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Vision zero values and traffic safety in three countries

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Background:

- Some TS measures are not implemented due to their cost, others due to their excessive limitation of freedom.
- Traffic safety often comes as a result of increased paternalism and restricted freedom (e.g. seat belt and helemt laws, speed limits).
- «The road is not a place for exercising your personal freedom»
- Vs. Car as «freedom machine» (Lonero 2007)
- NY-times 1986: seat belt laws are a «violation of human rights»



Aims:

- 1) Compare the values related to individual freedom to take risk and paternalism among car drivers and bus drivers in Norway, Greece and Israel,
- 2) Examine the factors influencing values related to individual freedom and paternalism among car drivers and bus drivers in the three countries, and
- Examine the relationship between values and safety outcomes (i.e. road safety behaviours and accident involvement).



National road safety culture (RSC):

- Shared values and attitudes signifying what is important (e.g. safety, mobility, freedom), shared norms prescribing certain road safety behaviours, and thus shared patterns of behaviour and shared expectations regarding the behaviours of others (Nævestad et al. 2022).
- Several definitions of RSC includes values. Values are taken for granted, related to our identity (thus hard to change) and motivate behaviour.
- RSC values are often part of the larger national culture.



More definitions:

- Freedom: The condition or right of being able or allowed to do, say, think, etc. whatever you want to, without being controlled or limited. (TS: to take risks). (Cam. Dict.)
- Paternalism: being forced to do something for the sake of your own good, although you would not, or might not, have chosen to do so yourself (Elvebakk 2015).
- Values: e.g. refer to desirable goals, transcend specific actions and situations, serve as standard/criteria "taken for granted way of seeing things". (Schwarz 1992)



More definitions:

- Attitudes: more context specific than values: Summary evaluation of an entity with some degree of favor or disfavor (Ajzen 2001).
- Values influence behaviours through more specific attitudes, e.g. related to speeding, DUI, seat-belt use.
- Specificity is important: attitudes must be related to specific behaviours (cf. Tuesday keynote).
- Attitudes have a cognitive, affective and behavioural component (Gehlert et al 2014).



Method:

 Quantitative surveys with 812 drivers from Norway, 135 from Israel and 485 from Greece and 61 qualitative interviews.

 We measure focus on the individual's freedom to take risks in traffic and acceptance of paternalistic road safety measures using six questions, that we divide into two indexes.

Relationships with DBQ-items are examined.



Hypotheses:

- Hypothesis 1: Drivers in the country with the lowest road safety level and the least comprehensive (paternalistic) road safety policies (i.e. Greece) have the highest focus on individual freedom to take risk and the lowest focus on paternalism.
- Hypothesis 2: Bus drivers in all the three countries will value individual freedom less and be more paternalistic, as their driving is more heavily regulated than car drivers.
- Hypothesis 3: The drivers who value individual freedom to take risk in traffic over paternalism, take more risks themselves.
- Hypothesis 4: Higher levels of risk taking in traffic is related to higher accident involvement.

Comparison of national road safety policies:

Road safety indicator	Greece	Israel	Norway
Target for reduction of fatalities	Yes for 2020	Yes for 2021	Yes for 2030
Time horizon of target (base year 2018)	2 years	3 years	12 years
Targeted annual reduction of fatalities	-5.2%	-1.9%	-5.3%
Blood alcohol (BAC) limit (percent)	0.05	0.05	0.02
Speed limits on motorways (km/h)	130	100/110/120	90/100/110
Motorcycles as share of all vehicles	19%	4%	5%
Seat belt wearing among car drivers	77%	94%	98%
Seat belt wearing among front seat passengers	73%	91%	96%
Percent (ESRA) speeding on motorways	71%	79%	89%
Percent (ESRA) driving after drinking too much	12%	5%	3%
Percent (ESRA supporting zero BAC-limit	60%	77%	68%
Road fatalities per million inhabitants (2017)	69	36	20

Items

Paternalism Individual

freedom

 The fact that accidents still happen in traffic, shows that the 0.847 authorities should control road users' behaviour to a greater extent than they do today

2) The authorities should make it more difficult for people to 0.805engage in risky behaviour in traffic (e.g. by lowering speedlimits, increasing police enforcement)

3) It is morally and ethically unacceptable that people are 0.667
killed or severely injured in traffic accidents^a

4) Road users should be able to choose risky activities in traffic,0.795as long as they do not expose other to risk

5) A skilled person can take more risks than others 0.723

6) Road users know best themselves how they should behave in 0.618 traffic

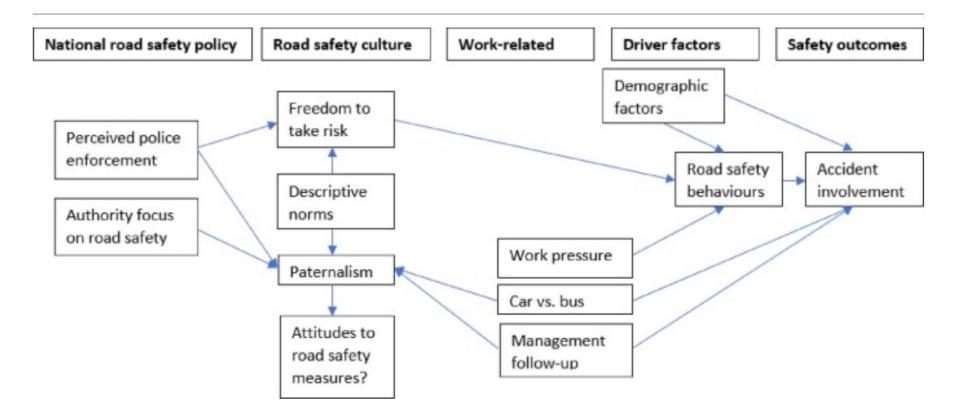


Results:

	Individual freedom			Paternalism			
	Mean	Number	S.D.	Mean	Number	S.D.	
Norway	6.4	711	2.5	10.6	711	2.8	
Israel	6.0	129	2.4	10.4	129	2.8	
Greece	7.2	386	2.6	13.3	386	1.9	
Car	6.5	984	2.5	11.3	984	2.8	
Bus	6.9	242	2.9	12.1	242	2.7	



Main results from four separate regression analyses:





Concluding discussion I:

- The TS records of the studied countries reflect different policies and levels of national regulation of freedom to take risk (least restrictive in Greece).
- In line with this, we find a higher valuation of freedom to take risk among Greek drivers.
- Greek drivers also expect higher levels of risk taking from other drivers in their country, report higher levels of risky driving themselves, and are more often involved in accidents.
- Thus, it seems that values have an important role in RSC legitimizing and motivating risky driving, which are related to accidents.



Concluding discussion II:

- Why do we not see a relationship between paternalism and road safety behaviours?
- How can we explain the "Greek paradox"?
- The relationship between road safety policies and values: what comes first?



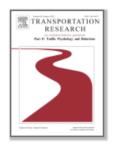
Policy implications:

- 1) Road safety policies should focus on both internal and external motivation
- 2) Can we influence RSC values and attitudes?
- 3) Large potential for paternalistic measures among drivers at work
- 4) Is the road a private sphere or a public sphere?





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The role of values in road safety culture: Examining the valuation of freedom to take risk, risk taking and accident involvement in three countries

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