

Submitted by the expert from Japan

Informal document **GRE-70-38**
(70th GRE, 21-23 October 2013,
agenda item 14(c))

UN Regulation No. 4 on Rear Registration Plate Lamps

Proposal for Amendment of R4

JASIC

Background

- Japan has been working on the worldwide harmonization of technical regulations.
- It has also been actively preparing to join the IWVTA currently being discussed.



Japan desires to adopt R4, but currently can not, since the R4 is based on European Plate Size.

69thGRE

<Proposal>

Japanese plate sizes are added to R4

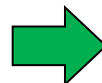
Plate sizes other than those used in each country may be prohibited by each country.

<Comments>

Allowing each country to prohibit plates is against the spirit of the 1958 Agreement .

What R4 specifies are not plate sizes, but illuminated areas.

Is it able to harmonize by adjusting illuminated area or measurement points?



Japan took back the proposal.

Points of Japan's New Proposal

Taking the comments from GRE that what R4 specifies are not plate sizes, but illuminated areas,
Japan reviewed the proposal focusing on illuminated areas.

<Points of the new proposal>

Japan surveyed the sizes of registration plates being used around the world and studied how we could optimize the illuminated areas.

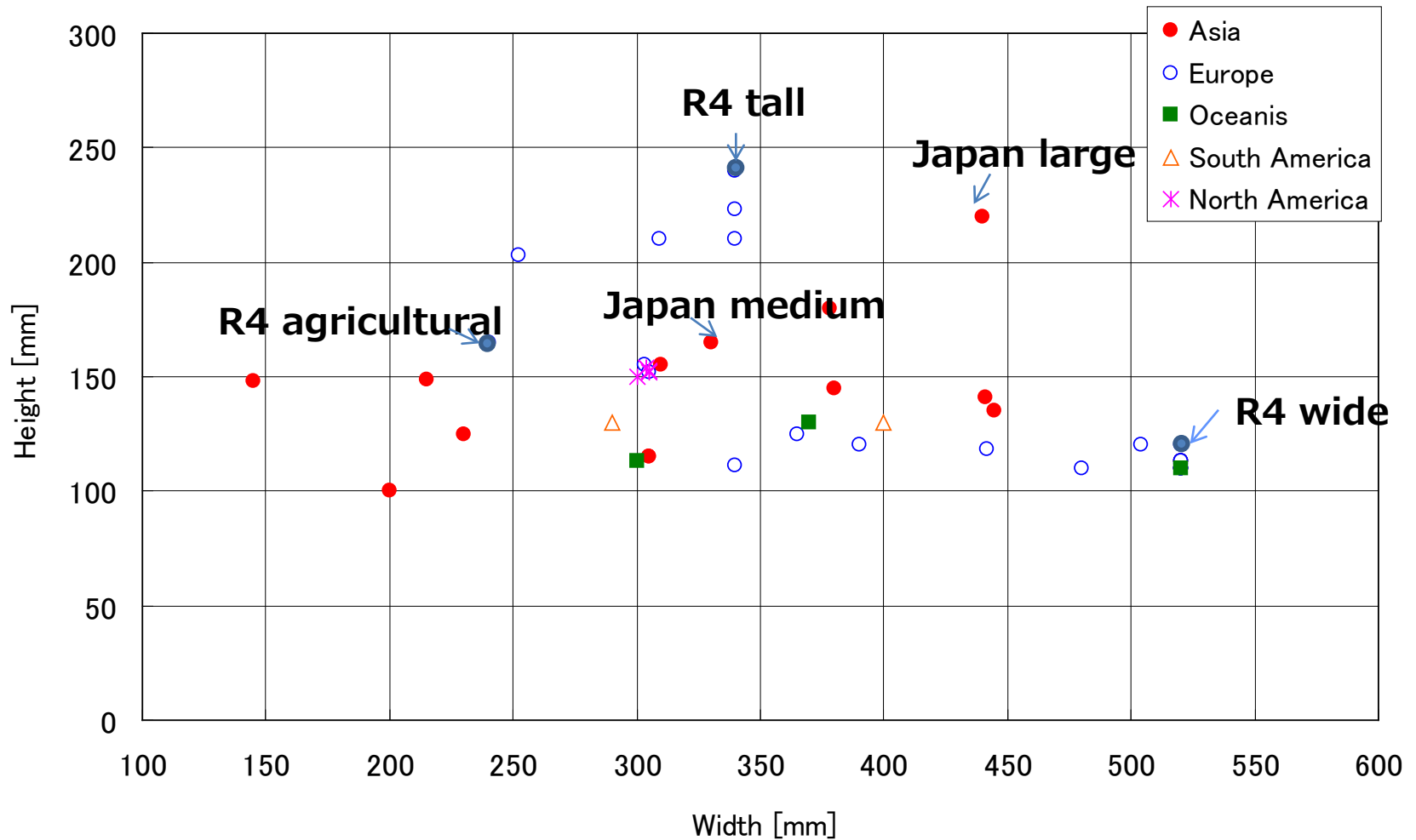
As the results

- ➡ • Add the new illuminated areas not covered by the current R4
- ➡ • Add illuminated areas to be used in many countries.

Registration Plates around the World



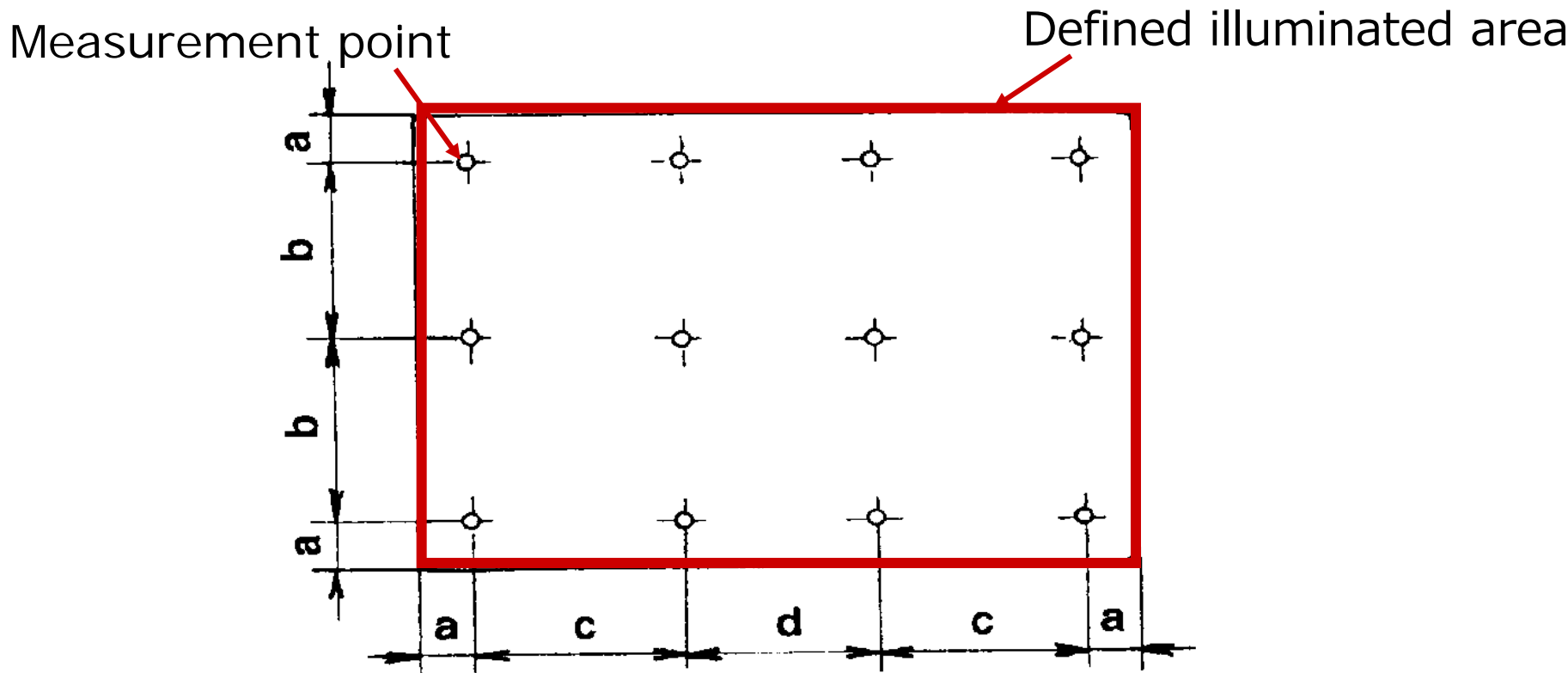
Sizes of Registration Plates around the World



Illuminated Area & Measurement Points (R4)

R4 prescribes requirements on the uniformity of luminosity in the illuminated area.

This means that the registration plate lamp has performance also for any other smaller registration plates in the illuminated area.



Illuminated Area covered by R4

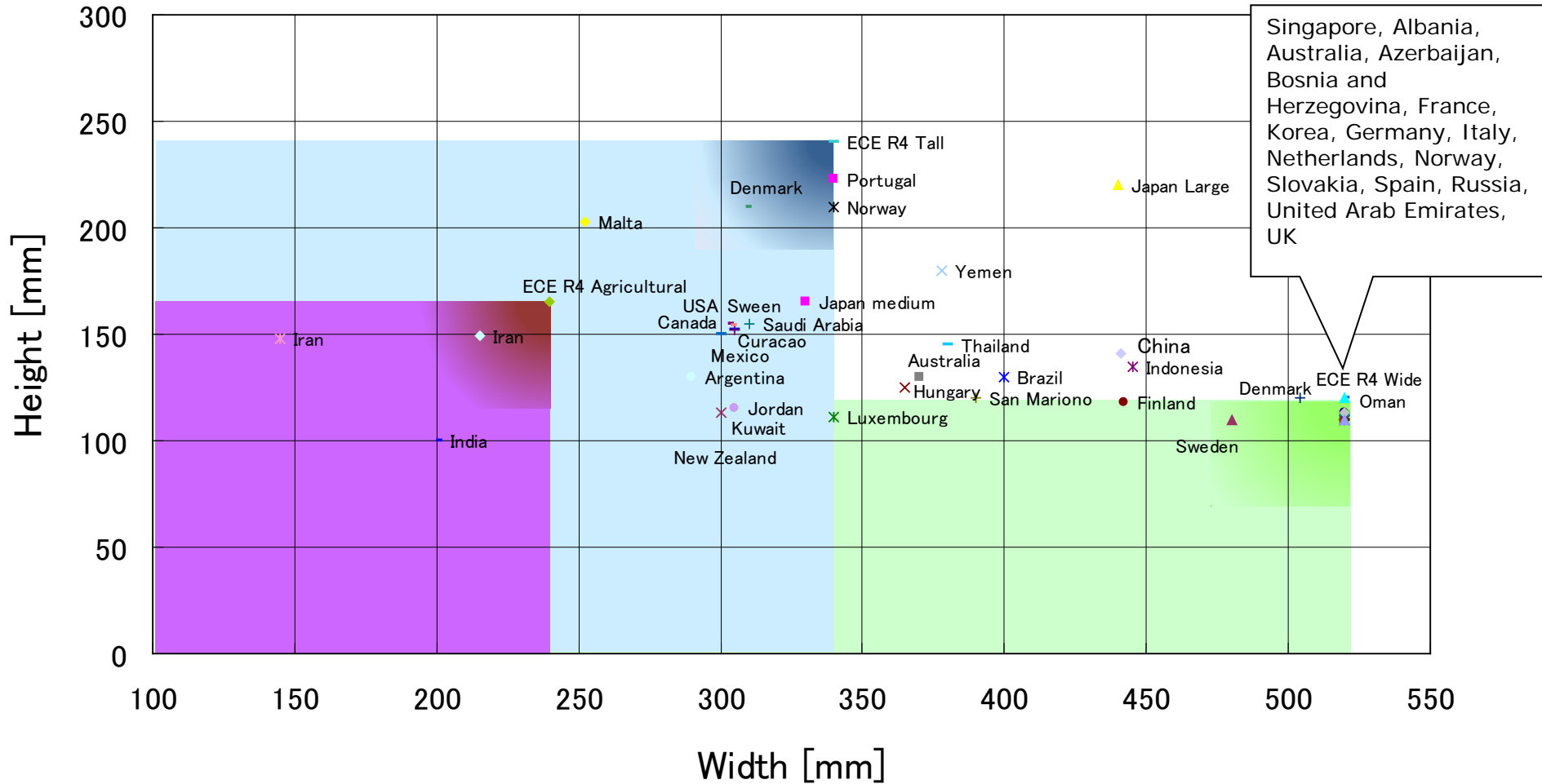
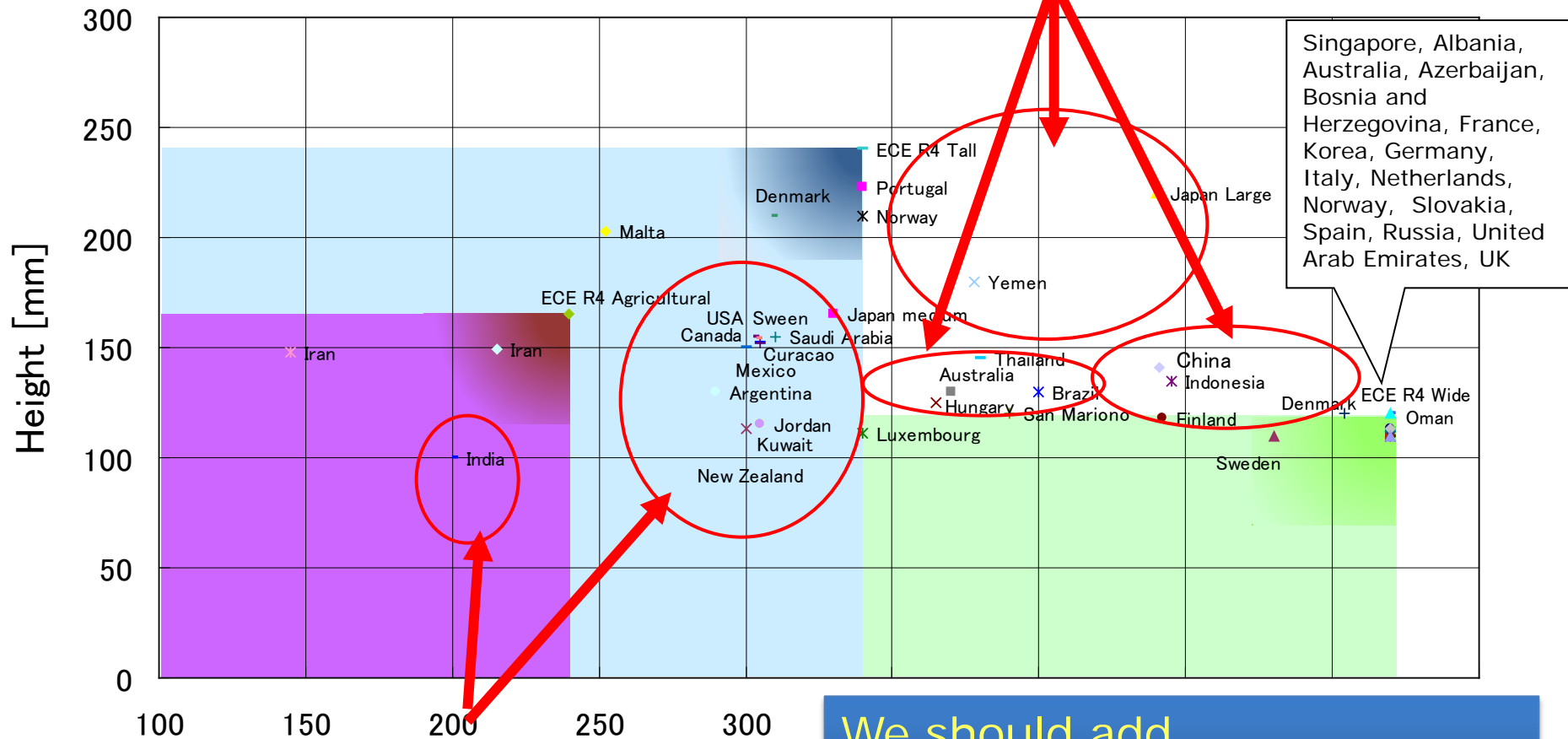


Plate Sizes Uncovered by R4

(i) These plate sizes are not covered by R4.



Singapore, Albania, Australia, Azerbaijan, Bosnia and Herzegovina, France, Korea, Germany, Italy, Netherlands, Norway, Slovakia, Spain, Russia, United Arab Emirates, UK

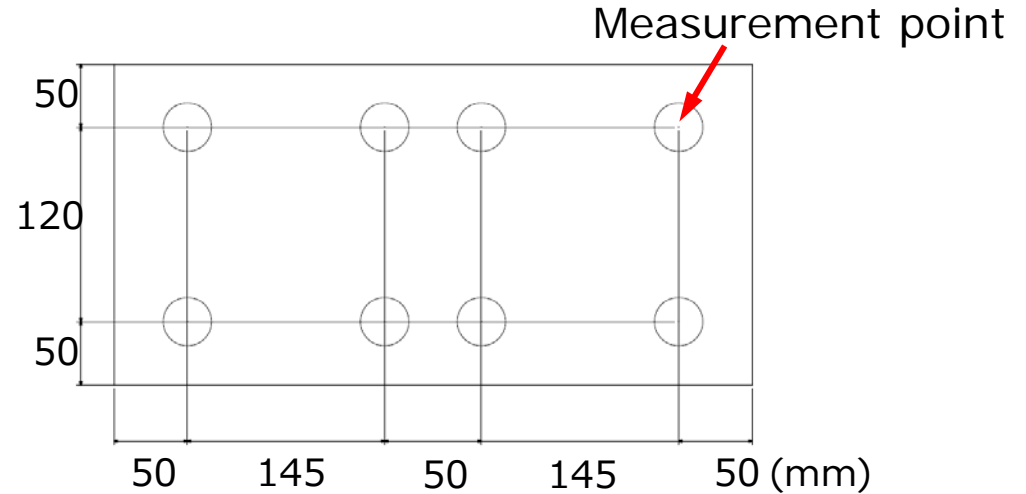
(ii) These plate sizes are quite different from the size of illuminated area in R4.

We should add some new illuminated areas?

To address the problem (i),

Add New Area (category), that covers Japanese Large Plates as well as other countries

(440 mm × 220 mm)



To address the problem (ii),

Add New Area (category), that covers Japanese Medium Plates as well as other countries

(330 mm × 165 mm)

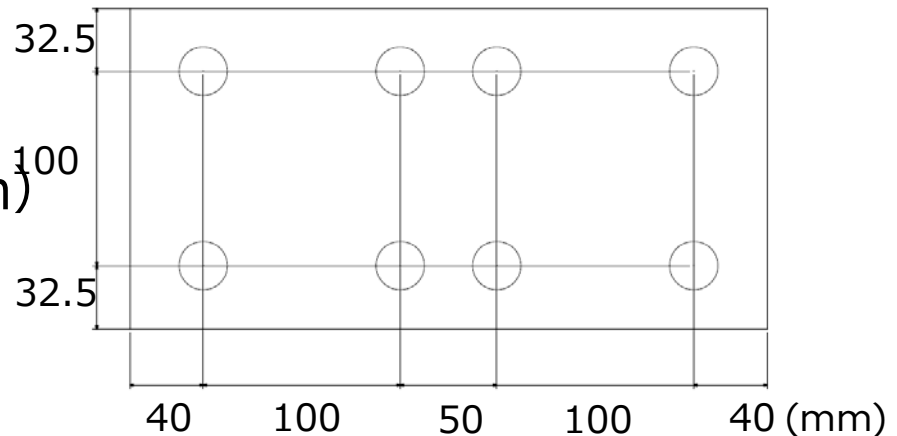
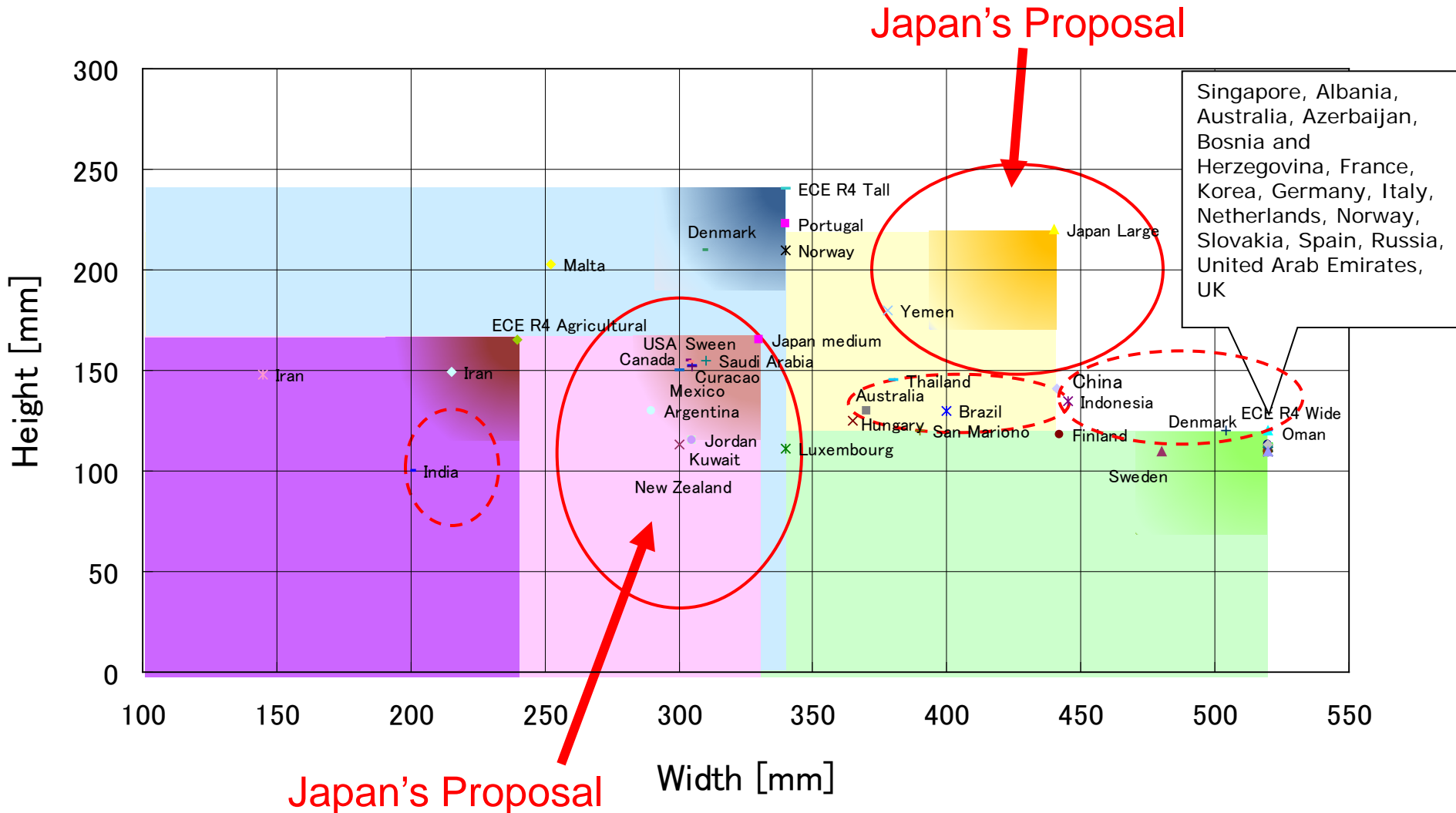


Plate Sizes Covered by the current R4 and Japan's proposal



Specific Points of Proposal for Amendment

- Registration plate lamps covering new illuminated areas are added
 - Category 1a: For use to illuminate a registration plate, the size of which is 340 x 240 mm or less (tall plate).
 - Category 1b: For use to illuminate registration plate, the size of which is 520 x 120 mm or less (wide plate).
 - Category 1c: For use to illuminate registration plate, the size of which is 240 x 165 mm or less (plate for agricultural or forestry tractors).
- NEW**
- Category 2a: For use to illuminate registration plate, the size of which is 330 x 165 mm or less.
 - Category 2b: For use to illuminate registration plate, the size of which is 440 x 220 mm or less.“

We should avoid any mismatch between the registration plate lamp and the size of the mounted registration plate.

The applicant shall choose a registration plate lamp of a category matching the size of the registration plate the vehicle will be fitted with.

Summary

- This proposal is intended to promote R4 to be harmonized.
- Japan surveyed registration plates as currently used around the world. It proposes categories which are not covered in R4 and which is suitable for the world wide solutions.
- The categories proposed here don't cover all of areas. If other countries propose additional categories suited for the purpose, we will do our best to support them.