



Directorate-General for Mobility and Transport

Directorate C – Land Transport

C2 – Road Safety

CARE expert meeting, 28 October 2021

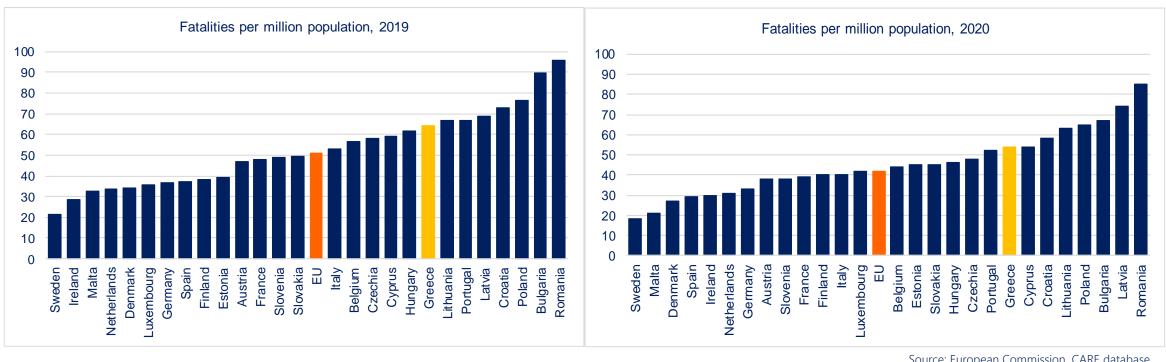
# The value of disaggregate data in road crash analysis

George Yannis, Professor Dimitris Nikolaou, Marianthi Kallidoni, Researchers



Department of Transportation Planning and Engineering, National Technical University of Athens

#### Road Fatalities per million population, 2019-2020

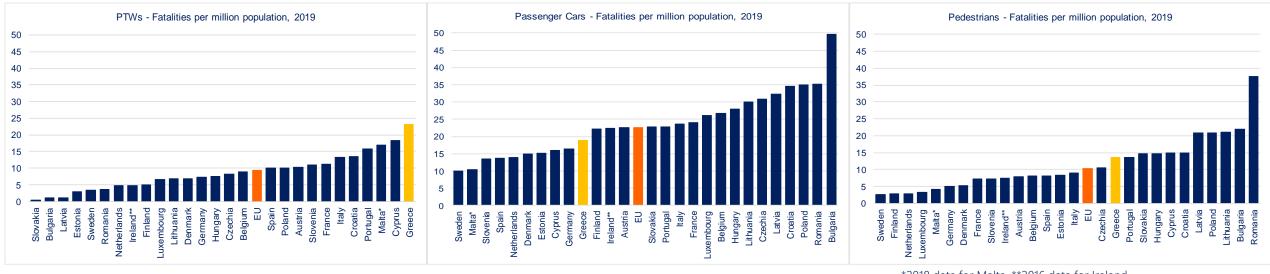


Processing: NTUA - Road Safety Observatory

- ➤ Based on CARE final data for 2019, Greece ranked 20<sup>th</sup> among the EU countries in terms of road fatalities per million population
- ➤ Based on preliminary European Commission data for 2020 (published on April 2021), Greece remains at the 20<sup>th</sup> position among the EU countries



#### Road Fatalities by Transport Mode, 2019

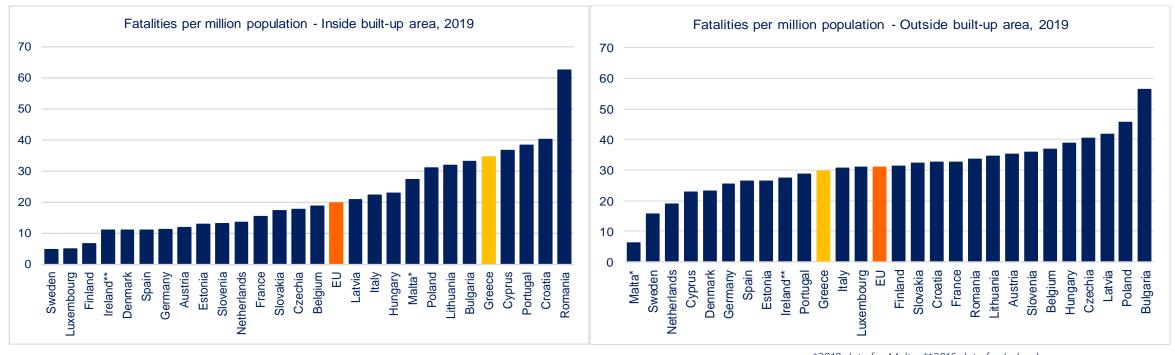


\*2018 data for Malta, \*\*2016 data for Ireland Source: CARE database, Processing: <u>NTUA - Road Safety Observatory</u>

- ➤ Greece had the highest PTW fatality rate (motorcycles & mopeds) in the EU (27<sup>th</sup> with 23 fatalities per million population), while the EU average was about 9
- ➤ Passenger car fatality rate in Greece (10<sup>th</sup> with 19 fatalities per million population) was below the EU average (23)
- ➤ Pedestrian fatality rate in Greece (17<sup>th</sup> with 14 fatalities per million population) was a bit higher than the EU average (10)



### Road Fatalities by Area Type, 2019

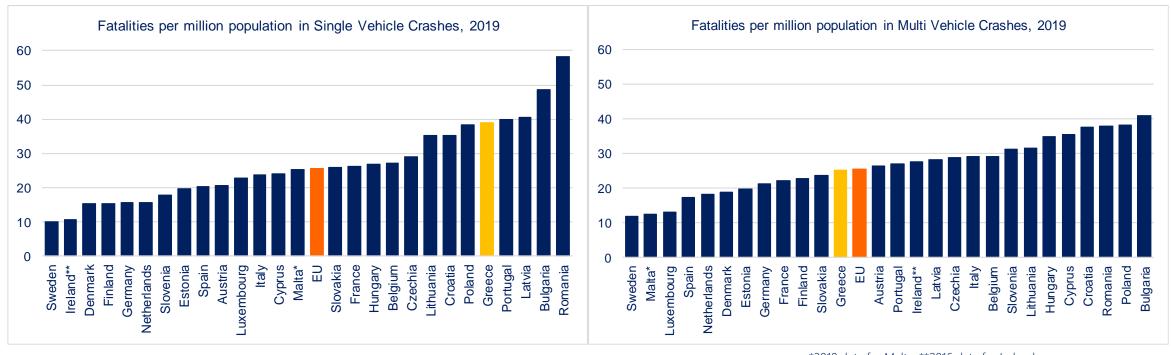


\*2018 data for Malta, \*\*2016 data for Ireland Source: CARE database, Processing: NTUA - Road Safety Observatory

- Fatality rate inside built-up areas in Greece (23rd with 35 fatalities per million population) was higher than the EU average (20)
- Fatality rate outside built-up areas in Greece (11th with 30 fatalities per million population) was slightly lower than the EU average (31)



#### Road Fatalities by Number of Vehicles involved, 2019

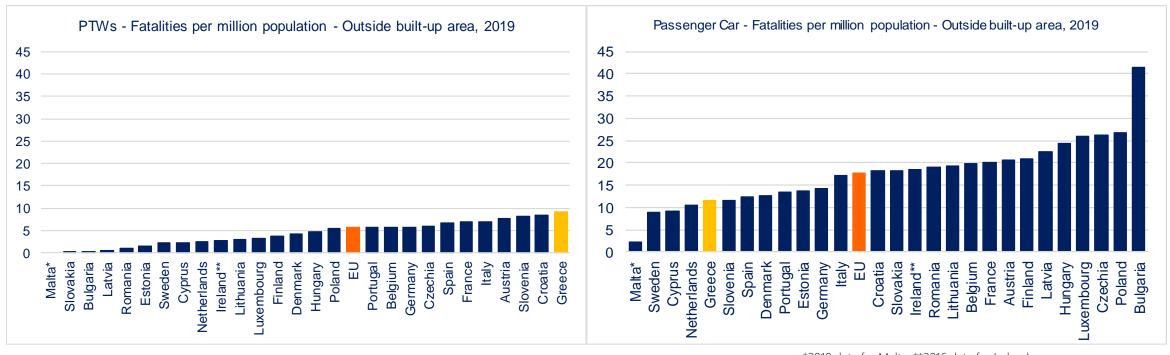


\*2018 data for Malta, \*\*2016 data for Ireland Source: CARE database, Processing: <u>NTUA - Road Safety Observatory</u>

- Fatality rate in single vehicle crashes in Greece (23<sup>rd</sup> with 39 fatalities per million population) was higher than the EU average (26)
- Fatality rate in multi vehicle crashes in Greece (12<sup>th</sup> with 25 fatalities per million population) was almost equal to the EU average (25.5)



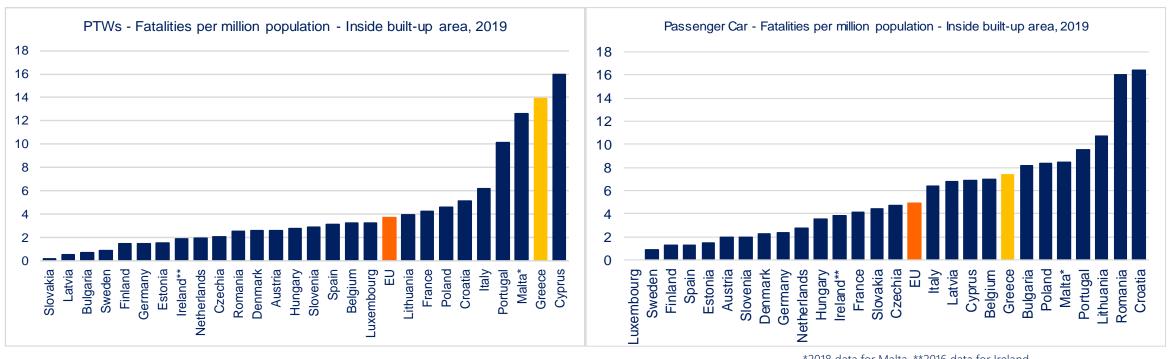
#### Road Fatalities Outside built-up areas by Transport Mode, 2019



\*2018 data for Malta, \*\*2016 data for Ireland Source: CARE database, Processing: <u>NTUA - Road Safety Observatory</u>

- ➤ Greece had the highest PTW fatality rate outside built-up areas in the EU (27<sup>th</sup> with 9.1 fatalities per million population), while the EU average was 5.6
- ➤ Passenger car fatality rate outside built-up areas in Greece (5<sup>th</sup> with 11.5 fatalities per million population) was quite lower than the EU average (17.7)

#### Road Fatalities Inside built-up areas by Transport Mode, 2019

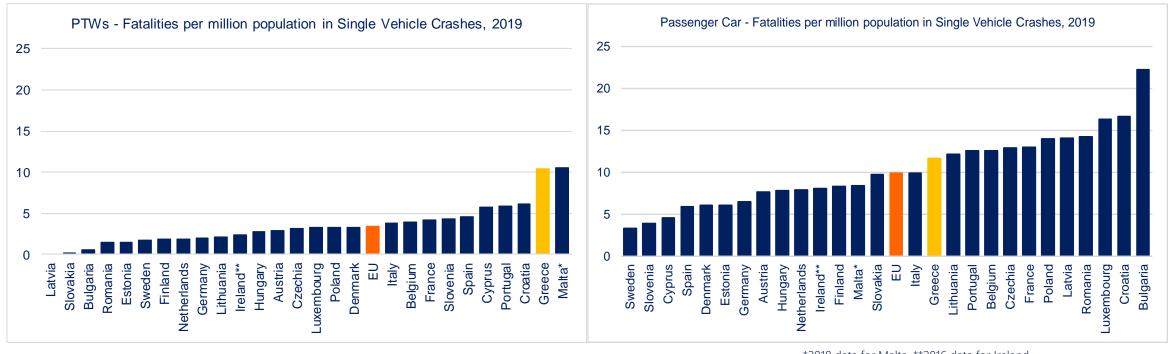


\*2018 data for Malta, \*\*2016 data for Ireland Source: CARE database, Processing: NTUA - Road Safety Observatory

- ➤ Greece had the second-highest PTW fatality rate inside built-up areas in the EU (26<sup>th</sup> with 13.9 fatalities per million population), while the EU average was 3.7
- ➤ Passenger car fatality rate inside built-up areas in Greece (20<sup>th</sup> with 7.4 fatalities per million population) was higher than the EU average (4.9)



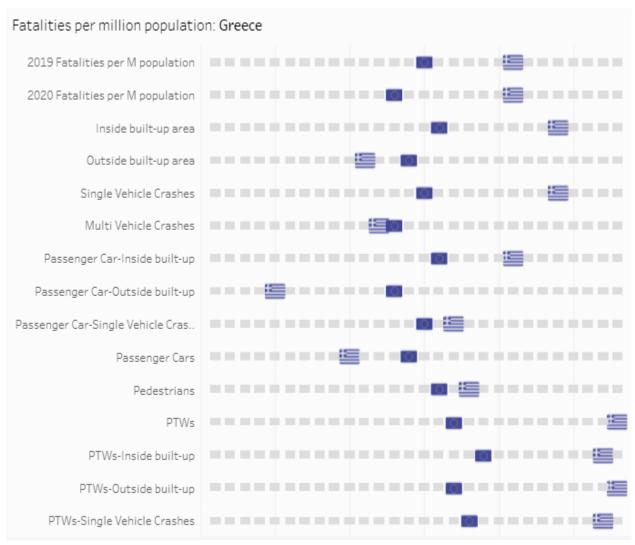
#### Road Fatalities in Single Vehicle Crashes by Transport Mode, 2019

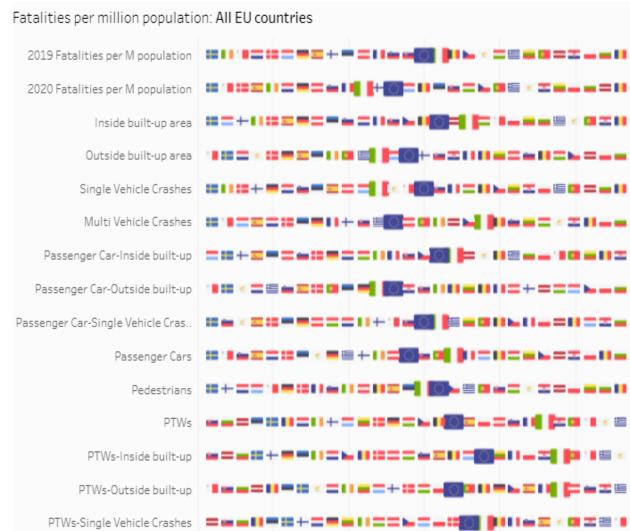


\*2018 data for Malta, \*\*2016 data for Ireland Source: CARE database, Processing: NTUA - Road Safety Observatory

- ➤ Greece had the second-highest PTW fatality rate in Single Vehicle Crashes in the EU (26<sup>th</sup> with 10.4 fatalities per million population), while the EU average was 3.3
- ➤ Passenger car fatality rate in Single Vehicle Crashes in Greece (16th with 11.7 fatalities per million population) was higher than the EU average (9.9)

## EU dynamic road fatalities map - www.nrso.ntua.gr/nrso-ee1/







### **Concluding Remarks**

- The total number of road fatalities per million population allows for some overall comparisons among countries.
- ➤ However, countries performance may differ significantly when different types of road crashes are examined.
- ➤ Disaggregate data can reveal hidden road safety problems, allowing national Authorities to focus on targeted road safety countermeasures







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