Post-collision response and emergency care in Luxembourg



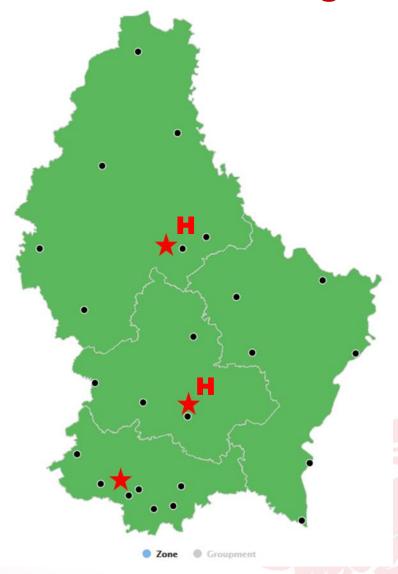
Structure of the rescue services in Luxembourg

- 1 single dispatch centre (« 112 ») and eCall for « civil emergencies »
- Police dispatch centre (« 113 »), direct interconnection
- 1 single digital radio communication system (RENITA) for all public services: fire, rescue, police, customs,...
- Reform on the way: July 1st, 2018 creation of a unique public fire and rescue structure encompassing ALL:
 - ambulance units (ministry of interior)
 - rescue units (ministry of interior)
 - fire brigades (municipalities)
 - airport fire brigade (ministry of transport)
 - physician staffed emergency teams (ministry of health)
 - special units (ministry of interior)



Structure of the rescue services in Luxembourg

- System mainly based on VOLUNTEERS
- 25 Rescue stations •:
 - 1-2 (4+) ambulances
 - 1 road traffic accident rescue vehicle or Fire and rescue truck
 - 1 professional fire-brigade (Lux-City)
 - 15 partially professionnal stations (mainly EMT)
- 3 Doctor staffed vehicles *
 (2 helicopters, H)
- 150 fire stations (volunteers)
 - 54 first responder units





Structure of the rescue services in Luxembourg

- « Historical distribution » of rescue stations (before reform)
- One public service for all medical emergencies
- Location of the fastest means by a routing program in the dispatch centre
- Computer based support for dispatcher (reception of calls, alarming, support of operation, documentation, ...)
- Predefined means for engagement for most situations:
 - Car accident with incarcerated person: 1 First responder team, 1 Amb, 1 physician staffed vehicle, 2 Fire truck (incl. 1 rescue truck)
 - Increase of means according to the number of victims, cars, other risks

Staff, vehicles and equipment

- 3 tier response:
- First responders (and firefighters):
 - volunteer fire fighters,
 - « advanced » first aid, special training in management of life threatening situations (massive bleeding, cardiac arrest,...)
- **EMT** (ambulance staff):
 - advanced training, but no invasive measures
 - Driving safety training for ambulance drivers
- Emergency medical team:
 - Anaesthesia and intensive care physician exclusively,
 - always together with an anaesthesia nurse
 - rendez-vous system exclusively



Vehicles and equipment

- First responders:
 - small cars with minimal equipment (first aid, tourniquet, AED)
- Ambulances:
 - 2018: new version, all EN 1789, type C
- « SAMU »:
 - SUV, fully equipped for 2 victims in life-threatining condtion, or alternatively:
 - Helicopter, only daytime, at discretion of physician on duty (1 patient)







Vehicles and equipment





Fully equiped ambulance



SAMU (emergency physician car/helicopter)



General population

- No requirement for 1st aid or CPR training for driving licence
- Compulsory CPR training in secondary schools (since 2017/2018)
- No first aid kit or extinguisher required, only safety vests and triangle compulsory
- Emergency corridor COMPULSORY on motorways at all times (even traffic jams without accidents,...)
- Hard shoulder not intended for rescue services
- « Vision zéro » governmental programm to reduce road traffic accidents (improving infrastructure, sensitizing population, enforcement)





Conclusions and perspectives

- Many efforts have been undertaken to improve the system over the last few years
- Dispatch center needs « streamlining » of processes
- First responders must be maintained and further developped
- Increase of professional personnel and increase of immediate availability of volunteers
- Measurement of quality to instore
- Reform to come soon with more flexibility

Thank you for your attention!



