



911 Advisory Board
Funding Subcommittee

Funding Formula Recommendation
Calendar Year 2021

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911 ADVISORY BOARD EXECUTIVE SUMMARY

ACTION ITEM:

The Funding Subcommittee has developed a recommendation to change the distribution formula for 2021. The Board is asked to review the recommendation and vote whether to recommend adoption to PEMA.

REQUIREMENTS:

- The formula must be reviewed every two years (§ 5306.1); review required for calendar year 2021.

BACKGROUND:

- The current distribution formula meets legislative requirements and mirrors the Act 12 interim formula.
- The interim formula was based on 2010 – 2014 wireline revenue, VoIP revenue, and reported expenses.
- Common concerns cited with the interim and current formula:
 - Wireline revenue continues to decrease annually (Reduction of \$19 million since 2016)
 - VoIP revenue continues to gradually increase (\$5 million from 2016)
 - Standard accounting requirements did not exist prior to Act 12; inconsistent county reporting
 - There was no method in place to verify a county's reported expenditures
 - A large-scale project completed in 2010 – 2014 may artificially inflate a county's revenue

FORMULA REVIEW:

- The subcommittee began work to identify a formula recommendation in July 2018.
- A formula had to meet the following criteria to be considered for recommendation:
 - Fairly and proportionately reflect 911 system needs (§ 5306.1), be simple and based on objective data, and not be subject to manipulation
- Subcommittee efforts led to the development and review of 34 formula models.

RECOMMENDATION:

A formula based on 3% equal distribution; Remainder 97.5% population and 2.5% Population Density (Total)

RATIONALE:

- Recommendation best satisfies legislative requirements and subcommittee review criteria:
 - Each subscriber or consumer pays the \$1.65 surcharge for the provision of 911 services
 - A county is responsible for providing 911 service in their jurisdiction
 - Population represents where a person paid the surcharge for 911 service and is a fair and proportionate method to reflect 911 system needs
 - Population and population density are objective data sets obtained from the US Census, are readily available and understood by the public, and have little to no risk of manipulation
- Recommendation addresses 3% equal distribution concerns & impacts of how people communicate today:
 - 2.5% population density is included to reflect increased activity of mobile and digital devices and helps offset concerns of large counties due to contributing a large share of the equal distribution.
 - It is understood and accepted the 3% equal distribution is beneficial to small counties.
- Recommendation was developed with a holistic view of 911 funding (83% and 15%):
 - Since 2016, \$154.5 million of 15% funding has been awarded to support local 911 initiatives.
 - Ignoring 15% funding would discount an important component of 911 funding when considering a formula change.

I. 911 DISTRIBUTION FORMULA REQUIREMENTS

PEMA is directed by Chapter 53 of Title 35 of the Pennsylvania Consolidated Statutes to establish formulas and methods to distribute money in accordance with section 5306.1 (relating to fund) in consultation with the Board. (35 Pa. C.S. § 5303). The distribution formula shall be reviewed every two years and may be adjusted annually. (§ 5306.1). In developing and evaluating the distribution formula, PEMA, in consultation with the board, shall consider and may include the following factors that permit the formula to reflect 911 system needs (§ 5306.1):

- Base level costs common to all 911 systems.
- Population and population density.
- Call volume, including definition of what constitutes a call as published by the agency.
- Extenuating factors such as topography, concentrated exposure such as transit or industrial facilities, or cyclical exposures such as high-attendance public events.

The current distribution formula was established in 2017. The formula was reviewed for 2019 with no recommended changes. To meet the biennial requirement to review the formula, the 911 Advisory Board Funding Subcommittee has completed a review of the distribution formula to determine any adjustments for calendar year 2021.

II. BACKGROUND

Act 12 of 2015 (Act 12) changed how PEMA distributed 911 funding from a de facto competitive grant process to quarterly formula-based distributions. The formula distribution concurrently gives counties a defined amount that provides budget certainty and serves as an incentive to manage within available dollars; knowing that the difference comes from the county general fund or other revenue sources.

Act 12 Interim Formula:

Act 12 established an interim distribution formula. Under the interim formula, 83 % of the funds are to be distributed quarterly to the PSAPs as follows:

- A share equivalent to 106% times a PSAP's average 5-year wireline revenue from 2010-2014.
- A share equivalent to 106% times a PSAP's average 5-year VoIP revenue from 2010-2014
- Any remaining fund will be distributed based on a PSAP's average 5 year reported expenditures from 2010 - 2014.

Common concerns cited with the interim distribution formula include:

- Wireline revenue has significantly decreased as consumers move away from traditional wireline service. Total wireline revenue collections in 2016 were \$57.3 million compared to \$38.8 million in 2019.
- VoIP revenue continues to increase annually. Total wireline revenue collections in 2016 were \$49.5 million compared to \$54 million in 2019.
- Through 2014, counties only reported total expenditures on their Annual Report with no detail provided:
 - Standardized accounting procedures did not exist prior to Act 12. Counties likely reported expenditures in an inconsistent manner.
 - Verification of a county's reported expenditures was not possible given the financial reporting and audit requirements in the 911 Program prior to Act 12.
 - A county's revenue may be artificially inflated if a large-scale project was completed in between 2010-2014.
 - The interim distribution formula carried forward known deficiencies related to wireless 911 funding distribution, expenditure reporting, and oversight that existed prior to Act 12.

Current Distribution Formula:

Act 12 required PEMA, in consultation with the Board, to establish and implement a replacement of the interim formula no later than 18 months from the effective date of Act 12. The replacement formula must include:

- 3% equal distribution
- 80% based on a mathematical formula with at least 30% solely based on population.

PEMA, in consultation with the Board, established the replacement formula for calendar year 2017. The current distribution formula meets legislative requirements and uses simple math to mirror revenue a county would have received under the Interim Formula.

- 3% - Equal distribution among all PSAPs
- 80%- Distributed by mathematical formula
 - 30% - Based on population
 - 70% - Based on the “Revenue Difference Ratio”

The *Revenue Difference* for each PSAP was calculated using the following steps:

- Determine revenue a county would have received using the interim distribution formula at \$314 million.
- Subtract a 3% equal distribution at \$314 million.
- Subtract a 30% distribution based on population at \$314 million.

Some common concerns cited with the interim formula apply to the replacement formula as the portion after the 3% equal distribution and 30% based on population is based on wireline revenue, VoIP revenue, and reported expenditures from 2010 – 2014.

III. FUNDING SUBCOMMITTEE FORMULA REVIEW

To meet the biennial requirement to review the formula, the 911 Advisory Board Funding Subcommittee has completed a review of the distribution formula to determine any adjustments for calendar year 2021.

Assumptions:

- Counties desire a change to the distribution formula to address common formula concerns and resolve remaining issues with 911 funding prior to Act 12.
- 911 surcharge revenue collections average \$316 million annually since 2016. If the formula is changed, counties understand and accept they will see an increase or decrease in their 83% formula revenue.

Review Criteria:

The subcommittee identified criteria a formula had to meet to be considered for recommendation. A formula must:

- Fairly and proportionately reflect 911 system needs (§ 5306.1)
- Be simple
- Be based on objective data
- Not be subject to manipulation

Review Process:

Subcommittee discussions began in July 2018 to identify a formula replacement. The subcommittee discussed the factors required by Act 12 along with numerous other factors (i.e. reported expenditures, CAD events, public road

mileage, etc.). Subcommittee discussions led to the development and review of 34 formula models. Detail on the subcommittee's consideration of formula factors is below.

Population and population density:

The subcommittee elected to include population and population density in their recommendation:

- Population reflects a fair method to distribute revenue as it can be reasonable assumed population reflects where a person has paid the \$1.65 surcharge for 911 service
- Population provides a proportionate method for distributing revenue; population size is directly related to the amount of revenue a county receives
- Population factors have a known, objective dataset (US Census)
- Population data sets are readily available to and reasonably understood by the public
- Population has minimal risk to manipulation
- Population provides all stakeholders with the ability to project revenue and provides budget certainty

Base-level costs common to all 911 systems:

The subcommittee elected to not include base level costs common to all 911 system in their recommendation for the following reasons:

- A known, objective data set of base-level costs common to all 911 systems does not exist
- The factor would be subject to manipulation pressure if included in the formula
- Note: A framework of base level costs will take significant effort to develop and maintain. However, PEMA is working to develop a framework of base-level costs as it is an important consideration for many other aspects of the 911 Program such as:
 - 911 system planning
 - Proactive budgeting
 - Determining 15% funding allocations
 - Eligibility determinations
 - Further definition of capital and operating reserve caps

Call Volume:

The subcommittee elected to not include call volume in their recommendation for the following reasons:

- Counties currently report call volume data using a variety of methods
- PSAP configurations and operations differ by county and have an impact on call volume reporting
- A standardized, reliable statewide call dataset does not exist
- Call volume has a high risk of manipulation
- A statewide call accounting system may help standardize the collection of call volume data. However, only a portion of PSAP activity would be captured in a standardized manner and the data would not capture all PSAP activity (i.e. alarm calls). Also, the data would still be subject to manipulation based on PSAP operations and configuration.

Extenuating factors:

Extenuating factors were a significant part of discussions in the funding subcommittee. The subcommittee elected to not include call extenuating factors in their recommendation for the following reasons:

- Every county has activity and extenuating factors they would like to capture in the formula.
- Trying to quantify this activity and their extenuating factors is subjective or a method is not available to effectively measure.

- It is unlikely an agreement would be reached on how to fairly and accurately reflect a county's operating circumstances in the formula.

Reported Expenditures:

A common suggestion from stakeholders outside of the subcommittee is to update the formula with current expenditure data. The subcommittee evaluated a model that revised the current formula using reported expenditure data from 2016 – 2018. The subcommittee elected to not include reported expenditures in their recommendation for the following reasons:

- There is high confidence in the expenditure data reported for costs funded by the 911 surcharge. However, it appears there are differences in the way counties account for and report 911 related expenditures not funded by the surcharge. Reported expenditures not funded by the 911 surcharge have a high risk of manipulation. It is assumed reported expenditures would not provide a comprehensive or consistent data set for each county.
- It is understood the next opportunity for an increase to the 911 surcharge will be in 2024 with no indications that an increase will occur. A sustainable 911 Fund and 911 System are a primary focus of the Pennsylvania 911 community as provided in the Statewide 911 Plan. The subcommittee felt a formula based on reported expenditures works against that focus and encourages inefficiencies. The subcommittee was concerned about creating a “spend more to get more” environment where there is incentive to increase expenditures.
- There was sentiment in the subcommittee that counties approached the pre-Act 12 wireless funding process much differently. The wireless funding process encouraged counties to request as much funding as possible to get more wireless revenue. The subcommittee felt counties that took a more conservative approach to the wireless funding process continue to be negatively impacted today. The cumulative effects over the years have artificially created disparities between counties in areas such as wages and capabilities. Because of the continued impacts of the wireless funding process, the subcommittee felt strongly that reported expenditures does not fairly and proportionately reflect 911 system needs.

The subcommittee discussed numerous other factors (i.e. CAD events, public road mileage, etc.) and in general the factors did not meet the criteria established by the subcommittee to recommend a formula. Please see Appendix B for a list of formula models reviewed by the subcommittee.

IV. SUBCOMMITTEE RECOMMENDATION

The consensus in the subcommittee is the current formula is unfair, based on subjective data, and past its useful life. Changing the formula advances the Pennsylvania 911 community on the path to a fair and transparent 911 Program. This also offers the 911 community an opportunity to address some key issues remaining from the wireless funding process. The subcommittee is focused on working with PEMA to alleviate the impacts of a formula change and to address 911 system needs through a planned and coordinated approach inclusive of all 911 funding (83% and 15%). The 911 subcommittee is recommending updating to the distribution formula in 2021 to:

- 3% equal distribution; Remainder 97.5% population and 2.5% Population Density (Total)

V. RATIONALE

The recommendation meets legislative requirements and best satisfies the review criteria based on objective data available today:

- The recommendation satisfies legislative requirements by including a 3% equal distribution and distributing 80% of revenue based on a mathematical formula with at least 30% solely based on population.
- Population and population density best meet the criteria established by the subcommittee. See “Population and population density” in Section III. Funding Subcommittee Formula Review.
- 18% of 911 revenue collections are already being redistributed among counties through the 3% equal distribution and 15% funding process. It is reasonable to assume population reflects where a person has paid the \$1.65 surcharge for 911 service. With the amount of revenue already being redistributed, the subcommittee did not see a need to introduce factors that further redistribute funds among counties.

The recommendation addresses concerns with the required 3% equal distribution and acknowledges the increased activity due to how people communicate today – largely through mobile and digital devices.

- 2.5% population density is included to reflect the impact of increased activity of mobile and digital devices on PSAP operations.
- The subcommittee understands and accepts the 3% equal distribution is beneficial to smaller counties.
- However, larger counties feel they are negatively impacted by the 3% equal distribution as they essentially contribute a large share of the funding to support that formula requirement. The inclusion of population density offsets some of the impact of the equal distribution on larger counties.

The subcommittee has taken a holistic view of 911 funding inclusive of 83% funds and 15% funds.

- Since 2016, \$154.5 million of 15% funding has been awarded to counties across Pennsylvania to support 911 initiatives. Please see Appendix C for 15% funding amounts by county.
- On average, \$47 million is available for statewide interconnectivity purposes annually.
- The perception that 15% funding is discretionary funding is inaccurate. Statewide interconnectivity funds represent a significant portion of annual 911 surcharge revenue. These funds are becoming an increasingly important part of covering county 911 expenditures. To discount 15% funds prohibits a comprehensive picture of 911 funding and may hinder our ability to effect improvements to the distribution formula.

VI. FORMULA IMPLEMENTATION PLAN

PEMA and the subcommittee recognize there are many impacts to changing the distribution formula (financial, political, etc.). Together, we developed a plan to implement the formula in 2021 but alleviates a portion of the financial impacts for two years through 2022. The formula would be implemented as follows:

1. The formula would take effect when the payments for the 1st quarter of 2021 are calculated.
 - 2020 census data is expected to be released by March 31, 2021. Should the 2020 census data not be available, the most recent Census estimates will be used for population and population density.
2. For counties that will realize a revenue decrease because of the formula adjustment, 15% funds will be used to offset 50% of the calculated revenue adjustment in 2021 and 2022. No action is required of a county to receive revenue under this method.

- Each quarter PEMA will compare the revenue a PSAP received under the old formula to the new formula and will include 50% of the difference in the quarterly payment amount to the counties that will realize a revenue decrease contingent upon the availability of funds.
- As an option, a county may request to receive 100% of the revenue adjustment in 2021 and not receive any revenue adjustment in 2022. A county must notify PEMA in writing of selecting this option by August 14, 2020.

VII. PEMA POSITION

PEMA understands changing the formula is a difficult issue. We are supportive of a formula transition plan that alleviates funding impacts to counties as much as possible. PEMA is committed to meeting county needs through other established methods such as incentivizing efficiencies and statewide contracts. An example is the coming statewide NG911 system project where 15% funds will be used to cover 911 call delivery costs that counties are funding today using 83% funds.

Common feedback PEMA has received from county partners is the formula is unfair, outdated, and must be changed. Counties will be the entities primarily impacted by a formula change. PEMA will not realize any tangible benefits or impacts to 911 Program operations from a formula change. Recognizing this is an important issue to our county partners, PEMA is supportive of efforts to find an optimal distribution formula.

PEMA was engaged in subcommittee discussions to develop a recommendation for a new formula. PEMA and the subcommittee did not take this task lightly as discussions spanned over a nearly two-year period. The subcommittee is aware of the impacts of a formula change and strongly considered funding decreases that counties will realize. To illustrate this point, eleven members of the subcommittee directly represent a county. Of the eleven members, five will realize a revenue decrease with a formula change. A clear message was sent regarding the desire for formula change with subcommittee members willing to support taking a decrease to implement a fair method for distributing 911 revenue to all PSAPs in Pennsylvania.

PEMA agrees with the subcommittee that stakeholders should take a comprehensive view of 911 funding inclusive of 83% and 15% funds. Not only has PEMA supported hundreds of projects across PA with 15% funds; we've also distributed remaining 15% funding balances back to the counties where possible. PEMA distributed the \$18.5 million remaining balance from the 2019 15% funding cycle to the counties through the distribution formula in February 2020.

PEMA, the 911 Advisory Board, and county partners have built a collaborative relationship under Act 12. The 911 Advisory is composed of a cross section of professionally-competent state, county, and local interests. PEMA acknowledges the Board is representative of Pennsylvania's 911 community and would accept the Board's recommendation regardless of outcome.

APPENDIX A – 911 ADVISORY BOARD FUNDING SUBCOMMITTEE

Jeff Boyle, PEMA (non-voting PEMA representative)

Gary Thomas, Allegheny County (Chair)

Chris Clark, Jefferson County (Vice Chair)

Brian Gottschall, Berks County

John Grappy, Erie County

Allen Weaver, Juniata County

Rick Molchany, Lehigh County

Fred Rosencrans, Luzerne County

Frank Jannetti, Mercer County

Nadine Dodge, Philadelphia

Dove Cohick, Tioga County

Lisa Schaffer, County Commissioners Association of Pennsylvania (CCAP)

Commissioner Matt Quesenberry, Elk County

Mark Greenthaner (PA NENA) (non-voting)

Doug Hill, CCAP (Member until December 2019)

Commissioner Jim Hertzler, Cumberland County (Member until December 2019)

Commissioner Mark McCracken, Clearfield County (Member until December 2019)

APPENDIX B – DISTRIBUTION FORMULAS REVIEWED

1.	3% Equal Distribution; Remainder 30% Population and 70% Reported Expenditures 2016 - 2018
2.	3% Equal Distribution; Remainder 30% Population and 70% CAD Events
3.	3% Equal Distribution; Remainder 30% Population and 70% Public Road Mileage
4.	3% Equal Distribution; Remainder 50% Population and 50% Public Road Mileage
5.	3% Equal Distribution; Remainder 70% Population and 30% Public Road Mileage
6.	3% Equal Distribution; Remainder 97% Population, 1% Call Volume, 1% Population Density, and 1% Public Road Mileage
7.	3% Equal Distribution; Remainder 97% Population, 2% Call Volume, 1% Population Density,
8.	3% Equal Distribution; Remainder 30% Population and 70% Population Difference Ratio (Current formula using population rather than reported expenditures)
9.	5% Equal Distribution; Remainder 100% Population
10.	6% Equal Distribution; Remainder 100% Population
11.	7% Equal Distribution; Remainder 100% Population
12.	8% Equal Distribution; Remainder 100% Population
13.	9% Equal Distribution; Remainder 100% Population
14.	10% Equal Distribution; Remainder 100% Population
15.	3% Equal Distribution; Remainder 100% Population
16.	3% Equal Distribution; Remainder 90% Population and 10% Call Volume
17.	3% Equal Distribution; Remainder 80% Population and 20% Call Volume
18.	3% Equal Distribution; Remainder 70% Population and 30% Call Volume
19.	3% Equal Distribution; Remainder 60% Population and 40% Call Volume
20.	3% Equal Distribution; Remainder 50% Population and 50% Call Volume
21.	5% Equal Distribution; Remainder 100% Average by Class of County
22.	3% Equal Distribution; Remainder 99% Population, 1% Population Density (Total)
23.	3% Equal Distribution; Remainder 98% Population, 2% Population Density (Total)
24.	3% Equal Distribution; Remainder 97.5% Population, 2.5% Population Density (Total)
25.	3% Equal Distribution; Remainder 97% Population, 3% Population Density (Total)
26.	3% Equal Distribution; Remainder 96% Population, 4% Population Density (Total)
27.	3% Equal Distribution; Remainder 95% Population, 5% Population Density (Total)
28.	3% Equal Distribution; Remainder 99% Population, 1% Population Density (Land Only)
29.	3% Equal Distribution; Remainder 98% Population, 2% Population Density (Land Only)
30.	3% Equal Distribution; Remainder 97% Population, 3% Population Density (Land Only)
31.	3% Equal Distribution; Remainder 96% Population, 4% Population Density (Land Only)
32.	3% Equal Distribution; Remainder 95% Population, 5% Population Density (Land Only)
33.	3% Equal Distribution; Remainder 94.73% Population, \$4,350,512.26 Equal Distribution Offset
34.	3% Equal Distribution and \$4,350,512.26 Equal Distribution Offset; Remainder 97.5% population and 2.5% population density

APPENDIX C – STATEWIDE INTERCONNECTIVITY FUNDING

County	2016	2017	2018	2019	Grand Total
Adams	\$0	\$0	\$154,859	\$241,322	\$396,181
Allegheny	\$7,796,150	\$3,823,476	\$6,111,727	\$3,418,312	\$21,149,664
Armstrong	\$1,654,388	\$95,237	\$1,515,806	\$466,561	\$3,731,992
Beaver	\$426,071	\$26,362	\$485,789	\$3,859,422	\$4,797,644
Bedford	\$0	\$121,872	\$143,473	\$321,391	\$586,737
Berks	\$7,659	\$37,230	\$0	\$114,449	\$159,338
Blair	\$0	\$157,643	\$144,831	\$799,012	\$1,101,486
Bradford	\$600,700	\$695,412	\$194,436	\$94,810	\$1,585,357
Bucks	\$0	\$0	\$0	\$198,000	\$198,000
Butler	\$228,422	\$16,756	\$981,064	\$157,778	\$1,384,020
Cambria	\$345,349	\$802,804	\$536,261	\$149,378	\$1,833,792
Carbon	\$473,781	\$14,563	\$181,688	\$143,263	\$813,295
Centre	\$0	\$434,294	\$853,676	\$97,552	\$1,385,522
Chester	\$3,451,891	\$9,800	\$0	\$0	\$3,461,691
Clinton	\$516,041	\$0	\$0	\$0	\$516,041
Columbia	\$1,362,783	\$626,564	\$4,786,010	\$2,077,931	\$8,853,288
Cumberland	\$0	\$0	\$0	\$453,943	\$453,943
Dauphin	\$118,035	\$73,006	\$567,963	\$1,598,238	\$2,357,242
Delaware	\$0	\$1,949,007	\$0	\$323,000	\$2,272,007
Elk	\$1,445,270	\$5,176,592	\$2,061,593	\$1,791,770	\$10,475,225
Fayette	\$1,641,629	\$121,193	\$1,215,797	\$466,570	\$3,445,190
Franklin	\$0	\$0	\$154,859	\$51,912	\$206,771
Fulton	\$3,030,952	\$429,338	\$97,606	\$254,856	\$3,812,753
Greene	\$390,051	\$48,266	\$226,990	\$97,851	\$763,159
Huntingdon	\$0	\$425,144	\$134,954	\$144,314	\$704,412
Indiana	\$1,003,840	\$87,822	\$502,237	\$188,016	\$1,781,914
Juniata	\$815,092	\$550,723	\$241,791	\$119,000	\$1,726,606
Lackawanna	\$574,677	\$232,644	\$179,150	\$1,491,100	\$2,477,570
Lancaster	\$0	\$0	\$0	\$667,505	\$667,505
Lawrence	\$234,919	\$91,675	\$843,329	\$133,747	\$1,303,670
Lebanon	\$0	\$0	\$2,628,866	\$366,013	\$2,994,879
Lehigh	\$7,779,760	\$4,993,322	\$1,689,115	\$1,035,353	\$15,497,549
Luzerne	\$48,000	\$70,000	\$117,878	\$71,422	\$307,300
Lycoming	\$600,725	\$0	\$0	\$0	\$600,725
Mercer	\$311,288	\$26,360	\$404,031	\$890,939	\$1,632,618
Mifflin	\$1,188,587	\$15,750	\$681,744	\$54,538	\$1,940,619
Monroe	\$9,246,325	\$1,169,769	\$1,085,219	\$396,020	\$11,897,333
Montgomery	\$44,172	\$36,465	\$114,172	\$1,208,135	\$1,402,944
Northampton	\$2,681,425	\$1,441,410	\$1,358,778	\$1,121,609	\$6,603,222
Northumberland	\$0	\$0	\$0	\$126,969	\$126,969

County	2016	2017	2018	2019	Grand Total
Perry	\$0	\$479,093	\$156,740	\$326,348	\$962,181
Philadelphia	\$0	\$0	\$5,877,065	\$612,205	\$6,489,270
Pike	\$406,625	\$104,843	\$224,690	\$200,498	\$936,656
Potter	\$0	\$534,118	\$0	\$95,252	\$629,369
Schuylkill	\$0	\$69,814	\$243,094	\$147,617	\$460,525
Snyder	\$837,855	\$2,909,747	\$114,253	\$78,020	\$3,939,875
Somerset	\$294,278	\$1,204,437	\$417,634	\$343,463	\$2,259,812
Sullivan	\$538,898	\$3,967	\$0	\$0	\$542,866
Susquehanna	\$48,000	\$70,000	\$93,190	\$161,469	\$372,659
Tioga	\$154,184	\$0	\$0	\$0	\$154,184
Union	\$496,627	\$0	\$0	\$0	\$496,627
Venango	\$3,797,638	\$255,428	\$513,847	\$506,097	\$5,073,010
Washington	\$0	\$6,000	\$58,798	\$183,403	\$248,201
Wayne	\$0	\$43,976	\$185,114	\$132,722	\$361,811
Westmoreland	\$1,144,526	\$99,571	\$756,478	\$277,615	\$2,278,190
Wyoming	\$0	\$955,291	\$0	\$40,617	\$995,908
York	\$114,336	\$0	\$0	\$869,017	\$983,353
Grand Total	\$55,850,952	\$30,536,784	\$39,036,600	\$29,166,340	\$154,590,676

Please Note:

There are many instances where a county will serve as a fiduciary agent for a region (group of counties). For example, Elk county serves as the fiduciary for the 10 county Norther Tier region. The 10 counties share a 911 network, 911 call handling equipment, computer aided dispatch system, logging/recorder, and dispatch protocol system. All 911 grant awards to support these shared initiatives are provided to Elk county who handles all of the procurements, vendor payments, and financial activity of the 10-county region. These awards will be reflected in totals for Elk County rather than each county that benefits from the award.

There will be some variations in how funds are awarded to counties depending on which counties are involved in a project. In general, fiduciary counties (bold) and counties supported are as follows:

1. **NECore - Monroe**, Carbon, Lackawanna, Luzerne, Pike, Schuylkill. Susquehanna. Wayne
2. **Lehigh Valley - Lehigh**, Northampton (Allentown & Bethlehem before consolidation)
3. **North Central - Columbia**, Clinton, Lycoming, Mifflin, Montour, Northumberland, Snyder, Sullivan, Tioga, Union
4. **Northern Tier – Elk**, Cameron, Clarion, Clearfield, Crawford, Erie, Forest, Jefferson, McKean, Warren
5. **NorthCom – Bradford**, Potter, Wyoming
6. **Southern Alleghenies – Blair**, Bedford, Centre, Fulton, Huntingdon
7. **South East - Philadelphia**, Berks, Bucks, Chester, Delaware, Montgomery
8. **WestCore - Allegheny**, Armstrong, Beaver, Butler, Cambria, Fayette, Greene, Indiana, Lawrence, Mercer, Somerset, Venango, Washington, Westmoreland
9. **Lebanon**, York

APPENDIX D – FORMULA RECOMMENDATION EXAMPLE

1. Estimated Annual Revenue:	\$316,000,000
2. Statewide Interconnectivity Share (15%)	\$47,400,000
3. PEMA Administrative Share (2%)	\$6,320,000
4. Balance to be Distributed by Formula: <i>(Line 1 less Lines 2 & 3)</i>	\$262,280,000
83% Formula:	
5. 3% - Equal Distribution <i>(line 4 x .03)</i>	\$9,480,000
6. 80% Distributed by Formula <i>(line 4 less Line 5)</i>	\$252,800,000
7. 97.5% - Population <i>(Line 6 x .975)</i>	\$246,480,000
8. 2.5% - Population Density <i>(Line 6 x .025)</i>	\$6,320,000

County	Equal Share	POPULATION	PERCENT	Pop. Revenue	DENSITY	PERCENT	Den. Revenue	Total Revenue	Current Formula	Difference
ADAMS	\$141,493	102,811	0.80%	\$1,978,663	197.14	0.64%	\$40,670	\$2,160,825	\$2,012,513	\$148,312
ALLEGHENY	\$141,493	1,218,452	9.51%	\$23,449,882	1,636.14	5.34%	\$337,537	\$23,928,912	\$22,823,164	\$1,105,748
ARMSTRONG	\$141,493	65,263	0.51%	\$1,256,028	98.22	0.32%	\$20,263	\$1,417,784	\$1,340,914	\$76,870
BEAVER	\$141,493	164,742	1.29%	\$3,170,564	371.12	1.21%	\$76,563	\$3,388,620	\$3,391,168	(\$2,548)
BEDFORD	\$141,493	48,176	0.38%	\$927,178	47.35	0.15%	\$9,769	\$1,078,439	\$856,965	\$221,474
BERKS	\$141,493	420,152	3.28%	\$8,086,092	485.35	1.58%	\$100,128	\$8,327,712	\$7,930,944	\$396,768
BLAIR	\$141,493	122,492	0.96%	\$2,357,436	232.38	0.76%	\$47,941	\$2,546,870	\$2,267,576	\$279,294
BRADFORD	\$141,493	60,833	0.47%	\$1,170,770	52.40	0.17%	\$10,809	\$1,323,072	\$1,233,648	\$89,424
BUCKS	\$141,493	628,195	4.91%	\$12,090,012	1,009.78	3.30%	\$208,318	\$12,439,823	\$12,923,712	(\$483,890)
BUTLER	\$141,493	187,888	1.47%	\$3,616,024	236.40	0.77%	\$48,769	\$3,806,286	\$2,600,112	\$1,206,173
CAMBRIA	\$141,493	131,730	1.03%	\$2,535,227	189.97	0.62%	\$39,191	\$2,715,911	\$2,793,402	(\$77,491)
CAMERON	\$141,493	4,492	0.04%	\$86,451	11.27	0.04%	\$2,325	\$230,269	\$158,188	\$72,080
CARBON	\$141,493	64,227	0.50%	\$1,236,089	165.86	0.54%	\$34,218	\$1,411,799	\$1,438,880	(\$27,081)
CENTRE	\$141,493	162,805	1.27%	\$3,133,286	146.43	0.48%	\$30,208	\$3,304,986	\$2,420,733	\$884,253
CHESTER	\$141,493	522,046	4.08%	\$10,047,107	687.07	2.24%	\$141,744	\$10,330,343	\$11,636,147	(\$1,305,804)
CLARION	\$141,493	38,779	0.30%	\$746,326	63.68	0.21%	\$13,138	\$900,957	\$1,164,649	(\$263,692)
CLEARFIELD	\$141,493	79,388	0.62%	\$1,527,872	68.81	0.22%	\$14,195	\$1,683,560	\$1,642,142	\$41,418
CLINTON	\$141,493	38,684	0.30%	\$744,498	43.07	0.14%	\$8,886	\$894,877	\$1,092,245	(\$197,368)
COLUMBIA	\$141,493	65,456	0.51%	\$1,259,742	133.64	0.44%	\$27,570	\$1,428,805	\$1,204,512	\$224,293

County	Equal Share	POPULATION	PERCENT	Pop. Revenue	DENSITY	PERCENT	Den. Revenue	Total Revenue	Current Formula	Difference
CRAWFORD	\$141,493	85,063	0.66%	\$1,637,091	81.97	0.27%	\$16,910	\$1,795,494	\$1,491,760	\$303,734
CUMBERLAND	\$141,493	251,423	1.96%	\$4,838,795	456.19	1.49%	\$94,112	\$5,074,399	\$5,708,295	(\$633,896)
DAUPHIN	\$141,493	277,097	2.16%	\$5,332,908	497.01	1.62%	\$102,533	\$5,576,933	\$5,903,262	(\$326,329)
DELAWARE	\$141,493	564,751	4.41%	\$10,868,992	2,960.84	9.66%	\$610,823	\$11,621,308	\$12,442,171	(\$820,864)
ELK	\$141,493	30,169	0.24%	\$580,622	36.25	0.12%	\$7,479	\$729,593	\$1,021,762	(\$292,170)
ERIE	\$141,493	272,061	2.12%	\$5,235,987	174.58	0.57%	\$36,015	\$5,413,495	\$5,051,649	\$361,846
FAYETTE	\$141,493	130,441	1.02%	\$2,510,420	163.46	0.53%	\$33,722	\$2,685,634	\$2,274,269	\$411,366
FOREST	\$141,493	7,279	0.06%	\$140,089	16.87	0.06%	\$3,481	\$285,062	\$209,997	\$75,065
FRANKLIN	\$141,493	154,835	1.21%	\$2,979,898	200.40	0.65%	\$41,343	\$3,162,733	\$3,115,643	\$47,090
FULTON	\$141,493	14,523	0.11%	\$279,504	33.16	0.11%	\$6,840	\$427,837	\$420,807	\$7,030
GREENE	\$141,493	36,506	0.29%	\$702,581	63.16	0.21%	\$13,031	\$857,105	\$797,894	\$59,210
HUNTINGTON	\$141,493	45,168	0.35%	\$869,287	50.81	0.17%	\$10,481	\$1,021,261	\$930,655	\$90,606
INDIANA	\$141,493	84,501	0.66%	\$1,626,275	101.28	0.33%	\$20,895	\$1,788,663	\$2,485,046	(\$696,383)
JEFFERSON	\$141,493	43,641	0.34%	\$839,899	66.44	0.22%	\$13,706	\$995,097	\$1,106,965	(\$111,868)
JUNIATA	\$141,493	24,704	0.19%	\$475,444	62.77	0.20%	\$12,949	\$629,886	\$932,877	(\$302,991)
LACKAWANNA	\$141,493	210,793	1.65%	\$4,056,845	453.80	1.48%	\$93,618	\$4,291,956	\$4,430,782	(\$138,826)
LANCASTER	\$141,493	543,557	4.24%	\$10,461,100	552.50	1.80%	\$113,981	\$10,716,574	\$9,518,399	\$1,198,175
LAWERENCE	\$141,493	86,184	0.67%	\$1,658,666	237.58	0.78%	\$49,013	\$1,849,171	\$1,761,883	\$87,287
LEBANON	\$141,493	141,314	1.10%	\$2,719,678	389.72	1.27%	\$80,400	\$2,941,571	\$2,838,790	\$102,781
LEHIGH	\$141,493	348,549	2.72%	\$6,708,047	1,000.60	3.27%	\$206,424	\$7,055,964	\$6,432,274	\$623,690
LUZERNE	\$141,493	317,646	2.48%	\$6,113,299	350.17	1.14%	\$72,239	\$6,327,031	\$6,257,390	\$69,641
LYCOMING	\$141,493	113,664	0.89%	\$2,187,536	91.39	0.30%	\$18,853	\$2,347,881	\$2,624,394	(\$276,513)
MCKEAN	\$141,493	40,968	0.32%	\$788,455	41.63	0.14%	\$8,588	\$938,535	\$1,190,520	(\$251,984)
MERCER	\$141,493	110,683	0.86%	\$2,130,165	162.16	0.53%	\$33,453	\$2,305,110	\$2,022,655	\$282,455
MIFFLIN	\$141,493	46,222	0.36%	\$889,572	111.49	0.36%	\$23,000	\$1,054,064	\$1,220,608	(\$166,544)
MONROE	\$141,493	169,507	1.32%	\$3,262,270	274.54	0.90%	\$56,638	\$3,460,400	\$4,190,723	(\$730,323)
MONTGOMERY	\$141,493	828,604	6.47%	\$15,947,010	1,699.87	5.55%	\$350,685	\$16,439,188	\$14,164,532	\$2,274,655
MONTOUR	\$141,493	18,240	0.14%	\$351,040	137.87	0.45%	\$28,442	\$520,975	\$499,406	\$21,569
NORTHAMPTON	\$141,493	324,358	2.53%	\$6,242,476	859.55	2.81%	\$177,325	\$6,561,293	\$7,694,047	(\$1,132,754)
NORTHUMBERLAND	\$141,493	91,083	0.71%	\$1,752,950	190.80	0.62%	\$39,362	\$1,933,804	\$1,447,291	\$486,514

County	Equal Share	POPULATION	PERCENT	Pop. Revenue	DENSITY	PERCENT	Den. Revenue	Total Revenue	Current Formula	Difference
PERRY	\$141,493	46,139	0.36%	\$887,974	83.02	0.27%	\$17,127	\$1,046,594	\$778,340	\$268,254
PHILADELPHIA	\$141,493	1,584,138	12.37%	\$30,487,741	11,105.85	36.25%	\$2,291,143	\$32,920,377	\$33,628,897	(\$708,520)
PIKE	\$141,493	55,933	0.44%	\$1,076,466	98.71	0.32%	\$20,364	\$1,238,323	\$1,387,104	(\$148,782)
POTTER	\$141,493	16,622	0.13%	\$319,901	15.37	0.05%	\$3,171	\$464,564	\$607,726	(\$143,162)
SCHUYLKILL	\$141,493	142,067	1.11%	\$2,734,170	181.53	0.59%	\$37,450	\$2,913,112	\$4,190,987	(\$1,277,875)
SNYDER	\$141,493	40,540	0.32%	\$780,218	122.05	0.40%	\$25,179	\$946,889	\$780,495	\$166,395
SOMERSET	\$141,493	73,952	0.58%	\$1,423,253	68.40	0.22%	\$14,111	\$1,578,857	\$1,415,688	\$163,169
SULLIVAN	\$141,493	6,071	0.05%	\$116,840	13.42	0.04%	\$2,769	\$261,102	\$439,145	(\$178,043)
SUSQUEHANNA	\$141,493	40,589	0.32%	\$781,161	48.76	0.16%	\$10,060	\$932,713	\$1,139,203	(\$206,490)
TIOGA	\$141,493	40,763	0.32%	\$784,510	35.84	0.12%	\$7,394	\$933,397	\$1,470,690	(\$537,294)
UNION	\$141,493	44,785	0.35%	\$861,916	141.22	0.46%	\$29,135	\$1,032,543	\$1,000,215	\$32,328
VENANGO	\$141,493	51,266	0.40%	\$986,647	75.06	0.25%	\$15,484	\$1,143,624	\$956,773	\$186,851
WARREN	\$141,493	39,498	0.31%	\$760,164	43.99	0.14%	\$9,076	\$910,733	\$800,520	\$110,213
WASHINGTON	\$141,493	207,346	1.62%	\$3,990,505	240.83	0.79%	\$49,684	\$4,181,682	\$4,025,459	\$156,223
WAYNE	\$141,493	51,276	0.40%	\$986,839	68.32	0.22%	\$14,094	\$1,142,426	\$1,278,115	(\$135,689)
WESTMORELAND	\$141,493	350,611	2.74%	\$6,747,731	338.32	1.10%	\$69,795	\$6,959,019	\$7,858,445	(\$899,426)
WYOMING	\$141,493	27,046	0.21%	\$520,517	66.81	0.22%	\$13,784	\$675,794	\$1,364,099	(\$688,305)
YORK	\$141,493	448,273	3.50%	\$8,627,298	492.47	1.61%	\$101,597	\$8,870,388	\$8,039,740	\$830,648
Total	\$9,480,000	12,807,060	100.00%	\$246,480,000	30,635	100%	\$6,320,000	\$262,280,000	\$262,280,000	

Note:

- The Current Formula Total for Lehigh includes the allocation amount for the City of Allentown prior to consolidation
- The Current Formula Total for Northampton includes the allocation amount for the City of Bethlehem prior to consolidation