

Hungary

CONCLUSIONS OF A SEVERE ACCIDENT

1. On 06. 11. 2011. a severe bus accident happened in Egypt, a HD coach rolled over with 50 Hungarian tourists on board. The coach – taking a curve with relatively high speed – turned on its left side, slid 30-50 m and stopped. The result: 11 fatalities, 29 injured and hospitalized passenger, among which 4 were in life danger and 15 seriously injured.
2. The superstructure was strong enough, no significant structural deformation. The casualties were caused by ejection of the passengers, mainly by partial ejection. This was said by the doctors and by the surviving passengers. All the side windows were broken, the outside panelling of the side wall and the ground was covered with blood. The surviving passengers said that all passengers fell onto the left side of the bus, compressing the people sitting next to the window to the window and to the road surface and they were ground by the broken glass fragments and by the ground.



3. The fire brigade and the ambulance people were on the scene in 20 minutes. The firemen rescue the passengers through the windscreen and the rear wall window. Escape hatches were not mentioned and from the pictures it is difficult to estimate the number and the position of this kind of emergency exits (see the long AC device on the roof). But it is clear that these injured passengers could not evacuate the bus even with the powerful help of the firemen, through the escape hatches
4. This accident was the headline in the Hungarian newspapers and the TV news in one week. Everybody gave wiser and wiser advice to anybody, who is “responsible” for this tragedy. The society was shocked by this accident.
5. There is no final report about the accident, and I am not sure whether we shall get it from Egypt. But certain conclusions may be drawn from this accident:
 - 5.1. The ejection (total and partial) of the passengers in rollover accident shall be avoided, steps are needed in the regulatory work to solve this problem.
 - 5.2. One good possibility is the use of the laminated safety glass as side window. It should be allowed (or required it) in buses.
 - 5.3. In the case of severe rollover accident, (many seriously injured passengers) when the bus is lying on its side, the rear wall window and the windscreen are the good emergency exits (EE) to rescue the seriously injured people.
6. On the basis of the conclusions mentioned above and the society demand (to do something in the future to avoid this kind of events) I repeat again my earlier proposals to SDWEE for consideration, in relation to the expert group’s proposal for GRSG:
 - 6.1. Require the rear window as EE in all bus categories
 - 6.2. Allow in written form the windscreen as EE if certain conditions are met (e.g. electric glass cutting hand tool in the driver compartment or “kick down” type windscreen installation, etc.)
 - 6.3. Do not accept the breakable side windows among the required number of EE (There is no need for them and they are unusable). If SDWEE would accept this approach, well usable EE would be in the required number of EEs.
 - 6.4. Accepting proposal 6.3. the way would be open to use laminated glass as side window. The use of laminated glass should be allowed in written form (The next step could be to require it).