PURPOSE: To establish minimum standards and provide guidelines for the development of a comprehensive emergency preparedness plan to enhance surge capacity at Trauma Centers (TC).

AUTHORITY: Public Health Security and Bioterrorism Preparedness and Response Act of 2002, Section 319C-1 Hospital Preparedness Program – Trauma Surge and Expanded Participant Agreement

DEFINITION: Surge Capacity – The ability to quickly expand capacity and capability beyond normal operations to meet an increased demand for medical care in the event of a multiple casualty incident (MCI), bioterrorism or other large-scale public health emergencies.

PRINCIPLES:

1. TCs have a significant role in the healthcare community’s response to terrorist incidents or natural disasters involving multiple casualties.

2. TCs shall have a comprehensive emergency preparedness plan that includes all essential hospital departments to maximize surge capacity.

3. Emergency preparedness plans shall be a scalable, all-hazards approach with emphasis on management of multiple casualties with traumatic injuries.

4. Emergency preparedness plans shall provide for sustainability of the facility.

5. Plans shall be exercised semi-annually, one of which must be a functional exercise. Corrective measures must be implemented in a timely manner to address deficiencies identified during the exercise.

6. TCs shall adopt a Hospital Incident Command System (HICS) that is compliant with the National Incident Management System (NIMS) and integrate the NIMS Implementation Activities for Hospitals and Healthcare Systems.

POLICY:

TCs shall develop a comprehensive emergency preparedness plan that addresses the following critical elements:

1. Triage – Develop a hospital triage system to identify patients needing intensive care or surgery and patients who can be downgraded from intensive care, transferred to other healthcare facilities or discharged.
II. Surge Beds – Pre-identify physical space for expansion of intensive care and non-critical services and establish procedures to expand bed capacity for intensive care and general medical-surgical patients.

III. Personnel – Designate hospital personnel and establish procedures to manage the TC’s emergency response.

A. Trauma Surge Coordinator – Responsible for the development, implementation, evaluation and maintenance of all aspects of the TC Emergency Preparedness Plan. The Trauma Surge Coordinator shall participate in the overall emergency preparedness activities of the TC.

B. Support staff participation in the Emergency System of Advance Registration of Volunteer Health Professionals (ESAR-VHP) program.

C. Develop and maintain decontamination capabilities consistent with the Hospital Preparedness Program Agreement.

IV. Training – Conduct semi-annual training on emergency preparedness for TC personnel and medical staff. Training shall include participation in a functional disaster exercises.

V. Equipment and Supplies – Establish a process for procurement, storage and management of trauma surge equipment and supplies, which should include the following:

A. Monitoring equipment with EKG, oxygen saturation, and invasive and non-invasive pressure monitoring capabilities

B. Ventilators

C. Portable ultrasound machine

D. Point-of-Care analyzers

E. Intravenous fluids and pumps

F. Blood products and volume expanders

G. Pharmaceuticals required for critically injured patients

VI. Communications – TCs shall have secure and redundant communication systems that allow connectivity to other TCs, healthcare facilities and emergency response agencies. Each TC must implement, maintain, update, and regularly test a staff notification system which incorporates a response group for trauma team activation.

VII. Patient Tracking - In conjunction with Los Angeles County’s regional patient tracking program, participate in the patient identification and family reunification plan.
VIII. Security – Develop policies and procedures to secure the TC and manage the influx of victims, family members, and the press. These procedures will be implemented to prevent the obstruction of patient care delivery.

GUIDELINES:

TCs may adopt the following recommendations to achieve the critical elements outlined in this policy:

I. Triage:

A. Hospital triage should include the following categories:

1. Inpatient Triage – to identify patients who can be downgraded, transferred to other healthcare facilities or discharged.

2. Emergency Department Triage – to identify patients who meet criteria for intensive care or surgery.

B. Establish trauma triage teams to facilitate patient movement utilizing the triage criteria. Each TC shall determine the composition of the triage team.

II. Surge Beds:

A. Intensive Care Beds – Provision of intensive care services where critical care equipment and supplies are accessible. Expansion of intensive care beds may be achieved by:

1. Conversion of non-critical care beds into intensive care beds. This may include converting general medical-surgical, post-anesthesia care, procedure room, observation and/or outpatient care beds.

2. Conversion of non-patient care areas within the facility. This may include offices, cafeteria or conference rooms.

B. General medical-surgical beds – Expansion of non-critical beds may be achieved by:

1. Conversion of non-patient care areas within the facility.

2. Conversion of off-site facilities. This may include nearby medical offices and clinics, schools or church buildings.

3. Setting up temporary tent structures.

C. Cancellation of Elective Procedures – Develop and implement a process to cancel elective procedures during a disaster.

D. Patient Transfers – Transfers and transportation resources can be coordinated through the Medical Alert Center (MAC) if necessary.
III. Personnel:

A. Encourage health professionals to participate in Los Angeles County’s ESAR-VHP program. These health professionals may include, but are not limited to, surgeons, physicians, nurses, operating room technicians, pharmacists, and respiratory therapists.

B. Develop and implement an emergency credentialing system for volunteers.

IV. Communication:

A. Identify an alternate Hospital Command Center (HCC) should the primary HCC become inoperable. Ensure that the alternate HCC has communication equipment available.

B. Establish, maintain, and test redundant systems for internal and external communications. The following procedures and tools are recommended for redundancy:

1. Telephones
   a. Landline phones – Must be identified by the phone service company as a medical facility to receive priority repair and restoration service
   b. Cellular phones with Wireless Priority Service (WPS)
   c. Internal portable phones (zone phones, Vocera®)
   d. Direct outward dial lines
   e. Government Emergency Telephone System (GETS) – priority repair and restoration of landline phone service
   f. Public phones
   g. Satellite phones
   h. Fax lines

2. Radio
   a. Two-way hand held radios
   b. Direct Connect (Nextel®)
   c. Commercial broadcast receiver (AM/FM radios)
   e. VMED28

3. Pagers – Text, data and voice pagers

4. Internet
   a. E-mail to pagers and personal digital assistants (PDA)
   b. ReddiNet - Internet access
   c. Voice Over Internet Protocol (VOIP)
   d. Web page announcement

5. Staff Call-Back Notification Systems - Ability to send notifications to phones, pagers and PDAs with response and tracking capabilities.
6. Written messages and runners

V. Security: Measures to consider in enhancing the TC’s security:

A. Surveillance and preventive security measures.

B. Crowd control measures.

C. Control of entry or access points to the TC, including rapid lockdown of the entire facility. Facility lockdown plan shall be exercised on a regular basis.

CROSS REFERENCES:

Prehospital Care Manual:
Ref. No. 504, Trauma Patient Destination
Ref. No. 506, Trauma Triage
Ref. No. 519, Management of Multiple Casualty Incidents
Ref. No. 1102, Disaster Resource Center (DRC) Designation and Mobilization