

Informal document **GRSP-52-22**  
(52<sup>nd</sup> GRSP, 11 - 14 December 2012,  
agenda item 22(a))

# Approval System for New Mobility

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The 52<sup>nd</sup> Session for GRSP (2012.12.11~14)

Ministry of  
Land, Infrastructure, Transport and Tourism

- Due to Japan's low birthrate and aging populations, the ratio of senior citizen's population is increasing, and the vitality of regional towns and cities are shrinking.
- Meanwhile, travelers and decreasing senior citizens are looking for more convenient transportations in cities and certain areas. As a solution to this demand, "New Mobility", which is smaller than ordinary passenger car, is getting people's interests and attentions.
- EU could include this "New Mobility" in the categories of L6 and L7, but Japan does not have the appropriate category for it. Due to this lack of appropriate category in Japan, all of New Mobility fall into the category of M1/N1 and the M1/N1's safety/environmental standards are applied to them.
- As you could see, New Mobility could not meet the technical requirements of safety/environmental standards for M1/N1 for technical reasons.
- Therefore, New Approval System for New Mobility is required in order to make it possible for this New Mobility to run on public roads in Japan.

Note) To drive 'New Mobility' in Japan, the driver is required to have a driver license for passenger car.

Rated Output (Electric Vehicle)		0.6kW and less	Exceeding 0.6kW
Engine Capacity		50cc or less	from 50cc to 660cc
Three/Four Wheeled Vehicle	<p><b>Wheeled Walking Aids (No license required)</b></p> <ul style="list-style-type: none"> <li>• 6 km/h, or less</li> <li>• No Vehicle Inspection</li> <li>• Overall Length; 1,200mm</li> <li>• Overall width: 700mm</li> <li>• Overall Height: 1,090mm</li> </ul> 	<p><b>Quadricycle</b></p> <ul style="list-style-type: none"> <li>• Overall length: 2,500mm</li> <li>• Overall width: 1,300mm</li> <li>• Overall Height: 2,000mm</li> <li>• 1 passenger</li> <li>• Driving on a highway not allowed</li> </ul>  	<p><b>Mini-sized Vehicle</b></p> <div style="border: 2px dashed red; padding: 5px; background-color: red; color: white; text-align: center;"> <p><b>New Mobility</b></p> <ul style="list-style-type: none"> <li>• Rated Output: 8kW* and less (or 125cc or less)</li> <li>• 2 passengers or less (or, driving seat and of two CRSs)</li> <li>• Driving on a highway not allowed</li> </ul>  </div> <ul style="list-style-type: none"> <li>• Overall length: 3,400mm</li> <li>• Overall width: 1,480mm</li> <li>• Overall Height: 2,000mm</li> <li>• Vehicle Inspection</li> <li>• 4 passengers</li> <li>• Allowed its driving on a highway</li> </ul> 

\* Japan's Rated Output 8kW is equivalent to Maximum Continuous Rated Power 15kw of Category L7

# Main concepts of how to handle Safety Standards

- Giving the top priority to the securement of safety, some safety standards may be relaxed, provided that ① a vehicle does not drive on highways, and ② drives only in the area where the safety of traffic is secured .
- Main safety standards to be applied will be as follows.

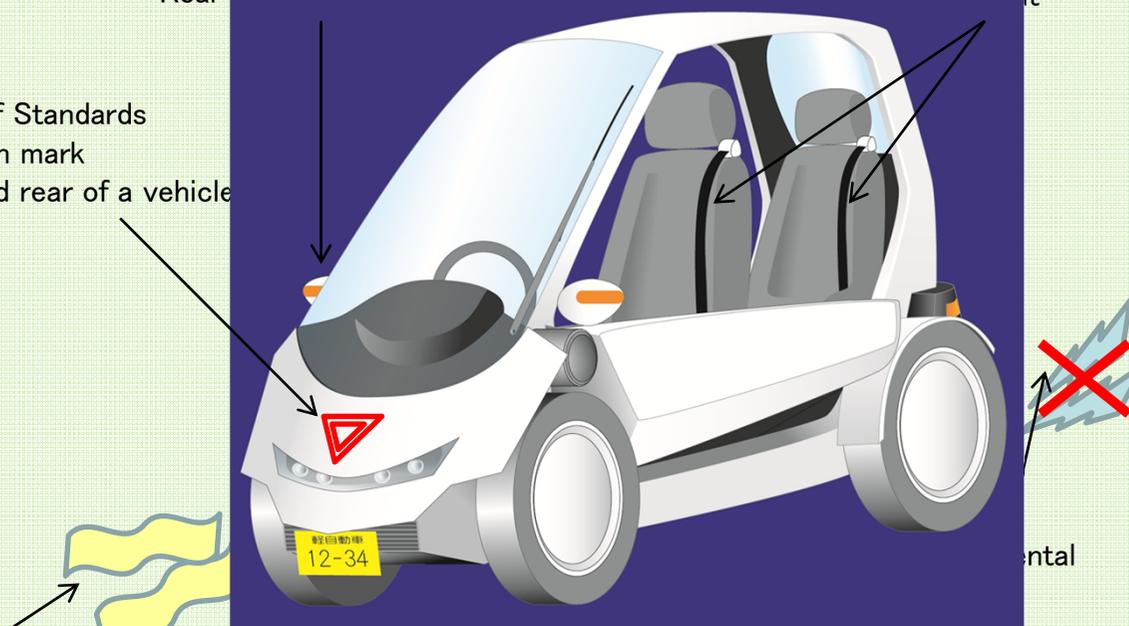
## Main standards to be applied as normal

Passive safety performance (Conformance to the structural requirement)

Rear-view mirror

Seatbelt

Display of Standards  
Relaxation mark  
(front and rear of a vehicle)



## Acoustic Vehicle Alerting System

\* the device that emits the sound automatically during driving in order to let pedestrians recognize the approach of a highly silent EV

Noise Control performance  
• Exhaust Gas Control performance

## Main Standards that could be relaxed

It is possible to relax the following standards, provided that a vehicle drives only in the safe area and not on highways

- Installation Strength of seat
- Impact absorbing performance of seatback
- Installation Strength of seatbelt
- Space and sizes of seating
- Child Restraint System (ISO-FIX)

## Main Standards that could be relaxed subject to the conditions

### Vehicle of 1,300 mm or less in the width

Following standards could be relaxed since it could be regarded as having characteristic of two-wheeled vehicle

- Fire retardant Interior finishes

[Device to which two-wheel vehicle standards will be applied]

- Lamps
- Brake
- Locking Devices

### Vehicle drive only on the roads with the maximum speed of 30km/h or less

Since there are very few fatality accidents on such roads, the following standards could be relaxed, too.

- Equipment strength of seatbelt
- The other requirement for crash worthiness

## Schedule

22 November 2012: Start asking for P.C.

Early January, 2013: Enforcement

## Social Effects of the introduction of New Mobility <“Guideline to introduce New Mobility” (Published on June 2012)>

### A daily Transportation for a short distance (within about 5 km radius area)

- “Providing new concepts for transportation” and “mobility aids to parents having kids and elderly people” to transportation of daily life like shopping, local activities, and commuting
- “Activation of Local Society” via movement and communication of people by using ‘New Mobility’
- “Optimization of Traffic System”, and “blending with Compact Town Planning” by connecting to public transportation

### Transportations in tourist or commercial area

- “Discovery of local attraction” by the increase of number and area of attraction spots using ‘New Mobility’
- “Improve the attractiveness and increase of tourists to Sight-seeing area”
- “Improvement of additional values in the locals area” by introducing green technology such a EV new mobility

### Means for Delivery of a small-scale shipping or porter-services

- load/unload goods from/to vehicle at the narrow space.
- “Optimization of small-scale and Regional logistics”
- “Improvement of Service” by actualization of efficient small-scale transportation



# Thank you for your attention

- If you have any questions regarding this system, please contact to the following.  
Engineering policy Division  
Road Transport Bureau  
Ministry of Land, Infrastructure, Transport and Tourism  
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