



PARALLEL SESSION: ADDRESSING THE SAFETY OF POWERED TWO-WHEELERS

Session Conclusions

1. KEYWORDS

Road Safety
Motorcycles
Powered Two Wheelers (PTW)
Vulnerable road users (VRU)

2. TITLE OF THE SESSION

Addressing the Safety of Powered Two-Wheelers

3. TOPIC OF THE SESSION

[Presentation of the issues that were presented, why they are important]

Powered two-wheelers – among them motorcycles, mopeds and scooters – are a common commuting vehicle in some regions of the world and an appreciated recreational vehicle in others. They are among the most affordable forms of personal transport, and rides use is on the rise in many countries. WHO reported in 2018 that 28% of road traffic fatalities are associated with powered two-wheelers, and in some countries this proportion can be as high as two thirds.

As drivers and riders of powered two-wheelers have less protection compared to people inside vehicles, utmost care must be taken in all components of the road traffic system to ensure their safety.

This includes road safety legislation and enforcement, vehicle and road design, personal safety equipment such as motorcycle helmets and protective clothing, and driver training. Ensuring safe speeds is also essential.

4. SHORT SUMMARY OF SESSION

Representatives of 4 different regions, from Government (Thailand), National Safety Committee (Chile), NGO (Africa) and Global industry representative were invited to share their experiences.

The panel participants highlighted popularity of motorcycles and expected increase in the use and fleet of and provided examples actual and required road safety policy interventions by government and stakeholders.

Though there are significant differences in situation, use and type of motorcycles in the regions, the panelists agreed on the key important mobility role and contribution of Powered Two Wheelers in society and economy, providing access to healthcare and jobs that may not be possible otherwise.

The panel also reviewed some of the recommendations of the Academic Expert Group (AEG) especially those on managing speed, procurement, sustainable practices.

The session benefited from an involved audience, filling the room entirely. Both positive 'love' and negative 'hate' attitudes towards the effective integration of PTWs were heard.

The strong interest in the Ministerial Conference-session demonstrated the need for proactive action to address safety of motorcyclists in all regions.

5. OVERALL MESSAGES

The moderator highlighted the key role of Powered Two Wheelers in society and economy and need to urgently address the unacceptably high number of fatalities and serious injuries by users of motorcycles.

The expert reminded that when identifying effective and affordable road safety solutions for Low- and Medium-Income Countries and/or High-Income countries, one should first consider differences in mix of MC in traffic between the regions. The % of motorcycles in the fleet can range from 2% (USA) to more than 90 % in some countries in Asia.

The accident data analysis presented by the expert illustrated differences but also commonalities, especially with regards to motorcycle to vehicle crashes. Nevertheless, there is need for a holistic package of safety policies specifically addressing this type of road user.

The Deputy Minister of Interior from Thailand reported that 80% of road crashes in Thailand have been to PTWs and about 80% of crashes have been on local roads which

belong to the Ministry of Interior's local administration. He presented Thailand's progress on motorcycle safety, such as mandatory automatic headlight for all motorcycles which was introduced several years ago and an ongoing consideration of the Ministry of Industry on ABS installation in motorcycles. The Deputy Minister of Interior also shared his deliberations to empower local authorities to improve road safety through better local road infrastructure.

In Chile, due to relatively low numbers, there had not been specific concerns with motorcyclist safety so far, however, the Chilean road safety policy makers proactively developed a motorcycle road safety plan to anticipate increase of the fleet of motorcyclists. The plan includes details on infrastructure, awareness campaigns, vehicle and other.

Mr Tom Bishop (AMEND), reported on the rapid growth of motorcycles in African countries in the last ten years, and banning of motorcycles by policy makers in Laos in Nigeria leading to protest and a standstill in traffic. From research in Tanzania, Ghana, Kenya, Rwanda in other countries AMEND reported that motorcycles are very popular, allowing a higher standard of living, access to health care, jobs etc. Since their research AMEND has been advising governments to take a measured approach rather than banning the vehicles from traffic, making their use safe allowing motorcycles to operate and bring benefits for the population. He added there were so far few best practices.

Panel members agreed that motorcycles have an important place in traffic and society and should NOT be 'demonised': The panel members suggested to follow the integrated approach to improve motorcycle safety, as illustrated by the Hon. Vice Minister of interior Mr. Bunyamane:

- Update vehicle technical requirements and enforcement of traffic law, recognising regional diversity, variability in infrastructure, traffic conditions and especially the stages of economic development. The Hon. Minister of Thailand reported on intentions to require advanced braking systems to new motorcycles based on UN Vehicle Technical Regulations
- Promote affordable and effective training and education to improve motorcycle rider skills when obtaining a license in Low- and Medium-Income Countries, for different vehicle categories as necessary, promote awareness on the need to wear a helmet but also consider the car driver training to better detect motorcycles as reported on by the representative of France, contributing from the audience.
- Road Infrastructure improvements and maintenance. Hon. Minister Bunyamane (Thailand Government) reported on mandating urban and rural infrastructure owners to improve quality, maintenance and motorcycle-friendliness of the roads and emphasized importance of effective accident data to identify black spots.

A plenary discussion emerged on question from the audience to limit motorcycle power or maximum speeds to 30 km/h but this discussion could not be concluded due to lack of time. IMMA clarified the different types of vehicles, types of use, and importance of adequate training and licensing. Some voices in the audience challenged the effectiveness of training.

6. OVERALL RECOMMENDATIONS

- Motorcycle Safety (action) plan. A specific motorcycle policy expert committee is required in each country or region with the goal to develop a specific safety and action plan as highlighted by panellist Ms Johanna Vollrath. The moderator, Dr Maria Gomez advised to integrate the PTW policy aspects, rather than identifying them separately leading to the risk of skipping that part.
- Motorcycles policy integration should receive a 'second chance' according to Mr Tom Bishop considering their benefits to society. Johanna Vollrath added that PTWs should be recognized as an independent user group considering their specificities though a creation of a dedicated expert committee. Mr Edwin Bastiaensen, (IMMA) added that policy makers also include parking to facilitate connection to public transport and support multimodality policy.
- Research and pilots are required to evaluate the opportunities for motorcycle specific solutions, such as accepting motorcycles in bus-lanes, advanced stop lines at crossing allowing separation of vehicle flow at crossings etc.
- Modal Shift: The old narrative of non-motorised to powered two wheelers to four wheeled mobility is outdated according to the moderator Dr Maria Segui Gomez. Both in high-income and in low- and medium-income countries, PTW is a resourceful tool, considering light weight, small size, economy in use and energy efficiency. Where public transport is available, parking facilities for PTWs should be created to facilitate modal shift.
- On Procurement and sustainable practices and reporting:
 - More and more services are provided with 'motorcycle taxi' in low- and medium-income countries according to Mr Tom Bishop (AMEND): A best practice was observed in Rwanda, leading to self-regulation of motorcycle taxi drivers through associations regulating behaviour of their drivers. He additionally highlighted emergence of private sector innovations for use by motorcycle taxi fleet operators monitoring the behavior of their riders through app-based solutions.
 - Moderator Dr Maria Segui Gomez advised that in countries where compliance to minimum vehicle standards as defined under UN WP.29 are not existing, fleet owners as police forces could choose for procuring vehicles with high minimum standards.
 - Mr Edwin Bastiaensen (IMMA) advised that promotion should be made to fleet operators to procure vehicles with good durability and assure regular vehicle maintenance, rider periodic training and wearing of protective equipment such as UN approved helmets by their riders. All of this should be reported on based on periodic in-company compliance monitoring.
- Training and Education: In some LMICs there is an absence of mainstream training schemes and the industry training offer is often the only one available. Courses are offered for different groups of riders: novice riders, advanced riders, corporate training, police force training, etc.

IMMA reported from Thailand accident research that 85% of crashed motorcycle operators did not have adequate training and education before taking a motorcycle license. As a result, Hon. Minister Bunyamanee (Thailand) reported they looking

into a gradual licensing system. The panel agreed on the high importance of effective and affordable training and education, especially in Low- and Medium-Income Countries.

Vehicle technologies and requirements

- In cases of lack of minimum safety performance requirements, governments should consider joining the WP.29 activities under United Nations, and benefit from the uniform system of technical regulations for vehicles, equipment and parts and apply the international regulations suitable for their needs in their territories.
- Some vehicle technologies can be effective, but they cannot compensate for riding skills, especially Braking support systems such as CBS and ABS. Vehicle lighting, such as automatic headlamp-on is already standard in most countries.

7. IMPORTANT FINDINGS (EX. TECHNICAL OR OTHERS)

[This can include key findings that have been confirmed and can be shared, as well as emerging issues that have been identified and will require more analysis.]

Repeat of selection of key items above:

- Motorcycle Safety (action) plan. A specific motorcycle policy expert committee is required in each country or region with the goal to develop a specific safety and action plan as highlighted by panellist Ms Johanna Vollrath.
- Motorcycles policy integration should receive a 'second chance' according to Mr Tom Bishop considering their benefits to society. Johanna Vollrath added that PTWs should be recognized as an independent user group considering their specificities though a creation of a dedicated expert committee. Mr Edwin Bastiaensen, (IMMA) added that policy makers also include parking to facilitate connection to public transport and support multimodality policy.
- Training and Education: In some LMICs there is an absence of mainstream training schemes and the industry training offer is often the only one available. Courses are offered for different groups of riders: novice riders, advanced riders, corporate training, police force training, etc.
- Vehicle technologies and requirements Vehicle requirements should be based on international regulations established under or derived from the World Forum for Harmonisation of Vehicle Regulations WP.29. It is the national authorities' responsibility to determine which ECE regulations are appropriate for their market, and when to implement them.

8. SPECIFIC RECOMMENDATIONS FOR DIFFERENT STAKEHOLDERS INCLUDING GOVERNMENTS AND THE PRIVATE SECTOR

[This can include recommendations for future studies or future collaborations.]

- Follow up: 10 and 11 June (Stockholm) by Swedish Transport Administration (STA) and International Transport Forum (ITF): <https://www.itf-oecd.org/motorcyclists-safety-workshop>
- Governments should coordinate the creation of a national motorcycle safety action plan, as the result of a national motorcycle safety committee, as illustrated by Johanna Vollrath from Chile.
- Government, industry and other stakeholders should collaborate to develop capacity for affordable and effective training and education-programmes in LMI-countries with high motorcycling rates to assure that licensed riders have riding skills and traffic scanning capabilities.
- In cases of lack of minimum vehicle safety performance requirements, governments should consider joining the WP.29 vehicle regulation and harmonisation activities under United Nations, and benefit from the uniform system of technical regulations for vehicles (including motorcycles and three wheelers), equipment and parts and apply the international regulations suitable for their needs in their territories.
- Professional fleet owners should assure their drivers have adequate skills, looking out for motorcycle drivers.
- There is urgent need for further research and best practice exchange on effective road infrastructure solutions for motorcycles e.g. inclusive or dedicated motorcycle lanes, allowing motorcycles on bus lanes, filtering between lanes, etc. .

9. PREPARATION OF THE SESSION

[Mention here the persons and organisations that were involved in the preparation of the session]

Dr Maria Kraft – Director | Swedish Road Administration

Dr Nhan Tran - Head, Safety and Mobility | World Health Organization

Prof. Anders Lie – Senior Advisor | Government of Sweden

Dr Maria Segui Gomez - Member of the Academic Expert Group | Special Advisor for Road Safety at FIA

(Tum) Ingham Rattanaporn National Professional Officer (Public Health), World Health Organization Country Office

Edwin Bastiaensen - Secretary General | International Motorcycle Manufacturers Association

10. SESSION PROGRAM

[Include actual the program of the session as it actually took place]

Powered two-wheelers – among them motorcycles, mopeds and scooters – are a common commuting vehicle in some regions of the world and an appreciated recreational vehicle in others. They are among the most affordable forms of personal transport, and their use is on the rise in many countries. Globally, more than one quarter of road traffic fatalities are associated with powered two-wheelers, and in some countries where these vehicles are commonplace, this proportion can be as high as two thirds. As drivers and riders of powered two-wheelers have less protection compared to people inside vehicles, utmost care must be taken in all components of the road traffic system to ensure their safety. This includes related road safety legislation and enforcement, vehicle and road design, personal safety equipment such as motorcycle helmets and protective clothing, and driver training. Ensuring safe speeds is also essential.

Chair: Dr. Maria Segui Gomez
 Moderator: Dr. Maria Segui Gomez

Plan and timing: 10.10 h. - 11.20 h.

Aims of the session:

- Illustrate how the safe system approach can effectively address the safety of powered two-wheelers
- Showcase best practice from countries and cities who have addressed the safety of powered two-wheelers
- Identify key priorities for the next decade

Approx. Time	Topic/Presentation title	Speaker (title, role/position, organisation)
5 min.	Introduction	Maria Segui Gomez - Member of the Academic Expert Group Special Advisor for Road Safety at FIA
5 min.	Expert analysis on motorcycle safety	Cecilia Sunnevang - Vice President Research Autoliv Development AB.
Panellist	Policy Perspective from Government Thailand	Niphon Bunyamanee - Deputy Minister Ministry of Interior Thailand
Panellist	Safety Policy perspective from Chile	Johanna Vollrath - Executive Secretary National Road Safety Commission Chile
Panellist	Global Perspective from manufacturers	Edwin Bastiaensen - Secretary General International Motorcycle Manufacturers Association
Panellist	Motorcycle use and safety situation in African countries	Tom Bishop - Program Director AMEND