



BEFAST EMT initiative

Mission Kirikan, Turkey



Introduction

History

- ▶ Earthquake in Haïti
 - ▶ 200000 deaths in a few seconds
- ▶ Difficult organization
 - ▶ Dangerous
 - ▶ Country without rules





Problems

- ▶ Chaos

 - The entire world was sending help

 - Fieldhospital - african priest

 - Problems: food / water / sleeping /

- ▶ No rules

- ▶ No accountability

 - ▶ No pt. File

 - ▶ Quality?

 - ▶ Degree in medicine?









WHO Solution



EMT

- 
- ▶ Emergency medical teams
 - ▶ 911 for the world
 - ▶ Rules for disasters
- 

Rules

- ▶ Registration
 - ▶ Materials and people
- ▶ Qualitielabel, JCI for fieldhospitals
- ▶ Test
- ▶ License
- ▶ PT registration
 - ▶ Checklist + inform consent
 - ▶ Medical file
 - ▶ Archive





TYPE 1 MOBILE

Provide outpatient initial emergency care of injuries and other significant health care needs



TYPE 1 FIXED

Same as Type 1 Mobile but work out of a fixed structure and provide up to 12 hours per day of care, 7 days a week.



TYPE 2

Provide emergency care including surgery, 24 hours a day.
Deploy field hospitals with at least 20 beds and can replace and support small district hospitals.



TYPE 3

Provide inpatient referral care and complex surgery. Provide large 40-100 bed facilities and can support and replace tertiary hospitals.



SPECIALIZED TEAMS

Specialize in specific medical area. May be as small as two three senior specialists, or a specialist facility eg. Ebola or Rehabilitation.
Must bring appropriate equipment and supplies with them.

Belgian EMT 2 Fieldhospital

- ▶ 20 beds
- ▶ Staff: 120 people (dokters, nurses, engineers, logisticians,...)
- ▶ Emergencie departement
- ▶ OR + Sterilisation
- ▶ ICU
- ▶ RX
- ▶ LAB
- ▶ Maternity + pediatrics
- ▶ Burnunit
- ▶ Infection control



Logistieks

- ▶ Medical suply's
- ▶ Water
- ▶ Food
- ▶ Sleeping
- ▶ Electricity
- ▶ Satelite connection
- ▶ ...



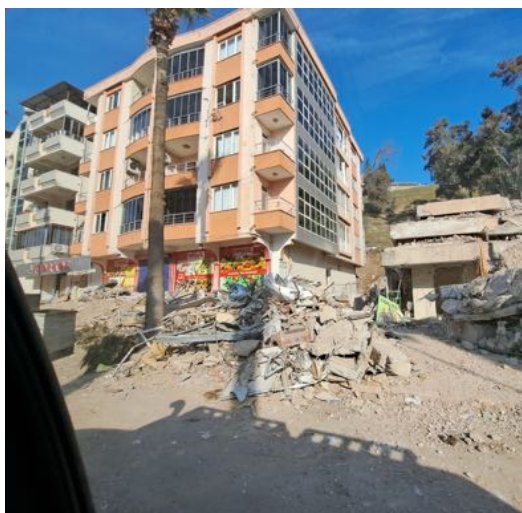






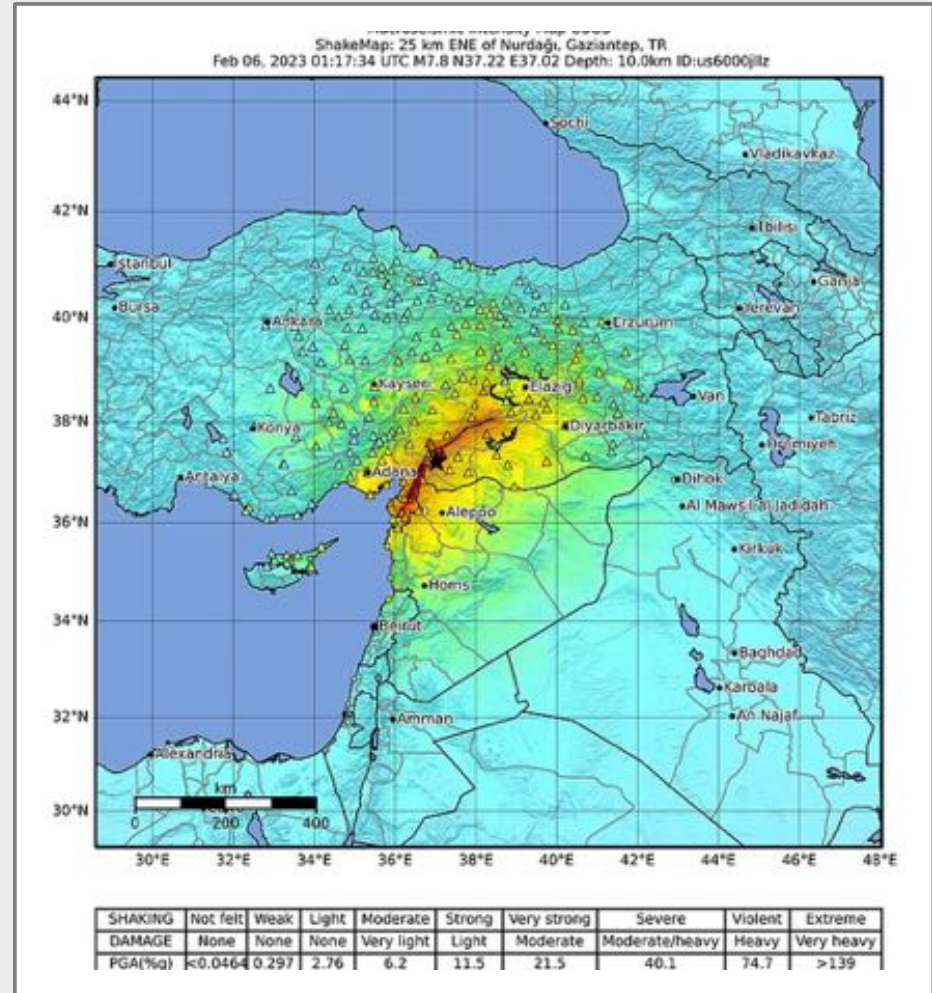
Earthquake turkey





Reddingswerkers op zoek naar overlevenden en lichamen in Kirikhan. © REUTERS





Statistics

- ▶ 50,096 deaths
- ▶ 115000 injured
- ▶ 345000 flats destroyed
- ▶ 164000 houses destroyed
- ▶ 2,7 miljoen people homeless

EMT Starts

- ▶ Belgium government sends a fieldhospital
- ▶ Volunteers are called
- ▶ Reconnaissance team flies to Turkey
- ▶ Kirikan



Logistical nightmare

- ▶ Incomplete hospital
- ▶ No medical supplies
- ▶ Never tested
- ▶ Never transported before
- ▶ First flight in 2 days



Mobilisation of Belgium



- ▶ Defence for transportation
- ▶ Public health for supply's
- ▶ Home affairs for testing, packing,,,
- ▶ Private sector
- ▶



Result

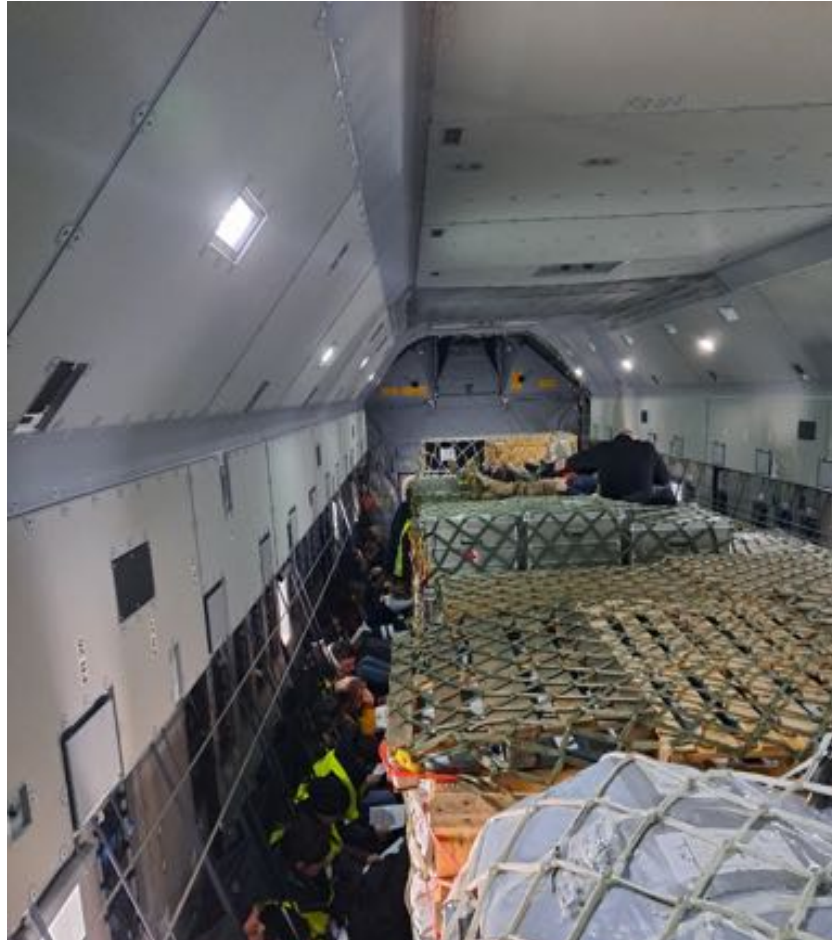
- ▶ First plane left after 2 days
- ▶ 1 plane a day, 9 days
- ▶ Hospital operational after 10 days



Kirikan

- ▶ City of 60000 people
- ▶ largest hospital in the area
- ▶ Temperature at night -6
- ▶ No water
- ▶ No electricity





















Type pathologie

- ▶ First rotation 1600 pt
- ▶ 160 surgical pt.
- ▶ Burns, children
- ▶ Fracture
- ▶ Laparatomie
- ▶ C-section
- ▶ Wound infections
- ▶ Scabies,....







Sterilization



Sterilization Haiti



Sterilization EMT fieldhospital



Problems to solve

- ▶ Nothing was tested
- ▶ No Sterile sets
- ▶ no consumables (papier, soap, products, peelpack,.....)
- ▶ No staff
- ▶ We had to start operathing from day 1





Solutions

- ▶ Medical emergency team from defence
 - ▶ Consumbles for 3 days
 - ▶ Sterile instruments for 5 operations
 - ▶ 2 nurses and logisticien used to work in the fiel
- ▶ Single use instruments
- ▶ Manuals to read in the plane
- ▶ Industry





Murphy's law

Murphy

- ▶ Autoclave crashed with first bowie and dick test
- ▶ Washing machine 1 hour later
- ▶ -5° in the sterilization
- ▶ Back up autoclave was between Brussel and Turkey



Solutions

- ▶ Heating in the sterilisation 24/24
- ▶ Called a technician in Belgium
- ▶ Started in a have day with the african autoclave



Robustex autoclaaf

Africa autoclave





Advantages / disadvantages

- ▶ It works on electricity , gas, wood, oil,...
- ▶ Easy

- ▶ Manually
- ▶ Time consuming
- ▶ No safety protocol
- ▶ No Quality protocol
- ▶ No peel pack





Procedure

Belgian brewery

- ▶ Others made fun of our installation
- ▶ Tried to shut us down
- ▶



Result



- ▶ All our tests were good
- ▶ Only country without sterilization problems
- ▶ Asked for help

Turkey in numbers

- ▶ Fieldhospital worked for 22 days
- ▶ 3503 patients
- ▶ 200 operations
- ▶ 8 births
- ▶ Used 9 plains
- ▶ Transported 180tons medical equipment



