

SPECIAL NEEDS POPULATIONS IN DISASTER RESPONSE



Joseph J. Contiguglia, MD, MPH&TM, MBA
Clinical Professor of Public Health
Tulane University SPH&TM

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DISASTER



Faculty

Joseph J. Contiguglia MD MPH&TM MBA
Clinical Professor of Public Health
Tulane University SPH&TM

Objectives

- Discuss the basic principals which should underlie disaster consequence management planning.
- Explain the influence of lifestyle and culture on disaster management within a population at risk.

Objectives

- Identify several special needs in a potential local population risk and assess significant characteristics of their requirements.
- Describe the need for urgent disaster related support of special needs populations.

Objectives

- List some tools available in the context of disaster driven lifesaving and consequent management.

OVERVIEW

- Vulnerable populations
- Challenges
- Tools
- Management

LANGUAGE

- Literacy
 - What level
- Spoken
 - Formal
 - Dialect
 - Patois
 - Jargon or street
- Written

LANGUAGE MINORITY

- Critical disadvantage with respect to:
 - Warnings
 - Relief-information
 - Instructions
 - Job opportunities
 - Enrollment processes
 - Reimbursement requirements

ILLITERATE

- Same problem for the illiterate
- Difficult to benefit from printed material – illustrations may help
 - Describing benefits
 - Providing instructions
 - Fill out application forms
 - Register for assistance

CUSTOMS

- Authority
- Hierarchy
 - Class
 - Status
 - Power
- Social Roles
 - Sex
 - Age
 - Tribe/family
- Violence

VALUES & NORMS

- | | |
|-------------|----------------------|
| • Religious | • Tribal |
| – Christian | • Occupational |
| – Moslem | • Caste |
| – Hindu | • National/Patriotic |
| – Buddhist | • Racial |
| – Animist | • Familial |
| – Pagan | |
| – Atheist | |

IMMIGRANTS

- Residents without legal status
 - “Permanent” illegals
 - Some encouraged by country of origin
 - Transient workers
 - Bad guys
 - Gangsters
 - Smugglers

IMMIGRANTS

- Legal but newly arrived
- Relatives
- Unregistered children

IMMIGRANTS

- Complex array of obstacles, including:
 - Language barriers
 - Bureaucratic rules
 - Fear of military assistance
 - Fear of deportation
 - Not included in long-term recovery

IMMIGRANTS

- Lack of integration of religious customs can also contribute to social stress
- Recent immigrants from Middle East
 - May follow religious norms of modesty and separation of the sexes
 - Usually are not accommodated in emergency shelters
 - Which members participate in community activities?

TRANSIENTS, NEWCOMERS AND TOURISTS

- Those who pass through, stay temporarily, or are recently arrived may not:
 - Hear warnings
 - Know where to shelter
 - Have resources easily available
- Communities can reduce the vulnerability of this population, especially those with large tourism industries

ISOLATED GROUPS

- Living in remote and/or rural areas
- Difficulty receiving information about relief assistance
- Difficulty acquiring actual assistance and supplies
- Isolated households
- Farms
- Ranches

ELDERLY: MOBILITY

- Disability
- Strength
- Prosthesis
- Crutch or cane
- Walker
- Cart
- Bedridden

ELDERLY: ADAPTABILITY

- Physical
- Mental
- Emotional
- Social

ELDERLY: FRAGILITY

- Emotional
 - Confusion
 - Disassociation
 - Fear/panic
- Physical
 - Fitness/endurance
 - Bone structure

ELDERLY: FRAGILITY

- Physiological
 - Cardiovascular
 - Endocrine
 - Renal

ELDERLY: THERAPEUTICS

- Multi system disease
 - Cardiovascular (CAD), Failure, A Fib
 - Endocrine (Diabetes)
 - Neurological (stroke), senile dementia
 - Renal Failure
- Multiple medications

ELDERLY: THERAPEUTICS

- Medication interactions
- Absorption/excretion
 - GI
 - Hepatic
 - Renal

SINGLE PARENTS

- Often have lower incomes and greater constraints placed upon their time
- May restrict the family's access to important community recovery activities and resources

CHILDREN

- Society tends to be adult-oriented
- Children completely dependent on adults
 - Safety
 - Security
 - Feeding
 - Care
 - Education

CHILDREN

- Many relief and recovery systems
 - Assume children will be cared for by parents
 - Neglect to directly consider their needs

CHILDREN

- The care system for many may break down during disasters
- May be left to fend for themselves
- System may not account for their needs

HOMELESS AND STREET CHILDREN

- The most rapidly growing homeless group is families
- Little is known about what happens to them after disasters

HOMELESS AND STREET CHILDREN

- Familiar places are often ruined or permanently altered, further displacing the homeless
 - Doorways
 - Traditional shelters

LESBIAN AND GAY HOUSEHOLDS

- Little is known about homosexual families after disasters
- Speculate that the hostility they experience every day may be exacerbated

MEDICALLY DEPENDENT: PHYSICAL

- Some people rely on certain types of medical machinery for survival
 - Life support
 - Oxygen
- Unable to participate in many recovery programs
- Unable to access relief
- At increased risk

DISABLED

- Often marginalized in relief efforts
- Inadequate systems of relief distribution
- Incomplete systems of support
- No accommodation for special needs
 - Surgery & Rehabilitation
 - Provisions for Blind, Deaf & Dumb

DISABLED

- No accommodation for special needs
 - Shelters may not be built with ramps
 - Limits access of wheelchair bound victims
 - Toilets

PSYCHIATRY

- Medication side effects
 - Heat sensitivity
 - Seizure, fainting
- Acute
 - Acute stress disorder, insomnia
- Panic
- Delayed
 - PTSD
- Chronic
 - Psychosis & Neurosis

MEDICALLY DEPENDENT: PSYCHOLOGICAL

- The mentally ill may experience increased fear and confusion due to:
 - Increased stress
 - Access to medication
 - Access to treatment
- Altered mental state
 - May be helpless
 - May be unable to access recovery assistance

PSYCHOLOGICAL INJURY TREATMENT

- Expect large numbers of casualties (10%)
- Treatment principles
 - Proximity
 - Immediacy
 - Expectancy

SOLDIERS RESTING ON OMAHA BEACH
WAR PSYCHIATRY, ZAJTCHUK

PSYCHOLOGICAL INJURY TREATMENT

- Stress of dealing with casualties
 - Fatigue
 - Overworked
 - Understaffed
 - Sleep deprivation

HEARING IMPAIRED

- Visual support
- Visual alerting systems
- Visual instruction displays
 - Fixed
 - Dynamic
- Hearing aids
 - Availability
 - Repair
 - Supplies (batteries)

SPEECH IMPAIRED

- Signing translators
 - Dialects
- Writing materials
- Access to support
- Identifying urgent needs
- Asking questions

VISUALLY IMPAIRED

- Safe Environment
 - Tactile signage
- Access to necessary support services
 - Water
 - Food
 - Housing
 - Bedding
 - Sanitary facilities
- Dogs
 - Availability
 - Support

IMMUNOSUPPRESSION

- HIV
- Chronic disease
- Radiation
- Chemical
- Therapeutic
 - Neoplasia
 - Autoimmune disease
- Pregnancy

IMMUNOSUPPRESSION: INFECTION CONTROL

- Contact
- Airborne
- Water
- Latrine
- Footwear
- Sleeping quarters
- Vectors
- Isolation
- Quarantine

MEDICAL: CARDIOVASCULAR

- Hypertension
 - Medication
 - Diet
- Coronary Vascular Disease
 - Angina
 - Acute MI
- Failure
- Pacemaker
- Transplant

MEDICAL: KIDNEY

- Renal
 - Dialysis
 - ATN
 - Chronic progressive
 - New
 - Screening

OTHER MEDICAL

- Endocrine
 - Diabetes
 - Type I
 - Type II
 - Hypothyroid
- Allergy
 - Asthma
 - Medication
 - Food

PEDIATRICS

- Newborn
 - Protocols
- Acute medical or surgical problems
- Special vulnerabilities
- Immunizations
- Chronic diseases
- Medications & dosages

SURGERY/TRAUMA

- Urgent Pre-Op
- Post-Op
- Acute trauma
 - First aid
 - Transportation
 - Availability of surgical sites
 - Wound dressing
- Medication
- Follow Up

TETANUS & GANGRENE

- Identification of injury
- Availability of skilled care
- Debridement & dressing
- Medication
- Follow up
- Antitoxin
- Immunization

SNAKEBITE & ENVENOMATION

- Snakes
- Spiders

SPECIAL SURGERY

- OB/GYN
 - Pregnancy
 - Delivery
- Neurosurgery
- Ophthalmology
- Dental

MALNUTRITION

- Assess for vitamin/mineral supplementation
- Establish minimum diet
 - 2100 Kcal/day
 - 20% Fats or oils
 - 46gm Protein



UNICEF

REFUGEE SITUATIONS Vulnerable Groups

- Women & female-headed households
- Lactating or pregnant female
- Children
- The elderly
- The disabled
- Ethnic, political or religious minorities
- Urban refugees in a rural setting



IRC
WOMEN'S
COMMISSION

POISONING

- Identification
- Diagnosis
- Public health intervention
- Acute & emergency response
- Therapeutics
- Consultation & support
- Follow Up

TOOLS

- **Horizontal Community Planning**
 - **Prevention Model integrated with Recovery Model**
 - **Across the ESFs**
- **Guidelines**
 - **Integrated across ESFs**

TOOLS

- **Standards**
 - **Modified**
 - **Timing**
 - **Training**
 - **Outcome**
 - **Care**

PREVENTION-BASED MANAGEMENT

- **Focus on vulnerability and risk**
- **Changing conditions**
- **Shared or regional variations**
- **Multiple authorities, interests, actors**
- **Situation-specific functions**
- **Shifting & tangential relationships**
- **Moderate and long time frames**

RECOVERY-BASED MANAGEMENT

- **Focus on disaster events**
- **Obligated responders**
- **Fixed, location-specific conditions**
- **Single agency responsibility**

RECOVERY-BASED MANAGEMENT

- **Command and directed operations**
- **Hierarchical relationships**
 - **Focused on hardware and equipment**
- **Specialized expertise**
- **Urgent & short time frames**

TOOLS

- **Operational Models**
 - **Doctrine**
 - **Manpower**
 - **Roles**
 - **Numbers**
 - **Training**
 - **Logistics**
 - **Time Phased**
 - **Flow**
 - **Communications Infrastructure**
 - **Risk Communications**

TOOLS

- Ethics
 - Substantive elements
 - Procedural elements
 - Values
- Principles
- Professional codes
- Defined duty requirements
 - Compensation, benefits & training
- Mandate & sanction

PHYSICIAN OBLIGATION IN DISASTER PREPAREDNESS AND RESPONSE

A.M.A., JUNE 2004

- “Responses to . . . disasters require extensive involvement of physicians.
- Individual physicians have an obligation to provide urgent medical care during disasters.
- This ethical obligation holds even in the face of greater than usual risks to their own safety, health or life.”

DISASTER PLANNING

- Ethical frameworks to guide decision making
 - Help to reduce collateral damage
 - Increase trust and solidarity within and between health care organizations
- Good planning requires reflection on values

DISASTER PLANNING

- Science alone cannot tell us how to prepare for a public health crisis
- Deliberate & corporate
- Not spontaneous

ETHICAL VALUES

- Duty to provide care
- Equity
- Individual liberty
- Privacy
- Proportionality
- Protection of the public
- Reciprocity
- Solidarity
- Stewardship
- Trust

MANDATE

- Optimal balance between potential outcomes, security/survival & liberty
- Clinical paradigm - focus on individual patient
- Rescue paradigm - save lives and minimize aggregate morbidity
 - Focus on community welfare

MANDATE

- Infectious disease
 - Isolation
 - Quarantine
 - Prophylaxis
- Mass casualties
 - Decontamination
 - Evacuation & treatment

MANAGEMENT

- Time phasing critical
- Decision points
- Defined options
 - Pre-approved actions
- Prepared
 - Sites
 - Communications
 - Equipment
 - Supply flow & alternative sourcing
 - Manning

MANAGEMENT

- Evacuation
 - Who
 - How
 - When
 - Enroute medical support
 - Prepared receiving communities
 - Urgent needs
 - Targeted evacuation
 - Special needs sites

MANAGEMENT

- Administrative preparation
 - Target populations
 - Cadre
 - HICS style crosswalk
 - Organizational design
 - Job Action Sheets
 - Forms
 - Training
 - Equipment
 - Prepared Personnel Pool

MANAGEMENT

- Sheltering
 - Local
 - Distant
- Residual population
 - Daily needs
 - Special needs

MANAGEMENT

- PODs
- Supply
 - Marshalling
 - Warehousing
 - Delivery
 - Security

PANIC AVOIDANCE AS A GOAL

- Many communication plans list the avoidance of panic as a major goal
- Panic describes an intense contagious fear causing individuals to think only of themselves

PANIC AVOIDANCE AS A GOAL

- Risk factors for panic include:
 - Belief that there is only a small chance of escape
 - Perception that there are no accessible escape routes
 - Perceiving high risk of being seriously injured or killed
 - Available but limited resources for assistance

PANIC AVOIDANCE AS A GOAL

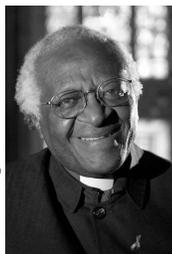
- Risk factors for panic include:
 - Perceptions of a "first come, first served" system
 - Perceived lack of effective management of the event
 - Perceived lack of control
 - Crowd ("mob") psychology and dynamics
 - Authorities that have lost their credibility

PANIC AVOIDANCE AS A GOAL

- Studies indicate that panic is rare
- Most people respond cooperatively and adaptively to natural and man-made disasters
- Panic avoidance should never be used as a rationale for false reassurance or for lack of transparency on the part of authorities

OUTCOME

- Shape the battlefield
- Back to the future
- "The good news to a hungry person is bread."
 - Desmond Tutu



DESMOND TUTU

SUMMARY

- Vulnerable populations
- Challenges
- Tools
- Management
- "Plans are nothing, planning is everything."
 - Eisenhower, Patton



GENERAL
DWIGHT D.
EISENHOWER

