Draft Minutes of Meeting – Subject to Change Upon Approval by the Trauma Needs Assessment Taskforce at their next regularly scheduled meeting



#### **MINUTES**

# EMERGENCY MEDICAL SERVICES & TRAUMA SYSTEM (EMSTS) DIVISION OF COMMUNITY HEALTH

#### TRAUMA NEEDS ASSESSMENT TASKFORCE (TNAT)

May 16, 2017 - 2:30 P.M.

#### MEMBERS PRESENT

John Fildes, MD, Chairman, UMC Amy Doane, Vice Chair, Sunrise Hospital Kim Cerasoli, RN, UMC Deborah Kuhls, MD, UMC (via phone) Shirley Breeden, Public Representative Stephanie Miller, Southern Hills Hosp (Alt.) Gail Yedinak, UMC Sean Dort, MD, St. Rose Siena Hospital Sajit Pullarkat, Centennial Hills Hospital Daniel Llamas, Sunrise Hospital Stacy Johnson, RN, Mountain View Hospital Kelly Taylor, LVMPDEHWT Jennifer Renner, RN, HCA

#### **MEMBERS ABSENT**

Adam Rudd, Southern Hills Hospital Alma Angeles, RN, Sunrise Hospital Jason Driggars, Paramedic, EMS Provider (Private) Frank Simone, Paramedic, EMS Provider (Public) Chris Fisher, MD, Sunrise Hospital Kim Dokken, RN, St. Rose Siena Danita Cohen, UMC

#### SNHD STAFF PRESENT

John Hammond, EMSTS Manager Laura Palmer, EMSTS Supervisor Judy Tabat, Recording Secretary Michael Johnson, PhD, Dir. of Community Health Heather Anderson-Fintak, Associate Attorney

#### **PUBLIC ATTENDANCE**

Karen Port, HCA

#### CALL TO ORDER - NOTICE OF POSTING

The Trauma Needs Assessment Workgroup convened in the Red Rock Trail Conference Room at the Southern Nevada Health District (SNHD), located at 280 S. Decatur Boulevard, on May 16, 2017. Chairman John Fildes called the meeting to order at 2:34 p.m. and the Affidavit of Posting was noted in accordance with the Nevada Open Meeting Law.

**PUBLIC COMMENT:** A period devoted to comments by the general public about those items appearing on the Agenda. Comments will be limited to five (5) minutes per speaker. Please step up to the speaker's podium, clearly state your name and address, and spell your last name for the record. If any member of the Board wishes to extend the length of a presentation, this may be done by the Chairman or the taskforce of majority vote.

Chairman Fildes asked if anyone wished to address the Committee pertaining to items listed on the Agenda. Seeing no one, he closed the Public Comment portion of the meeting.

#### II. CONSENT AGENDA

Chairman Fildes stated the Consent Agenda consisted of matters to be considered by the Trauma Needs Assessment Taskforce that can be enacted by one motion. Any item may be discussed separately per taskforce member request. Any exceptions to the Consent Agenda must be stated prior to approval.

Approve Minutes/Trauma Needs Assessment Taskforce Meeting: 04/19/2017

Chairman Fildes asked for a motion to approve the Consent Agenda. Motion made by Member Taylor, seconded by Member Cerasoli and carried unanimously.

#### III. REPORT/DISCUSSION/POSSIBLE ACTION

#### A. Review/Discuss Domain (1) Population

Dr. Fildes stated that the minutes should reflect that the Office of EMS & Trauma System (OEMSTS) has created a very early draft of the needs assessment tool [Attachment A] which he believed to have enough clarity on to modify and move forward with. He asked for comments about ways of creating a clear and concise reporting tool in this domain.

Ms. Taylor stated that since items B, C, & D under Population are related specifically to how a hospital might be defining their service area, shouldn't the assessment tool ask them to define the area of interest to make sure the data supports their answers.

Mr. Hammond stated that in addition to the hospitals requesting to enter the system, there is also the surveillance the Health District takes on to determine need.

Dr. Fildes stated that there is a hierarchy of decision making in this process. He felt this needs based assessment tool is really for this taskforce to feed back to the Regional Trauma Advisory Board (RTAB). The RTAB would then interact with the OEMSTS to try to determine whether there is need in the system to consider new centers. Questions about defining trauma service areas and modeling activities among and between trauma service areas is probably the work of an application process and perhaps not as much of finding need in the system.

Ms. Taylor said she didn't disagree but felt that identifying the area that they are looking at during the needs process would be important. She felt you can't define a need if you don't know which area they are actually looking for and then the granularity would be within the analysis.

Ms. Cerasoli questioned if all these points have equal weight.

Dr. Fildes stated that at the last meeting there was a discussion that we had not discovered a method of assigning weight yet.

Ms. Johnson stated that items C & D under Population specify trauma field triage criteria (TFTC) data and questioned whether they were going to include looking at the state numbers to get the big picture from a state trauma registry. She added that she would also like to see if all of the non-trauma centers are seeing a growth in patients that meet National Trauma Data Bank (NTDB) criteria versus only looking at TFTC.

Dr. Fildes stated that the state registry has been dysfunctional for two decades and felt depending on it would be an error on their part to give that as advice to the RTAB. He added that he would be willing to write that in because in an ideal system if everything were functioning that would be what you would use.

Mr. Hammond felt it was a good idea to write that in and advised that his office is continuing to monitor the hospitals compliance for the state.

Dr. Fildes stated that he reviewed the minutes of the previous meetings and expressed his thoughts on the population domain:

- Determine whether or not there was growth in population in the county and is the growth projected to continue.
- Determine whether or not there was growth within defined geographic areas of the county and is that growth projected to continue.
  - o quadrants of the county ex. NE, NW, SE, SW, or
  - o zip code (discussions were largely around zip codes), or
  - o projected trauma service areas (TSA)
- Determine population of patients being transported that have met one of the TFTC criteria
  - o population of the county
  - o smaller areas to look for trends of growth
- Determine if numbers are going up for patients with injury codes treated at any one hospital or within a group of hospitals, trauma centers and non-trauma centers within an area.

He added that would cover the injury pyramid from general population to an area specific analysis. He stated that he would start with a quadrant and then build that out by zip code or just use zip code for convenience.

Ms. Doane felt that they should consider looking at zip codes based on where the hospitals get their patients from because a quadrant isn't going to slice the hospital locations equally. She explained that her hospital system tends to look at a conglomerate of zip codes of where most of their admissions or ER visits come from and that is how they define a service area.

Mr. Hammond stated that if they apply a quadrant scheme that would lend itself to be a surrogate to transport time.

Dr. Fildes agreed adding that they could use the four quadrants of the valley, use the zip codes within the quadrants and then when you get down to a trauma service area there are other things that impact that like municipality, transport agencies, boundaries, geographic features and practical considerations for transport. He stated that each of these points should be modeled hierarchically.

Ms. Taylor stated that with regard to NTDB data vs. TFTC data, she questioned if item C & D under #1 Population should be moved to item #4 Severely injured patients (ISS>15) discharged from Acute Care Facilities not designated as a Trauma Center and item #5 Trauma Centers currently in the Las Vegas valley.

Mr. Hammond felt that they were looking at this as more of a subset of the whole. There is an increase of population and within that subset of increase population they are looking at an increase in trauma patients. He felt keeping it under population would be appropriate.

Dr. Fildes reiterated that he is trying to model most of these domains to be analyzed like a pyramid. You measure what the whole population is doing and then break it down by population of TFTC patient, then TFTC patients in a quadrant, in a zip code and then in a service are. This would be for current measurements and for projected measurements. He added that if they could array this where you can look at it and it makes sense everybody would feel a more comfortable that the source of the data is reliable and its depiction is also reliable.

#### B. Review/Discuss Domain (2) Median Transport Times

Dr. Fildes noted that it has already been decided that 15 minutes will be used as the median transport time to make it a more efficient system. He added this would be looking at the entire valley which you could also do for looking at quadrant transport time and zip code transport time understanding that the step 1 and 2 are the time sensitive patients with lights and sirens patients. The step 3 and 4 patients are usually street speeds so there would be a difference between their transport times.

Ms. Cerasoli stated that she was under the impression that there was a nationwide average of 30 minutes

for general transport times and questioned if there was an established acceptable range for the step 3 and 4 patient transport times.

Mr. Hammond stated that he hasn't found any research for the optimal transport time for step 3 and 4 patients. There is plenty of research for the step 1 and 2 patient and it is always around that nugget of the golden hour.

Ms. Cerasoli felt that if they are going to make that specific criterion then they should establish that goal.

Dr. Fildes stated in terms of enumerating under Item #2 Median Transport Times, he suggested that if the current average transport time is 15 minutes or less then you do into quadrant, zip code or you could do it by designated centers and it should be stratified to step 1 and 2 and then step 3 and 4.

Ms. Palmer questioned if he wanted to tie it to the areas in question.

Dr. Fildes answered in the affirmative adding service areas for analysis would have to be tied to both. He asked the taskforce that in terms of median transport times if there was any interest in including a recommendation to develop star charts or a diamond grid surrounding hospitals desiring designation, applying for designation, existing centers in the system or all acute care facilities.

Mr. Hammond advised the taskforce that he has previously discussed creating a diamond grid or chart with Lei Zhang, Public Health Informatics Scientist. He added that it is very time consuming and may take some time.

Dr. Fildes asked if the OEMSTS can propose some language that's practical and relevant about graphing transport times relative to acute care facilities and comment on it at their next meeting. He felt it would be useful in their guidance to the RTAB.

Ms. Taylor questioned if there was a way to tie the data to the trauma level.

Ms. Palmer stated that has been done. She advised it was 14 minutes for step 1 and 2 patients and a little over 15 minutes for step 3 and 4 patients.

Dr. Fildes asked for other comments on transport times and how to depict them that would be useful and usable to the RTAB and the Health District. Hearing none he closed this agenda item.

#### C. Review/Discuss Domain (3) Lead Agency/System Stakeholder/Community Support

Dr. Fildes stated that the previous minutes show that they reached a point where they couldn't find a firm way to define lead agency/stakeholder/community support in the fact that each of these is different.

Ms. Doane felt there should just be an expressed understanding that an applicant would be expected to submit letters of support and then when it went before the BOH there would be an assumption of opportunities for dissent or support at that level to be publically expressed.

Mr. Hammond expressed his concern with regard to where are the letters of support coming from because the NBATS tool is specific to letters of support from city and county governing bodies. He added that they did receive a number of community support letters but within the framework of NBATS those are accepted and filed but don't affect the scoring. He questioned if they are going to continue with that particular framework using municipalities and governing counties as community support system stakeholders as defined in the NBATS tool.

Ms. Taylor felt that they couldn't quantify the community involvement and stakeholders for this particular tool.

Mr. Hammond felt that they could do it in regards to the government entities. He stated that a trauma center was going to open up within the city of Las Vegas then you have the City of Las Vegas municipal body and you have Clark County and those are the two bodies that you have to support your effort.

Dr. Fildes suggested they bullet point each one and spell out an understanding of what level of support they are looking for.

Ms. Taylor agreed and stated this would be the expectation of what you are supposed to potentially present in your application.

Ms. Doane asked for clarification with regard to government entities. The taskforce agreed it included the applicant's city councilperson or local commissioner and not the whole city council for an initial consideration.

Dr. Fildes stated that as they write the draft he would rather be more inclusive and more critical in the end then be more critical at this point and less inclusive. He felt that there is a sense of what carries weight with the lead agency, stakeholders and what carries weight with the community. He suggested using the verbiage of "including but not limited to" as way to get this rolling.

## D. Review/Discuss Domain (4) Severely Injured Patients (ISS > 15) Discharged from Acute Care Facilities not Designated as Level I, II, or III Trauma Centers

Dr. Fildes stated the previous minutes indicate that this statistic is reported by the Health District in the TMAC and that there is a known way to calculate it and a known way to present it. He questioned if this taskforce is peer review protected in the same way as the TMAC. Mr. Hammond answered in the negative.

Dr. Fildes asked Mr. Hammond to explain the method they use to collect this information and how it is depicted.

Mr. Hammond stated it is based on the state trauma registry that is a required reportable field. Those are tracked numerically. It is easy to slice and dice that data any way you wish so if you want to take a look at a particular non trauma center in a quadrant, in a zip code in a TSA and whether or not number is going up or down as a percentage that is easy enough to do.

Ms. Taylor stated that patients with an ISS > 15 are generally going to a level I or II center and questioned where level III and IVs fall into that coding.

Dr. Fildes explained the timeline of an injury where something unexpected happens to a person and 911 is called and there will be a response, a transport, and then an evaluation. That evaluation may take place at a trauma center or a non-trauma center which will include physical examination and diagnostic studies and a list of patient problems will be generated and coded. If those injury issues are severe, the codes add up to a number that is greater than 15. This number is not known until after the patients evaluation in the ED is reasonably complete.

Ms. Renner explained that she looks at ISS after the fact. A more accurate number of what is happening in the field is the TFTC.

Ms. Johnson reported that once their facility realizes the patient has an ISS > 15 they typically get transferred to a trauma center. She felt that they shouldn't put that much weight on this because there really isn't a problem with that in our current system.

Mr. Hammond agreed and stated that the last time he looked it was less than 150 a year for all 15 non-trauma centers.

Ms. Doane stated that perhaps more appropriate criteria would be looking at transfer rates. How many are getting triaged and then transferred out to a higher level of care.

Mr. Hammond stated that they do track the transfers in.

Ms. Johnson believes that the data they submit to the state, anything put in as a transfer to a trauma center is no longer captured under a non-trauma center data. They capture it under the trauma centers data.

Mr. Hammond agreed stating that is captured as a transfer in and reported on the TFTC report that is received from the trauma centers. It can also be captured from the trauma registry as a transfer in and from what location.

Ms. Doane suggested that they consider all three discussion points in this domain to get the full picture to include ISS > 15, state data for non-trauma centers, and transfers in.

Dr. Fildes explained that the TFTC is in the domain of EMS data collection and interfacility transfer is reported in the trauma registry and may also be present in the uniform hospital discharge data set as well as the state registry.

- Ms. Cerasoli stated that this measure is more applicable to determine when a level III needs to upgrade to a level II.
- Dr. Dort agreed stating these are not the patients to look for when evaluating for level III center. He added that the numbers of patients with ISS > 15 that are not at trauma centers are most likely not a result of the EMS system they are the results of a privately owned vehicle (POV) and any decisions that we make to change the system isn't going to redirect those patients anyway.
- Dr. Fildes stated that there is a methodology for collecting patients with high ISS scores treated in non designated trauma centers and asked the OEMSTS to advise them on what they might consider to be a threshold value of whether it is small, medium, or large. This will be monitored on multiple levels among them being the need to add additional trauma center care or perhaps the need for public education on the use of the EMS system.
- Mr. Hammond questioned if it is the decision of the taskforce to remove that as criteria for this tool.
- Dr. Fildes felt they should leave it in but leave it simplified. Dr. Dort agreed that it needs to be included in the needs assessment but weigh it more when increasing the level of a trauma center rather than determine its existence.
- Dr. Fildes felt that they can look at the absolute number or look at the percentage for ISS > 15, state data for non-trauma centers, and the transfers in. He asked that the OEMSTS bring back some draft language for this area based on this discussion and they will critique that in the next meeting.

#### E. Review/Discuss Domain (5) Level I Trauma Centers

- Dr. Fildes stated that the Health District provides the RTAB with trend information that crosses multiple years. This information talks about volumes and acuities and defines the operational characteristics of each of the current centers. He suggested that those reports be included and become part of this needs assessment.
- Ms. Taylor questioned if this would be another section to bullet point what types of reports to include for the application process.
- Dr. Fildes stated that when this gets passed to the RTAB for consideration they look at the operational characteristics of each current trauma centers over time and how they've made tremendous investments in personnel, staff and facilities. He would hope that they produce a system pie chart to depict how the addition of new centers would impact the volumes of those existing centers.
- Ms. Doane stated that she would be interested to see the current systems makeup and how adding a level III would impact each specific trauma activation level vs. just looking at it on the whole.
- Ms. Taylor questioned if that is going to be based on the current catchments areas.
- Dr. Fildes felt that that kind of analysis is more advanced then identifying a need in the community.
- Ms. Renner felt that if another center was admitted into the system they would have to work out another catchment zone after that center was admitted.
- Dr. Fildes agreed stating that they become a function of fire districting, municipal boundaries, or the presence of McCarran as a geographic barrier to get transport across a certain place.
- Ms. Taylor questioned how the market shift is determined if the market is currently determined based on the catchment area and how would we figure out what that potential shift would be without kind of identifying that first.
- Dr. Fildes gave an historical overview on how the catchment areas were determined. He cautioned that there are so many stroke and heart centers in Las Vegas and that none of them actually achieve certification or levels of excellence because it is so diluted. Trauma historically going back to the 70s and the 80s came at this from a different point of view and he would personally like everyone to be very considerate of that point of view and to not have 100 trauma centers to see 100 patients a year as opposed to one trauma center that sees 100,000 patients a year.
- Dr. Dort added that with ACS standards it's much more volume dependant to maintain a level I and they obviously need to be protective of that.

Dr. Fildes felt that what they hand down to RTAB should reflect that they have considered that and they should consider it as well.

F. Review/Discuss Domain (6) Numbers of Severely Injured Patients (ISS > 15) Seen in Trauma Centers Already in the TSA

Tabled

G. Next Meeting and Agenda Items (6/20/2017 2;30pm)
Tabled

#### IV. INFORMATIONAL ITEMS/DISCUSSION ONLY

None

V. <u>PUBLIC COMMENT:</u> A period devoted to comments by the general public, if any, and discussions of those comments, about matters relevant to the Committee's jurisdiction will be held. No action may be taken upon a matter raised under this item of this Agenda until the matter itself has been specifically included on an agenda as an item upon which action may be taken pursuant to NRS 241.020. Comments will be limited to five (5) minutes per speaker. Please step up to the speaker's podium, clearly state your name and address, and spell you last name for the record. If any member of the taskforce wishes to extend the length of a presentation, this may be done by the Chairman or the Community by majority vote.

Chairman Fildes asked if anyone wished to address the taskforce. Seeing no one, he closed the Public Comment portion of the meeting.

#### VI. ADJOURNMENT

As there was no further business on the agenda, Chairman Fildes adjourned the meeting at 3:31 p.m.

### Southern Nevada Trauma System Trauma Needs Assessment

1.	Population		YES	No	
	A.	Is the Las Vegas valley population increasing?			
		(based on County demographer information)			
	В.	Is an area of the Las Vegas valley demonstrating population growth			
		at a faster rate than the rest of the valley?			
		(based on County demographer information)			
	C.	Is there an increase in TFTC incidents in the area of population			
		growth? (based on SNHD Informatics data )			
	D.	Are the TFTC incidents for the appropriate step level increasing			
		(Step III and IV patients for a Level III center, Step I and II patients			
		For a Level I or II center)? (based on SNHD Informatics data)			
2.	Me	Median Transport Times			
	A.	Is the Southern Nevada Trauma System demonstrating transport			
		times greater than 15 minutes? (based on SNHD Informatics data)			
	В.	Are transport times for the appropriate step level greater than			
		15 minutes (Steps III and IV for Level III center, Steps I and II for			
		A Level I or Level II center) (based on SNHD Informatics data)			
3.	Lea	Lead Agency/ System Stakeholder/ Community Support			
4.	Sev	verely injured patients (ISS>15) discharged from Acute Care			
		cilities not designated as a Trauma Center			
	A.	Is the percentage of patients with an ISS >15 being discharged			
		from a non trauma center% or higher?			
		(based on SNHD Informatics data)			
5.	Tra	Trauma Centers currently in the Las Vegas valley			
6.	Number of severely injured (ISS >15) seen in the Trauma System				
	currently				
	Α	. Using the formula (500 X total level of Level I and Level II facilities)			
		Does the number of severely injured patients seen in the Trauma			
		system exceed this number? (based on SNHD Informatics data)			