# MICHIGAN ANNUAL REGION 8 TRAUMA REPORT-2020

#### **REGION 8**

**Statutory Reference:** R325.132 Rule 8 (3) (a) At least quarterly, a region shall submit evidence of ongoing activity, such as meeting notices, minutes to the department. Annually the regional trauma advisory council shall file a report with the department which describes progress toward system development, demonstrates ongoing activity, and includes evidence that members of the regional trauma advisory council are currently involved in trauma care.

#### **OVERVIEW AND ASSESSMENT OF RESOURCES**

#### Demographics:

Michigan's Upper Peninsula, known as Michigan Region 8, is 16,452 square miles with approximately 311,000 inhabitants, per the US Census. Flip the Upper Peninsula on its side and it would cover 41% of the Lower Peninsula yet it contains only 3% of the state population. Geographically bordered by Wisconsin and surrounded on three sides by Great Lakes, its fourseason weather can be fickle and furious. There are 14 hospitals dotted across Region 8, plus one Veteran's Administration hospital in Iron Mountain and one hospital in St. Ignace that aligns with Region 7 because of their Medical Control Authority's boundaries. Menominee County has oversight by a Wisconsin Medical Control Authority and there are no hospitals within that county. There are three health systems in Region 8 and the rest of the hospitals are independent. Health systems are Aspirus headquartered in Wausau, Wisconsin; UP Health System, owned by multi-state LifePoint headquartered in Brentwood, Tennessee; and OSF Healthcare headquartered in Peoria, Illinois. Parent organizations outside of Michigan commonly create communication on Michigan trauma program requirements. Tourism and outdoor recreation surge the population, as do a handful of universities and colleges. An example, Pictured Rocks National Lakeshore annually attracts 800,000+ worldwide visitors according to the National Lakeshore media releases. This attraction is located between Munising (pop. 2539) and Grand Marais (pop. 350). Region 8 continued to see an influx of tourism during the COVID-19 pandemic. The Soo Locks, a piece of national critical infrastructure, provides the border with Canada to the east. Region 8 embodies rugged terrain, minimal highways, no rescue air capabilities, one medical helicopter, and finite EMS agencies and hospitals.

### **Medical Control Authorities:**

MCA Name	Medical Director
Baraga	Jon Neufeld, MD
Delta	Edward Bigsby, MD
Dickinson	Ryan Hart, DO
Eastern	Kyle Raycraft, MD MBA
Gogebic Iron Ontonagon	Eric Maki, MD
Keweenaw Houghton	Emily Johnson, MD
Luce	Steven A. Vix, MD
Marquette Alger	Michael Mlsna, MD
Schoolcraft	David Schoenow, MD

# Designation Status of Facilities in Region:

Facility Name	Designated Yes or No	Level of Designation
Aspirus Iron River	their Meycal Control Auth	lo sausoe (V nobel) div
Aspirus Ironwood	ealth sysyms in Region 8	M M M M M M M M M M M M M M M M M M M
Aspirus Keweenaw	ate Like Year headquaren	iyalom, bwillid by muili-e
Aspirus Ontonagon	rus asams side	IV Vision in the second
Baraga County Memorial	suer s enorten se <b>Y</b> senottes s	IV
Dickinson County Health System	A response media religions $N$	Provisional IV
Helen Newberry Joy	ol o G em ometimes Ch	IV
Munising Memorial	ue air capabilities, oi e m N	Provisional IV
OSF St. Francis	Y	IV
Schoolcraft County Memorial	N	Provisional IV
UP Health System Bell	N	Provisional IV

UP Health System Marquette	as esc <sub>Y</sub> and ev	Mode Plan Objecti
UP Health System Portage	Y	III
War Memorial	Y	S SCT S AGE SCHOOL

#### Governance:

#### Regional Trauma Network (RTN) Board

	Name and Title
Chairperson	Pat Hirt, Trauma Program Manager
Vice Chairperson	Shelly Reeves, Trauma Program Coordinator

#### Regional Trauma Advisory Council (RTAC)

e the Region & Trauma	Name and Title
Chairperson	Shelly Reeves, Trauma Program Coordinator
Vice Chairperson	Julie DeLaire, Trauma Program Manager

#### Regional Professional Standards Review Organization

d into the Injury	Name and Title	
Chairperson	Vacant	
Vice Chairperson	Vacant	

#### **Governance Activity Report:**

- Regional Trauma Network Board (RTN Board): Supportive of its RTAC, almost all RTN members are also RTAC members. The meetings are succinct and collaborative.
- Regional Trauma Advisory Council (RTAC): The RTAC does not have committees since
  the same people wear multiple areas of responsibilities overlapping between the RTN,
  RTAC, Regional MCA Network, and Regional Preparedness. If a topic is too large to
  handle within the RTAC meetings, an ad hoc committee is formed. This occurred when
  the Region needed to develop an Injury Prevention Plan. The committee met, authored,
  and presented the Plan to the RTAC and RTN for adoption. Their activities are described
  within the next section of this annual report.
- Regional Professional Standards Review Organization (RPSRO): After a hiatus, the RPSRO has reformed with a composition of trauma medical directors, MCA medical directions and a few other subject matter experts such as EMS, program managers, and registry. This is an enriched cadre of clinical care providers and thus it has been difficult to call them for a meeting amidst COVID-19 response.

## Work Plan Objective Progress and Highlights

#### **Injury Prevention**

**Indicator 306.2:** The RTN is active within the region in the monitoring and evaluation of regional injury prevention (IP) activities and programs.

Regional Score: 2 in 2017; 2 in 2020

**Objective:** By March 2017, the RTAC will develop an injury prevention program database by surveying regional injury prevention stakeholders including hospitals, senior provider networks, Medical Control Authorities, UP Traffic Safety Council, and others. The database shall contain program type, audience, locations and contact persons.

**Progress:** The RTAC has trauma program managers that annually canvas their injury prevention programs to provide an update to the Regional IP database. It has been explained that even though COVID-19 has decreased the presence of 1:1 and group session injury prevention programs, there are ways to continue distributing education and awareness to our communities. The Regional Trauma Coordinator continues to update the R8TRAUMA Facebook page with injury prevention information, and also populates the Region 8 Trauma page on the Region 8 MCA Network website.

**Indicator 203.5:** The RTN has developed a written injury prevention plan. The injury prevention plan is data driven and targeted programs are developed based upon high injury risk areas. Specific goals with measurable objectives are incorporated into the injury prevention plan.

Regional Score: 1 in 2017; 2 in 2020

**Objective:** By December 2019, the RTN will have approved a Regional Injury Prevention Plan that addresses at a minimum, the trauma registry identified top 3 injuries in the region; a needs assessment; program identification, reach, and impact. The plan will include recommendations and action steps to address injury prevention in the region for sustainability and will include the acute care facilities in the region. The plan shall be reviewed annually by the RTAC.

**Progress:** The Regional Injury Prevention Plan was authored and adopted, then placed on the R8MCAN.org website. It is annually reviewed.

#### Communications

**Indicator 302.10:** There are established procedures for EMS and trauma system communications for major EMS events or multiple jurisdiction incidents that are effectively coordinated with the overall regional response plans.

Regional Score: 2 in 2017; 3 in 2020

**Objective:** By September 2017, the RTAC will have reviewed the gathered assessment information in database format, in addition to any reasons for variation in the region (geographic coverage areas, funding, logistics for radio reprogramming, etc.), and meet with the Regional Healthcare Coalition to draft a regional EMS communications procedure and a regional inter-facility communications procedure by March 2018.

By May 2018, meet with the Regional 911 Authority to start the process of writing a region-wide large-scale incident communications procedure with completion expected March 2019 and implementation completion December 2019.

**Progress:** Region 8's Communications Procedure was written, adopted, and reviewed again in 2020. The liaison to the Regional 911 Authority was given the procedure for that organization to adopt. Formal adoption did occur by Regional Trauma Network, Regional Healthcare Preparedness Coalition, and Regional MCA Network. There is not universal adoption by individual agencies.

**Indicator 302.9:** There is a procedure for communications among medical facilities when arranging for inter-facility transfers including contingencies for radio or telephone system failure.

**Regional Score:** 2 in 2017; 4 in 2020

**Objective:** By April 2017, the RTAC will have developed a communications assessment tool to identify gaps and capabilities: primary, secondary, tertiary between prehospital (ground/air) and hospital; primary, secondary, tertiary between hospital to hospital for transfers; existing COM-L plans for large incidents. Partners will complete an assessment tool by July 2017.

**Progress:** The tool is a database of redundant communications between EMS agencies and hospitals, and then hospitals to hospitals. Regional Trauma members gather updates every three years and submit to the Regional Trauma Coordinator for the database. The RTC shares this with Regional Healthcare Preparedness. An addition to the database for 2020 is communication capabilities that the Regional Medical Coordination Center has.

#### Infrastructure

**Indicator 302.1:** There is well-defined regional trauma system medical oversight integrating the needs of the trauma system with the medical oversight of the overall EMS system.

Regional Score: 1 in 2017; 2 in 2020

**Objective:** By August 2017, the RTN will organize and facilitate initial and then ongoing meetings of MCA Medical Directors and their hospital(s) trauma medical directors. The initial meeting will provide orientation to the EMS system of protocol adoption (with a focus on trauma specific protocols), training and oversight, as evidenced by member roster, agenda and minutes.

**Progress:** This objective was met when state trauma project money was available to support it. The ability for trauma medical directors and MCA medical directors, when they are not the same person, to meet is transitioning to RPSRO.

**Indicator 302.2:** There is a clearly defined, cooperative, and ongoing relationship between regional trauma physician leaders and the EMS system medical directors in the region.

Regional Score: 3 in 2017; 2 in 2020

**Objective:** By July 2018, the RTN shall adopt the RPSRO as the venue for the MCA Medical Directors and the Trauma Medical Directors to meet and coordinate the regional trauma system as evidenced by meeting minutes and the amendment to the bylaws, written description of roles and responsibilities.

**Progress:** The RTN established the RPSRO as the venue for the MCA Medical Directors and the Trauma Medical Directors to meet, coordinate and evaluate the regional trauma system. The RPSRO met in March on the cusp of COVID-19 response with only surgeons in attendance and two EMS agencies. There were no established linkages to every MCA medical oversight at the meeting. This gap was brought to the RTAC and RTN to remind their medical directors (some are the same person) of their attendance importance. Since the RSPRO was on hold for so long and now we are still within pandemic response, scheduling and attendance of these medical professionals is difficult.

**Indicator 303.2:** The regional trauma network plan should ensure that the number, levels, and distribution of trauma facilities are communicated to all partners and stakeholders. The RTN should develop procedures to ensure that trauma patients are transported to an appropriate facility that is prepared to provide care.

Regional Score: 1 in 2017; 1 in 2020

**Objective:** By August 2017, the RTAC will develop and implement a survey of hospitals specific to roles, resources and responsibilities providing care including specialty populations, to include out of region. This living document will be communicated to stakeholders on an agreed upon time frame. This data will be used in the development of the regional system plan.

**Progress:** Spreadsheet was developed, information gathered, reviewed every three years. The geography of Region 8 prohibits trauma patients meeting CDC trauma triage criteria step 1 and 2 to always be delivered to the highest level of trauma center.

**Indicator 303.1:** The regional trauma plan has clearly defined the roles, resources and responsibilities of all acute care facilities treating trauma, and of facilities that provide care to specialty populations (burns, pediatrics, other).

Regional Score: 1 in 2017; 3 in 2020

**Objective:** By March 2020, as an ongoing activity of regional trauma system planning, the number and levels of trauma facilities are communicated regularly to the MCAs who incorporate this information into local MCA triage and destination protocols. These local protocols account for trauma facility resources, geography and transport time. Online medical direction ensures proper destination guidance in the event of trauma diversion. The RPRSO will perform annual audits of all trauma center diversion to assure the appropriate use of diversion and accuracy of the trauma center resource.

**Progress:** The spreadsheet in the prior indicator's objective outlines what facility has what abilities. The Regional Trauma Coordinator sits on the Regional MCA Network and has encouraged every MCA to develop a destination matrix based upon patient conditions and hospital capabilities.

#### **Regional Performance Improvement**

**Indicator 206.1:** The RTN generates data reports to evaluate and improve system performance.

**Regional Score:** 2 in 2017; 2 in 2020

**Objective:** By September 2017, the RPRSO will develop a plan to routinely monitor ongoing data submission to the registry that addresses timeliness, participation and incident numbers.

**Progress:** During this workplan's span of years, the function of the RPSRO was being developed statewide. Timeliness of data submission has always been monitored by the Regional Trauma Coordinator and the State Trauma Data Administrator. It is a rare occasion that a facility runs behind on entries. Turnover in hospital registry-tasked positions has caused delays, especially if there is no one left at the program to train the new personnel. COVID-19 prompted re-structuring of one health system's trauma programs and contributed to data delays.

**Indicator 302.6:** The region has adopted mandatory regional pre-hospital triage protocols to ensure that trauma patients are transported to an appropriate trauma center based on their injuries. The triage protocols are regularly evaluated and updated to ensure acceptable and region-defined rates of sensitivity and specificity for appropriate identification of a major trauma patient.

**Regional Score:** 3 in 2017; 2 in 2020

**Objective:** By December 2017, RTAC and the Regional Trauma Coordinator will work with partners, including the Regional MCA Network, to support the adoption of EMS System protocol for trauma triage and destination.

By December 2019, RTAC and partners will develop and implement a process to evaluate implementation of the EMS trauma triage and destination protocol.

**Progress:** Every MCA has adopted the state trauma triage and destination protocol. Two MCAs have adopted destination matrices: Marquette Alger and Delta. The remainder of the

MCAs have not, while citing all of their patients go to the closest facility because there are no others within 45 minutes. The Keweenaw Houghton MCA has two facilities within its area, but both are comparable Level III facilities. That MCA, like all others, recognizes patient requests, and they also use a geographic line to determine the closest facility. No evaluation occurred because MCAs have not adopted anything beyond the state protocol.

**Indicator 303.4:** When injured patients arrive at a medical facility that cannot provide the appropriate level of definitive care, there is an organized and regularly monitored system to ensure the patients are expeditiously transferred to the appropriate, system defined trauma facility.

Regional Score: 2 in 2017; 1 in 2020

**Objective:** The RPSRO, with approval by the RTN, will by November 2019, develop a plan that includes methods to monitor and address issues related to inter-facility transfers and their expeditiousness and appropriate utilization.

**Progress:** The RPSRO was not regularly meeting as all of their activity was placed on hold. This objective was not achieved. There is a new regional PSRO document, flow sheet, and form that will be adopted by the RPSRO when it meets. This will provide a mechanism to address issues related to inter-facility transfers.

**Indicator 205.2:** Collected data from a variety of sources are used to review the appropriateness of all-inclusive regional trauma performance standards, from injury prevention through rehabilitation.

Regional Score: 1 in 2017; 1 in 2020

**Objective:** Annually, the RPSRO will develop and share annual data reports and/or recommendations with the RTN to inform decision making and evaluate system performance.

**Progress:** The data reports to be shared with the RPSRO were to come from the State. In 2019, a new mechanism called a RSPRO Inventory was developed to provide data. COVID-19 response occurred, but the RPSRO was able to meet in March regarding the first set of data for their new Inventory. They reported to the RTN one PI issue and that is EMS recruitment and retention as it relates to 911 response and patient transfers.

**Indicator 303.4:** There is a regional trauma bypass protocol that provides EMS guidance for bypassing a trauma care facility for another more appropriate trauma care facility.

Regional Score: 2 in 2017; 1 in 2020

**Objective:** By December 2019, the RPSRO will support the development of a bypass protocol for the region that addresses resources.

**Progress:** All MCAs have adopted the state trauma triage and destination protocol, which is what in 2017 was thought to be regional. There are no additional bypass protocols authored and approved.

**Indicator 205.3:** The RTN data in the state trauma registry is used to identify and evaluate regional trauma care and improve the use of resources.

Regional Score: 3 in 2017; not an indicator in 2020 workplan

**Objective:** By April 2017, the RPSRO will review quarterly data reports to monitor and evaluate system functioning (i.e., age, ISS score, mechanism of injury, destination, length of stay emergency department, transfer, admission) as evidenced by meeting agenda, minutes and report.

**Progress:** Reports shifted from being written and generated by the Regional Trauma Coordinator to provided by the State Trauma Section to the RPSRO. These became biannual in 2020.

#### Continuum of Care

**Indicator 308.1:** The regional work plan addresses the integration and participation of rehabilitation services within the continuum of care for trauma patients.

**Regional Score:** 1 in 2017; 2 in 2020

**Objective:** The RTAC will by October 2018 develop and conduct a survey of rehabilitation services available in the region, and also include services routinely used outside the region. This shall be evidenced by the publication of the survey tool and results.

By January 2019, the RTAC will use survey findings and provide recommendations to the RTN on integration of rehabilitation services within the Regional Trauma Plan, including possible role for rehabilitation content expert(s) in the network.

**Progress:** The RTAC keeps an up-to-date list of rehabilitation services available in the region. There is one in-patient, licensed rehabilitation unit in the region at UP Health System Marquette. In the next workplan, the list will expand to facilities out of region and for all types of specialty populations.

#### Trauma Education

**Indicator 310.3,4,6:** The regional trauma network establishes and ensures that appropriate levels of EMS, nursing and physician trauma training courses are provided on a regular basis.

Regional Score: 2 in 2017; 2 in 2020

**Objective:** By February 2018, the RTAC and Regional MCA Network will develop and conduct a survey of partners and stakeholders regarding trauma education as evidenced by survey tool and results.

**Progress:** A survey was written and distributed to the trauma program managers and MCAs with the following results: ATLS, TNCC, ENPC, PHTLS, TCAR.

**Indicator 310.10:** As new protocols and treatment approaches are instituted within the regional trauma system; structured processes are in place to inform or educate all personnel of those changes in a timely manner.

Regional Score: 1 in 2017; 2 in 2020

**Objective:** By September 2018, the RTN, with support of partners and stakeholders, will establish a mechanism to inform trauma professionals about trauma education and EMS protocols. Evidence of this shall be by the inclusion of this information on the Regional Healthcare website from the Regional Healthcare Coalition, meeting minutes reflecting role of RTN as clearinghouse for ongoing trauma education and plan for ongoing dissemination of the education initiatives.

By January 2019, the RTN in partnership with the RTAC and stakeholders will develop a structured process to address trauma education including new treatments, protocols and regional training requirement and subsequently publish such document.

Progress: The Regional Healthcare Coalition ceased having an updated website. Regional Trauma instituted a Regional Trauma Facebook page to communicate all types of information to a wide audience (@R8TRAUMA). The Regional MCA Network provided funding to establish a website and the Regional Trauma Coordinator (RTC) asked if trauma could have a page. The MCA Network agreed to that and the RTC updates the page(s) with information. The MCAs have not populated their pages and so the RTC is working in collaboration with the Director for the Center for Rural Health at Northern Michigan University to establish student interns that will populate the MCA pages with treatment protocols.

#### Regional Summary:

Region 8 has been accustomed to distance technology for many years. All meetings have been video conferenced since the trauma system was in existence. When COVID-19 hit and others had to establish a means to virtually operate, Region 8 had zero impact. The Region removed an objective in their 2020 workplan that cited to please embrace virtual meeting technology statewide since that allows stakeholders in this region to be involved and attend meetings and training.

Social media continues to be embraced by the RTN as a mechanism to inform stakeholders and the public. With expansive land and little people, these types of connections and transparency opens doors for more subject matter experts to grab the information and weave into their circles. There is an ongoing emphasis for hospital marketing departments to keep watch on the R8TRAUMA Facebook page for materials to share.

Nine of the fourteen hospital trauma programs experienced turnover in the last 18 months. COVID-19 response exacerbated this by carving staff from trauma programs for other hospital functions.

Regio	nal System Evaluation in accordance with Administrative Rule Requirements:
	Regional trauma network and committee meetings have taken place as scheduled (quarterly) in accordance with the Open Meetings Act.
	If not completed, please explain: April meetings cancelled for COVID-19 response.
Ø	Schedule and information regarding RTN Board and RTAC posted on the trauma website
Ø	Annual confirmation that members of the RTAC are currently involved in trauma care completed.
	All MCA's are participating in the RTN
	If not, what efforts have been made to address: Keweenaw Houghton had no representative for part of the year and by October a representative was named. Dickinson has no representative now.
	Documentation that all hospitals in the trauma network are participating in:
	☐ Regional Injury Prevention – Munising has not attended meetings.
	☐ Regional Performance Improvement – Munising has not attended meetings.
	☑ Submission of registry data to ImageTrend
	Regional trauma plans completed (attach copy of plan or state "in progress")
	☑ Regional Injury Prevention
	☐ Regional Trauma Education
	☑ Regional Performance Improvement
	If not completed, which plans are missing and why? Regional Trauma Education is not being worked on in Region 8.
	Regional PI process in place; Inventory data reviewed and trends (if noted) are being monitored. PI process that includes two levels of review is in place (as needed). RPRSO corresponds annually (at a minimum) with RTN regarding PI. Minutes, materials stored by RTC.  If not completed, please explain: The Regional PI Plan was distributed to the Regions in September and adopted at the October RTN and RTAC meetings. A RSPRO meeting
	has not occurred to educate that membership about it.
RTN E	Board Chairperson: Tolucio a First Date: 1-14-202
Regio	nal Trauma Coordinator: fyn flu l