Draft proposal for amendments to UNECE R107

General remark:
The proposed working document is divided in 2 parts:

- The 1st part is already in the format of an official document as the items contained in it were discussed in depth by the informal group;
- The 2nd part is in the format of a table with 2 columns, because the experts are expected to produce inputs and comments for discussion at the 5th meeting (Paris, 2-3 March 2011).

This document includes the proposals of document GRSG-100-09.

In the proposal below, the proposed new text is in **bold** characters, and the text proposed for deletion is in ~~strike-through~~ characters.

A. PROPOSAL

2. Definitions

…

2.41. "Overnight locking system" means a system designed to provide the possibility to secure the service and emergency doors of the vehicle against opening.

2.42. "Emergency lighting system" means a lighting system helping the occupants to locate the emergency exits in case of emergency.

2.43. "Safety sign" means a configuration of visual elements intended to convey a safety-related message.

…

Annex 3

7.6. Exits

7.6.1. Number of exits

7.6.1.1 The minimum number of doors in a vehicle shall be two, either two service doors or one service door and one emergency door. Every double-deck vehicle shall have two doors on the lower deck (see also paragraph 7.6.2.2.). The minimum number of service doors required is as follows:

Number of passengers	Number of service doors		
	CLASS I & A	CLASS II	CLASS III & B
9 - 45	1	1	1
46 - 70	2	1	1
71 - 100	3 (2 in the case of a double-deck vehicle)	2	1
> 100	4	3	1

7.6.1.2. The minimum number of service doors in each rigid section of an articulated vehicle shall be one except that this minimum number shall be two in the case of front section of an articulated vehicle of Class I.

7.6.1.3. For the purpose of this requirement, service doors equipped with a power-operated control system shall not be deemed to be emergency doors unless they can be readily opened by hand, once the control prescribed in paragraph 7.6.5.1. has been actuated, if necessary.

7.6.1.4. The minimum number of emergency exits shall be such that the total number of exits in a separate compartment is as follows:

The number of exits for each separate deck (in the case of a double-deck vehicle) and each separate compartment must be determined separately. Toilet compartments or galleys are not considered to be separate compartments for the purposes of defining the number of emergency exits. Escape hatches can only count as one of the above-mentioned number of emergency exits.

7.6.1.6. A double service door shall count as two doors and a double or multiple window as two emergency windows.

7.6.1.7. If the driver's compartment does not provide access to ~~the~~ **a** passenger compartment by means of a passageway **that permits** ~~complying with one of the conditions described in paragraph 7.7.5.1.1~~

(a) the front edge of the cylindrical gauge defined in paragraph 7.7.5.1. to reach at least the transverse vertical plane tangential to the foremost point of the driver's seat back in its rearmost longitudinal position, and

(b) from this plane, it is possible to move the panel shown in Annex 4, figure 7 forwards from the contact position, with the cylindrical gauge until it reaches at least the vertical plane tangential to the foremost point of the driver's seat cushion,

the following **requirements** ~~conditions~~ shall be met:

7.6.1.7.1. The driver's compartment shall have two exits, which shall not both be in the same lateral wall. When one of the exits is a window, **this window** ~~it~~ shall ~~comply with the requirements set out in paragraphs 7.6.3.1. and 7.6.8.~~ **have a minimum area of 400,000 mm^2, it shall be possible to inscribe in this area a rectangle measuring 500 mm x 700 mm and it shall comply with the requirements set out in paragraph 7.6.8.** for emergency windows.

7.6.1.7.2. One or two seats are permitted alongside the driver for additional people, in which case both of the exits referred to in paragraph 7.6.1.7.1. shall be doors.

The driver's door shall be accepted as the emergency door for the occupants of those seats, provided that it is possible to move a test gauge from the occupants' seats to the exterior of the vehicle through the driver's door (see Annex 4, figure 27).

Verification of the access to the driver's door shall be subject to the requirements of paragraph 7.7.3.2., by using the test gauge having a dimension of 600 x 400 mm, as described in paragraph 7.7.3.3.

The **service** door provided for the passengers shall be in the side of the vehicle opposite to that containing the driver's door and shall be accepted as the emergency door for the driver.

~~Up to five additional seats may be fitted in a compartment incorporating the driver's compartment, provided that the additional seats and the space for these seats comply with all requirements of this Regulation and at least one door giving access to the passenger compartment complies with the requirements of paragraph 7.6.3. for emergency doors.~~

7.6.1.7.3. ~~In the circumstances described in paragraphs 7.6.1.7.1. and 7.6.1.7.2., the exits provided for the driver's compartment shall not count as one of the doors required by paragraphs 7.6.1.1. to 7.6.1.2., nor as one of the exits required by paragraph 7.6.1.4., except in the case mentioned in paragraphs 7.6.1.7.1. and 7.6.1.7.2. Paragraphs from 7.6.3. to 7.6.7., 7.7.1., 7.7.2. and 7.7.7. shall not apply to such exits.~~ **Paragraphs 7.6.3. to 7.6.7., 7.7.1., 7.7.2. and 7.7.7. shall not apply to the exits provided for the driver's compartment as referred to in paragraphs 7.6.1.7.1. and 7.6.1.7.2.**

7.6.1.7.4. In the circumstances described in paragraphs 7.6.1.7.1. and 7.6.1.7.2., the exits provided for the driver's compartment and any seats alongside the driver shall not count as one of the doors required by paragraphs 7.6.1.1. to 7.6.1.2., nor as one of the emergency exits required by paragraph 7.6.1.4. for any other passenger compartment.

7.6.1.7.5. Up to five additional seats may be fitted in a compartment incorporating the driver's compartment and any seats alongside the driver, provided that the additional seats and the space for these seats comply with all requirements of this Regulation and at least one of the emergency exits required by paragraph 7.6.1.4. is a door giving access to the passenger compartment complying with the requirements of paragraph 7.6.3.1.2. for emergency doors.

7.6.1.8. If the driver's compartment **is accessible from a passenger compartment by means of a passageway complying with the requirements of parts (a) and (b) of paragraph 7.6.1.7.,** and any seats adjacent to ~~it~~ **this driver's compartment,** are accessible from ~~the main~~ **that same** passenger compartment

by means of a passageway complying with one of the conditions described in paragraph 7.7.5.1.1., no external exit is required from the driver's compartment.

7.6.1.9. If a driver's door or other exit from the **driver's** compartment is provided in the circumstances described in paragraph 7.6.1.8. it may ~~only~~ count as **one of the required exits** ~~an exit~~ for passengers **in vehicles of Class A or B** provided:

7.6.1.9.1. it satisfies the requirements relating to the dimensions of emergency door indicated in paragraph **7.6.3.1.2.** ~~7.6.3.1.~~;

7.6.1.9.2. it fulfils the requirements ~~indicated in~~ **of** paragraph 7.6.1.7.2.;

7.6.1.9.3. the space reserved for the driver's seat shall communicate with the main passengers' compartment through an appropriate passage; such requirement shall be deemed to be fulfilled if the test gauge described in paragraph 7.7.5.1. can move unobstructed from the gangway, until the front end of the gauge reaches the vertical plane tangential to the foremost point of the driver's seat back (this seat being situated in its rearmost longitudinal position) and, from this plane, the **test gauge** ~~panel~~ described in paragraph 7.6.1.7.2. **can** ~~could~~ be moved to the emergency door in the direction established by such paragraph (see Annex 4, figure 28) with seat and steering wheel adjustment in their mid position.

7.6.1.9.4. If there is a door opposite the driver's door, the provisions of paragraph 7.6.1.9. shall apply to it, provided that there is not more than one passenger's seat beside the driver.

7.6.1.10. Paragraphs 7.6.1.8. and 7.6.1.9. do not preclude there being a door or other barrier between the driver's seat and the passenger compartment provided that this barrier can be released quickly by the driver in an emergency. A driver's door in a compartment protected by such a barrier shall not be counted as an exit for passengers.

7.6.1.11 Escape hatches, additional to the emergency doors and windows, shall be fitted in vehicles of Class II, III and B (in the upper deck roof in the case of double-deck vehicles). They may also be fitted in the case of Class I and A vehicles. There shall not be any escape hatches fitted in the roof of a trolleybus. The minimum number of hatches shall be:

Number of passengers (in the upper deck in the case of double-deck vehicles)	Number of hatches
not exceeding 50	l
exceeding 50	2

Proposal from the editorial task force	Remarks
7.6.1.12. Each intercommunication staircase shall be considered to be an exit from the upper deck of a double-deck vehicle.	

Proposal from the editorial task force	Remarks
7.6.1.13. All persons accommodated in the lower deck of a double-deck vehicle must in an emergency situation, have access to the exterior of the vehicle without having to enter the upper deck.	
7.6.1.14. The upper deck gangway of a double-deck vehicle shall be connected by one or more intercommunication staircases to the access passageway of a service door or to the lower deck gangway within 3 m of a service door:	English native speakers kindly requested to improve the grammar.
7.6.1.14.1. two, or at least one and-one-half staircase, shall be provided in Class I and Class II vehicles if more than 50 passengers are carried on the upper deck;	English native speakers kindly requested to evaluate relevancy of the language. (two, or at least …)
7.6.1.14.2. Two, or at least one and-one-half, staircases are to be provided in Class III vehicles if more than 30 passengers are carried on the upper deck.	English native speakers kindly requested to evaluate relevancy of the language. (two, or at least …)
7.6.1.15. In the case of a vehicle without a roof, the exits on the deck without a roof shall be such as to fulfil those prescriptions that are not incompatible with the absence of the roof.	
7.6.2. ~~Siting~~ **Positioning** of exits	Request for comments from the IG on: – Annex 7, para.1.b): need to address the question of whether one door is enough for vehicles of 22 passengers, or even more (Class I). – Possible harmonization of the provisions of para. 7.6.2.1.(former) among all classes of vehicles
7.6.2.1. Vehicles **of Classes I, II and III** ~~having a capacity exceeding 22 passenger seats~~ shall meet the requirements shown below.	Editorial work performed by editorial task force as requested per document SDWEE-02-07-Rev.1
7.6.2.1.1. The service door(s) shall be situated on the side of the vehicle that is nearer to the side of the road corresponding to the direction of traffic in the country in which the vehicle is to be licensed for operation and at least one of them shall be in the forward half of the vehicle. This does not preclude:	Experts are kindly requested to provide clarification about the difference between "the vehicle is to be licensed for operation" and "the country in which the vehicle is to be registered" (para. 7.6.2.2.1.)
7.6.2.1.1.1. the provision of a specially designed door in the rear or side faces of a vehicle for use in place of a service door by wheelchair passengers, or	
7.6.2.1.1.2. the provision of an additional service door in the rear face of a vehicle principally for loading/unloading of goods or luggage, but which could	See note under para. 7.6.2.6.

Proposal from the editorial task force	Remarks
be used by passengers where circumstances so require, or	
7.6.2.1.1.3. the provision of one or more additional service door**(s)** on the opposite side of the ~~vehicles~~ **vehicle** in the case of vehicles designed for use in circumstances which require ~~loading/unloading~~ **boarding / alighting of passengers** on both sides **of the vehicle**. Examples of such circumstances include vehicles for airside use at airports, vehicles for use on multimodal transport systems using island platforms, or vehicles which cross borders to countries which do not drive on the same side of the road as the country in which the vehicle is to be licensed for operation. Vehicles so equipped shall be provided with control(s) which allow the driver to inhibit normal operation of the doors which are not currently in use**.** ~~, or~~	Justification in document GRSG/2002/13: "*Re. paragraph 5.6.2.1.: Provision for special types of vehicle currently in use, so as to permit type approval of such types.*" This provision cannot be found in R36, R52 nor Directive 2001/85/EC. It is hence reasonable to believe that the provision was added seeking to "go beyond the task of merging" the above regulatory texts (see note of document GRSG/2002/13).
~~7.6.2.1.1.4. the provisions of a service door in the rear face of a Class A or B vehicle~~	Transferred to para. 7.6.2.2.5. as applying to classes A & B
~~7.6.2.2. If the passenger's compartment has an area S_0 equal or greater than 10 m^2, two of the doors referred to in paragraph 7.6.1.1 shall be separated such that the distance between transverse vertical planes through their centres of area is not less than:~~	Becomes 7.6.2.3.
7.6.2.2. Vehicles **of Classes A and B** ~~having a capacity not exceeding 22 passengers~~ may meet either the requirements shown below or those contained in Annex 7, paragraph 1.2.	Editorial work performed by editorial task force as requested per document SDWEE-02-07-Rev.1
7.6.2.2.1. The service door(s) shall be situated on the side of the vehicle that is nearer to the side of the road corresponding to the direction of the traffic in the country in which the vehicle is to be registered, or in the rear face of the vehicle.	
7.6.2.2.2. The exits shall be placed in such a way that there is at least one exit on each side of the vehicle.	
7.6.2.2.3. The forward half and the rearward half of the passenger space shall each contain at least one exit.	
7.6.2.2.4. At least one exit shall be situated either in the rear face or in the front face of the vehicle unless an escape hatch is fitted.	
7.6.2.2.5. The provisions of a service door **shall apply also** in the rear face of ~~a Class A or B~~ **the** vehicle.	– Comes from former para. 7.6.2.1.4. – Request for comments from the IG: discuss the possibility to extend to all vehicle classes.
7.6.2.3. If the passenger's compartment has an area S_0 equal or greater than 10 m^2, two of the doors	Per document GRSG/2010/6, adopted as a Supplement, at

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referred to in paragraph 7.6.1.1 shall be separated such that the distance between transverse vertical planes through their centres of area is not less than:	GRSG-98.
7.6.2.3.1. In the case of a single deck vehicle, 40 per cent of the overall length of the passenger compartment measured parallel to the longitudinal axis of the vehicle. In the case of an articulated vehicle, this requirement shall be fulfilled if two doors of the different sections are separated such that the distance between the doors is not less than 40 per cent of the overall length of the combined passenger compartment (all sections). If one of these two doors forms part of a double door this distance shall be measured between the two doors which are furthest apart.	
7.6.2.3.2. In the case of a double-deck vehicle, two of the doors referred to in paragraph 7.6.1.1. shall be separated such that the distance between transverse vertical planes through their centres of area is not less than either 25 per cent of the overall length of the vehicle or 40 per cent of the overall length of the passenger compartment on the lower deck; this shall not apply if the two doors are on different sides of the vehicle. If one of these two doors forms part of a double door, this distance shall be measured between the two doors which are furthest apart.	
7.6.2.4. The exits (on each deck in the case of a double-deck vehicle) shall be placed in such a way that their number on each of the two sides of the vehicle is substantially the same. (This shall not imply the need to provide additional exits over and above the number specified in paragraph 7.6.1.). Any exits in excess of the required minimum number need not be substantially balanced on each of the two sides.	
7.6.2.5. At least one exit shall be situated either in the rear face or in the front face of the vehicle respectively. For Class I vehicles and for vehicles with a rear part permanently closed off from the passenger compartment, this provision is fulfilled if an escape hatch is fitted. For double-deck vehicles, this requirement shall apply only to the upper deck.	– Origin: UNECE R36, para. 5.6.2.4. – "rear part permanently closed off from the passenger compartment" means that in current Class I vehicle constructions, one can expect the power train unit, CNG/LPG installation, A/C system, add-blue installation, etc. to be located in the rear of the vehicle, hence preventing the exit through the rear wall.

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7.6.2.6. The exits on the same side of the vehicle shall be suitably spaced out along the length of the vehicle.	No better wording could be offered by the editorial task force.
7.6.2.7. A door shall, provided that it is not a service door, be permitted in the rear face of the vehicle.	The editorial task force couldn't find out why it was deemed contradictory to para. 7.6.2.1.2. by SDWEE-02.
7.6.2.8. If escape hatches are fitted, they shall be positioned as follows: if there is only one hatch, it shall be situated in the middle third of the passenger compartment the vehicle; if there are two hatches, they shall be separated by a distance of at least 2 m measured between the nearest edges of the apertures in a line parallel to the longitudinal axis of the vehicle.	
7.6.3. Dimensions of exits	
7.6.3.1. Vehicles of Class I, II or III shall meet the following requirements:	
7.6.3.1.1. A service door shall have an aperture creating an access in accordance with the requirements shown in paragraph 7.7.1. of this annex.	
7.6.3.1.2. An emergency door shall have a door aperture with a minimum height of 1,250 mm and a minimum width of 550 mm.	Classes A & B: real scale tests at 300 mm: unfeasible for some experts (Warsaw meeting). Need to revise the dimensions and the whole table of Annex 7. Harmonization with Classes I, II & III to be reviewed as well.
7.6.3.1.3. An emergency window shall have a minimum area of 400,000 mm^2. It shall be possible to inscribe in this area a rectangle measuring 500 mm x 700 mm.	SDWEE-02 (Warsaw): – Group keen to get information about the use of Emergency Exits in case of accident. – Sure they are used, but no research. No data seem currently available to the informal group. – CEESAR to be approached by Alan Davis. – Rear face reduced dimensions to be reviewed.
7.6.3.1.4. In the case of an emergency window situated in the rear face of the vehicle, either it shall meet the requirements shown in paragraph 7.6.3.1.3., or it shall be possible to inscribe in the aperture of this emergency window a rectangle 350 mm high and 1,550 mm wide, the corners of which may be rounded to a radius of curvature not exceeding 250 mm.	EURO VI Class I vehicle rear end space demand makes it technically challenging to go beyond the current 350 x 1550 mm requirement, hence it is suggested by the editorial task force not to amend the provisions of paras. 7.6.3.1.3. & 4.
7.6.3.1.5. An escape hatch shall have a hatch aperture with a minimum area of ~~400,000 mm^2~~	Proposal for new dimensions, per document SDWEE-04-10.

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450,000 mm². It shall be possible to inscribe in this area a rectangle measuring ~~500 mm~~ **600 mm**x 700 mm.	It is considered an improvement of the level of safety to increase the required dimensions of the escape hatches. The proposal increases the surface of the hatch by 12.5% in order to take into account the situations in the real world, i.e. the occupants wearing winter clothes, elderly people etc. With the same attention given to safety, the minimum area of the rectangle to be inscribed in the hatch aperture is increased by 20%.
7.6.3.2. Vehicles of Class A or B may meet either the requirements shown in paragraph 7.6.3.1. (Class A meeting Class I requirements and Class B meeting Class II and III requirements) or those contained in Annex 7, paragraph 1.1.	
7.6.4. Technical requirements for all service doors	Outside of the scope of the SDWEE informal group, except for the additional provisions for overnight locking systems, per document SDWEE-04-10
7.6.4.11. If an overnight locking system is provided, the following shall apply:	Per document SDWEE-04-10 **See justifications to the new paragraph 2.41. (definition of "overnight locking system")**
7.6.4.11.1. the locking system shall have been automatically deactivated when the ignition is in the "ON" position, or	Per document SDWEE-04-10 **See justifications to the new paragraph 2.41. (definition of "overnight locking system")**
7.6.4.11.2. a warning shall be provided to the driver indicating that the overnight locking system remains in operation at one or more door(s) when the ignition is in the "ON" position. One signal may be used for more than one door.	Per document SDWEE-04-10 **See justifications to the new paragraph 2.41. (definition of "overnight locking system")**
7.6.5. Additional technical requirements for power-operated service doors	No provisions influencing emergency situations.
7.6.6. Additional technical requirements for automatically-operated service doors	No provisions influencing emergency situations.
7.6.7. Technical requirements for emergency doors	Additional provisions for overnight locking systems, per document SDWEE-04-10
7.6.7.2. Emergency doors, during their use as such, shall not be of the power-operated type**,** unless~~,~~ **either a service door control prescribed in paragraph 7.6.5.1. or a control for a dedicated emergency door complying with the provisions of paragraph 7.6.5.1.**	Paragraph 7.6.7.2 permits that emergency doors are power-operated provided that they meet certain provisions. One of the provisions seems to suggest that

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~~once one of the controls prescribed in paragraph 7.6.5.1.~~ has been actuated and returned to its normal position, the doors do not close again until the driver subsequently operates a closing control. Activation of one of the controls ..."	there must be an emergency device for opening the emergency door. However, the present wording refers to one of the devices prescribed in paragraph 7.6.5.1., being the emergency devices for the power operated service door. This could bring to the conclusion that a power-operated emergency door can only be opened by the emergency device for service door(s). The proposed wording clarifies that either such a control or a control for the dedicated emergency door can be used to operate the door.
7.6.7.7. If an overnight locking system is provided, the following shall apply:	Per document SDWEE-04-10 **See justifications to the new paragraph 2.41. (definition of "overnight locking system")**
7.6.7.7.1. the locking system shall have been automatically deactivated when the ignition is in the "ON" position, or	Per document SDWEE-04-10 **See justifications to the new paragraph 2.41. (definition of "overnight locking system")**
7.6.7.7.2. a warning shall be provided to the driver indicating that the overnight locking system remains in operation at one or more door(s) when the ignition is in the "ON" position. One signal may be used for more than one door.	Per document SDWEE-04-10 **See justifications to the new paragraph 2.41. (definition of "overnight locking system")**
7.6.8. Technical requirements for emergency windows.	
7.6.8.7. Any film (e.g. for advertising, anti-vandalism, etc.) laminated to the inside and/or outside of an emergency window shall not prevent or inhibit the function as emergency exit. Proof of the correct function shall be demonstrated to the satisfaction of the Technical Service."	Per document SDWEE-04-10.
7.6.11. ~~Markings~~ **Safety signs**	
~~7.6.11.1. Each emergency exit and any other exit that meets the prescriptions for an emergency exit shall be marked, inside and outside the vehicle, by an inscription reading "Emergency Exit" and supplemented, where appropriate, by one of the relevant pictograms described in ISO standard 7010:2003.~~	Current wording of paragraph 7.6.11.1. is now placed in paragraph 7.6.11.2.3. The informal group agreed to favour pictograms in all cases, with supplementary explanatory wording when necessary. The Secretariat however found not relevant to introduce the safety sign

Proposal from the editorial task force	Remarks
	provisions into a new paragraph 7.19 as recommended by SDWEE-05.
7.6.11.1. General requirements	
7.6.11.1.1. Each safety sign required by this Regulation shall be used to communicate only one safety message. The information provided shall be in the form of pictograms, however, words, letters and numbers may supplement the pictogram in combination on the same sign. It shall be located and orientated so as to be easily understood.	
7.6.11.1.1.1. Pictograms indicating a required action by the user shall show a person, or the relevant part of a person, operating the equipment or device.	
7.6.11.1.1.2. Pictograms indicating a required movement shall, where appropriate, show an arrow pointing in the direction of motion. Where a rotational movement is required, a curved arrow shall be used.	The informal group supported the mandatory indication of a movement where appropriate, including rotational movement which is required elsewhere for emergency exits. The particular case of a movement not included in the plan of the sticker (e.g. in the case of a roof hatch) will be addressed by the informal group in a later stage, probably by defining a different pictogram applicable to each of the four different kinds of emergency exit.
7.6.11.1.1.3. Where devices are to be operated, panels removed or doors opened, the pictogram shall indicate the action in progress.	
7.6.11.1.1.4. The lower case letter(s) of supplementary words, single letters and numbers shall have a minimum height of 8mm. Words shall not be in upper case letters only.	
7.6.11.1.2. All safety signs shall be of photo-luminescent material having luminance decay characteristics conforming, as a minimum, to sub-classification C in Table 2 of ISO 17398: 2004, when measured in accordance with paragraph 7.11 of that standard and, in the case of signs for external use, after testing in accordance with paragraph 7.3 of the standard.	The experts of the informal group had an agreement in principle with the proposed wording, and acknowledged that the requirement for "photo-luminescent" signs could preclude other systems.
7.6.11.1.3. Safety signs shall not be located in positions where they may be obscured during operation of the vehicle. However, a curtain or blind may be positioned over an emergency window	The informal group proposes this wording as a solution to the challenge offered to the operators to make the safety signs visible

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provided an additional safety sign indicates that the emergency window is located behind the curtain or blind.	while in the same time equipping the vehicles with blinds and curtains.
7.6.11.1.4. All safety signs shall comprise a white pictogram on a green colour background.	It is believed that such harmonisation is the correct approach for safety.
7.6.11.1.5. All safety signs shall have a white border, having a width of at least 2mm, irrespective of the size of the sign.	It is believed that such harmonisation is the correct approach for safety.
7.6.11.2. Positioning of safety signs	
7.6.11.2.1. Safety signs identifying the control or the device for breaking emergency windows shall be positioned adjacent to, or surround all internal and external emergency controls for all exits.	
7.6.11.2.2. No part of a safety sign shall obscure any misuse protection that may be present, e.g. a cover.	
7.6.11.2.3. Each emergency exit, and any other exit that meets the prescriptions for an emergency exit, shall be marked, inside and outside the vehicle~~ by an inscription reading "Emergency Exit" and supplemented, where appropriate, by one of the relevant pictograms described in ISO standard 7010:2003.~~ **with a safety sign complying with the requirements of paragraphs 7.6.11.1.1., 7.6.11.1.1.4., 7.6.11.1.2., 7.6.11.1.3., 7.6.11.1.4. and 7.6.11.1.5.**	Comes from former paragraph 7.6.11.1.
~~7.6.11.2.~~ **7.6.11.3.** The emergency controls of service doors and of all emergency exits shall be marked as such inside and outside the vehicle either by a representative symbol or by a clearly-worded inscription.	
~~7.6.11.3.~~ **7.6.11.4.** Clear instructions concerning the method of operation shall be placed on or close to every emergency control of an exit.	
~~7.6.11.4.~~ **7.6.11.5.** The language in which any textual markings intended to comply with paragraphs 7.6.11.1. to 7.6.11.3. are to be inscribed shall be determined by the approving authority bearing in mind the country / countries in which the applicant intends to market the vehicle in liaison if necessary with the competent authorities of the country / countries concerned. If the authority of the country / countries where the vehicle is to be registered has the language changed, this change shall imply no new type-approval process.	
7.7. Interior arrangements	
7.7.1. Access to service doors (see Annex 4, figure l)	
7.7.2. Access to emergency doors (see Annex 4, figure 5)	SDWEE-02 (Warsaw): "Gauges seem smaller than the

Proposal from the editorial task force	Remarks
The following requirements shall not apply to driver's doors used as emergency exits in vehicles having a capacity not exceeding 22 passengers.	Emergency Exits. Dimensions of gauges will be considered at next meeting". Issue was however subsequently not covered. The IG members are kindly requested to provide input.
7.7.2.1. Except as provided for in paragraph 7.7.2.4., the free space between the gangway and the emergency door aperture shall permit the free passage of a vertical cylinder 300 mm in diameter and 700 mm high from the floor and supporting a second vertical cylinder 550 mm in diameter, the aggregate height of the assembly being 1400 mm. The diameter of the upper cylinder may be reduced at the top to 400 mm when a chamfer not exceeding 30 degrees from the horizontal is included.	
7.7.2.2. The base of the first cylinder shall be within the projection of the second cylinder.	
7.7.2.3. Where folding seats are installed alongside this passage, the free space for the cylinder shall be required to be determined when the seat is in the position for use.	
7.7.2.4. As an alternative to the dual cylinder, the gauging device described in paragraph 7.7.5.1. may be used (see Annex 4, figure 6).	
7.7.3. Access to emergency windows	
7.7.3.1. It shall be possible to move a test gauge from the gangway to the exterior of the vehicle through every emergency window.	
7.7.3.2. The direction of motion of the test gauge shall be in the direction in which a passenger evacuating the vehicle would be expected to move. The test gauge shall be kept perpendicular to that direction of motion.	
7.7.3.3. The test gauge shall be in the form of a thin plate having a size of 600 mm x 400 mm with corners radiused by 200 mm. However, in the case of an emergency window in the rear face of the vehicle, the test gauge may alternatively have a size of 1400 mm x 350 mm with corners radiused by 175 mm **and the intrusion of headrests of seats or other parts of seats shall be allowed provided they can be easily moved out of the way.**	– Per document SDWEE-04-10 – SDWEE-04 decided to review the additional wording for decision at its March 2011 meeting. The IG members are kindly requested to provide input. – Access to emergency exits should be harmonized (doors, windows, hatches, etc.)
~~7.7.4.1. Escape hatches in the roof~~	Deleted per document SDWEE-04-10
~~7.7.4.1.1. Except in the case of Class I and A vehicles, at least one escape hatch shall be located such that a four-sided truncated pyramid having a side angle~~	Reports on bus accidents have shown that the emergency hatches in the roof are only used when the

Proposal from the editorial task force	Remarks
~~of 20 degrees and a height of 1,600 mm touches part of a seat or equivalent support. The axis of the pyramid shall be vertical and its smaller section shall contact the aperture area of the escape hatch. Supports may be foldable or movable provided they can be locked in their position of use. This position shall be taken for verification.~~	bus or coach has tilted. While the bus or coach is in the driving position the emergency hatches are not used by the passengers in the case of emergency. Therefore it seems justifiable that no exit support is required. The figure N° 26 to which these paragraphs refer should be deleted as well.
~~7.7.4.1.2. When the structural thickness of the roof is more than 150 mm, the smaller section of the pyramid shall contact the aperture area of the escape hatch at the level of the outside surface of the roof.~~	Reports on bus accidents have shown that the emergency hatches in the roof are only used when the bus or coach has tilted. While the bus or coach is in the driving position the emergency hatches are not used by the passengers in the case of emergency. Therefore it seems justifiable that no exit support is required. The figure N° 26 to which these paragraphs refer should be deleted as well.
7.8.3. ~~(Reserved)~~ **Emergency lighting**	Proposal from the editorial task force, per SDWEE-04, to introduce provisions for emergency lighting system, as a medium term requirement, i.e. with addition of relevant transitional provisions.
7.8.3.1. It shall be possible for the driver to activate the emergency lighting system from the driver's seating position.	
7.8.3.2. The opening of any emergency door shall activate the emergency lighting system.	
7.8.3.3. When a vehicle is fitted with an emergency switch [complying with the requirements of paragraph XXX of this Regulation], engagement of this emergency switch shall activate the emergency lighting system of the vehicle.	The editorial task force is well aware that the Regulation N°36 does not apply anymore. The informal group experts are requested to provide input on whether introducing the relevant provisions into Regulation N°107.
7.8.3.4. When a vehicle is equipped with a deceleration sensor, engagement of a switch related to the deceleration sensor signal shall activate the emergency lighting system of the vehicle. The manufacturer shall demonstrate by documentation to the Technical Service the relationship between the deceleration threshold and the activation of the emergency lighting system.	

Proposal from the editorial task force	Remarks
7.8.3.5. When a vehicle is equipped with a tilt angle sensor, engagement of a switch related to the tilt angle sensor signal shall activate the emergency lighting system of the vehicle. The manufacturer shall demonstrate by documentation to the Technical Service the relationship between the tilt angle threshold and the activation of the emergency lighting system.	
Annex 4, Figure 8, footnote 1/: current text remains unchanged, to read: 1/ 700 mm in the case of an emergency door. 1,500 mm in the case of an emergency door in the upper deck of a double-deck vehicle. 850 mm maximum in the case of an emergency door in the lower deck of a double-deck vehicle.	The informal group decided in its 4th meeting to keep the current text of the regulation unchanged because a maximum value of 850 mm permits the manufacturer to design vehicles with lower steps when necessary.
Annex 4, Figure 20: replace "siting" with "positioning"	
Annex 4, Figure 26: amend to read "**Reserved**"	Amended per document SDWEE-04-10
Annex 7, paragraph 1.2.: replace "siting" with "positioning"	

B. JUSTIFICATION

Paragraph 2.41.

Addition of a definition of "overnight locking system" as a proposal from the SDWEE informal group to include the item in the Regulation, per paragraphs 7.6.4.11. (service doors) and 7.6.7.7. (emergency doors). According to IRU, centralized overnight unlocking would be appreciated by most European operators in order to facilitate some basic security features. The informal group agreed to address this issue as centralized overnight locking system might interfere with the functioning of the emergency exits.

Paragraph 2.42.

Addition of a definition of "emergency lighting system". The SDWEE informal group found opportune to add provisions for emergency lighting system as a practical way to help the occupants of a vehicle reaching access to the exits in case of emergency.

Paragraph 2.43.

The informal group found relevant to introduce new provisions for safety signs in order to improve the level of safety thanks to some harmonisation of the signage. The informal group agreed to introduce the provisions relating to the safety signs in the existing paragraph 7.6.11. (markings).

Paragraph 7.6.1.7.

None of the conditions described in paragraph 7.7.5.1. are applicable to the driver's compartment. Paragraph 7.7.5.1.1.1. is the most suited but in most vehicles it is impossible to move the panel forward by 660 mm as the dashboard in front of the driver is usually curved

so that the controls are within the driver's reach. The proposal that the gangway test gauge is moved to coincide with the driver's seat back (as for the forward facing passenger seat and for paragraph 7.6.1.9.3. describing how a driver's door can be used as an exit for passengers) and then the panel is moved forward to the foremost point of the driver's seat cushion. This is to ensure that the driver has sufficient free height and width when accessing or leaving his seat.

Paragraph 7.6.1.7.1.

The requirements for emergency windows are specified in paragraph 7.6.3.1.3. so it is more precise copy the current text of 7.6.3.1.3. into paragraph 7.6.1.7.1.

Paragraph 7.6.1.7.2.

The minimum dimensions are applicable to service doors only.

It is clearer if this paragraph only deals with the driver's seat and seats alongside (without a passageway to the passenger's compartment) and the requirements for the five additional seats being transferred into a new paragraph (7.6.1.7.5.).

Paragraph 7.6.1.7.3.

Moving of the last sentence of paragraph 7.6.1.7.4., which helps to define the technical requirements for the exits defined in paragraphs 7.6.1.7.1. and 7.61.7.2., from that paragraph and putting it alone in a revised paragraph 7.6.1.7.3. Having prescribed when and where exits are required it is better to fix their technical requirements immediately, rather than to "hide" them as the last sentence of a following paragraph.

Paragraph 7.6.1.7.3. renumbered as 7.6.1.7.4.

The text of existing paragraph 7.6.1.7.3. is difficult to comprehend. The intention is that when the driver's compartment and any passenger seats alongside the driver do not have an acceptable passageway to a passenger compartment, then the driver's door and the passenger's door on the opposite side of the vehicle are not accessible to any other passengers and shall not be counted as exits for the passenger compartment. The passenger compartment requires the exits as defined in paragraph 7.6.1. without using the driver's and front passenger's doors.

New Paragraph 7.6.1.7.5.

Moved from paragraph 7.6.1.7.2. and modified to make it clear that:
a) the five additional seats are in addition to any passenger seats alongside the driver;
b) as there is no passageway between the front seats (driver's and adjacent passenger's) and the five additional seats, these additional seats must be considered as being in a separate compartment with the required number of exits (two), one of which must be an emergency door giving access to the main passenger compartment.

Note: Paragraphs 7.6.1.8. & 7.6.1.9 are specific to vehicles in which there is an acceptable passageway from the driver's and adjacent passenger's seats to the passenger compartment. Paragraph 7.6.1.8. says that in such vehicles an external exit is not required from the driver's compartment, but paragraph 7.6.1.9. says that if an exit is provided it can be counted as an exit for the passengers with no limit on the number of passengers.

Paragraph 7.6.1.9.

Clarification that when there is an acceptable passageway between the passenger's compartment and the driver's compartment, the driver's door and/or the front passenger's door can only be used for passengers in vehicles of Class A or B. This possibility came from Regulation N° 52 and did not exist in Regulation N° 36.

Paragraph 7.6.1.9.1.

The requirements for emergency doors are specified in paragraph 7.6.3.1.2. so it is more precise to specify this paragraph rather than paragraph 7.6.3.1., which applies to all exits.

Paragraph 7.6.1.9.3.

Paragraph 7.6.1.7.2. refers to a test gauge and not to a panel. The word "can" is more appropriate than "could".

Paragraph 7.6.1.9.4.

Paragraph 7.6.1.9.4. is taken from paragraph 5.7.2.5. of Regulation N° 52 and is introduced to allow a door for 1 passenger seated alongside the driver to be used as an emergency door for the main passenger compartment.