

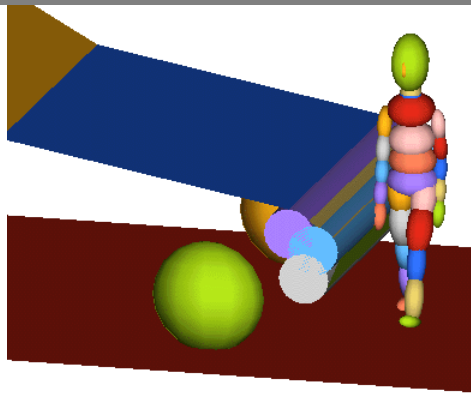
Transmitted by the expert from Japan

Informal document No. GRSP-41-29
(41st GRSP, 7-11 May 2007,
agenda items 2.1.2. & 2.1.3.)

Japan's proposal for
Pedestrian Protection GTR Scope

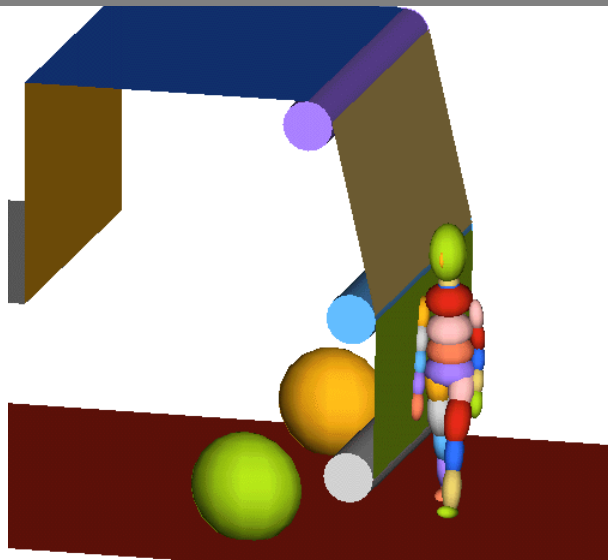
Comparison of dummy's behavior at collision by vehicle front surface design(1)

Car type: Sedan, Pedestrian size: 6 year old child



Vehicle Speed: 40km/h

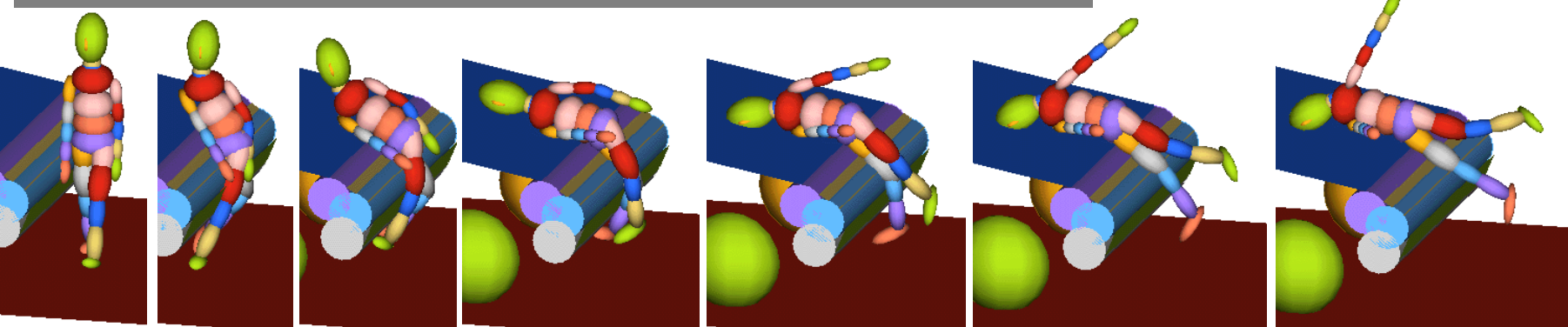
Car type: Truck, Pedestrian size: 6 year old child



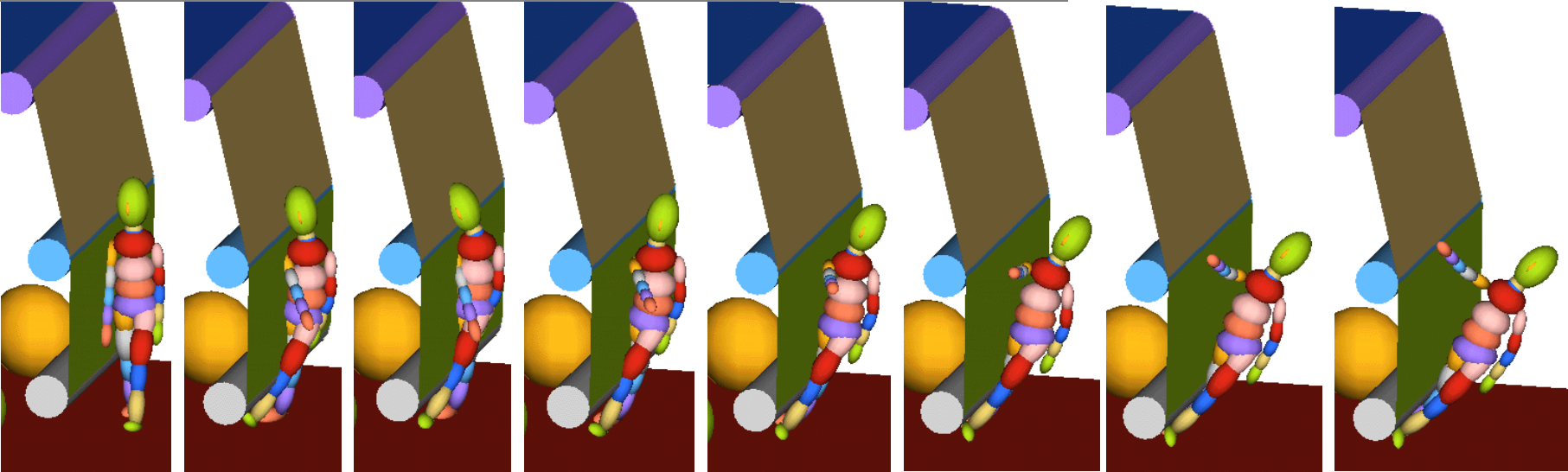
Vehicle Speed: 40km/h

Comparison of dummy's behavior at collision by vehicle front surface design(2)

Car type: Sedan, Pedestrian size: 6 year old child

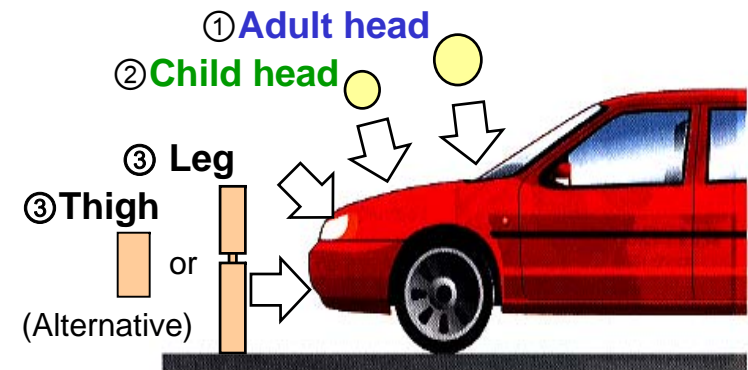


Car type: Truck, Pedestrian size: 6 year old child



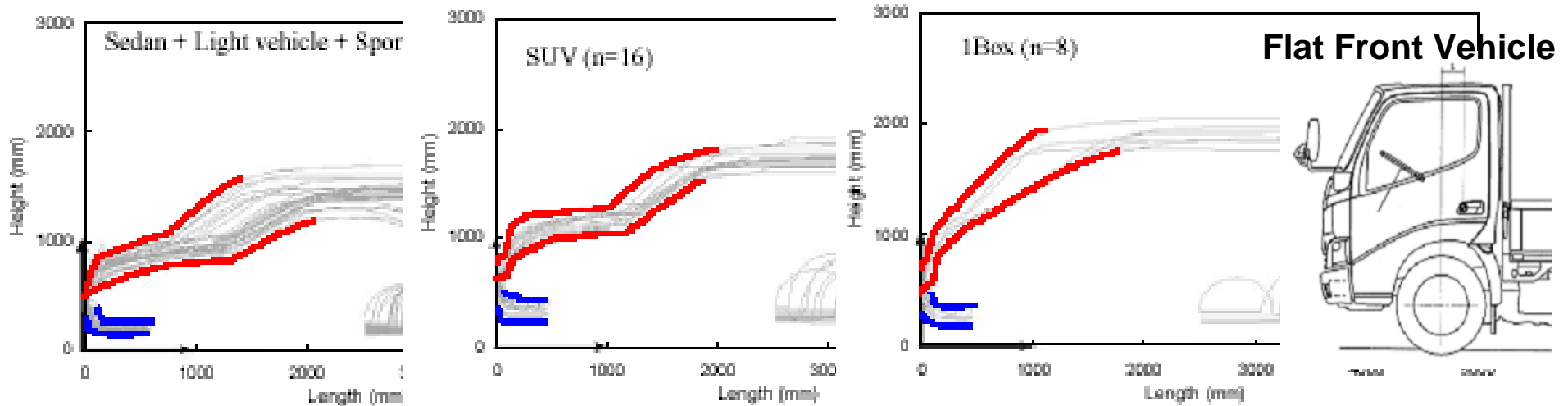
Background

1. The GTR draft test protocol is originally based on the EEVC study which covers bonnet type vehicles.

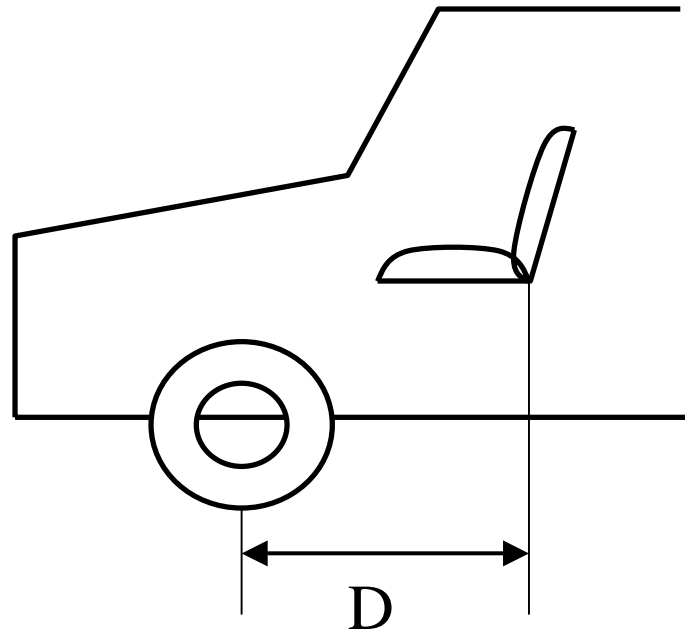


2. IHRA study expanded the test protocol coverage for 3 types of vehicles, i.e., typical bonnet type passenger car, SUV and 1-box type vehicles.

However, the test protocol still does not cover flat front vehicles.



The relationship between the front axle and the rear most H-point of frontal seat

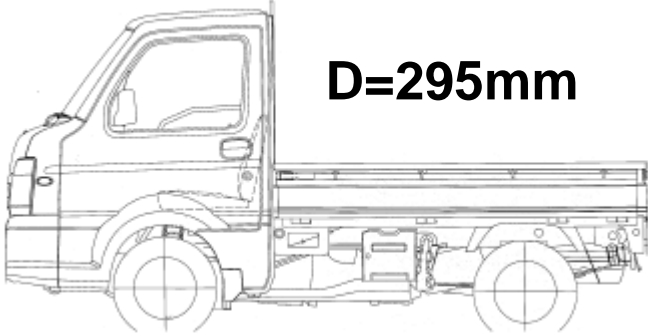
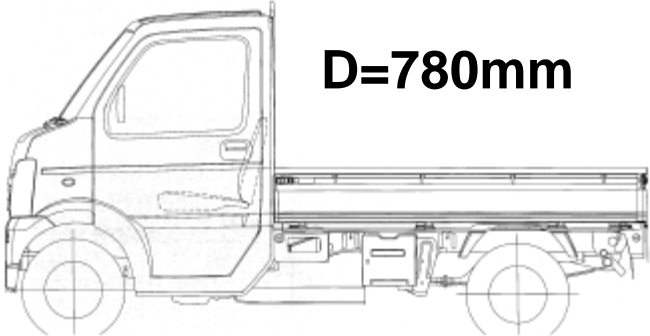


Proposed : $D \geq 1000\text{mm}$ including the object of gtr
 $D < 1000\text{mm}$ excluding the object of gtr

FFV definition

NEW type of mini-truck (D<500)

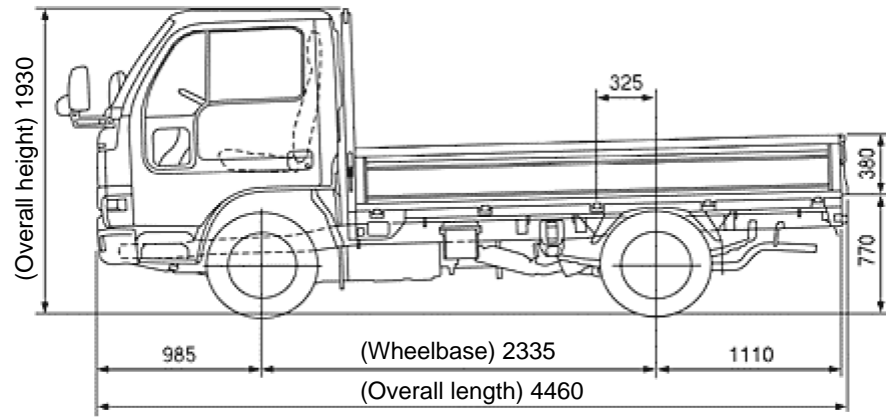
OLD type of mini-truck (D>500)



FFV definition

Truck A

D=140



Truck B

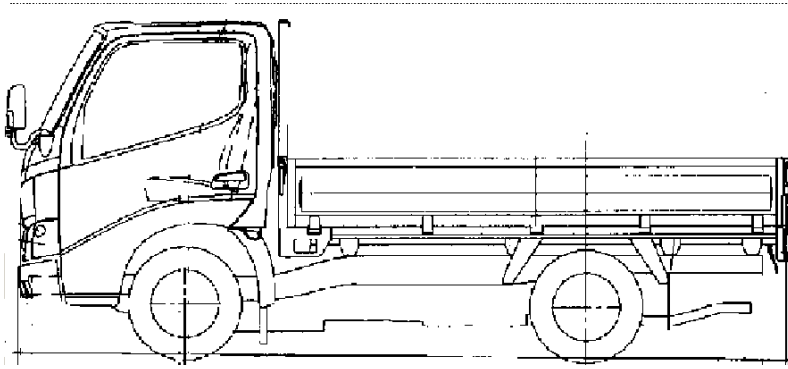
D=150



FFV definition

Truck E

D=180

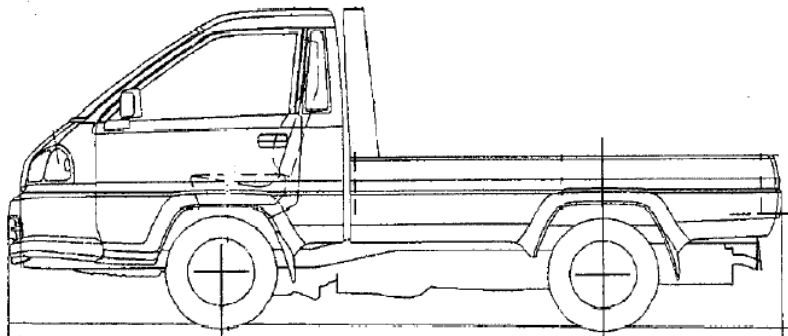


L4430mm



Truck F

D=275



L4240mm



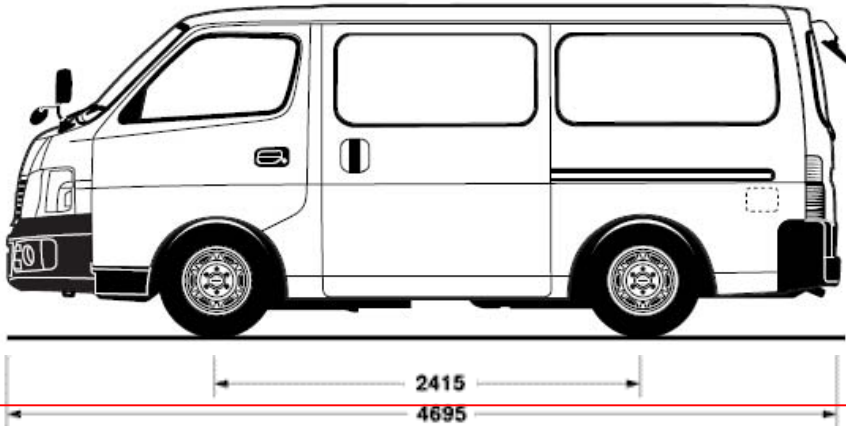
D=1130



FFV definition

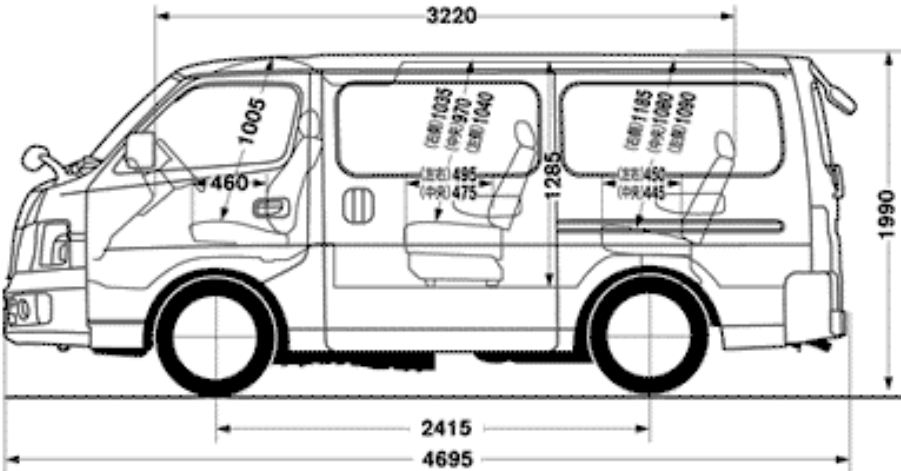
Van A

D=271



PC A

D=271



FFV definition

Mini-van A



D = 920

Mini-truck A



D = 780

Mini-truck B

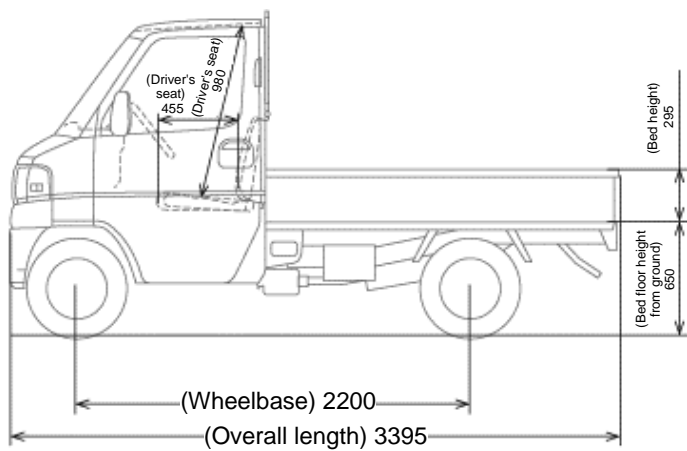


D = 295

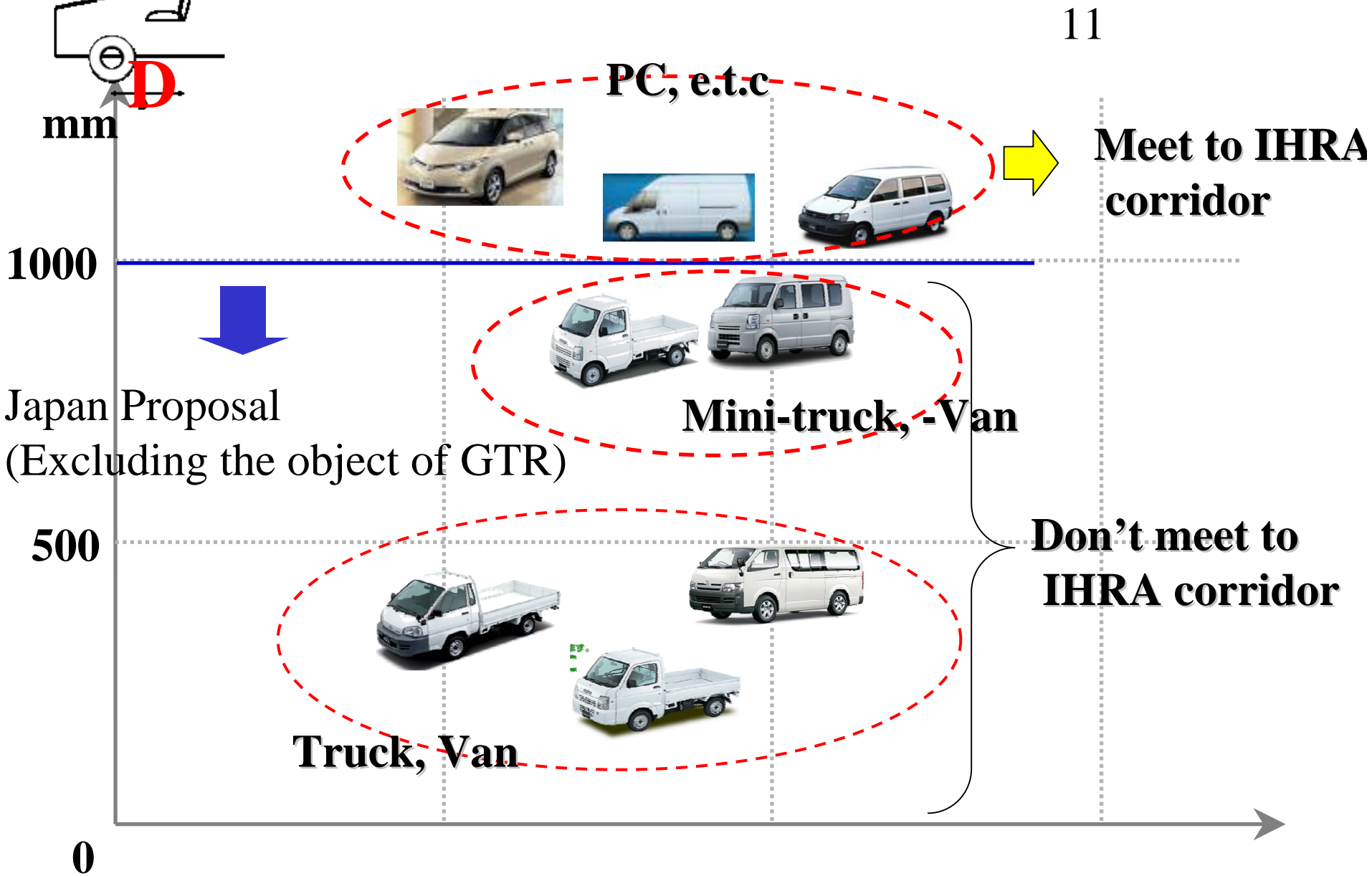
K-truck C



D=850



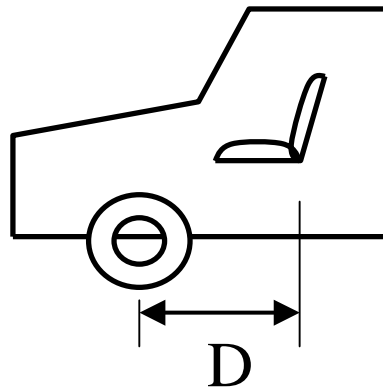
FFV definition



SUMMARY

JAPAN's proposal

$D < 1000\text{mm}$ as the defined for excluding the box type vehicle of Category 1-2 and Category 2



The relationship between the front axle and the rear most H-point of frontal seat

Proposed : $D \geq 1000\text{mm}$ including the object of gtr

$D < 1000\text{mm}$ excluding the object of gtr