EMS Transition: Phase 1 Summary

Scott County, Iowa

March 2023

PUBLIC CONSULTING GROUP

CONTENTS

Section 1: Phase Summary

Scott County (County) awarded a contract to Public Consulting Group, LLC (PCG) on January 4, 2023, to conduct an "EMS Transition Study." The primary scope of work was divided into two specific phases, which will culminate in a final report being provided to the County to help guide their future actions. Phase 1, the focus of this summary report, was to include the following:

a. Call volume and response time assessment highlighting countywide system demands/needs.

b. Operational overview needs assessment for a 9-1-1/ambulance service response system, including organizational structure, station overview, and (vehicle) apparatus needs evaluation.

c. Identifying potential impacts to 9-1-1 dispatching for emergency medical services throughout the County, such as call routing/PSAP transferring and/or processes for dispatching multiple units/agencies within the County.

d. Non-profit (MEDIC) to municipal/government-based (County) transition timeline development.

e. Modeling projections/processes should account for the entire county.

f. Engagement with relevant stakeholders.

g. A "Phase 1 Summary."

h. An in-person presentation to relevant stakeholders, coinciding with an on-site visit.

1.1 – Project Timeline

The County and multiple relevant stakeholders (transition team) had already been meeting on the topic of a potential transition of MEDIC into the County prior to PCG's engagement. Meeting minutes from the previous transition team meetings were reviewed by PCG prior to attending their first meeting on January 4th, 2023. Weekly update meetings were held every Wednesday to keep information flowing and to keep the transition on track for a possible July 1st, 2023, or January 1st, 2024 "go-live" date. Future projected milestone dates for the final report include an on-site visit at the end of March 2023, and the completion of a final report by July 2023.

1.2 – Disclaimer

This document represents the data and analysis available to the PCG team from Phase 1. As the data collection and analysis continues, there is always the possibility of information or conclusions changing. The final report provided for this study will contain much of this information and may have additional clarifications.

In the event of any conflicting information between this document and a later report, the information and conclusions in the later report should be seen to supersede those contained in this document.

1.3 – Acknowledgements

Phase 1 of this study, and the subsequent document, has been the result of significant stakeholder engagement. Representatives from the following agencies, in no specific order, are thanked for providing their insight into a possible transition:

- Scott County
- MEDIC EMS
- Iowa's Bureau of Emergency and Trauma Services
- Iowa Office of Department of Health and Human Services
- Scott Emergency Communications Center
- Iowa Board of Pharmacy
- The Iowa Public Safety Dispatcher Union
- Heninger and Heninger, P.C.
- Scott County EMS Association
- Scott County Fire Chief's Association
- Wheatland Emergency Medical Services
- Durant Ambulance Service
- Bennett Ambulance Service
- The City of Davenport
- The City of Bettendorf

Section 2: Call Volume and Response Times

2.1 – Call Volumes

Seen in **Figure 2.1**, there has been a steady year-to-year growth in call volume classified as dispatch priorities 1, 2, or 3. Calls classified in this manner can be understood to represent typical calls for emergency medical services. There has also been a slight decrease in the number of calls not directly related to 9-1-1 responses (i.e., interfacility transports, standbys, special events, and other assorted calls).

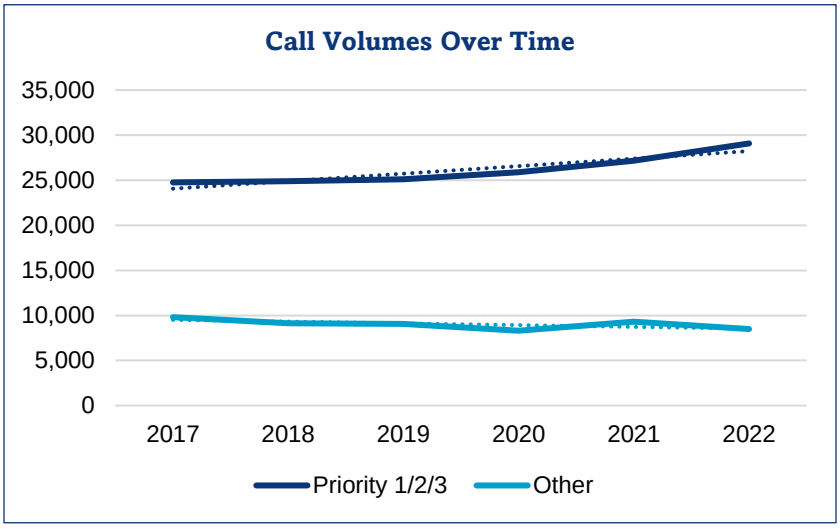

Figure 2.1: Call Volumes by Dispatch Priority

While the year-to-year growth in call volume since 2017 averages to approximately 2%, there has been a more significant increase since 2020, averaging 5% in year-to-year growth for the overall call volume. Only time will tell if these increases are solely due to COVID-19 patterns or if they are representative of a new normal for the communities served by MEDIC.

The "Other" calls noted in **Figure 2.1** represent interfacility transports, standbys, special events, calls outside of the service area, and other specialty services provided by MEDIC (i.e., dispatch priorities 4-9, cancelled calls, and courier calls). Most of these calls could be considered to be secondary responsibilities, as the primary responsibility of MEDIC is to respond to 9-1-1 calls for service (the priority 1/2/3 calls). When the 9-1-1 call volume increases, there is a drop in the "Other" call volume.

This suggests there is a capacity issue as increased 9-1-1 calls will often result in an increased number of transports, which should equate to an increased number of interfacility transports, among others. It should be noted that a large source of call volume, Select Specialty Hospital, recently relocated to Genesis Medical Center's East Campus. This agreement allows Select Specialty Hospital to utilize diagnostic and imaging services at Genesis, eliminating many transports that previously occurred because these services were not available at the Select campus.

There will still be a need for some transports, such as patients requiring to be transported back and forth to the University of Iowa, that will be incurred because of Select Specialty Hospital's contracts, but the overall number should drop significantly. It is estimated that these transports represented roughly $200,000 of annual revenue but were also responsible for significant unit utilization or decrease in overall available capacity, while units were waiting with critical patients.

Figure 2.2 displays the volume of combined (9-1-1 and scheduled/unscheduled transfers) mutual aid MEDIC received from other EMS agencies because they did not have the capacity to respond to those calls. Mutual aid calls are defined as responses that are assigned to MEDIC but are handled by agencies other than MEDIC.

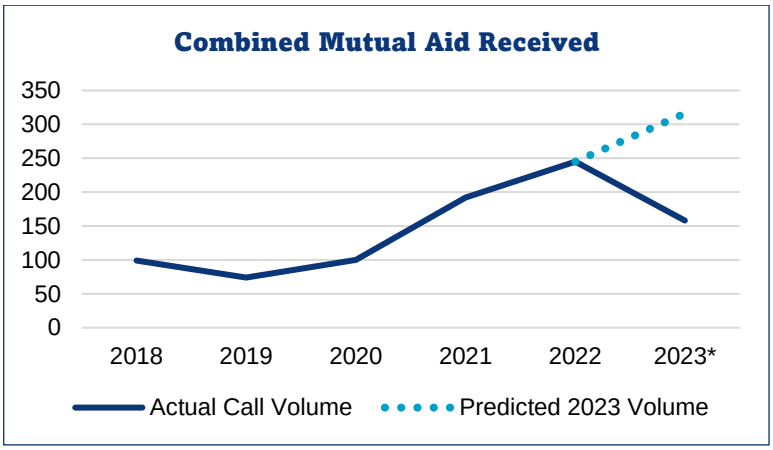

Figure 2.2: Combined Mutual Aid Received

There are multiple variables that could be responsible for the inability to respond to these calls, i.e., the lack of available capacity. Staffing at MEDIC has decreased over the past couple of years, averaging 95% of positions being filled from FY '18 – FY '20, but their fulltime staffing dropped as low as 71% for FY '22 and 72% for the first half of FY '23. The slight decrease in staffing from '20-'21, but the almost 100% increase in mutual aided calls suggests that this problem is likely due to system capacity (the number of ambulances available) related to volume increases coupled with staffing vacancies (See **Section 2.3** for more detailed information).

While one call per day may not significantly impact the revenue obtained from interfacility transports, the inability to respond to these calls suggests daily periods of strain on the system significant enough to limit the ability to respond, or potentially impact response times. FY22 dispatch volume increased 9.4%, and transport volume increased 8.8%. A major strength of MEDIC is their ability to respond to the responses generated by 9-1-1 calls. Since the beginning of the 2018 fiscal year, MEDIC only received mutual aid for 10 of their 9-1-1 calls (priority 1, 2, or 3). **Figure 2.3** shows the number of 9-1-1 calls that have been mutual aided to other agencies since 2018.

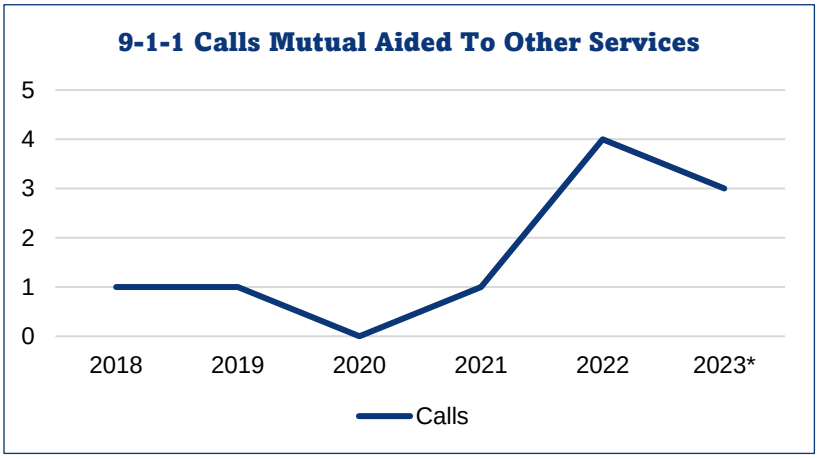

Figure 2.3: 9-1-1 Calls Mutual Aided To Other Services

The calls mutual aided to other services is approximately 1.2% of their mutual aid volume, and roughly 0.01% of their total call volume since FY '18. This suggests that MEDIC focuses heavily on being able to respond to the calls in their service areas and are willing to hold interfacility transports until their capacity allows. One of the reasons for this is the policy MEDIC has of keeping administrative staff on-call for when the demand is outpacing capacity. More information on this will be found in **Section 2.3**.

2.2 – Response Times

Response times are defined as the amount of time that it takes for a unit to arrive on the scene of a call for service after being dispatched. MEDIC EMS has been reporting times to the County based on when the call was received to when the unit arrived on scene. While being more indicative of the total time from calling 9-1-1 to receiving help, removing the call answering and processing time from the total response time can help delineate where in the process improvements can be made. Response times are traditionally indicative of the steps taken to ensure that response units are strategically positioned to respond to the incidents that they are dispatched to, while also being an early indicator of potential issues with capacity in a system. Studies dating back to the 1950s suggest that the time potentially saved by responding to calls for service with lights and sirens is not clinically, or operationally, appropriate in all but a few of the most specific cases and that the appropriate staging of units is more impactful on time saved.

When reviewing the response times, averages are frequently cited, but 90th percentiles are a more accurate predictor of when a unit would be expected to arrive. Utilizing 90th percentiles, or greater, allows for a transparent approach to communicating with the community and elected officials. **Table 2.1** represents the geographical areas that MEDIC responds to. **Table 2.1** also includes the response times for the City of Clinton, which resides outside of Scott County. These responses are part of an existing service agreement that MEDIC has with MercyOne Clinton. The services provided are detailed in **Section 3.3 – Specific Operational Notes**. The areas align with the emergency service areas (ESA) within Scott County, with the obvious exception of the City of Clinton, and are defined as follows:

- Metro: All of Davenport and Bettendorf
- Rural: All areas outside of the "Metro" that fall directly under MEDIC's ESA
- RSA: Areas within Scott County outside of MEDIC's ESA

Table 2.1 shows an overview of the average and 90th percentile response times for MEDIC from the past several years.

Area	Time	2017	2018	2019	2020	2021	2022
Metro	Average	0:05:06	0:06:13	0:06:34	0:06:33	0:06:38	0:06:38
	90th	0:08:04	0:09:43	0:10:20	0:10:30	0:10:36	0:10:38
Rural	Average	0:08:43	0:09:52	0:10:10	0:09:54	0:09:54	0:09:51
	90th	0:14:25	0:15:57	0:16:00	0:16:06	0:16:23	0:16:08
RSA	Average	0:22:58	0:14:00	0:13:15	0:15:46	0:11:12	0:10:51
	90th	0:38:22	0:17:58	0:20:14	0:25:26	0:13:38	0:16:58
City of Clinton	Average	0:06:57	0:06:58	0:07:33	0:07:59	0:09:11	0:08:35
	90th	0:09:48	0:10:09	0:10:27	0:10:56	0:13:42	0:12:25

Table 2.1: Response Times by Area and Calendar Year

See in **Table 2.2**, MEDIC reports their response fractiles to Scott County in a slightly different format. Their format is based on previously established performance targets. Both methods are accurate ways to display

response time frames. As an example, for 2017 **Table 2.1** suggests that MEDIC responded to 90% of their calls in 8 minutes and 4 seconds or less in the Metro area, whereas **Table 2.2** shows that MEDIC responded to 77.64% of their Code 1 responses in their target interval of less than 7 minutes and 59 seconds for six months in FY 22/23.

PERFORMANCE MEASUREMENT		2021-22 ACTUAL	2022-23 BUDGETED	2022-23 PROJECTED	6 MONTH ACTUAL
OUTCOME:	EFFECTIVENESS:				
Urban Code 1 Response times will be < 7 minutes 59 seconds	Response time targets will be achieved at > 90% compliance	78.98%	81.00%	82.50%	77.64%

Table 2.2: Example of MEDIC Fractile Reporting

Consistent with the response time goals that MEDIC has, as well as the general deployment of their resources, the metro area traditionally has lower response times overall versus the rest of Scott County. The unit based in the City of Clinton also has a lower response time but given that the purpose of this operation is to serve MercyOne-Clinton's scheduled/unscheduled ambulance transfer needs, this operation responds to 9-1-1 calls only when available. Response times have been gradually increasing across the two main areas of response for MEDIC, the metro and rural areas.

Response Time Standards

The most cited standard on EMS response times is NFA 1710: *Standard for the Organization and Deployment of Fire Suppression Operations, Emergency Medical Operations, and Special Operations to the Public by Career Fire Departments*. While specifically targeting "career fire departments," the less than 8-minute response for emergency medical calls is a very commonly found metric that EMS systems strive to meet. MEDIC exceeds the performance noted by agencies across the nation in a 2017 study on EMS response times[1]. In this nationwide study of 485 EMS agencies, the researchers found the 90th percentile response time to be 14 minutes for the suburban setting, 12 minutes for the urban setting, and 26 minutes for the rural setting. NFPA 450: *Guide for Emergency Medical Services and Systems* does not have specific time frames listed for response intervals.

As an example, for local response times, one of Iowa's neighboring states, Illinois, reported the median (middle of the set of times) and interquartile range (middle 50% of the response times) from 2015-2019 on their state website[2]. These times are an example of the metrics that a state, or county, can choose to publish for public viewing and transparency. The expected response times are generally set by what the community is willing to accept, but there are multiple illnesses or injuries (such as heart attacks and strokes) where time matters, and increased response times can lead to increased injury or death. The response times calculated for MEDIC are better than the posted response times of the counties in neighboring Illinois.

2.3 – Areas of Concern

Staffing

Staffing is an issue that has many layers and potentially far-reaching consequences. Shown in **Table 2.3** are the staffing levels, focusing on the full-time staffing, at MEDIC that have been decreasing over the past few years.

Year	2017	2018	2019	2020	2021	2022	2023*
Fulltime Percent Staffed	100% 76/76	96% 73/76	92% 70/76	92% 70/76	89% 68/76	71% 54/76	76% 58/76
Total Company Percent Staffed	79.6% 133/167	84.4% 141/167	94.6% 158/167	94.6% 158/167	94.6% 158/167	81% 136/168	91.1% 153/168
*Values as of 03/15/2023							

Table 2.3: Percent of Total Staffing

MEDIC administration has acknowledged these staffing challenges, especially among full-time personnel. While staffing is known to be a nationwide issue, MEDIC stated that there are some local challenges too, including the possibility of a transition to a county-based service. While the transition is not viewed as negative, it is probable that the uncertain nature of the transition may cause challenges in hiring. Another issue is these positions require certain amounts of emergency medical training and certifications prior to being eligible for hire. This means that replacing personnel that leave, or are otherwise unable to work, is not always a fast or easy process.

MEDIC is in an advantageous position because they are almost fully staffed with full-time Paramedics (37/38), which take longer to train and are in a more competitive job market than their EMT counterparts. MEDIC is currently at 19/38 full-time EMTs required for full staffing. This represents a potentially significant staffing cost, as the positions left vacant by the EMTs are being covered by the present EMTs, at an overtime rate, or Paramedics, which are considerably more expensive. While part-time or PRN staff are always a source of staffing, they should only be relied on to the extent of the hours they are required to work. A part-time employee providing 600 hours a year to an agency is likely going to be more useful than one providing 100 hours of availability.

These vacancies can also increase the stress on the overall system as there are days when 100% of the ambulances are not staffed and the employees are working more than initially intended, either with higher workloads on each employee or by having employees working overtime. Increased working hours can result in “poor individual outcomes such as stress and burnout, as well as to turnover within the workforce, thus reducing the number of individuals available to provide high quality emergency care.[3]” While exposing the agency to increased liability is a concern, the added stress of additional turnover can exacerbate the staffing issue.

Another issue is that MEDIC utilizes their administrative staff in operational roles, i.e., staffing ambulances, fairly regularly between daily operations and their on-call scheduling. While there have been no negative consequences directly attributed to this staffing model with MEDIC, there is always a concern that the administrative staff may be less effective, and more stressed, if they are expected to handle these dual roles so often. In an ideal setting, the administrative staff are able to work on more strategic level issues, instead of having to fill in for staff vacancies. This area of concern will need to be addressed immediately.

Table 2.3 focuses primarily on the full-time operational staffing for ambulances across MEDIC, but there is also a concern with the staffing specifically for MED-COM, which will be addressed in more detail in **SECTION 4**. It has been stated that dual-status Paramedics (Paramedics capable of working both on the ambulances as well as in MED-COM) from the operational staff have been pulled into MED-COM when unexpected illnesses occur to ensure there was an appropriate number of dispatching staff available. Both divisions need to be appropriately staffed.

Capacity

A concern echoed by the two larger Scott County municipalities, Bettendorf and Davenport, is the capacity that MEDIC currently has available to handle the call volume and potential growth. The population of Scott County overall has remained relatively static according to US census data from 2017-2021. Davenport has seen a decrease in population of less than 0.5%, and Bettendorf has seen an approximate 2.5% increase in population year-to-year. There has also been a population increase across the rest of the County. The changes in the population centers, or density, may require future adjustment of station locations, to provide equitable coverage. Recent population trends can be found in **Table 2.4**.

Government Entity	2017	2018	2019	2020	2021	Average Population Change
City of Bettendorf	35,833	36,356	36,573	39,107	39,327	2.01%
City of Davenport	102,460	102,094	101,989	101,584	101,009	-0.31%
Scott County	172,691	173,019	173,400	173,216	174,170	0.21%

Table 2.4: Population by District

While population is a reasonable metric to review when estimating call volume fluctuations, it is not the only variable. The changes seen in the population centers are less telling than the change in emergency call volumes for each of the areas over time. These changes can be seen in **Figure 2.3**.

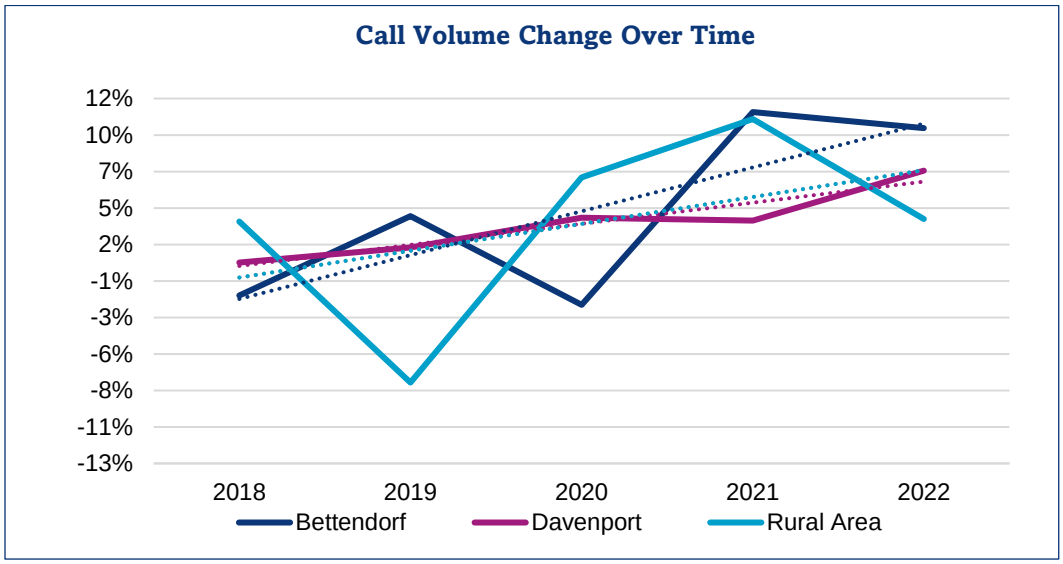

Figure 2.3: Call Volume Change Over Time

Seen in the figure above, there has been an increase in call volume for MEDIC over time, but the increased call volume in Bettendorf has doubled that of their neighbor, a 3% linear growth versus Davenport's growth of 1.44%, when represented as a linear trend. These trends not only represent a possible need for additional ambulances/resources, but they also represent a potential need for reallocation of those resources. Bettendorf appears to be a growing municipality and has created a significant number of housing developments for older adults who have a greater demand for ambulance services, while Davenport has a much more static growth.

The recent trends in population suggest that people are moving from more densely populated areas in favor of less densely populated suburban, or rural, areas and that the availability of remote work is making this trend possible. Acceptable response times should be established by reviewing applicable national standards and thorough communication with the community.

While MEDIC is accredited through the Commission on Accreditation of Ambulance Services (CAAS), CAAS does not enforce a specific EMS response standard. Conversely, they ensure that the agency understands their response times, and that they have a way to measure, report, and potentially improve those times. As noted earlier, response times are generally indicative of an agency's ability to appropriately locate response units, which is frequently directly related to the funding accessible to that agency for additional stations, ambulances, and staffing.

Certification in the State of Illinois

MEDIC currently requires that their providers are certified/licensed in both Iowa and Illinois. Illinois requires more hours of continuing education to renew an EMS certification (25/year as a Paramedic) than Iowa does, but they only require providers to renew once every 4 years versus Iowa's requirement to renew every other year. MEDIC staff states that employees are currently required to maintain certification in both states as a condition of their employment due to the possibility of needing to respond into Illinois for some calls. While this is typically not an issue when providing automatic aid to another area, if MEDIC continues to provide any scheduled transports, there would be the requirement for both state certifications to remain intact as well as their ambulance certifications to remain intact with the state.

If MEDIC chooses not to continue services that require Illinois agency/personnel licensure for any patient transport initiated in Illinois, there would likely be no reason for continued dual certification. It is common for EMS agencies to be able to function in scenarios where mutual aid is requested without dual certification. When agencies cross state lines, they are frequently functioning under the originating state's authority, rules, and protocols. These practices allow for a very clear delineation of authority and responsibility.

Given the possible differences in Illinois versus Iowa EMS protocols, having dual certifications could set both the providers and the agency up for more liability versus less. If there are protocol differences in each state, it would be incumbent on the providers to remember the protocol differences and act on them correctly. Typically, in a scenario where automatic aid is given into another state or jurisdiction, the provider is expected to act using the protocols that they are held to in their home jurisdiction. If the providers are certified in both states, that may not be the case. Every state is different, and this topic was not fully reviewed for the Phase 1 Summary. This would require communication with the Illinois Office of EMS, among other stakeholders, and will be a topic of further research.

Northwest Scott County

The northwestern quarter of Scott County is currently covered by three volunteer ambulance services. Referred to as the "Rural Scott County Ambulances" in MEDIC's computer aided dispatch (CAD) data, these services consist of Bennett Ambulance Service, Durant Ambulance Service, and Wheatland Emergency Medical Services. These services respond based on a "tiering model." This model states, regardless of the call type, the volunteer agency responsible for the area will be dispatched. That provider is then responsible to ask for assistance from a MEDIC ambulance, if needed. With this model, it is challenging to calculate the potential delays in care. It is important to note that MEDIC functions at the Paramedic level, where the rural ambulance services may respond at the EMT level, up to the Paramedic level.

Each service is staffed by volunteers of various certification levels. All three services reported that they respond to 95% or greater of the call volume that they are dispatched to, but each acknowledged an aging staff and no readily present plan for future sustainability. Cedar County for example, the seat of Durant Ambulance Service, is in the process of exploring the "essential service" designation to help ensure the future of EMS in their county. In their current state, none of the rural services can guarantee the same level of care provided by MEDIC.

Another issue with this model is the funding in place to provide for the tiering. If one of the rural ambulance services calls for a MEDIC unit to assist, there can be a fee for that service. With the level of billing and revenue generated by these transports, some of the rural agencies have reported that they actually take a loss on calls where they require MEDIC to assist. While none of the rural ambulance services are for profit businesses, there is still a legitimate concern that a provider may try to handle a patient care scenario above their ability to prevent the ambulance service from taking a loss. This fee has been a necessary item for MEDIC to ensure that they were reimbursed for the costs associated with responding to the rural ambulance services' area, but with a transition to the county, this practice should no longer occur.

As a County department, it will be incumbent on Scott County to ensure there is an equitable level of care throughout the County. **Figure 2.4** shows the general distribution of emergency calls across Scott County in 2022. Uniquely, this call distribution has been relatively unchanged since 2017.

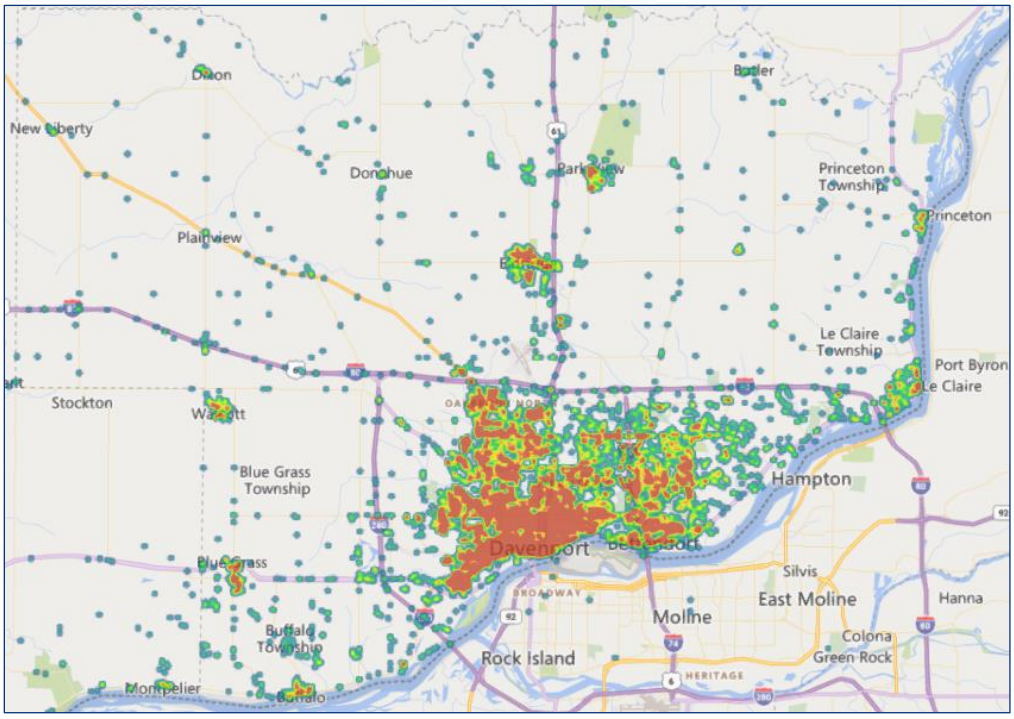

Figure 2.4: Emergency Call Distribution Across Scott County

The rural area ambulances provide significant value to the people of northwest Scott County, but there should be consideration in place as to where they fit in the continuity of care. The decline of volunteerism across the United States is not a new topic, nor is it an issue that only impacts EMS or EMS in Illinois. The trend is showing that is more and more challenging to recruit new volunteers and to consistently provide a reliable base of volunteers to draw from. All of the rural ambulance services echoed the issue, without prompting, that their membership was decreasing in numbers and rapidly getting older overall, suggesting that some of the current volunteers would not be able to continue their service for an extended period of time. An acceptable model of care would involve changing the dispatch procedures to always send a MEDIC unit and allow for the rural ambulance services to cancel the MEDIC unit once they arrive on scene and determine the call is within their capability.

Section 3: Operational Overview

The State of Iowa currently lacks any rules or regulations that require governmental entities to provide EMS services. The closest related language was enacted by Senate File 615 in June of 2021. This file being signed into law allowed for several changes across three primary Iowa Codes (357F, 357G, and 422D). The first two code provisions dictate the provision of funding for EMS through taxation across "Emergency Medical Service Districts," while the third gives counties the option to declare EMS an "essential service," providing for a maximum tax of $0.75/$1,000, with various sunset timelines if passed in a vote. While not dictating that EMS shall be provided across the state, these code revisions allow for the public to determine the services that they are willing to fund. Currently, MEDIC does not benefit from these funding mechanisms, and there are no immediate plans to enact them.

3.1 – Organizational Structure

MEDIC currently operates under an organizational structure common to many 501(c)(3) organizations, with several employees, and specifically the Executive Director, wearing multiple "hats." Under the structure of Scott County, many of these ancillary duties, like human resources, finance, etc., will largely be tasked to the appropriate County departments. Seen in **Figure 3.1** is a possible example of a future organizational structure. A much more linear approach to the EMS department would result in greater span of control and division of labor. This approach also helps promote internal succession planning and career potential.

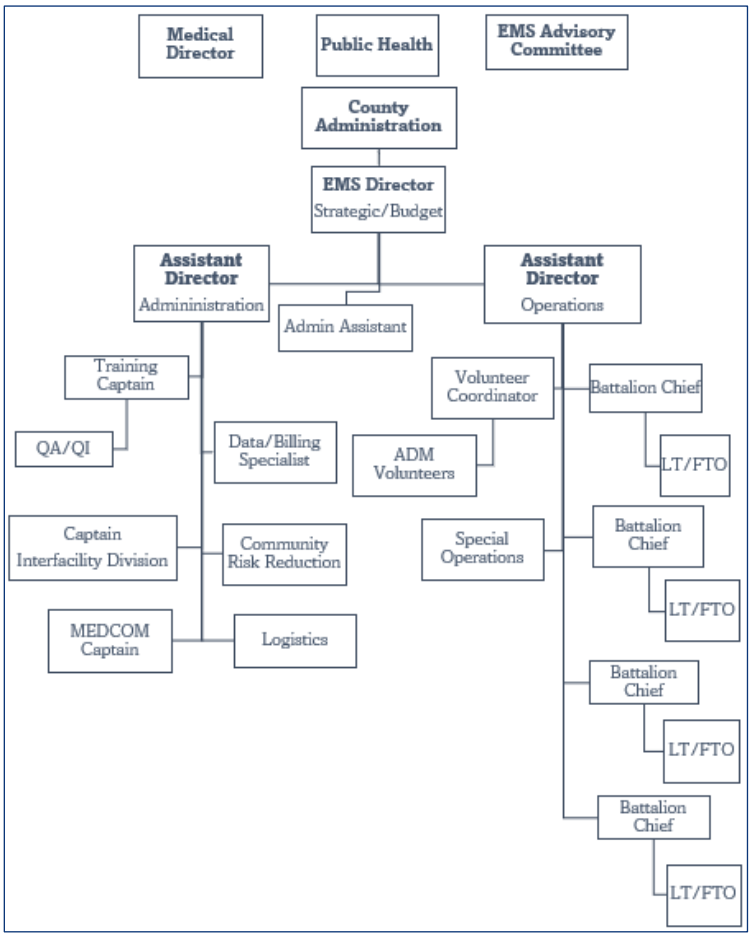

Figure 3.1: Suggested Organizational Structure

The titles found in the organizational structure are based on common industry practices for an organization of this size. Some of the possible changes would include changing the use of the term “volunteer”, as the County may not deem these paid personnel as “volunteers”, changing some of the ranks, etc. Specific job descriptions for some positions would likely not vary significantly from their current tasks, but many would have more defined tasks assigned to them. This management structure is not all-inclusive. There would be multiple operational positions (system status controllers, ambulance personnel, etc.) supervised by many of these positions. One of the important features of this organizational structure is the inherent scalability. If there is a desire to grow the structure to increase the services delivered, there is room for those services under the Assistant Directors. There is also the ability to remove positions, like the MED-COM Captain, if it is deemed that those divisions will not function under the EMS department.

This organizational structure also recommends that an advisory committee be created to help guide the future of the EMS department. Given the presence of multiple advisory boards within the Health Department, this advisory committee should take on the form of a technical advisory committee (TAC), like the committee currently serving the Scott Emergency Communications Center (SECC). The purpose of this TAC would be to advise the County Administration on the technical aspects of EMS provision that are not directly covered by one of the Health Department boards.

This is also a good way to ensure that the stakeholders from various groups (like the local fire departments, hospitals, and communities) continue to have the buy-in and influence that they previously had with MEDIC’s board of directors. The representation within the group should be carefully considered to ensure equitable representation. This should help ensure transparency and avoid potential conflicts down the road.

3.2 – Station and Vehicle Overview

A brief review of the status of stations and vehicles utilized by MEDIC suggests they are operational and in good condition. Routine maintenance of the facilities and vehicles utilized by MEDIC is accomplished by the facilities and support manager, where possible, and contracted to other parties when needed. Other than a well-noted desire for more space in the MEDIC headquarters, there were no immediate needs verbalized by the MEDIC staff or Fleet/Support Manager. Seen below in **Table 3.1** is a list of the stations that MEDIC currently recognizes and operates out of.

Station	Own/Lease/?	24 Hour	Comments
Eldridge	Own	Yes	ADM
Blue Grass	Lease	Yes	ADM
LeClaire	Own	Yes	ADM
Post 2 (HQ)	Own (Lease Land)	No	Land is leased through 2091
Bettendorf	Lease	No	Space in a Bettendorf FD Station
West Quarters	Lease	No	No
SW Quarters	Lease	No	No
Clinton	N/A	Yes	Part of agreement to provide services to Clinton

Table 3.1: List of MEDIC Stations

MEDIC has a longstanding relationship with both their ambulance vendor and their vehicle mechanic. While suffering from the same logistical backups as any other EMS agency trying to purchase new ambulances, MEDIC has been able to replace units in a timely manner. MEDIC has multiple ambulances being delivered in 2023 and appear to track the costs associated with their vehicles in a highly effective manner using the “Fleetio” software. An in-person assessment of available vehicles and facilities will be completed during the on-site visit.

3.3 – Specific Operational Notes

MEDIC provides a wide range of services to outside entities. These services range from providing chart hosting services to outright coverage of response areas. Most of these services do not directly impact the availability of ambulances in Scott County and should be seen more as financial assets/liabilities. As such, there will be a more detailed breakdown in the final document that will discuss these contracts. These topics are specifically presented here, instead of **Section 2.3 – Areas of Concern** because these topics have been identified as requiring additional research and thought, versus being areas that specifically need corrective action. In no specific order, here are some of the areas for future evaluation/consideration.

City of Clinton/MercyOne Clinton Operation

The City of Clinton sits inside of Clinton County, IA. Since 2000, MEDIC EMS has contracted with MercyOne out of the City of Clinton to provide support for their interfacility transfer needs. As part of this arrangement, the MEDIC unit is provided accommodations for their personnel and ambulance. This unit is primarily meant to provide transportation for MercyOne patients but will occasionally support the local EMS agencies when they are in need of extra units. This operation presents a unique management and staffing challenge, but also some financial opportunities. There are other services that could potentially take on this contract, if MEDIC were to terminate services there, but MercyOne should be given reasonable (6-month) notice prior to termination of the contract, if deemed necessary.

Muscatine County 9-1-1

Situated just inside of Muscatine County, the Townships of Fulton and Montpelier currently have contracted 9-1-1 coverage by MEDIC EMS. As a result of the contracts, these areas are not simply being covered by mutual aid, but instead fall directly under the ESA of MEDIC, making MEDIC responsible for ensuring appropriate EMS response to the area. This coverage results in roughly $4,400 worth of yearly fees being recovered from the two areas. While not accounting for a large amount of call volume, the fees, arguably, help to subsidize the costs associated with the rural Bluegrass ADM. There are also opportunities for increased recruitment and outreach into Muscatine County. If the community sees MEDIC actively working in their area, they may be more inclined to function as employees/volunteers for the agency.

Contract Transport Services

In addition to the services listed above, MEDIC provides transport services for multiple agencies like Hospice Centers and long-term care (LTC) centers. Typically, the agreements are related to the transfer of patients from one facility to the other, i.e., from the hospital to the hospice center or from the hospital to LTC centers as well. These contracts should be seen as providing positive financial flow and will have minimal operational impacts, as long as contracts are written to reflect the routine nature of these transports and the ability for MEDIC to delay the transfers while responding to 9-1-1 calls until they have the operational capacity available that response to 9-1-1 calls won't be delayed.

Chart Hosting, IT Support, And Dispatching Services

MEDIC provides chart hosting, IT Support, and dispatching services for Genesis Ambulance. As a note, Genesis Health was recently acquired by MercyOne. It is unknown if there will be any name changes for Genesis Ambulance associated with this merger. Any reference to Genesis Ambulance should be understood to be referring to the ambulance service previously operated by Genesis Health. These services would generally not be impacted by a transition to a county service unless there is a desire to sever those applicable lines. The provision of chart hosting and dispatching, arguably, provides a financial benefit for very little additional effort. A more detailed breakdown of the positive fiscal impact of these service lines will be included in the later, more inclusive, document, but there should be some early considerations of the IT support provided and what that support consists of. With a transition to the County, primary IT services will likely fall under the scope of the IT department, so it may be appropriate for the County to review the scope of services delivered to determine future agreements. When considering the IT implications, it should be noted that IT services are also provided to Durant Ambulance Service. Another concern is the requirement

for the Illinois dispatching license for MED-COM to function as the dispatch service for Genesis. There is room for further investigation into these topics at this point.

Section 4: 9-1-1 Impacts

Given the status of 9-1-1 call taking and dispatching within Scott County, this transition could have as little of an impact, or as much of an impact, as desired. Currently, MEDIC is dispatched by MED-COM, a division of dispatchers that are employed by MEDIC, but work out of the SECC facility as part of the intergovernmental agreement that initially established the SECC.

4.1 – SECC Impact

A scenario with little to no impact would be where MEDIC transitions to the County and brings MED-COM with them to remain a division under the EMS department. The supervisors of MED-COM currently report to the Quality/Education/Interim MED-COM Manager of MEDIC, and in transition, they would report to the Director of EMS. With both agencies functioning under the Scott County structure, there is a chance that communications between SECC and MED-COM would improve slightly, but there has been no concern that the current communications operations need improvement.

A scenario that could have a significant impact would be if SECC and MED-COM were to merge. There are multiple variations of this type of merger, including a scenario where the MED-COM employees create a separate division within SECC that are capable of emergency medical dispatching (EMD), but remain separate otherwise, or a scenario where the employees are merged with the SECC employees, and everyone is cross trained for the various dispatching disciplines. Interviews with local fire departments and municipalities suggest that a merger, at least of the CAD systems utilized, is a desired outcome.

Outside of the potential operational benefits associated with a merger of these groups, there is also a possibility there would be access to increased funding from the Iowa Ground Emergency Medical Transport (GEMT) program, as more of the expenses related to dispatch could be included. Without a merger, the expenses related to SECC may be allowable for GEMT reimbursement, but it is unknown as to how the separation of those departments may impact possible revenues.

The Iowa GEMT program is a voluntary program for public providers in Iowa to help offset the costs associated with providing ambulance transport. The GEMT program in Iowa was authorized in 2018, with a subsequent amendment in 2019. This program requires that providers account for all the expenses related to providing transport for Medicaid patients and uses a formula to calculate the difference between the actual cost to provide the transport versus the amount the agency was reimbursed for the transport. Providers can then receive supplemental payments, on a prospective basis, to help offset these costs. This can result in large payments for providers, depending on the insurance payor mix of the community served. If SECC and MED-COM were to merge, it may be easier for the County and Iowa GEMT to account for the expenses related to SECC when submitting the annual cost report. This option may still be available to the County even without a merger. Communication with the Iowa GEMT staff will be imperative to ensure accuracy in this process.

There are multiple concerns about a possible merger. Some of these concerns involve current staffing shortages, seniority lists within each division, pay structure, job satisfaction, and culture. There have been no stated concerns between the two, SECC and MED-COM, divisions and how they currently work together. Many of the concerns of delayed dispatching, and other time related issues, that have been verbalized by various stakeholders have not been proven when the CAD data was reviewed. While a merger seems possible, an immediate and more appropriate solution to many of the concerns would be for MED-COM to change their CAD system to the system used by SECC. The current MEDIC CAD also functions as its billing software and has proven data mining capabilities, which should be considered prior to any CAD changes. Another consideration is the concern that CAD systems for dispatching emergency calls, and those capable of handling the scheduled transports, may not offer the same options and operability.

The CAD platform currently used by SECC has shown that it is capable of handling EMS dispatch for other agencies across the nation. Whether the specific setup that SECC utilizes would work without some adjustments is to be seen. Concerns relayed from various stakeholders included lack of interdisciplinary access to information and concerns that dispatchers from each discipline did not always have access to the most up-to-date information as calls were being classified by the MED-COM dispatchers. With a potentially extended timeline to January 1st, 2024, there could be enough time to reasonably merge SECC and MED-COM as organizations, but a much simpler transition to the same CAD system should not be overlooked.

4.2 – MED-COM Service Lines

MED-COM currently provides three primary lines of service: EMD for MEDIC, interfacility dispatch for MEDIC, and dispatch services for agencies both inside and outside of Scott County. Each service line is unique and requires specific training and experience. The dispatching services for outside agencies appear to provide a net positive income stream for MEDIC, and thus would provide offsetting income to Scott County as well. These service contracts will need to be thoroughly reviewed to continue the desired services. The possibility that some, or all, of the agencies who are receiving services from MEDIC may not want to receive those services from Scott County should not be overlooked.

Another important task completed by the MED-COM employees is directly related to billing and revenue. Briefly mentioned earlier, the MED-COM staff perform many tasks associated with preparing for the billing process. Their efforts both save MEDIC money, because they would have to pay a billing company to perform these tasks, and speed up the collections process by catching errors early on and correcting them. If MED-COM staff no longer complete this “pre-billing” process, someone else would need to. Depending on the level of pre-billing being accomplished, it would likely take one or two full FTE positions to perform the same tasks currently handled by the MED-COM staff. MED-COM completes pre-billing for the previously mentioned Genesis Ambulance Service as well.

4.3 – MED-COM Accreditation

MED-COM is currently an Accredited Center of Excellence (ACE) by the International Academies of Emergency Dispatch. This accreditation demonstrates that MED-COM meets or exceeds dispatching standards while striving for constant improvement processes. ACE dispatch centers follow best-practice standards that are “scientifically validated, based on knowledge gleaned from millions of calls, and rooted in the expertise of industry professionals.[4]” It is important to note that any significant changes in the structure of MED-COM or the delivery of those services could put their status as an ACE dispatch center in jeopardy. Scott County administrators will have to weigh the pros and cons of accreditation and the processes involved. A merger process with SECC that affects structure and operations could cause the ACE accreditation to be lost. Dispatch centers can be ACE accredited in each discipline (law, fire, and EMS), and a recent discussion between MEDIC Administration and IAED officials strongly supported the possibility that SECC could assume the existing MEDIC ACE accreditation for EMD.

Section 5: Transition Timeline

A timeline of the critical tasks involved in starting a “new” EMS department was created for the purpose of this project. The initial timeline was focused on a July 1st, 2023 “go-live” date. Following a conversation with the GEMT representatives from the Iowa DHHS and the County’s desire to take the time necessary to implement EMS and ambulance transportation the “right way”, a January 1st, 2024, timeline became more feasible. Many of the tasks associated with creating a new department will only occur after the official creation of a department under Scott County. Once the department is created, many of the tasks can be accomplished as early as possible. Including the future EMS Director in the process would be beneficial in developing the Director’s understanding of Scott County, MEDIC EMS, and applicable state laws. The suggested timeline can be found as a separate document.

Appendix A: Bibliography

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