UEMS Lisbon

September 30 till October 1

Hans-Jörg Oestern
Division Trauma Surgery
Increasing problem in Europe


Terroristic attacks in Europe

Quelle: Global Terrorism Database (bis 2014), «Huffington Post», Statista Grafik: Ringier Infographics
Terroristic attacks can occur every time and on every place

That means preparation
Terrorist attacks

1. Strong cooperation between army medical officers and trauma surgeons

Which knowledge is necessary? (strategic, tactic and clinically) International lessons, which are learnt

2. Widespread and rapid dissemination of practical experiences nationwide and around Europe for example traumanetworks

Regional information days, Guidelines, Emergency exercises (100,000€ cost for the hospital)
About Trauma East

The East of England Trauma Network (Trauma East) brings together all those responsible for treating major trauma patients across the six counties of Bedfordshire, Cambridgeshire, Essex, Hertfordshire, Suffolk and Norfolk. The aim is to improve the treatment of this disease and reduce disability and deaths.

The Trauma Network works with others to try and prevent serious injury - the commonest being caused by road traffic collisions.
Development of Traumanetwork

July 2010 (n=5)

July 2011 (n=27)

Red Level 1
Blue Level 2
Green Level 3
Development

about 630 certified trauma centers in Germany
52 certified trauma networks in Germany, Austria and Switzerland

Trauma Centers 'across the borders':
- Netherlands
- Belgium
- Luxembourg
- Switzerland
- Austria

Isolated trauma center:
Dubai
Terrorist attacks

• 1. Strong cooperation between army medical officers and trauma surgeons

• Which knowledge is necessary? (strategic, tactic and clinically) International lessons, which are learnt

• 2. Widespread and rapid dissemination of practical experiences nationwide and around Europe for example traumanetworks

• Regional information days, Guidelines, Emergency exercises (100,000€ cost for the hospital)
Terrorist attacks

• 3. Educational formats for the treatment of gunshot and explosion injuries: together with Trauma surgeons, Army surgeons, other surgical disciplines, anesthesiologists

• Medical contents ec. wound ballistic

• Medical tactic and strategic contents (ec. Multiple places same time, kind of individual medicine

• Organisational contents (Bombing and rescue)
Terrorist attacks

• 4. **Enlargement of Trauma-Registries** by army gunshot and explosion injuries

• 5. **Contract** working together between army and all in treatment and handling terrorist attacks interested disciplines
<table>
<thead>
<tr>
<th>Country</th>
<th>Institution</th>
<th>Year</th>
<th>Type</th>
<th>Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>Norway</td>
<td>Stavanger University Hospital Trauma Registry</td>
<td>2003</td>
<td>1</td>
<td>1</td>
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<tr>
<td>Norway</td>
<td>Oslo University Hospital Ulleval Trauma Registry</td>
<td>August 2000</td>
<td>1</td>
<td>1415</td>
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<tr>
<td>Portugal</td>
<td>REGTRAUMA</td>
<td>2001</td>
<td>1</td>
<td>1</td>
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<tr>
<td>Spain</td>
<td>Registre de Politrauma de Catalunya</td>
<td>2001, but intermittent</td>
<td>In re-design phase</td>
<td>400</td>
</tr>
<tr>
<td>Sweden</td>
<td>SweTrau – The Swedish Trauma Registry</td>
<td>June 2011</td>
<td>Expected to be 35</td>
<td>Not yet in operation</td>
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<td>Sweden</td>
<td>Sodersjukhuset</td>
<td>1990</td>
<td>1</td>
<td>97</td>
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<tr>
<td>Switzerland</td>
<td>TRAC CHUV</td>
<td>2008</td>
<td>1 (increasing to 2)</td>
<td>315</td>
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<tr>
<td>United Kingdom</td>
<td>Trauma Audit and Research Network (TARN)</td>
<td>1990</td>
<td>175</td>
<td>27000</td>
</tr>
</tbody>
</table>
TraumaRegistry DGU
Increase of Accidents 4 times

Use of Handy for 4 sec. 60km/h = driving 66m blind
P.A.R.T.Y.

- Prevention
- Alcohol
- Risk
- Trauma
- Youth
Monitoring a decade

• UN GA resolution 54/255 in 2010 called for a Decade of Action for Road Safety (2011–2020).

• Status reports to be used as a monitoring tool for the Decade.
AFRICA HAS HIGHEST ROAD TRAFFIC DEATH RATES PER 100,000 POPULATION

WHO regions

- African Region: 16.1
- Region of the Americas: 10.3
- Eastern Mediterranean Region: 24.1
- European Region: 18.5
- South-East Asia Region: 18.5
- Western Pacific Region:
EBSQ Trauma Surgery
October 28
Berlin DKOU
## Structure

<table>
<thead>
<tr>
<th>Equipment</th>
<th>25 – 50 sqm ER Respirator Catheter and Drains Splints, ... Emergency - OR Tray: Thoracotomy, laparotomy Fixateur externe / pelvic clamp</th>
</tr>
</thead>
<tbody>
<tr>
<td>Diagnostics</td>
<td>Ultrasound X-Ray CT-Scan</td>
</tr>
<tr>
<td>Background</td>
<td>Lab Blood Bank ICU Heliport</td>
</tr>
</tbody>
</table>
The Utstein template for uniform reporting of data following major trauma: A joint revision by SCANTEM, TARN, DGU-TR and RITG

Kjetil G Ringdal1,2, Timothy J Coats3, Rolf Lefering4, Stefano Di Bartolomeo5, Petter Andreas Steen2, Olav Rise6, Lauri Handlin7, Hans Morten Lossius1 and Utstein TCD expert panel

1 Department of Research, Norwegian Air Ambulance Foundation, Drobak, Norway
2 Faculty of Medicine, Faculty Division Ullevål University Hospital, University of Oslo, Norway
3 Academic Unit of Emergency Medicine, Leicester University, UK
4 Institute for Research in Operative Medicine, University of Witten/Herdecke, Cologne-Merheim Medical Centre, Cologne, Germany
5 Unit of Hygiene and Epidemiology, DPMSC, School of Medicine, University of Udine, Italy
6 Orthopaedic Centre, Ullevål University Hospital, Oslo, Norway
7 Department of Orthopaedics and Traumatology, Helsinki University Central Hospital, Finland

Approval for EU in Perzent

Positive Created with Raphaël

2.1.2 Großbritannien
22 Poland
23 27 Greece 27%

37 Hungary
39 Italy
44 Sweden
38 France minus 38%
46 Netherlands
48 Deutschland

49 Spain
71 Great Britain

Datawrapper
Source: Pew Research Center Get the data
REPORTS: AT LEAST 60 DEAD IN NICE
CRASHES INTO CROWD IN APPARENT ATTACK
REPORTS: AT LEAST 60 DEAD IN NICE
CRASHES INTO CROWD IN APPARENT ATTACK
TRUCK CRASHES INTO CROWD

PROMENADE DES ANGLAIS

CBS

TS: AT LEAST 60 DEAD IN NICE CRASHES INTO CROWD IN APPARENT ATTACK

MARYAM VIOLET WITNESS
<table>
<thead>
<tr>
<th>Country</th>
<th>Registry</th>
<th>First patient</th>
<th>Number hospitals</th>
<th>Patients in 2010</th>
<th>Utstein?</th>
<th>Coded by</th>
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<tbody>
<tr>
<td>Denmark</td>
<td>TARN</td>
<td>1999</td>
<td>1</td>
<td>965</td>
<td>Y</td>
<td>Doctor</td>
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<td>Denmark</td>
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<td>1996</td>
<td>3</td>
<td>713</td>
<td>Y</td>
<td>Doctor</td>
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<tr>
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<td>Tooto Hospital Trauma Registry</td>
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<td>400</td>
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<td>Nurse coder</td>
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<tr>
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<td>300</td>
<td>13 000</td>
<td>Y (-2)</td>
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<td>RRTG – Registro Regionale dei Traumi Gravi of Emilia-Romagna</td>
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<td>Y</td>
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Doctor

Spain

Registre de Politrauma de Catalunya

2001, but intermittent

In re-design phase

400

N

Doctor or Nurse

Sweden

SweTrau – The Swedish Trauma Registry

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Trauma Registry of Southern Denmark

1996

3

713

Y

Doctor

Finland

Tooło Hospital Trauma Registry

2006

1

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