ALLENSTOWN & PEMBROKE

TRI TOWN

Emergency Medical Service

Paramedic Ambulance Service

Monthly Director's Report

for the month of

November 2017

PREFACE

Tri-Town Emergency Medical Service was created in June of 2012 and began operation in January of 2013. Prior to that date the Tri-Town Volunteer Emergency Ambulance Service was a non-profit entity that once provided ambulance service to the Towns of Allenstown, Hooksett and Pembroke. The Town of Hooksett now provides ambulance services through its fire department.

Under New Hampshire RSA 53-A, the Towns of Allenstown and Pembroke entered into an inter-municipal agreement to create a public entity to provide ambulance service for both communities. A Board of Directors is the governing body for the Service in accordance with this agreement. The ambulance is housed at the Pembroke Safety Center. The Service is staffed 24 hours per day, 7 days per week at the *Paramedic* Level. The cost of the Service is partially subsidized by funding provided from each town on a percentage basis in accordance with the provisions of the agreement. The Service also bills patients through a third party billing firm making up the remainder of the revenues that pay for the cost of operations.

Tri-Town EMS utilizes Concord Hospital as its Medical Resource Hospital and provides Emergency Medical Care under the coordination and guidance of Dr. David Hirsch. As part of the Medical Resource Hospital Agreement (MRH), Tri-Town EMS receives many of the medications and supplies the Service needs from Concord Hospital.

This report was created on December 12, 2017, by the Service Director, Christopher Gamache BS, NRP. This document contains data that was obtained from the New Hampshire Department of Safety, Bureau of Emergency Medical Service patient care reporting website, www.NHTEMSIS.org/elite, where all patient records for the Service are maintained. Tri-Town EMS is dispatched by Concord Fire Alarm who maintains all the times associated with the Service's EMS Incidents. Financial data has been provided by the Town of Pembroke and by ComStar Ambulance Billing.

SECTION 1: EMERGENCY MEDICAL SERVICE (EMS) ACTIVITY:

1.1 Total Number of EMS Incidents / Request for Services:		99	
	November 2016: 87		
Allenstown, NH: (*Current 3yr aver: 44.04%)*		46	46.5%
	November 2016: 30		
Pembroke, NH: (*Current 3yr aver: 55.96%)*		51	51.5%
	November 2016: 51		
Barnstead, NH (Incl. Center Barnstead):		0	
Bow, NH:		0	
Chichester, NH		0	
Concord, NH:		1	1.0%
Deerfield, NH:		0	
Epsom, NH:		1	1.0$
Hooksett, NH:		0	
1.2 Total Number of EMS Incidents Assigned to Tri-Town EMS:		91	92.0%
1.3 Total Number of EMS Incidents where Mutual Aid was GIVEN:		2	2.0%
1.4 Total Number of EMS Incidents where Mutual Aid was RECEIVED:		8	8.0%
	November 2016: 7		
Concord Fire Department:		1	
Epsom Fire Department:		3	
Hooksett Fire Department:		3	
DHART (Air Medical Transport):		0	
Bow Fire Department:		1	
1.5 Total Number of Patients Transported to the Hospital:		68	68.7%
Catholic Medical Center (CMC), Manchester, NH		9	13.3%
Concord Hospital, Concord, NH		51	75.0%
Elliot Hospital, Manchester, NH		8	11.7%
1.6 Number of Patients who Refused Transport to the Emergency Department:		15	15.2%
1.7 Total Number of EMS Responses that Resulted in Another Disposition:		8	8.0%

SECTION 2: EMS RUN DATA: (H:MM:SS)

2.1 Average Reaction Time:	0:44
2.2 Average Response Time:	4:54
2.3 Average On-Scene Time:	18:43
2.4 Average Transport Time:	18:47
2.5 Average Time the Ambulance was Unavailable at the Hospital:	20:34
2.6 Average Total Time On Task: (Tone to Back in Service or Available)	1:03:42

2.7 TIMES OF CALLS (*Time of Day & Day of the Week*)

(TIME)	SUNDAY	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY	SATURDAY
0000-0259							
0300-0559							
0600-0859	NO DATA FROM NHTEMSIS						
0900-1159							
1200-1459							
1500-1759							
1800-2059							
2100-2359							
TOTALS:	9	15	12	25	18	10	6

2.8 INCIDENT by DISPATCH REASONS

Incident Complaints Reported by Dispatch	Number of Incidents
Breathing Problems (6)	16
Chest pain (Non-Traumatic)	9
Sick Person (26)	9
Unconscious/Syncope	8
Falls (17)	7
Abdominal Pain/Problems (1)	5
Assault (4)	4
Medical Alarm (32)	4
MC / Transportation Incident	4
Diabetic Problem (13)	3
Dizziness (26)	3
Overdose / Misuse of Meds / Poisoning (23)	3
Unknown Problem / Person Down	3
Altered Mental Status	2
Back Pain (Non-Traumatic) (5)	2
Hemorrhage / Laceration / Bleeding (21)	2
Lift / Invalid Assist	2
Stroke / CVA / TIA	2
Allergic Reaction / Stings / Bites	1
Auto vs Pedestrian (29)	1
Carbon Monoxide / Hazmat / Inhalation / CBRN (8)	1
Cardiac Arrest / Death (9)	1
Head Injury (30)	1
Seizure (12)	1
Well Person Check	1

21.9 PROCEDURES PERFORMED by EMS PERSONNEL

Procedure Name	# of Times Procedure Performed
Vascular: IV / Extremity Vein Catheterization	81
Cardiac: 12 Lead ECG Obtained	58
Assessment: Patient Assessment	43
Electrocardiographic Monitoring	42
Cardiac: ECG Monitoring (4 Lead or Defib Pads)	16
Respiratory: etCO2 Digital Capnography	5
Respiratory: ETT / Intubation (Orotracheal)	3
Vascular: IO / Intraosseous Cannulation	3
Assessment: Stroke Exam	2
Respiratory: BVM / Bagged Ventilations (via Mask)	2
Respiratory: BVM / Bagged Ventilations (via Tube)	2
Cardiac: CPR (Manual)	1
Cardiac: CPR (Mechanical)	1
Movement: C-Collar Applied for Stabilization	1
Ortho: Spinal Motion Restrictions Applied (w/ C-Collar)	1
Ortho: Splinting (General)	1
Respiratory: Suction Airway	1
Vascular: IV / Venous Access via Pre-Existing Access	1

2.10 MEDICATIONS ADMINSTERED BY EMS PERSONNEL

Medication Name	# of Times Medication was Administered
Normal Saline	20
Nitroglycerin	14
Ondansetron / Zofran	11
Oxygen	11
Fentanyl	9
Aspirin	7
DuoNeb / Ipratropium Bromide w/ Albuterol	5
Epinephrine 1:1,000	4
Epinephrine 1:10,000	3
Midazolam / Versed	3
Methylprednisolone / Solu-Medrol	2
Diltiazem / Cardizem	1
Ketorolac / Toradol	1
Naloxone / Narcan	1
Prochlorperazine / Compazine	1

SECTION 3: TRI-TOWN EMS PERSONNEL:

There were no changes to the Service's roster in November of 2017. The current staffing level is as follows:

3.1	Full Time Employees:	4	*Paramedics*					4
3.2	Part Time Employees:	1	*Paramedic*	1	*AEMT*	2	*EMT*	4
3.3	Per Diem Employees:	2	*Paramedics*	9	*AEMT*	6	*EMT*	17
3.4	TOTAL WORK FORCE:	7	*Paramedics*	10	*AEMT*	8	*EMT*	25

3.5 Director's Hours – (24 hours on Ambulance, 16 hours for Administrative per week)

Amb. Hours: 76 Admin Hours: 77 Hol. / Paid Time Off: 32 Details 0

Required: 72 Required: 56 Available: 32

3.6 Injury Report: ☒No Injuries to Report

Number of Lost Time Incidents: 0 Number of Lost Time Hours: 0

Complaint Number: N/A Incident Type: N/A

Complaint Number: N/A Incident Type: N/A

SECTION 4: EQUIPMENT:

4.1 New Equipment Purchased: ☒ No Equipment Purchases

1. Ordered (2) Portable Radio's for Amb. 3 Cost: $4,432.80
2. Cost:
3. Cost:

4.2 Equipment Maintenance: ☐No Equipment Maintenance to Report

1. Equipment Name: Stryker Stretcher, Stairchair & Load System
   Maintenance Item: Annual PM (11/20/17)
2. Equipment Name:
   Maintenance Item:

4.3 Durable Medical Equipment (DME) Failure ☒No Failures to Report

1. DME Name: Failure Date:
   Failure Description:
   Failure Reported To: ☐Manufacturer ☐Chairman of the BOD ☐Medical Director ☐NH EMS ☐Federal Agency ☐No Reporting Required
   DME Disposition: ☐Repaired ☐Replaced ☐Disposed ☐Completed ☐Pending

SECTION 5: CORRESPONDENCE WITH OTHER HEALTHCARE & PUBLIC SAFETY AGENCIES

1. *ALLENSTOWN, Town of*	1. Allenstown Municipal Budget Committee Meeting.
2. *AMERICAN MEDICAL RESPONSE (AMR)*	1. Contacted AMR to have an agreement with them to be used as a ride site for EMS courses.
3. *NEW HAMPSHIRE BUREAU of EMERGENCY MEDICAL SERVICE*	1. Submitted Service License Renewal 2. Submitted Surgical Cricothyrotomy Protocol Renewal Application.
4. *CONCORD HOSPITAL*	1. Notified the Hospital was changing their patient management program to CERNER and this may create delays in the ED, particularly with registration. 2. Information about trainings were passed onto the Service. 3. All Services were reminded that the Linen was a one for one replacement. 4. The Service was notified of a shortage of 100ml, 250ml and 500ml bags of 0.9% NaCl solution. 5. Tri-Town EMS needed a letter from Dr. Larochelle supporting our continued inclusion in the Surgical Cricothyrotomy Protocol. This is a 2-year approval, of which Tri-Town's expires 12/31/17. Letter was sent to Tri-Town.
5. *PEMBROKE, Town of*	1. Provided a makeup training for police officers who missed the Bleeding Control training in October. (Nov 18th) 2. Pembroke Municipal Budget Committee Meeting.
6. *SUBSTANCE ABUSE DISORDER / CONTINUUM OF CARE (SuD/CoC)*	1. Attended the group meeting on 11/30/17 at Concord Hospital. The topic of the meeting was setting Goals for Treatment and Recovery.

SECTION 6: FINANCIALS

6.1	REVENUES		
	6.1.1	Ambulance Billing (Based on ComStar Reports)	$50,760.38
	6.1.2	Details	$855.00
	6.1.3	Paramedic Intercept	$0.00
	6.1.4	Administrative Fees (PCR requests, etc)	$0.00
	6.1.5	Educational Charges (CPR, EMS related courses)	$25.00
	6.1.6	Town of Allenstown Payment	$0.00
	6.1.7	Town of Pembroke Payment	$0.00
	6.1.8	Donations	$0.00
	6.1.9	***TOTAL REVENUE for MONTH***	**$51,640.38**
	6.1.10	NOTES: Regatta and Pembroke Friends of Football details	

6.2	EXPENSES			
	6.2.1	Payroll #1	Employee Compensation	$15,248.89
	6.2.2	Payroll #2	Employee Compensation	$16,842.89
	6.2.3	Payroll #3	Employee Compensation	
	6.2.4	Over Time	(included in Payroll #1 & #2 Figures)	$1,949.39
	6.2.5	EMS Supplies		$4,040.09
	6.2.6	Equipment		$0.00
	6.2.7	Office Expenses	Phone, Copier, Supplies, etc.	$1,203.42
	6.2.8	Insurances	Health, Dental, Disability, Life, W/C, Unemployment & Liability	$7,503.20
	6.2.9	Fuel		$551.77
	6.2.10	Veh. Maintenance	2-Tires, Lube/Filter Service, Air Filter	$1,839.95
	6.2.11	Uniforms		$0.00
	6.2.12	OTHER	(Legal Fee, ComStar Fee, Training & Eval)	$12,080.40
	6.2.13	***TOTAL EXPENSES for MONTH***		**$59,310.61**
	6.2.14	NOTES: **Purchased budgeted training aids*		

6.3	AMBULANCE BILLING SUMMARY *for the* MONTH				
		Payer	# of Transports	Gross Charges	Adjusted Charges
	6.3.1	Medicare	37		$20,353.68
	6.3.2	Medicaid	13		$2,467.00
	6.3.3	BC/BS, Anthem	3		$3,600.00
	6.3.4	Cigna	2		$2,190.00
	6.3.5	Other Comm. Ins	9		$11,260.00
	6.3.6	Self Pay, No Ins.	4		$4,450.00
	6.3.7	**TOTALS**	92	$79,360.00	$44,320.68
	Medicare Allowable Rates: BLSE: $372.49 ALS1E: $442.34 ALS2E: $640.22 Mileage: $10.79				
	NH Medicaid Rates: BLS: $145.00 ALS: $175 Mileage: $2.60				
	Tri-Town EMS Rates: BLS: $750.00 ALS1: $1,000.00 ALS2: $1,250.00 Mileage: $20.00				

	NOTES:	All charges are subject to adjustment as payer information is confirmed and contractual obligations are applied.

6.4	AMBULANCE BILLING SUMMARY *for the* YEAR *(Charges & Balance are Service Estimates)*				
	MONTH		**ADJUSTED CHARGES**	**RECEIVED**	**BALANCE**
	6.4.1	January	$41,620.09	$31,753.64	$9,866.45
	6.4.2	February	$39,006.91	$31,921.82	$7,085.09
	6.4.3	March	$39,117.63	$29,795.70	$9,321.93
	6.4.4	April	$43,194.85	$31,413.51	$11,781.34
	6.4.5	May	$43,516.17	$28,641.69	$14,874.48
	6.4.6	June	$41,745.72	$32,376.20	$9,369.52
	6.4.7	July	$45,567.15	$32,893.36	$12,673.79
	6.4.8	August	$48,399.11	$31,909.62	$16,489.49
	6.4.9	September	$54,610.72	$38,994.53	$15,616.19
	6.4.10	October	$62,155.71	$22,052.92	$40,102.79
	6.4.11	November	$44,320.68	$0.00	$44,320.68
	6.4.12	December			
	6.4.13	**TOTALS**	**$516,885.04**	**$311,752.99**	**$205,132.05**

6.5		AMBULANCE BILLING SUMMARY *for* PAST YEARS				
		YEAR ($/XPORT)		**ADJUSTED CHARGES**	**RECEIVED**	**BALANCE**
	(11 Months) (613 xports)	6.5.1	2014 ($445.09)	$379,988.31	$272,838.54	$107,149.77
	(700 xports)	6.5.2	2015 ($447.13)	$427,970.64	$312,987.46	$114,983.18
	(725 xports)	6.5.3	2016 ($496.12)	$505,940.11	$359,682.99	$146,257.12
		6.5.4	**TOTALS**	**$1,313,899.06**	**$945,508.99**	**$368,390.07**

SECTION 7: QUALITY ASSURANCE/QUALITY IMPROVEMENT & TRAINING

7.1	TRAINING REPORT				
	7.1.1	JEMS Monthly Article	Toxic Terrorism 0.25cr	EMPLOYEE PARTICIPATION	12/25
	7.1.2	EMS World Article	Finding ELVO: New Stroke Scales for EMS 0.25cr	EMPLOYEE PARTICIPATION	12/25
	7.1.3	MONTHLY SKILLS	Completed – 12/25; Partial Complete – 2/25		
	7.1.4	MONTHLY SHIFT TRAINING	Takotsubo Syndrome 0.25Cr	EMPLOYEE PARTICIPATION	10/25
	7.1.5	NCCP TRAINING	Role of Research and Skills night; 3cr	By: Stephanie Locke, IC, NRP	11/25
	7.1.6	NEXT NCCP TRAINING	Crew Resource Management & ECG Interpretation	By: Christopher Gamache, BS, NRP	December 12, @1830 at the Allenstown Fire Station.

	7.1.7	ORIENTATION	None

7.2 GENERAL UPDATES

7.2.1 EMR Course continues

7.2.2 Employees continue to complete required PRIMEX trainings.

7.2.3. Assistant Director Locke attended the Professional Development course at the New Hampshire Fire Academy.

7.2.4. Tri-Town EMS has an agreement with AMR to utilize them as a ride site for EMS courses.

7.2.5. A resident of Allenstown was discharged home with a Left Ventricular Assist Device or LVAD. The person made contact with Allenstown Fire Department and Tri-Town EMS. His address has been flagged with Concord Fire Alarm.

7.3 QUALITY ASSURANCE (QA) / CONTINUOUS QUALITY IMPROVEMENT (CQI) ACTIVITIES

7.3.1. The Service continues to remind employees to enter the Cardiac Monitor / 12-Lead, medications and other procedures into the procedures section of the ePCR.

7.3.2. Employees are reminded to add all billing information and to sign their PCR's.

7.3.3. No significant QA issue discovered in November 2017.

SECTION 8: VEHICLE MAINTENANCE

8.1	Ambulance 3 (79A3)		
	8.1.1	Mileage	84,375
	8.1.2	Preventative Maintenance	None
	8.1.3	Vehicle Repair(s)	None
8.2	Ambulance 8 (79A8)		
	8.2.1	Mileage	17,875
	8.2.2	Preventative Maintenance	1. Front End Alignment
	8.2.3	Vehicle Repair(s)	1. Employee hit a curb with the driver's side rear tire, significant damage to the sidewall. Due to the mileage on the tires, all 4 rear tires were replaced.

SECTION 9: DIRECTOR'S COMMENTS AND RECOMMENDATIONS

9.1 COMSTAR: Working with ComStar to setup the online portal with Medicare. ComStar provided the guidance for this process and once the initial setup was complete, they were able to work with Medicare to finish the process. I also had them update the list of authorized users to be David Jodoin and myself. New Hampshire Medicaid is also going to have a similar online system which ComStar can set that up for us when the Medicare component is complete. They are waiting for a few items to complete the process. Those items are in the works.

9.2 ACTIVE SHOOTER GRANT: Submitted the last of the paperwork to be reimbursed by the state for the Active Shooter Equipment that was purchased.

9.3 EQUIPMENT/AMBULANCE CHECKLIST: Assigned the task of documenting the state of the equipment and ambulance on a weekly checklist. The list of equipment will include all Durable Medical Equipment (DME) to include those items we have service agreements for as well as both ambulances. The list is in the final checks.

9.4 CLINICAL MANUAL: Completing the final edits on this manual. Then it will be sent to our medical director, Dr. Larochelle for review.

9.5 AMBULANCE 3 RADIO's: Order two (2) portable radios for ambulance 3. These items were budgeted for.

9.6 AMBULANCE 8 STRETCHER: Stryker field technician came to perform the annual PM on the stretcher, stair chair and load system. The load system does not have a service agreement since it was purchased by PL Custom. The field technician provided me with a quote for a five (5) year service agreement. A PO will be presented at the next board meeting.

9.7 AMBULANCE 8 REFRIGERATOR: We currently have medications that need refrigeration, and if/when we apply for the ability to perform Rapid Sequence Intubation (RSI), those medications require refrigeration. I am working with PL Custom to find a solution. The field technician for a product, made by the manufacturer of EMS refrigerators used in the area. These refrigerators have been reported to me to be reliable. I am looking into the cost to have this installed.

9.8 AMBULANCE 8 PATIENT COMPARTMENT RADIO: The radio in the patient compartment was failing to transmit a tone to open up the hospital radios. For a few days, we relied on the ambulance's cell phone as a primary source to communicate with the hospitals. I ask Deputy Chief Paul St. Germain to look at it. The problem was simple, a "DIR" button was pressed and this prevented the signal from being transmitted.

9.9 LIFE PAK 15: One of the LP15's is due for service. Field technician from Physio Control will be here to perform the PM. He will also bring new SPO2/SPCO probes.

9.10 APPLICANTS: Had a total of four (4) applications in the last few weeks. I am looking to hire more PD AEMT/EMT as the AEMT/EMT side of the schedule continues to be a minor problem to fill. I am specifically looking for employees who will provide broad availability, to include nights and weekends.

9.11 AMBULANCE 8 LOAD SYSTEM (STRYKER): The system is failing to electronically release the stretcher. The ambulance crews are using the manual release. Stryker was notified and will be here in a week or so to correct the problem.

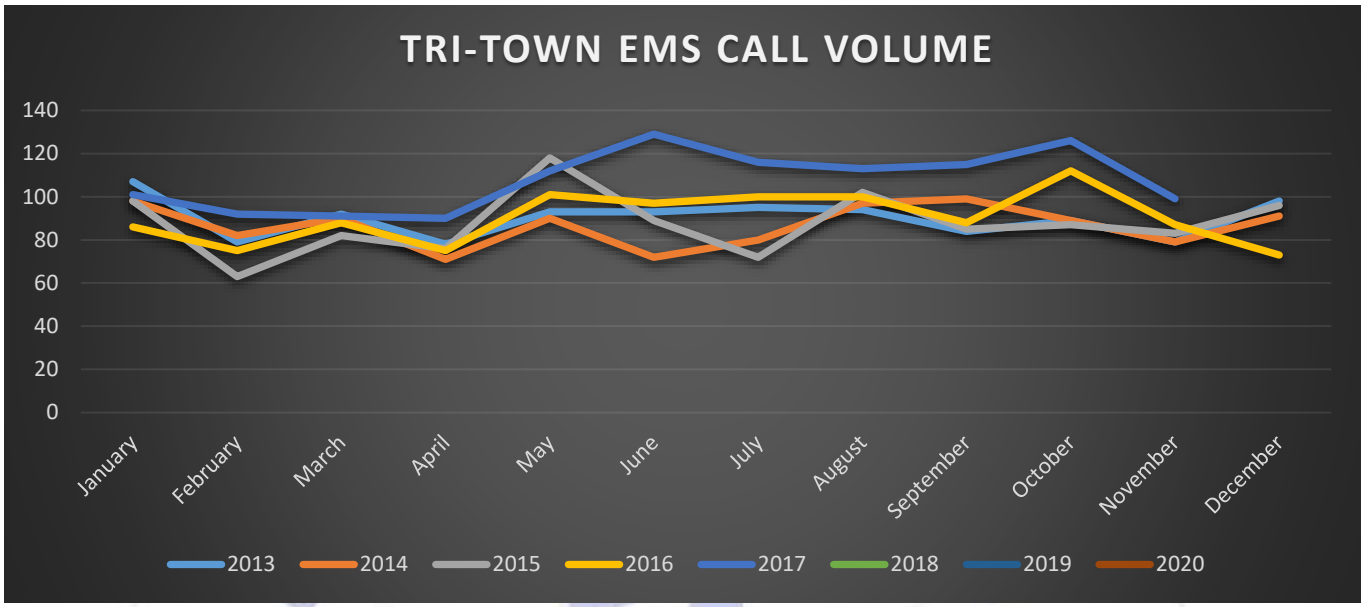
9.12 PEMBROKE POLICE DEPARTMENT: Provided two (2) officers with a makeup training on Bleeding Control and Tourniquets. In the initial training and in the makeup training, I took the opportunity to go over our Active Shooter gear and basic procedures.

SECTION 10: ADMINISTRATION

- Chairman of the Board, Allenstown Town Administrator: Shaun Mulholland
- Pembroke Town Administrator: David Jodoin
- Allenstown Fire Chief: Chief Shawn Murray
- Pembroke Fire Chief: Chief Harold Paulsen
- Allenstown Public Member: Michael O'Mara
- Pembroke Public Member: Robert "Bob" Bourque
- Tri-Town EMS Employee Member: Hearshell VanLuven, NRP
- Tri-Town EMS Service Director: Christopher Gamache, BS, NRP
- Tri-Town EMS Assistant Director: Stephanie Locke, I/C, NRP

RESPECTFULLY SUBMITTED BY:

Christopher Gamache, Service Director


TRI-TOWN EMS CALL VOLUME
140
120
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80
60
40
20
0
January
February
March
April
May
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September
October
November
December
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2014
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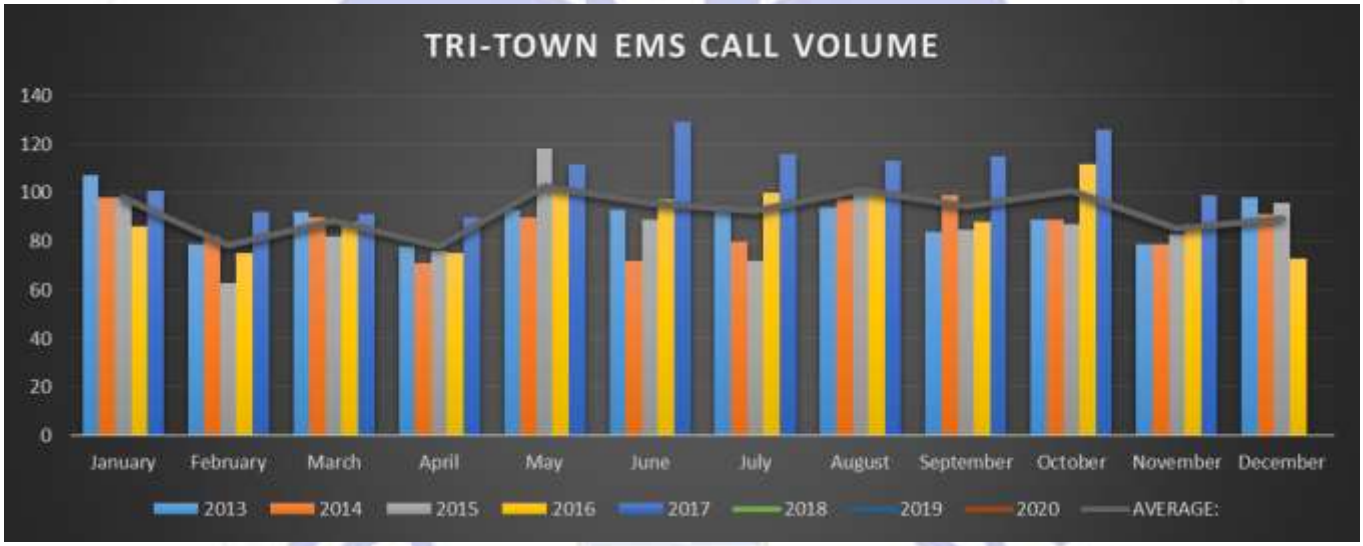
TRI-TOWN EMS CALL VOLUME
140
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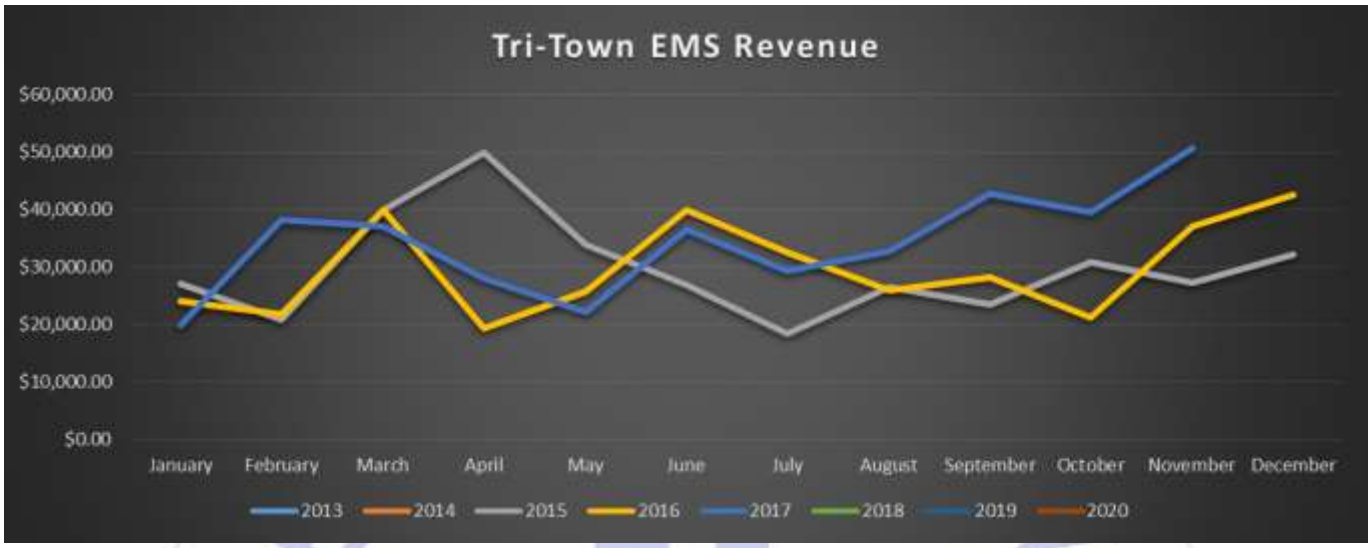
Tri-Town EMS Revenue
$60,000.00
$50,000.00
$40,000.00
$30,000.00
$20,000.00
$10,000.00
$0.00
January
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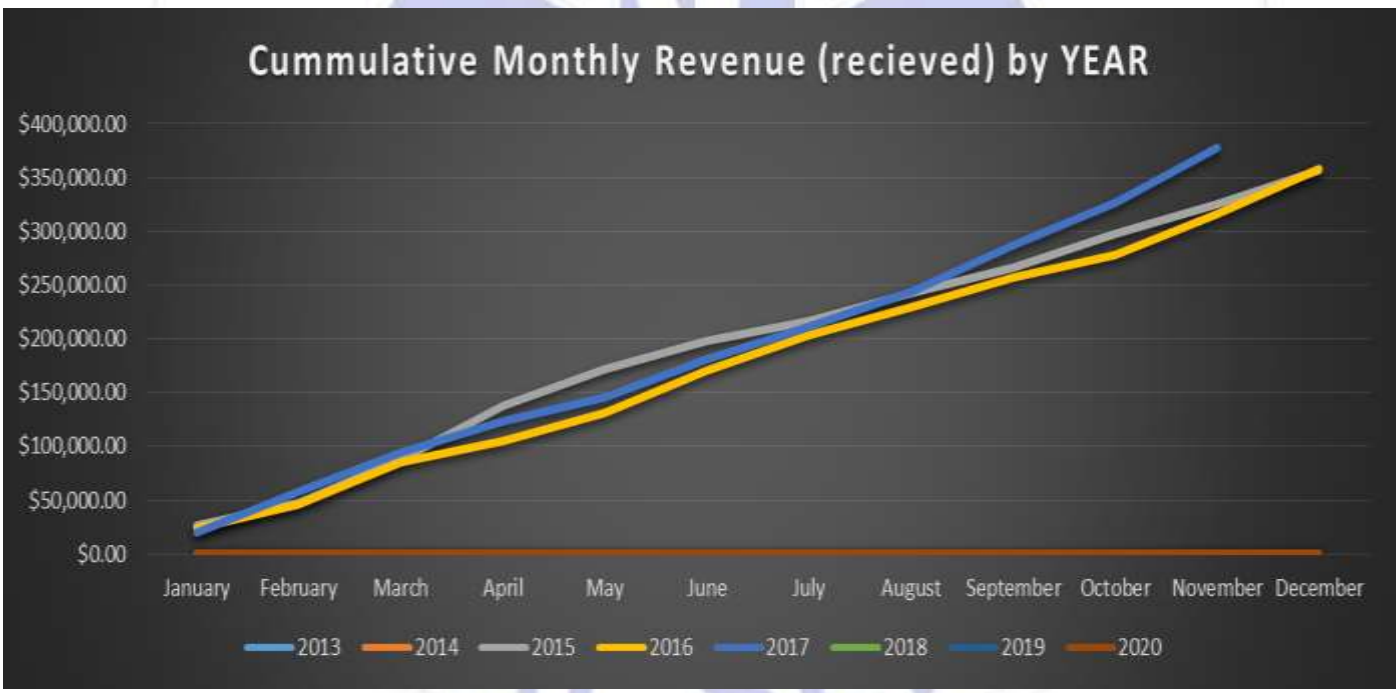
Cummulative Monthly Revenue (recieved) by YEAR
$400,000.00
$350,000.00
$300,000.00
$250,000.00
$200,000.00
$150,000.00
$100,000.00
$50,000.00
$0.00
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