

Reducing speeding in Europe

PIN Talk

Speed: how to tackle the most important factor in road collisions?

3 May 2019, Tallinn

Dovile Adminaite

Project Manager



European Transport Safety Council

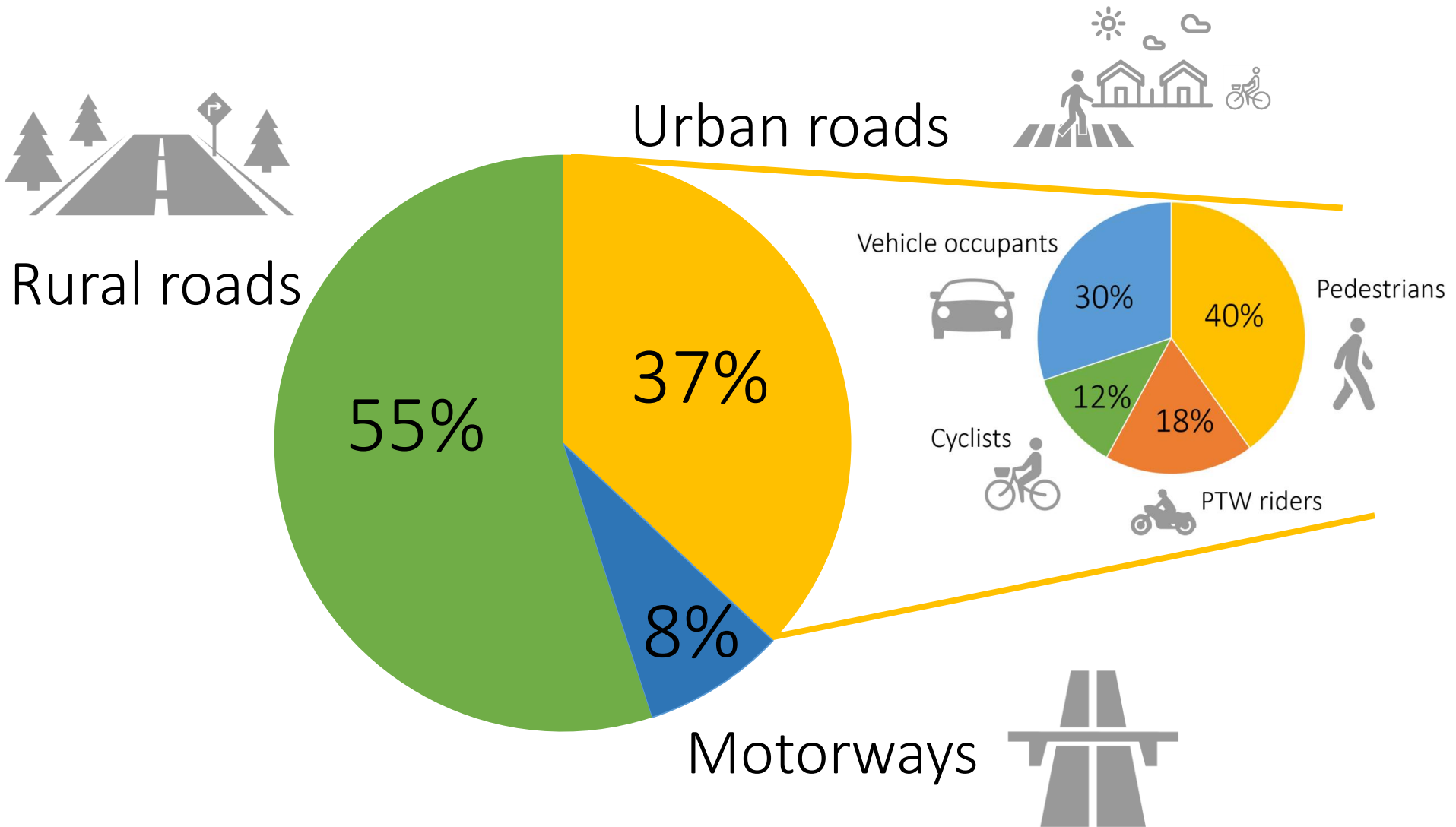
REDUCING SPEEDING IN EUROPE

- ✓ Speed on urban roads
- ✓ Speed on rural roads
- ✓ Countermeasures:
 - ✓ Safe and credible speed limits
 - ✓ Speeding enforcement
 - ✓ Speed-related safety performance indicator targets
 - ✓ Intelligent speed assistance

2,100

lives could be saved each year if the average speed dropped by only 1 km/h on all roads across the EU

ROAD DEATHS BY ROAD TYPE IN THE EU



SPEEDING LEVELS ON URBAN ROADS IN THE EU

35% to 75%

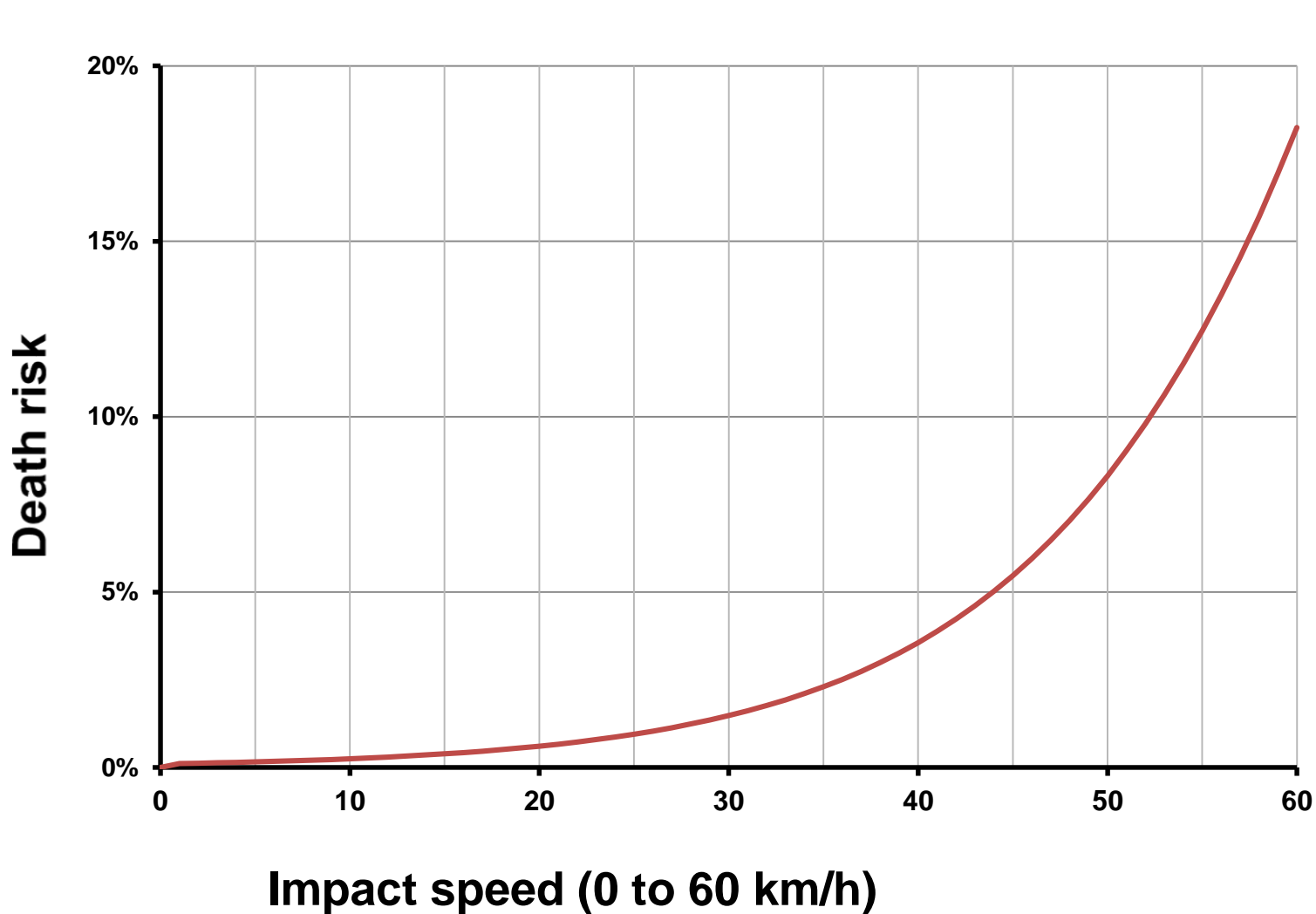


DOES SPEED REALLY GET YOU THERE ANY FASTER?

Travel distance	Travel speed	Time needed for a trip	Time saved
10 km	30 km/h	20 min	
10 km	40 km/h	15 min	5 min (30 vs 40 km/h travelling speed)
10 km	50 km/h	12 min	3 min (40 vs 50 km/h travelling speed)
10 km	60 km/h	10 min	2 min (50 vs 60 km/h travelling speed)

The effects of speed in reducing travel time are generally overestimated by road users and in urban areas the **time savings are particularly small or negligible** because of intersections, traffic lights, congestion, relatively short distances (OECD)

RISK OF PEDESTRIAN DEATH FOR DIFFERENT IMPACT SPEEDS



STANDARD SPEED LIMITS ON RURAL NON-MOTORWAY ROADS

70

Belgium (Flanders), Sweden

80

Cyprus, Denmark, Finland, France, Ireland, Malta, Netherlands, Switzerland, Norway

90

Belgium (Walonia), Bulgaria, the Czech Republic, Estonia, Greece, Croatia, Hungary, Italy, Luxembourg, Latvia, Lithuania, Poland, Portugal, Romania, Slovenia, Slovakia, Spain

100

Austria, Germany, Ireland, UK

***Source: EC**

STANDARD SPEED LIMITS ON RURAL NON-MOTORWAY ROADS

70

Belgium (Flanders), Sweden

80

Cyprus, Denmark, Finland, France, Ireland, Malta,
Netherlands, Switzerland, Norway

90

Belgium (Walonia), Bulgaria, the Czech Republic,
Estonia, Greece, Croatia, Hungary, Italy,
Luxembourg, Latvia, Lithuania, Poland, Portugal,
Romania, Slovenia, Slovakia, Spain

100

Austria, Germany, Ireland, UK

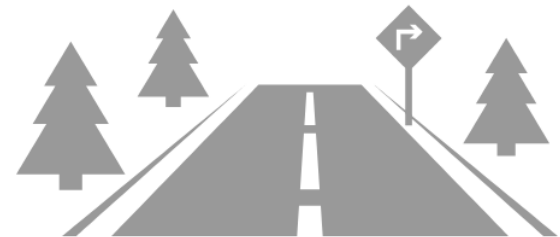
*Source: EC

SETTING SAFE SPEED LIMITS

- 70 km/h - safe speed limit on rural roads without a median barrier
- 100 km/h – safe speed on rural roads with median and side barriers
- Speed limits of much of the road network in EU countries are higher than the protective quality of the road, roadside and vehicle designs allows

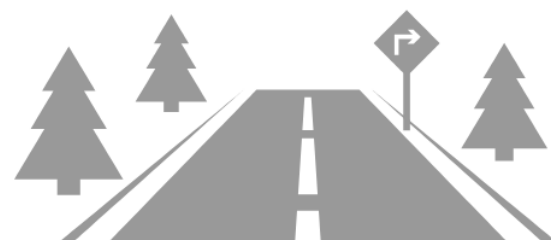
SPEEDING LEVELS ON RURAL NON-MOTORWAY ROADS IN THE EU

9% to 63%



SPEEDING LEVELS ON RURAL NON-MOTORWAY ROADS IN ESTONIA

27%



SAFETY AND CREDIBILITY OF SPEED LIMITS

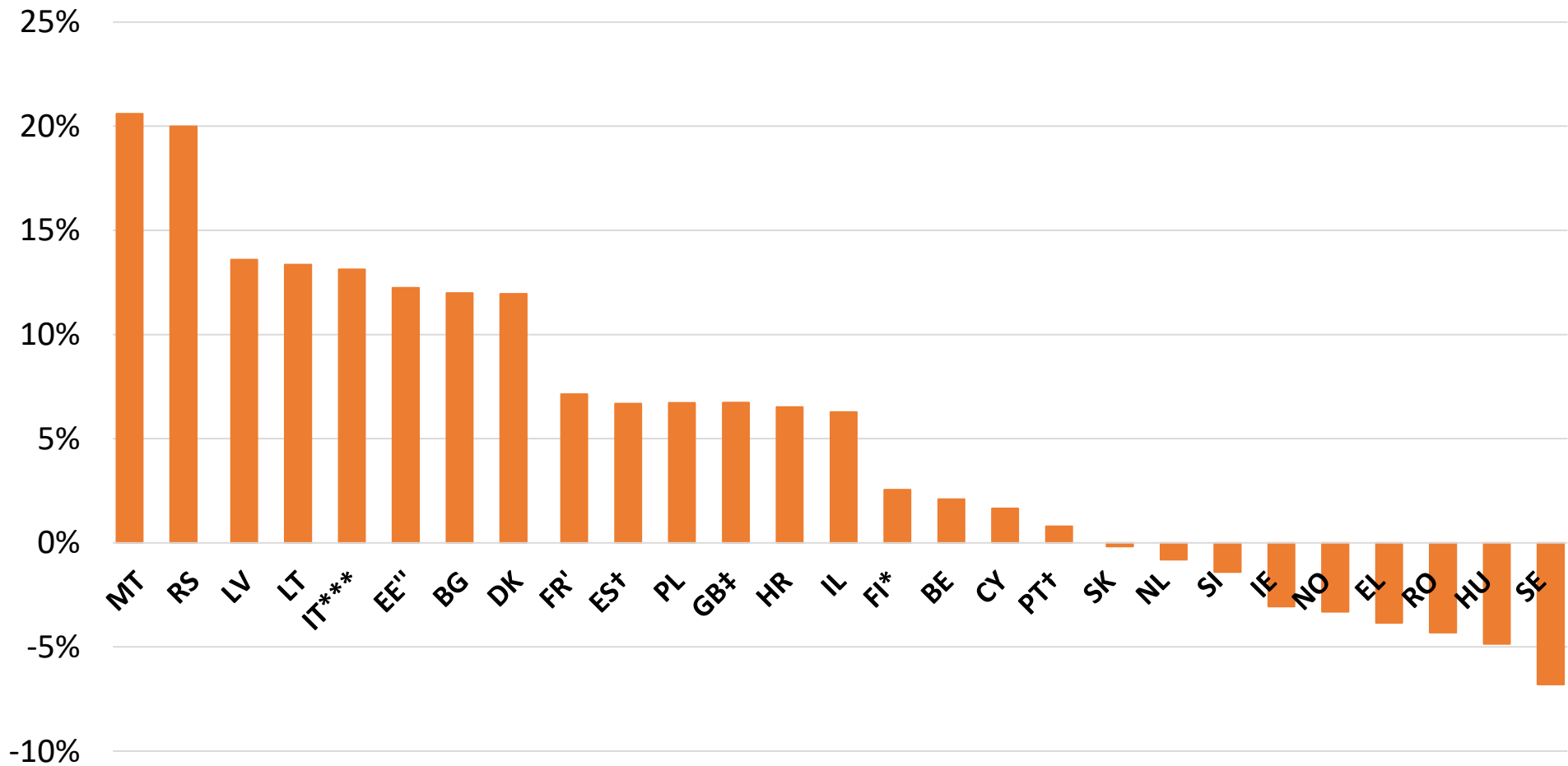
- Many countries have a requirement to set safe and credible speed limits in regulations
- Translating this into practice proves difficult
- Great majority of EU countries do not have estimates on proportion of roads with safe and credible speed limits

SWEDEN: SETTING SAFE AND CREDIBLE SPEED LIMITS



- 2008-2011 revision of speed limits on rural road network
- Speed limit based on safety classification of the road
- 2020 goal: 90% of states road with a speed limit of 80 km/h or below. Roads with higher speed limit should have a median barrier (76% matched the criteria in 2017)
- Reduction of speed limit on rural roads from 90 to 80 km/h. Result:
 - 3.1 km/h decrease in mean speed
 - 41% decrease in road deaths

ANNUAL CHANGE IN THE NUMBER OF SPEEDING TICKETS 2010-2017



	2017		2016		2015	
	Speeding tickets/1000 inhabitants	% by fixed or time-over-distance camera	Speeding tickets/1000 inhabitants	% by fixed or time-over-distance camera	Speeding tickets/1000 inhabitants	% by fixed or time-over-distance camera
NL	457	77%	470	79%	393	n/a
LU	428	95%	470	94%	n/a	
BE	299	n/a	292	n/a	n/a	
FR	n/a		253	95%	212	94%
LV	186	65%	116	43%	75	29%
MT‡	171	99.9%	163	99.8%	169	99.8%
CY	121	6%	124	9%	108	29%
EE	116	78%	126	73%	102	66%
FI*	111	66%	111	64%	93	55%
DK	97	n/a	98	n/a	82	n/a
LT	94	92%	58	98%	50	98%
HR	71	n/a	77	n/a	66	n/a
SI	57	n/a	37	n/a	44	n/a
PL	56	20%	55	21%	50	17%
BG	54	n/a	47	n/a	29	n/a
RS	52	n/a	47	n/a	38	n/a
HU	51	n/a	28	n/a	28	n/a
NO	45	39%	50	36%	48	36%
SK	45	3%	47	2%	55	2%
PT†	43	70%	10	0%	n/a	
IL	42	77%	18	67%	17	73%
RO	36	0%	42	0%	38	0%
IE	31	n/a	36	n/a	47	n/a
EL	20	n/a	16	n/a	16	n/a
SE	14	51%	15	51%	17	48%

SAFETY PERFORMANCE INDICATORS

- EU Strategic Action Plan on road safety:
SPIs within road safety policy framework
2021-2030
- 9 EU countries adopted SPI targets related
to speed

INTELLIGENT SPEED ASSISTANCE

WHAT IS INTELLIGENT SPEED ASSISTANCE?

1. Car receives position information via GPS and current speed limit from a digital map. Can also be combined with video camera sign recognition.

2. Speed limit is displayed on the dashboard.

Driver can override system by pushing harder on accelerator.

3. Car helps driver not to speed when speed limit is reached.



RECOMMENDATIONS TO MEMBER STATES

- Encourage local authorities to adopt 30 km/h zones in residential areas and other areas used by many pedestrians and cyclists and promote traffic calming measures
- Establish clear urban and rural road hierarchies which better match road function to speed limit, layout and design based on the principles of the Safe System approach
- Adopt national or regional enforcement plans with annual targets for a number of checks and compliance levels, including on speeding
- Systematically collect (SPI) data and set national SPI targets, including SPIs related to speed

THANK YOU FOR YOUR ATTENTION

 www.etsc.eu/PIN  @etsc_eu

 dovile.adminaite@etsc.eu

2,100 LIVES COULD BE SAVED EACH YEAR IF THE AVERAGE SPEED DROPPED BY ONLY 1 KM/H ON ALL ROADS ACROSS THE EU

ISA
=
20% FEWER DEATHS

THE MANDATORY INSTALLATION OF AN OVERRIDABLE INTELLIGENT SPEED ASSISTANCE (ISA) SYSTEM ON ALL NEW VEHICLES COULD EVENTUALLY CUT ALL ROAD DEATHS BY 20%



OBSERVED VEHICLE SPEEDS ABOVE THE SPEED LIMIT IN THE EU:



FROM **35% TO 75%**
ON URBAN ROADS



FROM **9% TO 63%**
ON RURAL ROADS



FROM **23% TO 59%**
ON MOTORWAYS

SOLUTIONS FOR SAFER SPEEDS:



SAFE AND CREDIBLE SPEED LIMITS



SELF-EXPLAINING, SELF-ENFORCING ROADS



VEHICLES THAT HELP DRIVERS TO COMPLY WITH SPEED LIMITS



STRICTER LAWS



ROAD USER EDUCATION



EFFECTIVE AND FREQUENT TRAFFIC LAW ENFORCEMENT ACTIVITIES