



Rainbow Babies  
& Children's Hospital



# Special Needs of Children in Disasters

## Triage and Children

Rainbow Center for Global Child Health  
Rainbow Babies and Children's Hospital  
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# Objectives

Upon completion of this activity participants will be able to:

- Define “triage”
- Describe unique considerations of triage for children in disasters
- Address psycho-social concerns while performing triage
- Identify children who need immediate attention



# Triage

## **Principles of care:**

- Humanity
- Neutrality
- Impartiality

# Definition

**Triage:** From the French word 'trier' that means to sort out.

A process to assign treatment ***priorities***, based on needs and available resources at that particular time.

# Triage: Goals

- Doing the most good for the most people
- Sorting patients according to severity and need for immediate care
- Recognize futility

# **Goal of Casualty Care (Civilian and Military)**

- Obligation to treat as many victims as possible who have a chance of survival
- Methodology is triage process

Frederick Burkle, MD-MPH

# Children are Not Little Adults

- Anatomic differences
- Physiologic difference
- Immunologic differences
- Developmental differences
- Psychological differences

# Conventional vs. MCI Triage

- Individual vs. large population
- Assumes nonfunctional EMS system

# BDLS Triage

- M-A-S-S (Move, assess, sort, send)
  - Military model, used in adults
  - Geographic proximity
  - Does not address issues related to children

# Inclusion vs. Exclusion Criteria

- Inclusion criteria: based on standard procedure, training, ACLS, ATLS, PALS, emergency protocols
- Exclusion criteria: based on available resources, some medical and surgical conditions will not receive the resources they normally do

Frederick Burkle MD MPH

# Medical Triage in Disasters

- Applies to MCIs (Mass Casualty Incidents), when conventional care cannot be delivered to all victims
- Best possible care for maximum number of salvageable patients
- Makes a distinction between those who will do well with minimum care and those who will die despite maximal care

“The main factor in disaster response is not a question of abilities to treat individuals but rather the ability to efficiently use available resources”

*Health Preparedness and Planning for Disasters: A Civil Military Perspective. Jan Luc Poncelet MD, MPH June 2002 PAHO, Washington DC*

# Triage in Humanitarian Emergencies

- International law requires the best “opportunity” for survival
- “Opportunity” means triage, not necessarily survival



# Epidemiologic Findings in Humanitarian Emergencies

- Unrealistic triage results in unacceptable death rates among those who should survive
- Inadequate surgery is worse than nothing
- The hopelessly injured die

R.M. Coupland

# Triage Officer

## The Role

- Only one person should be in charge of the triage process
- In emergencies, the decision should be simple and clear to avoid confusion
- It is very important to respect the triage decision

# **Triage Officer Qualities and Training**

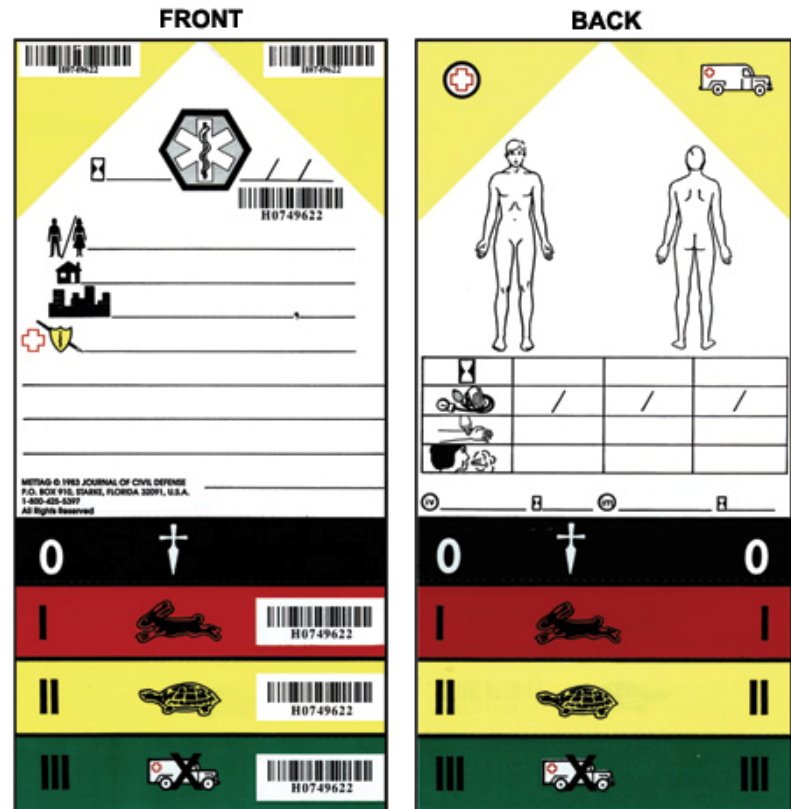
- Requires a person who is able to rapidly assess patient condition under adverse circumstances and rapidly determine their category
  
- EMT, nurse, physician

# Triage Systems

- **START** system for adults: It stands for Simple Triage And Rapid Transport
- **JumpSTART** system for for pediatric triage
- The Paediatric Triage Tape
- Careflight
- **SAVE** (secondary assessment of victim endpoint)

# Casualty Categories in Triage

- Minimal
- Delayed
- Immediate
- Expectant



# START Process - Adult

- Triage decision points:
  - able to walk
  - presence of spontaneous breathing
  - respiratory rate > 30/min**
  - capillary refill > 2 min**
  - ability to obey commands**
- Categories include:
  - green/minor
  - yellow/delayed care
  - red/immediate
  - black/deceased or expectant deceased



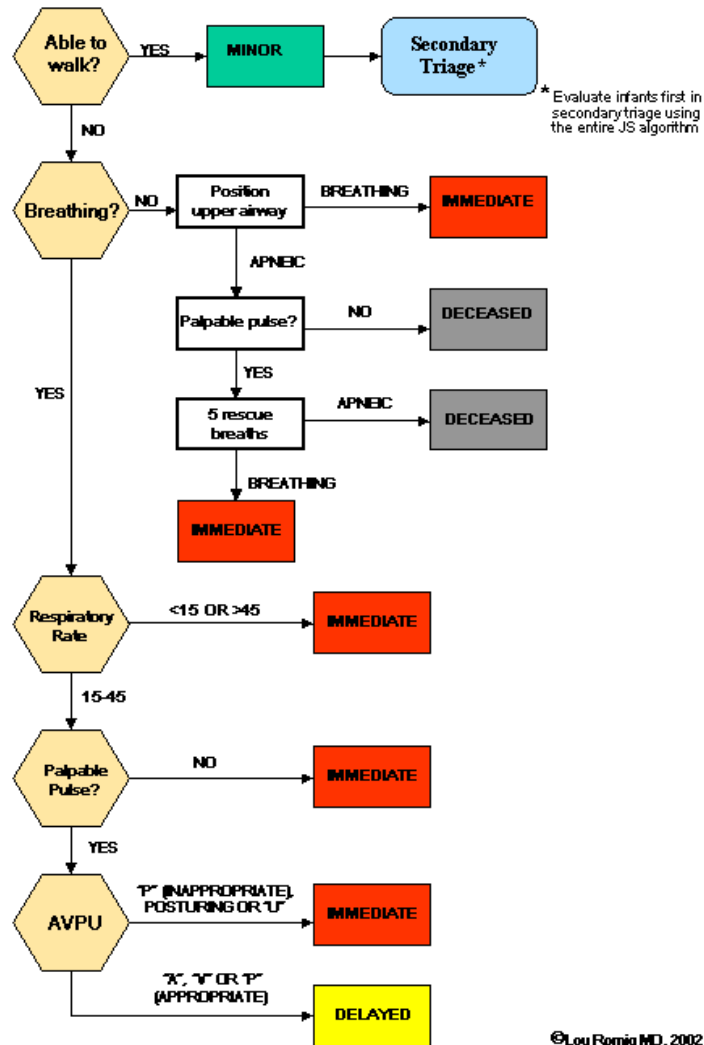
# Goals of JumpSTART

- Optimize limited resources for patients who will benefit the most, regardless of age
- Use physiologic decision points reflecting age variations in children
- Triage children in 30 seconds
- Recognize and minimize emotional influences in objective triage process

[www.doh.state.fl.us/workforce/ems1/EMSC/EMSCPdfs/EMSCNewsJun02.pdf](http://www.doh.state.fl.us/workforce/ems1/EMSC/EMSCPdfs/EMSCNewsJun02.pdf)



# JumpSTART Pediatric MCI Triage®



# Modifications for Non-ambulatory Children

- Infants who normally can't walk yet
- Children with developmental delay
- Children with acute injuries preventing them from walking *before* the incident
- Children with chronic disabilities

Lou Romig, MD

# PsySTART Triage

- Psy-START = psychological Simple Triage And Rapid Treatment
- It is a rapid mental health and incident management strategy for large scale events
- Emerging evidence suggest some interventions can alter the risk and prevent PTSD

# PsySTART Triage

- Pilot system operational via a secure website
- Has been piloted in Oklahoma tornadoes, CA wildfires, Tsunami
- Data analysis suggests system may be useful in identifying immediate need and sustained risk.

# PsySTART

- First responder can identify children who had most traumatic exposures
- Mental health practitioner then interviews those children about perception of threat and subjective experience of fear

# Children's Priorities in Triage

- ❑ Classical triage, medical needs
  - Classify patients by need for treatment according to: Immediate care, delayed, minimal or expectant
  - Treat children in a special designated area
- ❑ Psychological triage (i.e. PsyStart)
  - Provide emotional support
- ❑ Children's needs
  - Identification: special name tags
  - Reunify children separated from their parents
  - Find relatives or surrogates parents
  - Find housing, shelter and clothing appropriate for children
  - Adequate nutrition

# Triage: Summary

- Use a recognized easy to learn triage system (JumpSTART) for medical triage in MCIs
- Learn about PsySTART triage for psychological triage
- Re-triage frequently
- Remember that a child's developmental stage may affect triage score
- Children with developmental delays or chronic medical conditions may be mistriaged more easily
- Train all staff in basic pediatric emergency care, psychological and physical needs of children

**PRACTICE, PRACTICE, PRACTICE**

# References

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- Nat. Center for Child Traumatic Stress: [www.nctsnet.org](http://www.nctsnet.org)