee approved in-state courses including interactive on-line courses and self-paced CD/DVD Courses.

Out-of-state State 9-1-1 Committee approved courses. All approved expenses are allowed if state/province is adjacent to Michigan (i.e. Ohio, Indiana, Wisconsin, Ontario, Illinois, Minnesota). Only tuition is allowed for states/provinces not adjacent to Michigan unless otherwise specifically pre-approved by State 9-1-1 Committee's Dispatcher Training Subcommittee.

State 9-1-1 Committee approved conferences (trainees must attend at least 6 hours of approved courses at the conference within a 24 hour time frame).

Eligible personnel may retake classes as needed.

Training Sessions - Not Allowed

Expired courses, even if previously State 9-1-1 Committee approved.

Out-of-state travel expenses to states/provinces not adjacent to Michigan unless otherwise specifically pre-approved by State 9-1-1 Committee's Dispatcher Training Subcommittee.

Conferences that are not State 9-1-1 Committee pre-approved.

PSAP Payment History for Training Fund

NAME	2014	2015	2016	2017	2018
Alcona County 911	8,916.00	8,735.00	7,407.00	8,391.00	7,781.00
Alger County E911	3,343.00	1,092.00	1,852.00	1,048.00	1,945.00
Allegan County Central Dispatch	-	21,838.00	18,519.00	22,026.00	17,507.00
Alpena County Central Dispatch	12,259.00	10,919.00	9,259.00	10,489.00	9,726.00
Antrim County Central Dispatch Center	10,031.00	9,827.00	8,334.00	8,391.00	7,781.00
Arenac County Central Dispatch	11,145.00	10,919.00	9,259.00	10,489.00	-
Barry County Central Dispatch	15,602.00	16,378.00	14,815.00	16,781.00	15,562.00
Bay County 911 Central Dispatch	25,632.00	25,113.00	21,296.00	23,075.00	21,399.00
Benzie County Sheriff Department	10,031.00	9,827.00	8,334.00	8,391.00	7,781.00
Berkley Department of Public Safety	-	5,460.00	4,629.00	-	2,918.00
Berrien County Sheriff's Department	-	-	-	-	35,015.00
Birmingham Police Department	10,031.00	10,919.00	9,259.00	10,489.00	9,726.00
Bloomfield Hills Public Safety Department	5,573.00	4,368.00	4,629.00	5,244.00	4,863.00
Bloomfield Township Police Department	14,488.00	14,194.00	12,037.00	14,684.00	12,644.00
Branch County 911/Central Dispatch	-	-	-	-	-
Brownstown Police Department	-	-	-	-	3,891.00
Calhoun County Consolidated Disp Authority	35,663.00	36,032.00	29,629.00	31,466.00	30,152.00
Canton Township Department of Public Safety	-	-	15,741.00	19,929.00	17,507.00
Cass County Sheriff Department	10,031.00	10,919.00	9,259.00	10,489.00	9,726.00
CCE Central Dispatch Authority	23,404.00	22,929.00	18,519.00	19,929.00	17,507.00
Center Line Public Safety Department	-	4,368.00	3,704.00	4,196.00	-
Central Michigan University	7,801.00	7,643.00	6,481.00	6,293.00	6,809.00
Chelsea Police Department	4,458.00	4,368.00	3,704.00	4,196.00	3,891.00
Chesterfield Twp Police Department	7,801.00	-	-	-	7,781.00
Chippewa County Central Dispatch	14,488.00	14,194.00	12,963.00	13,635.00	12,644.00
Clare County Central Dispatch	11,145.00	10,919.00	10,185.00	11,537.00	9,726.00
Clay Township Police Department	5,573.00	5,460.00	3,704.00	4,196.00	4,863.00
Clinton County Central Dispatch	16,716.00	15,286.00	12,963.00	15,733.00	14,590.00
Crawford Emergency Central Dispatch	-	-	-	7,342.00	5,836.00
Dearborn Police Department	20,060.00	17,470.00	15,741.00	18,879.00	20,425.00
Dearborn Heights Police Department	-	-	-	10,489.00	6,809.00
Delta County Central Dispatch	10,031.00	9,827.00	7,407.00	9,440.00	8,754.00
Detroit Emergency Telephone District	-	-	114,814.00	-	146,870.00
Dickinson County Central Dispatch	11,145.00	10,919.00	9,259.00	9,440.00	9,726.00
Downriver Central Dispatch (Wyandotte)	13,374.00	-	12,037.00	-	10,699.00
Eastern Michigan University Police Department	10,031.00	9,827.00	7,407.00	-	-
Eaton County Central Dispatch	24,518.00	24,021.00	21,296.00	25,173.00	22,371.00
Ecorse Police/Ecorse Fire	-	-	-	-	-
Farmington Hills Police Department	-	-	15,741.00	17,831.00	17,507.00
Fenton Police Department	4,458.00	5,460.00	5,556.00	5,244.00	4,863.00
Ferndale Police Department	5,573.00	-	-	-	-
Flat Rock Police Department	-	-	-	-	-
Fraser Department of Public Safety	-	6,551.00	5,556.00	6,293.00	2,297.00
Genesee County 911 Authority	45,693.00	42,583.00	45,370.00	60,834.00	55,441.00
Gilbralter Police Department	-	4,368.00	3,704.00	4,196.00	3,891.00
Gladwin County Central Dispatch	12,259.00	10,919.00	9,259.00	10,489.00	9,726.00
Grand Rapids Police Department	49,036.00	49,135.00	45,370.00	44,052.00	37,934.00
Grand Traverse Central Dispatch	21,174.00	19,654.00	17,593.00	20,977.00	18,481.00
Gratiot County Central Dispatch	10,031.00	10,919.00	9,259.00	10,489.00	-

NAME	2014	2015	2016	2017	2018
Grosse Ile Township Police Department	5,573.00	-	4,629.00	-	4,863.00
Grosse Pointe Farms	-	6,551.00	6,481.00	7,342.00	6,809.00
Grosse Pointe Park DPS	4,458.00	-	3,704.00	-	-
Grosse Pointe Woods DPS	5,573.00	5,460.00	4,629.00	4,196.00	3,891.00
Hamtramck Police Department	2,229.00	-	926.00	1,048.00	3,891.00
Harper Woods Police Department	-	-	2,778.00	-	2,918.00
Hazel Park Police Department	-	-	-	3,146.00	2,918.00
Hillsdale County Central Dispatch	15,602.00	16,378.00	14,815.00	16,781.00	15,562.00
Huron County Central Dispatch	12,259.00	13,103.00	10,185.00	11,537.00	10,699.00
Huron Township Police-Fire	-	-	-	-	5,836.00
Ingham County Central Dispatch	65,753.00	62,238.00	55,555.00	59,785.00	52,524.00
Ionia County Central Dispatch	14,488.00	14,194.00	12,037.00	14,684.00	12,644.00
Iosco County Central Dispatch	12,259.00	12,011.00	11,111.00	11,537.00	10,699.00
Iron County 911	-	5,397.00	-	10,489.00	9,726.00
Isabella County Central Dispatch	14,488.00	14,194.00	12,037.00	13,635.00	13,618.00
Jackson County Central Dispatch	-	-	16,666.00	19,929.00	20,425.00
Kalamazoo County Sheriff Department	-	6,551.00	8,334.00	8,391.00	7,781.00
Kalamazoo DPS	21,174.00	19,654.00	17,593.00	18,879.00	16,535.00
Kalamazoo Township Police Department	5,573.00	5,460.00	4,629.00	4,196.00	3,891.00
Kalkaska County Central Dispatch	6,687.00	7,643.00	5,556.00	7,342.00	5,836.00
Kent County Sheriff Department	53,494.00	51,318.00	43,519.00	50,345.00	51,550.00
Lake County 911 Central Dispatch	12,259.00	13,103.00	10,185.00	11,537.00	8,754.00
Lapeer County Central Dispatch	20,060.00	19,654.00	15,741.00	18,879.00	16,535.00
Leelanau County 911	11,145.00	12,011.00	9,259.00	10,489.00	10,699.00
Lenawee County Sheriff Department	20,060.00	19,654.00	16,666.00	17,831.00	14,590.00
Livingston County 911 Central Dispatch	30,090.00	32,756.00	27,778.00	29,368.00	28,207.00
Livonia Police Department	-	13,103.00	12,037.00	12,587.00	10,699.00
Macomb County Sheriff's Department	32,320.00	40,400.00	49,073.00	61,883.00	56,413.00
Madison Heights Police Department	8,916.00	8,735.00	6,481.00	6,293.00	6,809.00
Manistee Co. 911 Central Dispatch	-	-	-	-	10,699.00
Marquette County Central Dispatch	12,259.00	14,194.00	12,037.00	13,635.00	12,644.00
Mason-Oceana 911	17,831.00	17,470.00	15,741.00	16,781.00	15,562.00
Meceola Consolidated Central Dispatch Authority	17,831.00	17,470.00	15,741.00	17,831.00	17,507.00
Menominee County 911	11,145.00	10,919.00	9,259.00	10,489.00	9,726.00
Michigan State Police	60,180.00	64,421.00	-	74,469.00	71,003.00
Midland County Central Dispatch Authority	20,060.00	19,654.00	15,741.00	17,831.00	16,535.00
Milan Police Department	4,458.00	5,460.00	4,629.00	4,196.00	3,891.00
Missaukee County Sheriffs Office	6,687.00	5,460.00	5,556.00	5,244.00	4,863.00
Monroe County Central Dispatch	23,404.00	22,929.00	19,444.00	22,026.00	22,371.00
Montcalm County Central Dispatch	20,060.00	18,562.00	16,666.00	18,879.00	15,562.00
Montmorency County 911 Sheriff Department	-	-	-	5,244.00	-
Muskegon Central Dispatch	32,320.00	33,849.00	27,778.00	33,564.00	31,125.00
Newaygo County 9-1-1 Central Dispatch	11,145.00	12,011.00	10,185.00	11,537.00	10,699.00
Niles Police Department	-	-	-	7,342.00	6,809.00
Northville Township Public Safety	-	10,919.00	9,259.00	10,489.00	8,754.00
Novi Police Department	13,374.00	12,011.00	9,259.00	-	11,672.00
Oak Park Department of Public Safety	5,573.00	5,460.00	4,629.00	6,293.00	5,836.00
Oakland County Sheriff Department	62,410.00	64,421.00	56,947.00	68,176.00	65,168.00
Ogemaw County Central Dispatch	11,145.00	9,827.00	9,259.00	10,489.00	9,726.00
Oscoda County Sheriff Department	-	-	-	-	3,891.00
Ottawa County Central Dispatch	36,778.00	38,216.00	33,333.00	38,808.00	36,961.00

NAME	2014	2015	2016	2017	2018
Plymouth Community Communications Center	-	12,011.00	10,185.00	11,537.00	10,699.00
Portage Department of Public Safety	11,145.00	12,011.00	11,111.00	12,587.00	11,672.00
Presque Isle County E-911	-	-	-	-	-
Redford Township Police Department	6,687.00	7,643.00	-	-	5,836.00
Richmond Police Department	5,573.00	5,460.00	4,629.00	5,244.00	4,863.00
River Rouge Police Department	-	-	-	3,146.00	-
Riverview Police Department	-	-	-	-	972.00
Rochester Police Department	5,573.00	4,368.00	3,704.00	4,196.00	4,863.00
Rockwood Police Department	4,458.00	-	-	-	-
Romeo Police Department	4,458.00	4,368.00	3,704.00	4,196.00	3,891.00
Romulus Police Department	-	-	-	-	4,863.00
Roscommon County Central Dispatch	13,374.00	13,103.00	11,111.00	11,537.00	10,699.00
Royal Oak Police Department	10,031.00	12,011.00	10,185.00	11,537.00	11,672.00
Saginaw County 911 Communications Auth.	42,349.00	40,400.00	34,259.00	38,808.00	37,934.00
Saline Police Department	10,031.00	4,368.00	3,704.00	4,196.00	3,891.00
Sanilac County Central Dispatch	-	9,827.00	8,334.00	9,440.00	9,726.00
SERESA	25,632.00	25,113.00	21,296.00	25,173.00	23,344.00
Shelby Township Police Department	11,145.00	10,919.00	10,185.00	11,537.00	11,672.00
Shiawassee County Central Dispatch	13,374.00	13,103.00	10,185.00	11,537.00	-
Southfield Department of Public Safety	18,946.00	19,654.00	15,741.00	18,879.00	15,562.00
St Clair County Central Dispatch	21,174.00	20,746.00	19,444.00	22,026.00	21,399.00
St. Joseph County Central Dispatch	18,946.00	16,378.00	14,815.00	15,733.00	14,590.00
Taylor Police Department	17,831.00	16,378.00	12,037.00	11,537.00	9,726.00
Trenton Police Department	-	-	-	-	5,836.00
Troy Police Department	21,174.00	24,021.00	18,519.00	19,929.00	16,535.00
Tuscola County Central Dispatch	13,374.00	12,011.00	11,111.00	11,537.00	10,699.00
University of Michigan Dept. of Public Safety	12,259.00	12,011.00	10,185.00	24,124.00	24,316.00
Utica Police Department	5,573.00	5,460.00	3,704.00	-	-
Van Buren County Central Dispatch	15,602.00	14,194.00	12,037.00	14,684.00	13,618.00
Van Buren Township Public Safety	-	-	8,334.00	9,440.00	9,726.00
Warren Police Department	-	24,021.00	19,444.00	22,026.00	20,425.00
Washtenaw Central Dispatch	36,778.00	34,940.00	29,629.00	31,466.00	29,180.00
Waterford Township Police Department	13,374.00	10,919.00	9,259.00	11,537.00	10,699.00
Wayne County Airport Authority	-	9,827.00	13,888.00	14,684.00	14,590.00
Wayne County Central Communications	-	-	-	-	-
West Bloomfield Police Department	13,374.00	14,194.00	11,111.00	11,537.00	12,644.00
Western Michigan University Police Department	-	4,368.00	3,704.00	4,196.00	3,891.00
Westland Police Department	23,404.00	22,929.00	18,519.00	19,929.00	19,453.00
Wexford County Sheriff/Central Dispatch	-	9,827.00	7,407.00	9,440.00	8,754.00
White Lake Township Police Department	6,687.00	6,551.00	5,556.00	6,293.00	5,836.00
Woodhaven Police Department	-	-	-	-	-

STATE OF MICHIGAN

STATE 911 PLAN



Compiled and Presented by the
Emerging Technology Subcommittee
Adopted by the State 911 Committee on June 12, 2019

June 12, 2019
REVISION
4.0

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1. EXECUTIVE SUMMARY

1.1 Background and Purpose Summary

Providing optimum 911 services for its citizens is a long-established priority for the state of Michigan. For more than 30 years, a collaboration of legislators, state and county personnel, Public Safety Answering Point (PSAP) agencies, and telecommunication providers have worked together to provide the necessary enhanced 911 framework. This framework is a multi-dimensional system composed of landline, wireless, and internet communication providers that allows delivery of 911 calls through a complex network of routers, switches, databases, and emergency dispatch communication centers. All parts of this network must be able to seamlessly integrate and interact with each other.

Just as 911 technology continues to evolve and change, the Michigan laws that determine the architectural network, 911 legislative and regulatory oversight, training standards, and funding mechanisms need to transform and adapt. The state statutes that provide 911 funding mechanisms will sunset in December 2021.¹ However, changes to Michigan's 911 funding stream and the subsequent impact on the continued migration from a legacy system to a Next Generation 911 (NG911) Internet-Protocol (IP) system remains a priority. The State 911 Plan is one more tool to help guide Michigan through the process by providing professional vision and leadership for a continuous migration to a NG911 system. The plan is designed to be used by all of the 911 stakeholders, state/county/local 911 authorities, and emergency communication centers. Local law enforcement, fire services, emergency medical service (EMS), Homeland Security, military officials, and State and Federal legislators may also utilize this planning aid.

Since the 1980s, Michigan has moved from receiving and processing wireline Enhanced 911 (E911) calls, through Enhanced Phase I and Phase II (wireless call processing and routing), through its deployment of Voice over Internet Protocol (VoIP) 911 calls, to its current deployment of NG911.

Soon, Michigan's 911 framework will have to provide access to public emergency services by any communication device in any format, both voice and data, including text messaging, video, photographs, and automatic crash notification. (A comprehensive feasibility study of NG911 [Internet Protocol IP-Based network] was completed by the Kimball Corporation in 2009.)

The State 911 Committee (SNC) requested that the Emerging Technology Subcommittee assist the State 911 Administrator in the development of the Plan. Since its approval in 2009, it has been updated in 2012, 2017, and this present iteration.

The State 911 Plan continues to identify and monitor Michigan's 911 goals and objectives. It is a "living document" that is updated as needed. Since the adoption of the State 911 Plan, the updates have identified a decrease in the number of Michigan PSAPs. Adoption of a statewide plan for the coordination and implementation of 911 allows Michigan to apply for Federal funds which allowed Michigan to receive matching funds for the Federal ENHANCE 911 Act Geographic Information System (GIS) grant in 2010. In 2019, Michigan will apply for Federal funds under the NG911 funding opportunity to further facilitate NG911 in Michigan.

Michigan's 911 service is enabled and governed by Public Act 32 of 1986² and its subsequent amendments. This Act created the State 911 Committee and provided the mechanism for the public/private collaboration of subject matter experts that have worked to identify and resolve numerous key 911 issues.³ Recommendations from the State 911 committee and its various subcommittees have been incorporated into several 911 statutes.⁴

¹ PA 379 of 2008 <http://legislature.mi.gov/documents/2007-2008/publicact/pdf/2008-PA-0379.pdf>

² PA 32 of 1986 <http://legislature.mi.gov/doc.aspx?mcl-act-32-of-1986>

³ MCL 484.1712

⁴ PA 249 of 2006 <http://legislature.mi.gov/documents/2005-2006/publicact/pdf/2006-PA-0249.pdf>

2. INTRODUCTION

This section will provide a brief background of Michigan's 911 system and an introduction to the 911 Plan and its purpose.

2.1 National Overview of the History and Background of 911

The concept of a nationwide emergency telephone number was first adopted in Great Britain in 1937. In 1967, in the United States, President Johnson's Commission on Law Enforcement and Administration of Criminal Justice recommended a nationally uniform three-digit emergency telephone number. In November of that year, the FCC met with the American Telephone and Telegraph Company (AT&T) and shortly thereafter AT&T announced it had reserved the numbers 911 for emergency use nationwide.

The nation's first 911 system was implemented by the Alabama Telephone Company in Haleyville, Alabama. On February 16, 1968, Alabama Speaker of the House, Rankin Fite, made the first 911 call from the Haleyville City Hall. Congressman Tom Bevill answered the call on a red telephone located in the police department.⁵

When 911 service was first introduced, 911 calls were sent to a single destination based on the caller's telephone exchange. Since there was little or no correlation between a telephone exchange boundary and the emergency responder's jurisdiction, a 911 call could end up at a PSAP that did not serve the caller's location. This early 911 service, now known as Basic 911, did not provide any telephone number or location information with the call. It was a voice service only; the caller had to provide his or her location and call back information.

Significant advancement in 911 technology occurred with the introduction of E911 in the 1980s. This level of service enabled a 911 call to be selectively routed to the PSAP serving the caller's location, and delivered that call with Automatic Number Identification (ANI) and Automatic Location Identification (ALI). Other features, such as selective transfer, further streamlined the call handling process.

The pace of change in telecommunications technology continues to increase rapidly. Voice over Internet Protocol (VoIP), text messaging, and picture messaging are being enthusiastically adopted by consumers for everyday communications – and these same consumers expect to be able to use these technologies to communicate with 911. Telecommunication changes in the devices and methods of accessing 911 services have become increasing mobile and digitally based. These changes necessitate the migration to a digitally-based 911 network that is adaptive to 911 activation from digital devices and has the ability to process increased location accuracy. At present, many states including Michigan are migrating to NG911.

2.2 Overview and Background of Michigan 911

In 1986, the Michigan Legislature enacted Public Act 32, also known as the Emergency Telephone Service Enabling Act and commonly referred to as PA 32 in the Michigan 911 community. While there had been 911 programs in several jurisdictions throughout the state, PA 32 facilitated the onset of enhanced 911 systems through the state. Public Act 32 set out several requirements for the establishment of 911 systems, including empowering counties as the local unit of government to enact the 911 plan and serve as 911 in the service districts⁶; provisions for the telephone service providers to recover recurring and non-recurring costs through a technical surcharge on the service subscribers and, minimally, system requirements for operational, managerial, technical, and fiscal considerations. The act also required that plans identify the PSAPs within the service district, public notice and hearing for the initial plan and subsequent changes to it, and provisions for units of government to "opt out" of participation in the plan. PA 32 also established the Emergency Telephone Service Committee⁷ to provide guidance on policy and technical issues regarding 911.

PA 32 has been amended a number of times since its inception in 1986; the most notable of those amendments included the following:

PA 29 of 1994:

⁵ Alabama Chapter of NENA website, "World's First 911 Call" <https://www.youtube.com/watch?v=M15p4rpYRbk>.

⁶ Wayne County is recognized by PA 32 as the exception, and it has four separate service districts. These service districts are: Conference of Western Wayne, Conference of Eastern Wayne, Detroit, and Downriver Mutual Aid.

⁷ PA 165 of 2007, removed the word "telephone" from the committee's title to reflect changing technology. It is now commonly known as the State 911 Committee (SNC).

- Permitted counties to enact operational surcharges by geographical boundaries of the county by commission vote⁸, ballot proposal⁹, or a combination of the two¹⁰.
- Gave powers of county commission to establish an emergency 911 district board for a consolidated dispatch and determine that board's scope of authority.

PA 78 of 1999:

- Imposed a surcharge on wireless devices for the purposes of implementing Phase I and II wireless 911.
- Established a cost recovery mechanism for wireless providers to deliver wireless 911.
- Set amounts for distribution of wireless surcharge to counties for costs of 911 service and to PSAPs for training dispatch personnel.

PA 244 of 2003:

- Set deadlines for counties to deploy Phase I and II wireless 911.
- Funded the State 911 Office.
- Set date to end cost recovery for wireless providers.

PA 164 & 165 of 2007:

- Changed local landline operational 911 surcharge to a local "all-device" surcharge.
- Changed statewide wireless 911 surcharge to a statewide "all-device" surcharge applicable to devices that access 911.
- Gave rulemaking to the Michigan Public Service Commission over Multi-Line Telephone Service (MLTS) location information, 911 dispatcher training, and standards for operational policies for PSAPs, and receipt and use of 911 funds.

PA 379 of 2008:

- Allowed county commissioners to put up to \$0.42 local "all-device" monthly surcharge by resolution and seek up to \$3.00 by ballot proposal modifying the similar provisions in PA 29 of 1994.

PA 269 of 2010:

- Allowed the use of \$1.7 million of the former CMRS funds to be used for matching funds for the ENHANCE 911 grant match to establish a statewide Geographical Information System (GIS) Repository for use by all PSAPs in the state to share GIS mapping data.

PA 260 of 2012:

- Requires a retailer to collect a prepaid wireless 911 surcharge at the point-of-sale at a rate of 1.92%.

PA 51 of 2018:

- Changed the State 911 fee on monthly-billed devices to \$0.25 and prepaid retail point of sale 911 fee to 5%.
- Revised the statutory distribution of state 911 funds to direct the bulk of the increased revenue towards funding NG911 in Michigan.
- Established the process for NG911 reimbursements for recurring and non-recurring network costs for NG911 providers.
- Required the Michigan Public Service Commission to issue a report to the legislature and governor in December 2020, on the status of NG911 in Michigan.

By October 2005, every county in the state of Michigan except for one had county wide enhanced 911 services, and by the end of 2005 all counties in the state were capable of processing wireless Phase II calls. In May 2008, the final county without enhanced 911 became fully enhanced with 911 service, making the state of Michigan fully capable of enhanced 911 for both landline and wireless 911.

In addition to the statewide delivery of enhanced 911 on both wireless and landline communications services, the 911 system in Michigan has also reached broad delivery of VoIP 911, telematics 911 routing, and an interim text-to-911 solution has been deployed in many counties. Even with this progress, changes in technology continue to be experienced by Michigan's 911 community. While the legacy Publicly Switched Telephone Network (PSTN) had been able to accommodate wireless and VoIP technologies through system adaptations, it does not have the

⁸ Up to 4% of the highest monthly base rate in the service district, not to exceed \$.80.

⁹ Up to 16% of the highest monthly base rate in the service district, not to exceed \$3.20.

¹⁰ Total not to exceed \$4.00.

capacity or functionality to accommodate digital communications. Evolving technologies and the expectations of the public to access 911 through those, including the speech and hearing impaired community that rely on data messages rather than voice, have made it clear that the legacy 911 network is no longer adequate.

The purpose of this plan is to outline the process toward a NG911 system capable of delivering and transferring a 911 call for help on any device that can initiate a 911 call within the state, through voice, data, or both. It is also the purpose of this plan to address operational issues that the State 911 Committee recognizes as key to the successful overall delivery of 911 in the state. It is the intent of the State 911 Committee to leverage all resources available to the 911 community to reach that end.

Those resources include: funding, through both state and federal sources; the utilization of impartial contracted services¹¹; and the long-standing collaborative system involving stakeholders at every level in the 911 community. Michigan's 911 history is a demonstration of progress and adaptability.

¹¹ Under PA 164 of 2007, MCL 484.1408(5) appropriated \$500,000 for a feasibility study for an IP-based 911 system in Michigan. In 2008, the state contracted with the Kimball Corp. to conduct that study. The final recommendations were presented to the State 911 Committee in December 2009. In March 2010, the contract with the Kimball Corp., was extended to include assistance with the development of a plan to migrate to a NG911 system.

3. CURRENT 911 ENVIRONMENT

3.1 Current Legislative and Regulatory Environment and Program Structure

The state-level 911 coordinating function is led by the State 911 Committee, which is a statutorily created committee under Michigan's Public Act 32 of 1986, as amended. The Committee is tasked with providing assistance in the implementation of 911 systems in Michigan.

Administrative support to the State 911 Committee is provided by the State 911 Administrator's Office located in the Michigan State Police (MSP) Field Support Bureau (FSB). The Committee may recommend technical and operational standards for PSAPs and model 911 systems, as well as provide assistance for the design, implementation and operation of those systems. The Committee does not have rulemaking authority. That authority rests with the Michigan Public Service Commission (MPSC), in consultation with the Committee, for the following specific 911 matters:

- Uniform policies, procedures, and protocols for 911 services in counties and PSAPs in the state.
- Training standards for PSAP personnel.
- Standards for the receipt and use of 911 funds.
- Requirements for multi-line telephone systems.

The mechanisms for coordinating the implementation of 911 system(s) and monitoring those operations and progress by the Committee include a diverse set of subcommittees. These subcommittees, which make recommendations to the Committee, draw from both the public and private sectors of the 911 community in Michigan. The subcommittees include Emerging Technology, Certification, Dispatcher Training, Policy, and Legislative Action. Subcommittees often utilize additional work groups for matters requiring more specific technical and policy input. Participation in these groups is guided by the Committee by-laws. Subcommittee meetings are posted in advance, are open to the public, and work group participation is active and encouraged. Activity of the Committee and its subcommittees are posted on the State 911 Committee website at www.michigan.gov/snc.

All PSAPs have methods of access to communication to coordinate and operate together; examples of this include data, telephony, and radio. Radio communications between PSAPs are varied. In some areas of the state there are high levels of radio interoperability between PSAPs and in others areas radio interoperability has not been achieved. Currently there are efforts in these areas of the state to achieve interoperability.

Michigan has recently updated its 911 statute (PA 51 of 2018) recognizing that NG911 funding and standards were needed in order to continue to progress on the NG911 system in Michigan. An annual report on the status of Michigan 911 is presented to the legislature each year, as well as legislative recommendations which may need to be considered in the forthcoming year.

3.2 Current 911 Technology

3.2.1 Overview

Michigan currently has four 911 Service Providers which may change as NG911 is deployed.

- AT&T – providing services via the Selective Router (Legacy CAMA Trunks) in the Lower Peninsula only.
- Frontier Communications – providing services via the Selective Router (Legacy CAMA Trunks) in the Lower Peninsula only
- Peninsula Fiber Network, LLC (PFN) – providing services via IP Switches (NG 911) in the Upper Peninsula.
- Peninsula Fiber Network Next Generation Services, LLC (PFNNGS) – providing services via IP Switches (NG 911) in the lower Peninsula.

The majority of Michigan counties and the Wayne County service districts have either migrated or are in the process of migrating to IP Based NG911 services.

3.2.2 Landline E911 Infrastructure

3.2.2.1 System Level of Service

All subscribers of communication service providers are served by PSAPs capable of receiving and processing Enhanced 911 calls.

3.2.2.2 PSAPs

PSAPs utilize multiple Customer Premise Equipment (CPE) vendors throughout the state.

The majority of the PSAPs have the wireline and wireless traffic delivered via one incoming trunk group from the respective 911 service provider.

3.2.2.3 LEC 911 Selective Routers

AT&T uses five Lucent 5 ESS 911 tandem switches in Michigan's Lower Peninsula located in Ann Arbor, Bay City, Cadillac, Grand Rapids, and Rochester.

Frontier Communications uses a Lucent 5ESS 911 tandem switch in Muskegon, a Nortel DMS100 911 tandem switch in Alma, a CML ECS1000 tandem switch in Bellaire, and a CML ECS1000 tandem switch in Adrian.

Peninsula Fiber Network uses four INdigital Emergency Services Routing Proxies (ESRP) located in Baraga, Munising, Southfield and Grand Rapids. Unlike the more traditional selective routers, this routing mechanism is in line with NG911 standards and capable of NG911 features and functions.

3.2.2.4 ALI Database

AT&T provides ALI service to Michigan PSAPs through redundant centralized ALI databases located in Southfield and Northbrook, Illinois. Each PSAP is served by two ALI circuits, one connected to each database. The network provides redundancy and flexibility for future enhancements.

Frontier Communications provides ALI service to Michigan PSAPs through redundant centralized ALI databases located in Ft. Wayne, IN and Everett, WA. Service is provided by redundant IP circuits to each database.

Peninsula Fiber Network provides ALI service to Michigan PSAPs through redundant ALI databases located in Baraga, Munising, Grand Rapids, and Southfield.

The state statute authorizes each county board to implement a county 911 plan. The plan is then required to designate the Operational, Fiscal, Technical, and Managerial consideration of that county's 911 system. This includes designation of the PSAPs, services providers, and the funding for the 911 structure within the county. All Michigan counties and the Wayne County service districts have a 911 service plan in place and provide enhanced 911 for wireline, wireless Phase II, and VoIP.

3.3 Economics

3.3.1 Current Funding Mechanisms

Under MCL 484.1401, Michigan currently has three statutory funding provisions for 911: 1) a statewide "all devices" surcharge, 2) a county "all devices" operational surcharge, and 3) a technical fee (wireline based).

Michigan's statewide 911 surcharge is set forth in MCL 484.1401; it is collected by the communication service providers and remitted to the Michigan Department of Treasury (Treasury). A separate fee on pre-paid wireless services is also remitted to the Treasury. The Treasury is responsible for the financial distribution of those funds. This includes processing remittances from the communications service providers; depositing those funds into the Emergency 911 Fund; distributing the funds to the counties, LECs, and the PSAPs as directed by the Committee; and accounting for all transactions from the 911 Fund.

In 2007, Michigan amended its 911 statute to require all communications services that can provide access to 911 to collect and remit the 911 surcharge, regardless of technology. This was a significant advancement as it broadened the surcharge base by making it technology neutral, which will help provide a more solid foundation for the future. In March, 2018 the statute was amended to increase funding in order to move Michigan to NG911. The state 911 fee of \$0.19 had not changed since the 2007, the postpaid point of sale 911 fee had not changed since 2012. Public Act 51 (PA 51) of 2018 increased both fees, raising postpaid from \$0.19 to \$0.25 and prepaid from 1.92% to 5%. The current legacy network remains funded through the technical fee, which changed from a county-by-county fee to a statewide fee under PA 51.

The majority of the increased funding is statutorily dedicated to NG911, with some increases for dispatcher training, county distributions, and the State 911 Administrative Office.

Funds generated by the State 911 surcharge of \$0.25 on all devices that can access 911 are outlined in MCL 484.1408 and distributed as follows:

- 65% to counties
- 5.5% for training
- 1.5% to MSP for regional 911 center
- 2.44% to State 911 Office
- 25.56% for the delivery of wireless 911 calls to PSAPs and recovery for MPSC-approved cost elements of NG911.
- Additional to the distribution rates cited above, all State 911 fee revenue exceeding \$37,000,000 is directed to the NG911 fund for payment of costs approved under MPSC docket U-20146.

In addition to 911 surcharges, some PSAPs in Michigan also use general fund money or special millage funds (a voter-approved tax rate on property, expressed in mills per dollar of value of the property) to support its 911 programs and operations.

Michigan statute, under MCL 484.1401, also provides for a technical charge that allows landline providers within the 911 service district to assess a statewide emergency telephone technical charge on the subscribers to cover the cost to provide the E911 network, databases, and trunking in that 911 service district. The amount is calculated by dividing the provider's actual costs by the number of exchange access facilities within the State. The landline provider can bill and keep the technical charge. The carriers collect the 911 technical fee from the subscribers. The funds are then distributed to the carriers for reimbursement for the delivery of 911. Those funds are also used to pay for CPA services for the administration of fees through the firm of Maner-Costerisan.

3.3.2 Current Revenues and Costs

Using the information available to the State 911 Committee in 2017, the operational costs to the counties for providing 911 was approximately \$240,529,770.46 and was funded to the total of \$257,312,334.71 by the sources as follows: (updated from Annual Report and FCC data)

Category	2017 Amount
Total Budget	\$240,529,770.46
Local Operational Surcharge	\$75,149,415.89
Millage	\$37,295,029.61
General Fund	\$89,987,593.48
State 911 Fee Distributions	\$28,376,741.33

<p>Other Revenues*</p> <p>*Sources include: grants, interest earned, sale of equipment, tower rental, etc.</p>	<p>\$18,760,779.19</p>

3.3.3 Allocation/Distribution of State and Federal Funding for Equipment and Operations Allocation of State Funding

The statutory framework of the distribution of state-collected 911 funds is detailed in section 3.3.1 above. MCL 484.401b(14) recognizes the allowable and disallowable uses of the 911 funds collected by the counties and the state. That list is included as Appendix B and generally states:

Allowable Uses:

- 911 call handling equipment
- Master logging recorders
- Instant call check recorders
- TeleTypewriter/Telecommunications Device for the Deaf (TTY/TDD)
- Mapping
- Back-up power
- Training
- Public education
- Contracted services

3.3.4 Allocation of Federal Funding

At this time, federal funding of 911 systems in Michigan has been limited. In recent years it has usually been in the form of Homeland Security grants through local Emergency Management programs. These projects, while very beneficial, have been local either at the county or municipal level, and are limited in scope and size.

In 2009 the \$1.7 million ENHANCE 911 Grant was matched with \$1.7 million of state of Michigan 911 funds to build the shared GIS Repository. The project created a platform to allow the PSAPs to share its local GIS information as well as establish the future foundation for geo-based NG911 call routing. The GIS repository project is presently utilized by 76 of the 83 counties in Michigan. Participating counties have the ability to view and import participating members' GIS data for 911 use, while the non-participating counties have view access to GIS Repository.

In August of 2018, a Notice of Funding Opportunity (NOFO) was issued through the National Highway Traffic Safety Administration and the National Telecommunications and Information Administration (NTIA). It has been the intent of this plan since its establishment in 2009, that federal funding received as a part of the implementation of this plan's goals and objectives will be directed towards improving 911 in Michigan. Additionally, federal funds received as a result of the current federal grant opportunity will be utilized to the broadest extent possible to ensure that all citizens have access to 911 capabilities, specifically to NG911.

4. FUTURE ENVIRONMENT

4.1 Vision Statement

Michigan shall utilize evolving technology to enable all PSAPs to receive, process, and dispatch 911 requests for emergency services effectively and efficiently, to meet the needs of the citizens, public safety, and the service providers.

4.2 Services and Capabilities

Michigan PSAPs will maintain its current excellent standard of 911 service delivery as each migrate to Next Generation 911 (NG911). Historically, governance and control of 911 at the County level of government has proven efficacious in Michigan, as County Boards of Commissioners are in the best position to understand the needs and operations of the local emergency services providers and citizens. However, new regional or other models of governance and control may emerge as technology evolves.

With migration to the NG911, Emergency Services Internet Protocol-enabled network (ESInet), access will be enabled to public emergency services by any communication device allowing responders access to video, photographs, automatic crash notification data, and other data files.

The ESInets will also enable service arrangements by minimizing the need for some PSAPs to be in one physical location, promoting flexibility in the form of virtual PSAPs and virtual back-up PSAPs. While physical consolidation of PSAPs is often cost prohibitive, the flexibility to share services, equipment, and functions on an interconnected network will lead to more effective and efficient call processing.

4.3 Infrastructure, Equipment and Technology

The National Emergency Number Association (NENA) defines NG911 as “A system comprised of Emergency Services IP networks (ESInets): IP-based Software Services and Applications, Databases and Data Management processes that are interconnected to Public Safety Answering Point premise equipment. The system provides location-based routing to the appropriate emergency entity. The system uses additionally available data elements and business policies to augment PSAP routing. The system delivers geodetic and/or civic location information and the call back number. The system supports the transfer of calls to other NG911 capable PSAPs or other authorized entities based on and including accumulated data. NG911 provides standardized interfaces for call and message services, processes all types of emergency calls including non-voice (multi-media) messages, acquires and integrates additional data useful to call routing and handling for appropriate emergency entities. NG911 supports all E911 features and functions and meets current and emerging needs for emergency communication from caller to Public Safety entities.”

Michigan is achieving NG911 through a phased approach, including the development of local and regional intranets capable of supporting an IP-Based 911 system; the development of public and/or private networks capable of transferring IP data between and among local networks; the development of appropriate interlocal agreements and supporting legislation; the technology to interconnect multiple networks seamlessly; and the replacement of PSAP CPE with equipment capable of receiving and processing IP data. This will result, in a statewide interconnected and interoperable system of local, regional, and national emergency services networks.

Considerations are:

- Infrastructure must be scalable and extensible.
- Infrastructure must be public safety grade, i.e. it must meet a higher level of availability, resiliency, reliability, security, and survivability than non-mission critical enterprise network infrastructure.
- Not all PSAPs/counties/regions will migrate at the same time. The legacy network and selective routers supporting the circuit switched network must continue to function during the migration period. Once all PSAPs serviced by that legacy router have been migrated off, a timeline to decommission the legacy equipment will be established. In concept, the legacy system would eventually connect to an ESInet gateway and convert legacy wireline/wireless 911 calls from analog into Session Initiation Protocol (SIP), attaching the caller's location information and presenting the call to the ESInet. Local, regional, and state ESInets must avoid potential single points of failure. Lack of redundancy and diversity in the 911 network can impact the reliability of 911 systems.

- There must be sufficient bandwidth and speed for data sharing between PSAPs.
- Existing state-wide GIS data services should be considered for database sharing across the network using centralized databases while existing systems should be interfaced as deemed necessary. The network's increased capacity and speed will allow efficient transfer of mapping, CAD, and CPE call data for use in NG911.
- Regional 911 ESInets will require connectivity and plans should be carefully established. Plans and agreements should also be established for 24x7x365 monitoring and maintenance on interconnected ESInets.

The Michigan Public Service Commission has a docket (Case No. U-20146) in which it lists the elements of NG911 the MPSC will use to approve the expenditures for state payment of 911 funds. That list, includes:

1. Charges for conversion, network installation/setup, and direct cut-over support incurred by the IP-based 911 service provider and/or its vendors.
2. Costs related to testing the network prior to cut-over and the portion of the network not cut-over during the months of conversion.
3. Expenses paid by the IP-based 911 service provider to vendors for Emergency Services Routing Proxy, Commodity Internet, Loop, Port, Transport, Routers, and Collocation service.
4. Charges for Port, Transport, and Router services that the IP-based 911 service provider supplies from its own network.
5. Direct Operating charges for 911 Manager/Support provided by the IP-based 911 service provider.
6. Selective Routing and ALI costs.
7. 911 Selective Router (Selective Router or Switches or Tandem) costs.
8. Circuits and Facilities costs.
9. Regional ALI Storage/Processing costs.
10. Text to/from 911.
11. Geographic Information Systems.
12. Any additional costs that an IP-based 911 service provider believes should be included because of changes in technologies.

A full cost study must be submitted by the NG911 provider prior to MPSC's approval of payment.

4.4 Operations, Staff, and Training

Operations, staffing and training are the responsibility of the Michigan PSAPs, within the guidelines and standards established by the Michigan Public Service Commission upon recommendation of the State 911 Committee (The Emergency 9-1-1 Service Standards of Training Rules R 484.801-R 484.806) It is critical that PSAP Administrators remain current on evolving multimedia technology and standards throughout the transition to NG911 and adjust operational procedures and policies, staffing levels, and training programs accordingly.

4.5 Governance

Governance and control of 911 has historically resided with the County Board of Commissioners, local governmental entities, and Authority Boards. It is envisioned that this model will continue, although evolving technology may lead to regional or other cooperative governance mechanisms.

The Michigan statute (PA 32 of 1986, as amended) defines a Consolidated Dispatch within a 911 Service District and the mandatory members of an Authority Board governing such an entity. Other models may evolve as technology reduces geographical limitations.

The State 911 Committee will monitor the maturing system and propose statutory amendments that address more flexible governance models and Committee structure as necessary.

Governance of 911 should not only focus on the basics of how and who oversees the provision of services, but also provide broad guidance on a statewide basis given Michigan's "local" control environment of today. Items that should be considered in future rule making with evolving technology and competition in the provision of 911 services should include, but not be limited to:

4.5.1 Public Access to Emergency Communications

- Include the requirements for provision of 911 service.

- All communications service providers are subject to 911 rules and regulations.
- Requirements for multi-line telephone systems (MLTS); requirement for all new technologies to provision emergency communications services.

4.5.2 Data Privacy

- Ensure privacy protections of citizens who call 911 to the extent guaranteed by statute
- Develop and maintain rules for use of 911 data for:
 - All agencies necessary to have access to the appropriate data for calls in progress.
 - Outbound notification systems for public safety purposes.

4.5.3 Data Service Standards

- Promulgate appropriate service standards for provisioning of emergency communications system and services.
- All communications service providers shall have minimum service standards for provisioning of emergency communications systems and services.

4.5.4 Funding to Achieve the Vision

Funding for local 911 service is historically the responsibility of the County Board of Commissioners. A number of funding mechanisms have been available to the counties, including special millages and 911 surcharges on communication devices. The State of Michigan also collects a 911 fee on communication devices and a point of sale 911 fee prepaid wireless devices. A portion of which is returned to the counties to help offset costs. (See section 3.3 at page 9 above for a detailed distribution of the State 911 fee.)

It is imperative that the NG911 ESInets be cost effective and competitive. No additional costs will be placed on Michigan taxpayers. The ability of many types of emergency services to share the ESInet should result in economies of scale. Fair cost allocation methodologies among all stakeholders will need to be developed.

Future work to ensure adequate and appropriate funding to support the provision of 911 services should include the historical groundwork already laid here in Michigan, but also look to embrace these key principles:

- Ability to authorize fee assessment and collection process.
- A robust yet flexible means for adjustment of an established rate or rate structure already in place.
- Define the mechanism for cost recovery, if necessary and appropriate.

4.5.5 Stakeholder Engagement and Communications

PSAP Administrators must be prepared to handle contingency planning devoid of geographical constraints. PSAPs must develop agreements with neighboring and regional PSAPs, at a minimum, regarding cooperation and protocols.

PSAP and provider network administrators must discuss and codify in written agreements responsibility for design, development, deployment, security, monitoring, and reactive and preventative maintenance.

Database Administrators must develop widely diverse databases inherent in NG911 and collaboratively develop service issue resolution and escalation, data quality assurance measures, security and data rights management.

Public information and education will be critical to the success of the implementation. The expectations of the public must be specifically established and communicated, especially throughout transitional phases during which 911 and PSAP capabilities may be different in various areas of the state.

4.5.6 Federal Government and Other National Factors

The Michigan 911 system will remain compliant with all Federal laws pertaining to 911 service. The State 911 Office will also assist in the collection of data needed from the State of Michigan for national reporting systems, including the Federal Communications Commission (FCC) and the National Highway and Traffic Safety Administration's (NHTSA) Implementation and Coordination Office (ICO).

4.5.7 Service and Application Providers

NG911 will introduce new service and application providers as needs for IP connectivity, monitoring, and maintenance evolve.

4.5.8 Infrastructure and Equipment Providers

NG911 has introduced new infrastructure and equipment providers to 911. The existing legal and regulatory environment will continue to be reviewed and revised to allow: 1) architecture and technology neutrality, 2) the potential delivery of new services by non-Local Exchange Carrier service providers, 3) the extension of liability protection to current and future network service providers, and 4) the alignment of new service arrangements, costs, and funding mechanisms to support infrastructure. Under Michigan statute, the MPSC has issued an order (U-20146), that sets forth the recurring and nonrecurring cost categories for all IP-based 911 service providers seeking reimbursement for providing 911 services.

4.5.9 Other Emergency Service Providers

Michigan will have working relationships with (and the ability to seamlessly share data with) other state and federal agencies that provide or support emergency services.

4.5.10 Other Related State Services

The Michigan NG911 system will be interactive and capable of two-way communication, integrating a number of non-public safety private and governmental services, such as suicide hotlines, trauma centers, poison control, road, public works, weather services, and Emergency Management. The ESInet will enable both the PSAPs and the general public to receive real time information, alerts, and warnings.

5. GOALS, OBJECTIVES, AND MEASURES

The goals of the revised State of Michigan 911 Plan are to:

- Efficiently and properly implement the funding systems established in Public Act 32 of 1986, as amended.
- Effectively carry out the development of best practices and model policies for PSAPs, local 911 governing units, and service providers as set out in Public Act 32 of 1986, as amended.
- Develop a strategy for assisting the counties and service districts that are migrating to a Next Generation 911 platform that is IP-based and capable of processing 911 calls on a technology-neutral basis.

5.1 State of Michigan 911 Plan Objectives:

Objective 1: Create a dashboard to reflect the status of NG911 deployments in Michigan.

Completion Date: June 2019 with continuing updates.

Measurements: Issuance of dashboard format.

Objective 2: Verification of decommissioning of legacy 911 components.

Completion Date: Ongoing through December 31, 2021.

Measurements: Verification of decommissioning of legacy 911 components.

Objective 3: Explore opportunities to ensure that funding of legacy components is appropriately addressed for consumers in the NG911 environment.

Completion Date: December 20, 2020.

Measurements: Issue of a written report issued by the MPSC with the assistance of the SNC by December 1, 2020.

Objective 4: Further make available the existing statewide GIS Repository to route calls through an ESInet(s) being utilized in the State of Michigan.

Completion Date: Open.

Measurements: Successful system test and use by those that are participating PSAPs.

Objective 5: Coordinate with Emergency Management and the State Interoperability groups to include PSAPs in the planning, testing, training, exercising, and evaluation of interoperability exercises.

Completion Date: Ongoing through December 31, 2021.

Measurements: Inclusions of statistical data regarding PSAP/Emergency Management coordination in the annual report to the legislature.

Objective 6: Recommend, in consultation with PSAPs, the adoption of the NENA i3 standards for PSAP cybersecurity, as well as establishing a planned migration to the TFOPA EC3 concept for cybersecurity.

Completion Date: June 30, 2020 with continuing updates

Measurements: Issuance of a cybersecurity model and recommendation in the State 911 Committee's Annual 911 report to the Legislature.

5.2 Tracking Progress

The activity towards the accomplishment of meeting each of the goals and objectives will be included in the State 911 Administrator's quarterly report to the Committee. This will include an evaluation of the "on target" status of each goal and objective, and any corrective measures/ action plans that may be necessary for any goals or objectives that are not being met. The goals, objectives, and status of each will be included in the Committee's Annual 911 Report to the Legislature.

6. RESOURCE ALLOCATION

The State 911 Office, is under the management of the Michigan State Police, in accordance with PA 244 of 2003. The office provides staff necessary to carry out the duties of the State 911 Committee, to include an Administrator, three analysts and an administrative assistant.

Currently there are eighty-six (86) 911 plans in the state of Michigan (Wayne County has four emergency service districts and the other counties each have one). Each county or emergency service district oversees its 911 system as written in its plan. The State 911 Office provides guidance and oversight to the counties and districts. Staff from the office is assigned to assist specific subcommittees and workgroups of the State 911 Committee.

Much of the work done by the Committee is done via its various subcommittees. These subcommittees are composed of subject matter experts from both the public (state and county/PSAP level) and private sector who volunteer their time and expertise, providing resources to the state at no charge. Existing subcommittees can guide the plan's operational standards, model policies, 911 fund use, service provider 911 delivery functions, and best practices for 911 governing authorities. Since this work is voluntary, no costs can be assessed. The knowledge and background of the subcommittee members are beneficial, and play an important role in the implementation of the Plan. The current subcommittees are:

- Emerging Technology
- Certification
- Policy
- Dispatcher Training
- Legislative Action

Resource allocation to meet the goals and objectives of the Plan is challenging. Since its inception in 1986, the legislation that enables 911 in Michigan has undergone a number of revisions to accommodate changing technology, funding, and operational needs. As this has occurred the allocation of resources has also changed to meet needs, however, changes in public policy, including funding and the distribution of resources, do not keep pace at the speed of changing technology. Ongoing planning is needed to identify the additional workload created to fulfill the objectives of Michigan's 911 systems in developing a system for notification, data collection, reporting, review, and compliance of the funding systems. The planning stage of the project must assess needs, rank project priorities, identify the number of staff required, estimate costs, and establish a time line for various phases of the project. The recent changes in the funding allocation the State 911 Office will allow the office to begin automating a number of its processes to improve efficiencies in the services it provides. Until this is completed, it is difficult to determine if the current staff of the State 911 Office can manage the additional work, and if the appropriate expertise is available. The State 911 Office has access to other state agencies (such as the Department of Technology, Management and Budget) that may be able to assist in the implementation of this plan.

Changes to Michigan legislation in 2018 and the allocation of resources stemming from that legislation are discussed in section 3.3.1. As PSAPs are making the transition from the legacy environment to NG911, established revenue streams are coming up short. There are initiatives underway within the state to change the legislation in support of more stable funding streams for implementation and maintenance of NG911 infrastructure. When preparing the operational budget to implement the plan, it will be necessary to consider state, as well as counties' and local PSAPs' funding. Providing 911 service to Michigan residents is a county responsibility. The counties and PSAPs may need additional support staff, technical experts, and equipment to meet the Plan's goals.

Current funding takes the long-term support of the Plan into consideration. While funding and funding allocations may be in place at the present time, it is imperative that ongoing needs of the 911 system as well as the willingness of the public and elected officials. It is possible that this will change over the course of time, but procedures need to be identified to address these possible changes.

It is important to remember that the Plan will be constantly evolving as technology advances and funding mechanisms alter. The State 911 Committee continues to be proactive in its efforts to ensure 911 services for the state's residents and visitors, regardless of the format of the 911 call that is placed.

7. UPDATING THE PLAN

Prior to 2009, there was no single 911 plan for the State of Michigan. Each of the state's eighty-three (83) counties prepared and maintained individual county-level (or in the case of Wayne County, four separate "Emergency Service District") plans.

The State of Michigan 911 Plan for 2009 was developed by, and will be updated by, the State of Michigan 911 Committee with assistance from the Committee's Emerging Technology Subcommittee and the State 911 Administrator. Beginning in 2009, the Plan will be included in the State 911 Committee's Annual 911 Report to the Legislature. The Plan will be reviewed and updated as needed.

Changes to the plan will be documented in the following manner:

- The Plan will be given a new version number following annual review and update cycle, or following any interim update necessary. The number given at that time is a full number, that is; 1.0, 2.0, etc.
- Any changes made to the Plan on an interim cycle are given a fractional number, that is 1.1, 1.2, etc.
- Copies of prior Plans will be made available.
- The Plan will be posted to the SNC website upon completion and approval of the review.

8. MECHANISM(S) FOR OVERSEEING AND MANAGING THE STATE'S 911 SYSTEM

In Michigan the 911 statute, Public Act 32 (PA 32) of 1986 (as amended), serves as the central oversight mechanism for 911 in the state. PA 32 sets out the authority for which a 911 system is enacted, as well as the minimum requirements of a 911 system. Under MCL 484.1303 (2)(a)(d) these requirements include: managerial, technical, operational, and fiscal considerations.

The State 911 Committee serves as a central coordinating body for 911 policy and planning. The Committee regularly issues best practices, model policies, and evaluates operational and funding compliance by PSAPs and counties through its compliance review system. By using compliance review, the Certification Subcommittee conducts comprehensive evaluations of local 911 operations, administration, and funding use. Further information is available at: www.michigan.gov/snc.

While the Committee has limited oversight powers, PA 32 currently permits direct oversight for funding use of 911 surcharges under MCL 484.1408(4)(a). Using this authority, the Committee has established a list of Allowable and Disallowable Wireless and Wireline 911 Surcharge Expenditures. In accordance with MCL 484.1401(b)(14), any changes made to the list's language must be transmitted to the Michigan Legislature 90 days prior to becoming effective.

The MPSC, in consultation with the State 911 Committee, may promulgate rules for uniform procedures, policies, and standards for the receipt and expenditure of 911 funds [Sec. 413(1)(c)].

The State 911 Committee is also required to issue an annual report to the Michigan Legislature and Governor regarding the status of 911 in Michigan. The report is a comprehensive accounting of the status of 911 in the state. All reports issued since 2000 are available through the Committee's web site at: www.michigan.gov/snc.

As described throughout this plan, the State 911 Committee is inclusive at all levels in its processes to guide the Michigan 911 system, and encourages the participation of all stakeholders in Michigan's 911 community.

9. MECHANISM FOR INITIATING AND MONITORING AN IMPLEMENTATION PROJECT

Michigan's Landline E911 and Wireless E911 (Phases I and II) implementation projects have been completed. These projects were conducted on a countywide or Emergency Service District level (i.e., Wayne County has four districts).

The focus of the 2017 Plan revision was the implementation of a Next Generation 911 system.

The projects will be initiated by the respective County/District 911 Coordinators, and monitored by the State 911 Committee, and the State 911 Administrator. Based on the solution selected, the future progress of the system's components will be tracked by the State 911 Committee, the State 911 Subcommittees, and included in the State 911 Committee's Annual 911 Report to the Legislature.

Text-to-911 implementation are initiated by the respective county/district 911 coordinators, and monitored by the State 911 Committee, and the State 911 Administrator. The current status of areas receiving Text-to-911 is available on the SNC website.

Roles of the State 911 Committee and State 911 Administrator are outlined in Michigan's 911 statute (PA 32 of 1986, as amended).

Relevant excerpts from Michigan's **EMERGENCY 911 SERVICE ENABLING ACT**:

484.1408 State 911 Service Charge; Report.

(11) No later than December 1, 2020, the commission must issue a report to the legislature and governor containing the following information:

(a) The total costs incurred by counties or 911 service districts that have transitioned to an IP-based 911 service provider.

(b) The estimated transition costs to be incurred by counties or 911 service districts that have not transitioned to an IP-based 911 service provider and the estimated dates for transition.

(c) The estimated ongoing, annual costs of operating the 911 network after the transition to an IP-based 911 service provider has been completed by all counties or 911 service districts choosing to transition.

(d) The current 911 funding system revenues as reported by the committee.

(e) The estimated costs of operating the IP-based 911 network based on the estimates calculated in subdivisions (b) and (c).

(12) The commission may collect data from counties, 911 service districts, IP-based 911 service providers, the state treasurer, and the state 911 committee that are reasonably required to complete the report under subsection (11). Counties, 911 service districts, IP-based 911 service providers, the state treasurer, and the state 911 committee shall submit to the commission any data that are reasonably required to compile the report under subsection (11). At the request of the commission, the committee shall, in preparing the annual report to be submitted to the legislature and governor under section 412 by August 1, 2020, collect data from counties, 911 service districts, and IP-based 911 service providers that the commission reasonably requires to compile the report under subsection (11) and submit that data to the commission.

484.1601 Technical assistance and assistance in resolving dispute.

Sec. 601. The emergency 911 service committee created in section 712, upon request by a service supplier, county, public agency, or public service agency, shall provide, to the extent possible, technical assistance regarding the formulation or implementation, or both, of a 911 service plan and assistance in resolving a dispute between or among a service supplier, county, public agency, or public safety agency regarding their respective rights and duties under this act.

484.1712 Emergency 911 service committee; creation; purpose; authority and duties.

Sec. 712. An emergency 911 service committee is created within the department of state police to develop statewide standards and model system considerations and make other recommendations for emergency telephone services. The committee shall only have the authority and duties granted to the committee under this act.

484.1714 Duties of committee; staff assistance.

Sec. 714. (1) The committee shall do all of the following:

(a) Organize and adopt standards governing the committee's formal and informal procedures.

(b) Meet not less than 4 times per year at a place and time specified by the chairperson.

(c) Keep a record of the proceedings and activities of the committee.

(d) Provide recommendations to public safety answering points and secondary public safety answering points on statewide technical and operational standards for PSAPs and secondary PSAPs.

(e) Provide recommendations to public agencies concerning model systems to be considered in preparing a 911 service plan.

(f) Perform all duties as required under this act relating to the development, implementation, operation, and funding of 911 systems in this state.

10. CONCLUSION

This 911 Plan provides a road map for the future direction of Michigan 911. As each section has outlined, the process is accountable, proactive, and designed to move the 911 system forward.

The State 911 Committee recognizes that NG911 architecture supports an interconnected system of local, regional, and state emergency services networks, and will ultimately expand to cover the entire nation. Effective interconnection requires effective statewide planning and coordination, as well as effective interstate planning and coordination.

The State 911 Committee, through this plan - and the Committee's inclusive process - will move forward in its work to develop recommendations to drive NG911 forward. The Committee recognizes that changes in the state's 911 statutory and network environment need to occur. To that end, this Plan will be a dynamic document that is capable of reflecting those changes.

As reflected in the section on Goals and Objectives, the Committee also recognizes that, in addition to NG911, other goals such as minimum standards for dispatcher training, standard PSAP operational policies, 911 fund contribution compliance and reporting requirements are also elements in making progress in 911. The Committee has created and adopted this Plan, not to simply outline the need to plan for technical progress, but for operational progress as well.

In conclusion, the purpose of this Plan is to outline the process toward NG911 and to address operational issues that the State 911 Committee recognizes as key to successful overall delivery of 911 in the state. As it has done in the past, the Committee will continue to facilitate Michigan's 911 legacy of progress and adaptability as we move into the new challenges facing 911 in the future.

APPENDIX A: ACRONYMS

- ALI – Automatic Location Identification
- ANI - Automatic Number Identification
- APCO – Association of Public Safety Communications Officials
- CAD – Computer-Aided Dispatch
- CLEC – Competitive Local Exchange Carrier
- CPE – Customer Premise Equipment
- E911- Enhanced 911
- ECRF- Emergency Call Routing Function
- ESInet – Emergency Services Internet Protocol network
- ESZ - Emergency Service Zone
- GIS – Geographic Information System
- ILEC – Incumbent Local Exchange Carrier
- IP – Internet Protocol
- LEC – Local Exchange Carrier
- LEIN – Law Enforcement Information Network
- LIS - Location Information Server
- MLTS – Multiple Line Telephone System
- MPSC – Michigan Public Service Commission
- MSAG – Master Street Address Guide
- MSP – Michigan State Police
- NENA – National Emergency Number Association
- NG911 – Next Generation 911
- PSAP – Public Safety Answering Point
- SIP – Session Initiation Protocol
- SNC - State 911 Committee
- TCC - Text Control Center
- TFOPA – Task Force on Optimal Public Safety Answering Point Architecture
- VoIP – Voice Over Internet Protocol
- VRS – Video Relay System

APPENDIX B: ALLOWABLE/DISALLOWABLE USAGE OF 911 SURCHARGE FUND

ALLOWABLE/DISALLOWABLE USAGE OF 911 SURCHARGE FUNDS

BY WAY OF EXAMPLE, BUT NOT LIMITATION, THE FOLLOWING COSTS ARE ALLOWABLE OR
DISALLOWABLE (as approved by the STATE 911 COMMITTEE on June 23, 2016):

ALLOWABLE 911 SURCHARGE EXPENDITURES FOR TRAINING FUNDS

Salaries and travel expenses - Allowed

Actual wages incurred after January 1, 2007 including overtime, not including benefits, of eligible Primary PSAP personnel to attend State 911 Committee approved training courses (either attendee wages OR backfill employee wages), including the hours of travel to and from the approved training and the hours of the approved course. Documentation of overtime wage use must be kept on site.

Travel expenses to attend approved training in-state or out-of-state for states/provinces adjacent to Michigan (Ohio, Indiana, Wisconsin, Ontario, Illinois, and Minnesota) meals, mileage, lodging, parking, etc.

Salaries of instructors for time spent presenting approved 911 center personnel training.

Reasonable travel expenses for instructors (meals, mileage, lodging, parking, etc).

Flat rate fee or tuition paid to a training provider for presenting approved 911 center personnel training.

Facilities, Equipment, Supplies - Allowed

Reasonable rental costs for use of the training facilities for the express purpose of conducting approved 911 center personnel training.

Meal, beverage, and snack expenses provided to trainees during the training.

The cost of purchasing or leasing training materials, including the following: texts, bulletins, tests, writing materials, slides, films, video tapes, and other materials used to assist the eligible trainees in understanding training topics presented as part of State 911 Committee approved training.

DISALLOWABLE 911 SURCHARGE EXPENDITURES FOR TRAINING FUNDS

Salaries and travel Expenses – Not Allowed

Monetary incentives, bonuses or awards for completion of training.

Out-of-state travel expenses to states/provinces not adjacent to Michigan unless otherwise specifically approved by the State 911 Committee's Dispatcher Training Subcommittee.

No reimbursement for PSAP personnel used as trainers in their own PSAP.

Unreasonable travel expense

Facilities, Equipment, Supplies – Not Allowed

Alcoholic beverages

Computer software to be used operationally (i.e. EMD protocol software, CAD software, etc.); computer hardware; any capital investment such as pre-employment testing equipment or simulated console equipment.

ALLOWABLE/DISALLOWABLE USAGE OF 911 SURCHARGE FUNDS

Training Sessions – Allowed

State 911 Committee approved in-state courses including interactive on-line courses and self-paced CD/DVD courses.

Out-of-state State 911 Committee approved courses. All approved expenses are allowed if state/province is adjacent to Michigan (i.e. Ohio, Indiana, Wisconsin, Ontario, Illinois, and Minnesota). Only tuition is allowed for states/provinces not adjacent to Michigan unless otherwise specifically pre-approved by State 911 Committee's Dispatcher Training Subcommittee.

State 911 Committee approved conferences (trainees must attend at least 6 hours of approved courses at the conference within a 24 hour time frame).

Eligible personnel may retake classes as needed.

Training Sessions - Not Allowed

Expired courses, even if previously State 911 Committee approved.

Out-of-state travel expenses to states/provinces not adjacent to Michigan unless otherwise specifically pre-approved by State 911 Committee's Dispatcher Training Subcommittee.

Conferences that are not State 911 Committee pre-approved.

Glossary of Terms

- 911** A three-digit telephone number to facilitate the reporting of an emergency requiring response by a public safety agency.
- 911 Network** - Literally, the dedicated circuits and switching components used to transport voice from the originating central office, PBX, or other equivalent point to the 911 controller unit at the PSAP.
- 911 Service** - The delivery of 911 dialed calls from the originating switch to the PSAP call taker, with associated delivery of ANI and ALI data.
- 911 System** - The set of network, database and CPE components required to provide 911 service.
- AR** **Alternate Routing**
A standard feature provided to allow E911 calls to be routed to a designated alternate location if (1) all E911 exchange lines to the primary PSAP are busy, or (2) the primary PSAP is closed down for a period of time (night service).
- Analog**
As applied to 911, call transport using signaling involving a physical change, such as voltage or frequency. Analog trunking using multi-frequency tones (MF).
- APCO** **Association of Public Safety Communications Officials**
The Association of Public Safety Communications Officials International, Inc. is a not-for-profit professional organization dedicated to the enhancement of public safety communications. APCO exists to serve the people who manage, operate, maintain, and supply the communications systems.
- ACN** **Automatic Collision Notification**
A service provided by vendors such as OnStar and ATX that allows sensors in vehicles to automatically initiate a call to a central answering point upon specific levels of vehicle impact, air bag deployment, etc.
- ALI** **Automatic Location Identification**
The automatic display at the PSAP of the caller's telephone number, the address/location of the telephone and supplementary emergency services information.
- ANI** **Automatic Number Identification**
Telephone number associated with the access line from which a call originates.
- Basic 911**
An emergency telephone system, which automatically connects 911 callers to a designated answering point. Call routing is determined by originating central office only. Basic 911 may or may not support ANI and/or ALI.
- CAS** **Call Associated Signaling**
Allows for the device position or location information to be delivered to the emergency services network in the call signaling as part of the call set-up information. With CAS, the originating network pushes the position information to an Emergency Services Network Entity (ESNE).

CBN Callback Number
The VoIP subscriber's telephone number.

CTIA Cellular Telecommunications and Internet Association
The Cellular Telecommunications and Internet Association is the international organization that represents all elements of wireless communication such as cellular, personal communication services, enhanced specialized mobile radio, and mobile satellite services serving the interests of service providers, manufacturers, and others.

CO Central Office
The Local Exchange Carrier facility where access lines are connected to switching equipment for connection to the Public Switched Telephone Network.

CMRS Commercial Mobile Radio Service
Includes all of the following:

1. A wireless 2-way communication device, including a radio telephone used in cellular telephone service or personal communication service.
2. A functional equivalent of a radio telephone communications line used in cellular telephone service or personal communication service.
3. A network radio access line.

CMRS Connection - Each number assigned to a CMRS customer.

Company Identifier (Company ID)

A 3 to 5 character identifier chosen by the Local Exchange Carrier that distinguishes the entity providing dial tone to the end user. The Company Identifier is maintained by NENA in a nationally accessible database.

Consolidated Dispatch

A countywide or regional emergency dispatch service that provides dispatch service for 75% or more of the law enforcement, firefighting, emergency medical service, and other emergency service agencies within the geographical area of a 911 service district or serves 75% or more of the population within a 911 service district.

CRN Contingency Routing Number
A 10-digit, 24x7 PSAP emergency telephone number used for fallback routing if a call cannot be routed through the selective router to the PSAP.

CPE Customer Premise Equipment
Communications or terminal equipment located at a subscriber's premises and connected with a carrier's telecommunication channel at the demarcation point.

Database

An organized collection of information, typically stored in computer systems, comprised of fields, records (data) and indexes. In 911, such databases include master street address guide (MSAG), telephone number/emergency service number (ESN), and telephone customer records.

Database Service Provider

A service supplier who maintains and supplies or contracts to maintain and supply an ALI database or a MSAG.

Dedicated Trunk

A telephone circuit used for a single purpose such as transmission of 911 calls.

- DR Default Routing**
The capability to route a 911 call to a designated (default) PSAP when the incoming 911 call cannot be selectively routed due to an ANI failure or other cause.
- ECRF Emergency Call Routing Function**
A functional element in an ESInet which is a LoST protocol server where location information (either civic address or geo-coordinates) and a Service URN serve as input to a mapping function that returns a URI used to route an emergency call toward the appropriate PSAP for the caller's location or towards a responder agency.
- EMS Emergency Medical Service**
The emergency medical response group established under the Emergency Medical Systems Act of 1972.
- ENP Emergency Number Professional**
A certification program for telecommunicators to encourage professional growth, promote a standard of competence, ensure an awareness of current issues in the 911 field and provide formal recognition of individuals for professional achievement.
- ESN Emergency Service Number**
A number defining the primary PSAP and up to five secondary PSAPs serving a particular telephone number. It is used in conjunction with the selective routing feature of E911 service.
- ESZ Emergency Service Zone**
The designation assigned by a county to each street name and address range that identifies which emergency response service is responsible for responding to an exchange access facility's premises.
- ESGW Emergency Services Gateway**
A component, residing in the VoIP service provider's network, responsible for integrating the SIP network with the emergency services network and routing 911 calls to the appropriate selective router, based on the ESRN/ESQK it receives from the regional call server on the 911 call server.
- ESInet Emergency Services Internet Protocol Network**
An ESInet is a managed IP network that is used for emergency services communications, and which can be shared by all public safety agencies. It provides the IP transport infrastructure upon which independent application platforms and core functional processes can be deployed, including, but not restricted to, those necessary for providing NG911 services. ESInets may be constructed from a mix of dedicated and shared facilities. ESInets may be interconnected at local, regional, state, federal, national and international levels to form an IP-based inter-network (network of networks).
- ESME Emergency Services Message Entity**
The ESME routes and processes the out-of-band messages related to emergency calls. This functionality is sometimes incorporated into the ALI database engine of a selective router.
- ESNE Emergency Services Network Entity**
The ESNE routes and processes the voice band portion of the emergency call. The ESNE is composed of selective routers, which are also known as routing, bridging, and transfer switches.
- ESQK Emergency Services Query Key**
A digit string that uniquely identifies an ongoing emergency services call and is used to correlate the emergency services call with the associated data messages. It may also identify an emergency services zone and may be used to route the call through the network, similar to an ESRK in wireless E911 networks.

ESRN Emergency Services Routing Number

A 10-digit number that specifies the selective router to be used to route a call.

Emergency Telephone Charge

Emergency telephone operation charge and emergency telephone technical charge.

Emergency Telephone District

The area in which 911 service is provided or is planned to be provided to service users under a 911 system implemented under this act. Also referred to as "911 service district."

Emergency Telephone District Board

The governing body created by the board of commissioners of the county or counties with authority over an emergency telephone district.

Emergency Telephone Operation Charge

A charge for non-network technical equipment and other costs directly related to the dispatch facility and the operation of one or more PSAPs including, but not limited to, the costs of dispatch personnel and radio equipment necessary to provide 2-way communication between PSAPs and a public safety agency. Emergency telephone operation charge does not include non-PSAP related costs such as response vehicles and other personnel.

Emergency Telephone Technical Charge

A charge for the network start-up costs, customer notification costs, billing costs including an allowance for uncollectable technical and operation charges, and network nonrecurring and recurring installation, maintenance, service, and equipment charges of a service supplier providing 911 service under this act.

E911 Enhanced 911

An emergency telephone system which includes network switching, database and CPE elements capable of providing Selective Routing, Selective Transfer, Fixed Transfer, ANI, and ALI.

Final 911 Service Plan

A tentative 911 service plan that has been modified only to reflect necessary changes resulting from any exclusions of public agencies from the 911 service district of the tentative 911 service plan under section 306 and any failure of public safety agencies to be designated as PSAPs or secondary PSAPs under section 307.

First Responder

Police, fire, or medial resource that is dispatched to handle 911 calls and deliver emergency services.

GIS Geographical Informational System

A computer software system that enables one to visualize geographic aspects of a body of data. It contains the ability to translate implicit geographic data (such as street address) into an explicit map location. It has the ability to query and analyze data in order to receive the results in the form of a map. It also can be used to graphically display coordinates on a map i.e. Latitude/Longitude from a wireless 911 call.

HCAS Hybrid CAS

A combination of CAS (Call Associated Signaling) and NCAS (Non-Call Associated Signaling).

Hypertext Link

A way to connect two Internet resources via a simple word or phrase on which a user can click to start the connection and easily access cross-references.

- ISDN** **Integrated Services Digital Network**
A digital interface providing multiple channels for simultaneous functions between the network and CPE.
- Internet Protocol Telephony**
Blending of voice, data, and video using Internet Protocol for each across the Internet or other existing IP based LANs and WANs, effectively collapsing three previously separate networks into one.
- I2 - NENA Defined VoIP Solution**
I2 routes VoIP calls into the current E911 systems and to the correct PSAP with correct ANI and ALI. I2 accommodates both stationary and nomadic users and provides MSAG valid location information and provides a method for nomadic user location either through an automated process or user input via a service prompted, web-based form or equivalent. Intended migratory path from i1.
- I3 - NENA Defined VoIP Phase E911 Solution**
Also referred to as Long Term, Next Generation 911. This enables end to end IP based E911 design, supporting VoIP originated call delivery and the transition of current wireline and wireless service providers to IP interface technology. Support IP mobility users, and all capabilities of I2. Utilizes extended capabilities of IP to provide location and other information with the call, as well as other sub-sets of relevant.
- LRO** **Last Routing Option**
Routing information sent by the VPC that provides a “last chance” destination for a call, for example the CRN or a routing number associated with a national call center.
- Lat/Lon** **Latitude and Longitude**
Latitude and Longitude are a coordinate system by means of which the position or location of any place on the earth’s surface can be described. Also known as x,y.
- LAN** **Local Area Network**
A transmission network encompassing a limited area, such as a single building or several buildings in close proximity.
- LEC** **Local Exchange Carrier**
A Telecommunications Carrier (TC) under the state/local Public Utilities Act that provide local exchange telecommunications services. Also known as Incumbent Local Exchange Carriers (ILECs), Alternate Local Exchange Carriers (ALECs), Competitive Local Exchange Carriers (CLECs), Competitive Access Providers (CAPs), and Local Service Providers (LSPs).
- LIS** **Location Information Server**
A Location Information Server (LIS) is a functional entity that provides locations of endpoints. A LIS can provide Location-by-Reference, or Location-by-Value, and, if the latter, in geo or civic forms. A LIS can be queried by an endpoint for its own location, or by another entity for the location of an endpoint. In either case, the LIS receives a unique identifier that represents the endpoint, for example an IP address, circuit-ID or MAC address, and returns the location (value or reference) associated with that identifier. The LIS is also the entity that provides the dereferencing service, exchanging a location reference for a location value.
- LNP** **Local Number Portability**
A process by which a telephone number may be reassigned from one Local Exchange Carrier to another.
- LoST** **Location to Service Translation**
A protocol that takes location information and a Service URN and returns a URI. Used generally for location-based call routing. In NG911, used as the protocol for the ECRF and LVF.

MSAG Master Street Address Guide

A perpetual database that contains information continuously provided by a service district that defines the geographic area of the service district and includes an alphabetical list of street names, the range of address numbers on each street, the names of each community in the service district, the emergency service zone of each service user, and the primary service answering point identification codes.

MCDA Michigan Communication Directors Association

An organization for Public Safety Managers and Directors to support the development and management of their Public Safety Communications Centers.

Mobile Subscriber

A subscriber who uses a wireless device that can be in motion during the call. Wireless Fidelity (Wi-Fi) VoIP is expected to eventually allow the end user to take a home-based telephony connection and roam within an interconnected wireless network, much as cellular technologies allow today.

MLTS Multi-Line Telephone System

A system comprised of common control unit(s), telephone sets, control hardware and software, and adjunct systems used to support the capabilities outlined herein. This includes network and premises based systems. E.g., Centrex, VoIP, as well as PBX, Hybrid, and Key Telephone Systems (as classified by the FCC under Part 68 Requirements) and includes systems owned or leased by governmental agencies and non-profit entities, as well as for-profit businesses.

NASNA National Association of State 911 Administrators

The National Association of State 911 Administrators is a not-for-profit corporation of full time state 911 coordinators whose primary responsibility is to administer 911 programs in their respective states. NASNA members review public policy issues, federal regulations, technology issues and funding mechanisms that impact 911 delivery.

NENA National Emergency Number Association

The National Emergency Number Association is a not-for-profit corporation established in 1982 to further the goal of "One Nation—One Number." NENA is a networking source and promotes research, planning, and training. NENA strives to educate, set standards, and provide certification programs, legislative representation, and technical assistance for implementing and managing 911 systems.

NOC Network Operations Center

A location from which the operation of a network or internet is monitored. Additionally, this center usually serves as a clearinghouse for connectivity problems and efforts to resolve those problems.

NG911 Next Generation 911

NG911 is an IP-based system comprised of managed IP-based networks (ESInets), functional elements (applications), and databases that replicate traditional E911 features and functions, and provide additional capabilities. NG911 is designed to provide access to emergency services from all connected communications sources, and provide multimedia data capabilities for PSAPs and other emergency service organizations.

Nomadic Subscriber

A subscriber who uses a device that is static during a call but does not have a static IP address assigned to it. Nomadic subscribers use Internet Service Provider (ISP) VoIP, which allows the end user to establish a telecommunications connection wherever he or she can obtain an Internet-based connection to the ISP provider.

- NCAS Non Call Associated Signaling**
A method for delivery of wireless 911 calls in which the Mobile Directory Number and other call associated data are passed from the Mobile Switching Center to the PSAP outside the voice path.
- Phase I Wireless E911 Service**
Dispatch center receives call back number of the wireless phone used to dial 911 and the location of the cell site used to handle the call.
- Phase II Wireless E911 Service**
Dispatch center receives specific location information of the wireless caller dialing 911, within parameters set by the Federal Communications Commission.
- Primary PSAP**
A PSAP to which 911 calls are routed directly from the 911 Control Office. (See PSAP below.)
- PBX Private Branch Exchange**
A smaller version of the phone company central switching office, usually privately owned by a non-telephone business. A PBX connects to the larger telephone network for external call handling, and usually requires dialing an access digit such as 9 or 8 to make an external call.
- Public Safety Agency**
An entity that provides firefighting, law enforcement, emergency medical, or other emergency service.
- PSAP Public Safety Answering Point**
A facility equipped and staffed to receive 911 calls. A Primary PSAP receives the calls directly. If the call is relayed or transferred, the next receiving PSAP is designated a Secondary PSAP.
- PSTN Public Switched Telephone Network**
The international telephone system based on copper wires carrying analog voice data.
- Redundancy**
Duplication of components, running in parallel, to increase reliability.
- Relay Method**
A PSAP notes pertinent information and relays it by telephone, radio, or private line to the appropriate public safety agency or other provider of emergency services that has an available emergency service unit located closest to the request for emergency service for dispatch of an emergency service unit.
- Secondary PSAP Answering Point**
A communications facility of a public safety agency or private safety entity that receives 911 calls by the transfer method only and generally serves as a centralized location for a particular type of emergency call.
- Selective Router**
The node in the emergency services network that performs enhanced call routing for 911 calls. Usually operated by the LEC.
- SR Selective Routing**
The routing of a 911 call to the proper PSAP based upon the location of the caller.
- Service Provider**
An entity providing one or more of the following 911 elements: network, CPE, or database service.

Service Supplier

A person providing a telephone service or a CMRS to a service user in this state.

Service User

An exchange access facility or CMRS service customer of a service supplier within a 911 system.

SIP Session Initiation Protocol

SIP is the IP-based protocol defined in IETF RFCs 3261 and 2543. SIP is one of the two dominant messaging protocols used by the VoIP industry.

**SS7/
CCS7 Signaling System 7 (SS7)/Common Channel Signaling (CCS7)**

An inter-office signaling CCS7 network separate from the voice path network, utilizing high-speed data transmission to accomplish call processing. (The Public Switched Telephone Network is in the process of upgrading from MF Signaling to SS7.)

SNC State 911 Committee

Effective at its June 24, 2008, meeting, the Emergency Telephone Service Committee changed its name to reflect current systems and technology. Its original creation and purpose remains the same.

Static Subscriber

A subscriber who uses a device that is static during a call and has a static IP address assigned to it. Static subscribers use cable and DSL VoIP, often deployed in static configurations in which the end user stays at a fixed location and uses the standard North American Numbering Plan. Examples of this service include residential landline replacements using cable or DSL connections.

Switch

Telephone company facility where subscriber lines or interswitch trunks are joined to switching equipment for connecting subscribers to each other, locally, or long distance.

(911) System Service Provider

The entity that manages, maintains and provides various 911 elements such as ALI database, MSAG to Public Safety Answering Points. This function is often performed by the LEC.

Tariff

The rate approved by the Public Service Commission for 911 service provided by a particular service supplier. Tariff does not include a rate of a commercial mobile radio service by a particular supplier.

Telecommunicator

As used in 911, a person who is trained and employed in public safety telecommunications. The term applies to call takers, dispatchers, radio operators, data terminal operators, or any combination of such functions in a PSAP.

Tentative 911 Service Plan

A plan prepared by 1 or more counties for implementing a 911 system in a specified 911 service district.

TCC Text Control Centers

Nationally, the wireless carriers and their vendors are establishing a small network of TCC's to interface between carrier-originated wireless 911 text users and the PSAP environment.

Transfer Method

A PSAP transfers the 911 call directly to the appropriate public safety agency or other provider of emergency service that has an available emergency service unit located closest to the request for emergency service for dispatch of an emergency service unit.

Trunk

Typically, a communication path between central office switches, or between the 911 Control Office and the PSAP.

Universal Emergency Number Service

Public telephone service that provides service users with the ability to reach a public safety answering point by dialing the digits "911." Also referred to as "911 Service."

Universal Emergency Number Service System

A system for providing 911 service under P.A. 80 of 1999. Also referred to as "911 System."

V-E2 An extension to the E2 ALI interface (specified in TIA J-STD-036)

V-E2 is defined by the NENA VoIP Location Working Group. V-E2 provides support for a "VoIP" class-of-service indicator in the response message from the VPC to the ALI.

VoIP Voice Over Internet Protocol

VoIP is a system for providing telephone service over the internet.

VPC VoIP Positioning Center

The application that determines the appropriate PSAP, based on the VoIP subscriber's position, returns associated routing instructions to the VoIP network, and provides the caller's location and the callback number to the PSAP through the ALI.

VoIP Provider

A generic term to describe a company that provides VoIP call services. Some VoIP providers provide direct service to the consumer (VoIP service providers). Others provide backbone and PSTN access services (VoIP carriers). Still others provide ESGW (ESGW operators). Some VoIP providers provide more than one of these Services.

WAN Wide Area Network

A network that covers a broad area (i.e., any telecommunications network that links across metropolitan, regional, or national boundaries) using private or public network transports.

Wireless

A phone system that operates locally without wires, using radio links for call transport.

Wireless Emergency Service Order

The order of the Federal Communications Commission. FCC docket No. 94-102, adopted June 12, 1996, with an effective date of October 1, 1996.

Wireless Phase I

Required by FCC Report and Order 96-264 pursuant to Notice of Proposed Rule Making (NPRM) 94-102. The delivery of a wireless 911 call with callback number and identification of the cell-sector from which the call originated. Call routing is determined by cell-sector.

Wireless Phase II

Under the new horizontal location rules, all carriers must provide a "dispatchable" location within 50 meters for the following percentages of wireless 911 calls, and within the following timeframes:

- within 2 years: 40 percent of all wireless 911 calls.
- within 3 years: 50 percent of all wireless 911 calls.
- within 5 years: 70 percent of all wireless 911 calls.
- within 6 years: 80 percent of all wireless 911 calls.

All CMRS providers must also meet the following vertical location requirements.

- within 3 years: all carriers must make uncompensated barometric data available to PSAPs from any handset that has the capability to deliver barometric sensor data.
- within 3 years: nationwide carriers must use an independently administered and transparent test bed process to develop a proposed z-axis accuracy metric, and must submit the proposed metric to the Commission for approval.
- within 6 years: nationwide CMRS providers must deploy either (1) dispatchable location, or (2) z-axis technology that achieves the Commission-approved z-axis metric, in each of the top 25 Cellular Market Areas (CMAs).
- within 8 years: nationwide CMRS providers must deploy dispatchable location or z-axis technology in accordance with the above benchmarks in each of the top 50 CMAs.

The FCC also set a 30-second time limit on generating a location fix for Phase II calls, but not for indoor call requirements, and a 90 percent “confidence” level for indoor-outdoor calls.

The clock for all of the timeframes began on March 4, 2015.

Wireless Telecommunications

The family of Telecommunications services under the heading of Commercial Mobile Radio Service. Includes Cellular, Personal Communications Services (PCS), Mobile Satellite Services (MSS), and Enhanced Specialized Mobile Radio (ESMR).

Wireline

The transmission of speech or data using wired connections.

For a more detailed listing of glossary terms, please see the website for the National Emergency Number Association at <http://www.nena.org/?page=Glossary>.