Exchange knowledge and techniques on roads and road transportation

WORLD ROAD ASSOCIATION

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PIARC and Road Safety – Contributing to the UN Targets and Initiatives
The power of knowledge exchange: The core of PIARC

• 121 National governments are members of the Association

• Members from a total of 140 countries
  • Regional authorities
  • Collective members – public or private
  • Individual members

• More than 1 200 experts are currently mobilised in our working groups

“PIARC has a good reputation as serious experts which is what we all need, continue with that” – PIARC Advisory Group Meeting 23 May 2018
PIARC’s contribution to the UN Global Road Safety Targets and Initiatives

- Reports on Road Safety
- The Road Safety Manual (RSM)
- Collaborations and Events on Road Safety
Road Safety reports

- **PILLAR 1: Road safety management**
- **PILLAR 2: Safer roads and mobility**
- **PILLAR 4: Safe road users**

- [Image of Road Safety report]
- [Image of Road Accident Investigation Guidelines for Road Engineers]
- [Image of Vulnerable Road Users: Guidelines for a Safer Man-Road Interface]
- [Image of Human Factors in Road Safety]
- [Image of Road Safety Inspection: Combating Driver Distraction and Fatigue]
- [Image of Road Safety Risk Management: Building Safer Roads]

**Language and Safety: An Introduction to Understanding How Land Use Decisions Impact Safety of the Transportation System**

[Image of report cover]
PILLAR 1: Road safety management

Land use and safety: an introduction to understanding how land use decisions impact safety of the transportation system

- apply land and transport planning processes,
- functional classification of the roads must match the surrounding land use,
- coordination and agreement between all levels of government are essential to support a safe and efficient transportation system.

Unplanned communities can create hazards for road users of all types such as motorists, cyclists and pedestrians, in countries at all stages of development. This extends beyond transport infrastructure decisions and includes land use, social and community services, management of resources.

Comparison of national road safety policies and plans

- Both a high-level road safety strategy designed to achieve a long-term aim and road safety policies setting out courses of action are valuable.

Examination of road safety performance of several nations, review of reported policies and strategies in jurisdictions and attempts to establish linkages between adopted and implemented road safety policies, overarching multi-year strategies and performance outcomes. Findings are built upon survey returns from 16 countries and 8 selected state/provincial jurisdictions.
Road accident investigation guidelines for road engineers.
• Road Accident Investigation (RAI) is an integral part of the road safety improvement system.
This PIARC report describes the accident data needed, how the location of crashes should be reported, and how accident data should be assessed. Focus is placed on collision diagram and on their analysis. A number of examples are presented in the appendices to illustrate the different situations.

Road safety inspection guidelines for safety checks of existing roads
• Road safety Inspection RSIs aim to identify potential problems so countermeasures can be applied to remove or minimise the chance of an accident occurring.
Road safety inspections (RSI) are a safety management tool that can be implemented by road authorities as part of an overall safety process. To assist both the RSA and RSI procedures, detailed checklists have also been included in this PIARC report.
Vulnerable road users: Diagnosis of design and operational safety problems and potential countermeasures

- Road safety inspections should address VRUs
- Checklists and tools include VRU needs and provide question-based guidance.

This PIARC catalogue can be used as a proactive safety tool to ensure that design faults do not arise, and as a reactive tool to assist in designing cost-effective countermeasures where problems already exist on the road network. Road safety inspections and audits should address VRUs; PIARC checklists and tools include VRU needs and provide question-based guidance.

The Role of Road Engineering in Combatting Driver Distraction and Fatigue Road Safety Risks

- Limiting road-side advertising, adequate sight distance requirements, proper road marks and signage.

Driver limitations have been built into standards and guidelines developed by road engineers over the years. The majority of today’s well-designed roads give drivers much surplus time to perform driving tasks.
PILLAR 4: Safe road users

Human factors guidelines for a safer man-road interface

- The basic rules are: the six-second rule, the field of view rule, the logic rule. PIARC’s report presents recommendations on road characteristics that aim at avoiding wrong perception and thus avoiding wrong reactions in drivers, most of which happen subconsciously. It provides detailed examples and sketches that allow designers to understand the relationship between misleading or irritating road characteristics and operational mistakes.

Human factors in road design. Review of design standards in nine countries

- Critical links: the optical density of the field of view; transition zones; fixation objects in the lateral road side environment; depth of the field of view.

This PIARC report reviews how human factors are explicitly or implicitly considered in the current road design standards of the following countries: Australia, Canada, China, Czech Republic, France, Hungary, Japan, the Netherlands and Portugal. For the different criteria and factors, it identifies best practices and provides recommendations for the missing/critical links.
Six forthcoming reports by the end of 2019

- National Road Safety policies evolution
- Vulnerable road users
- Human factors and design
- Catalogue of design, operations and maintenance safety problems and potential countermeasures for LMIC
- Setting credible speed limits
- Road Safety Audit guidelines (amended version)
The Road Safety Manual (RSM)
Need to know – must read quality

• Designed to help countries at every stage of infrastructure development to fulfil road safety objectives

• It includes new thinking on road safety and offers clear arguments on why adopting a Safe System approach is crucial for your country

• Each chapter of the RSM lists key messages, shares proven knowledge, backed up by practical examples and case studies.

Available for free here: http://roadsafety.piarc.org/en

• RSM is available in English
• Launch of French and Spanish version 2nd half 2018
• Chinese and Farsi versions under development
PART 1
STRATEGIC GLOBAL PERSPECTIVE

Chapter 1: Scope of the road safety problem
Chapter 2: Key developments in road safety

KEY MESSAGES:
• There is a global health crisis
• Road traffic injury is a major global public health problem.
• 1,24 million deaths per year (update from WHO 2016 to 1,3 million).
• Traffic accidents are preventable: Safe System.
PART 2
ROAD SAFETY MANAGEMENT

Chapter 3: The Road Safety Management System
Chapter 4: The Safe System Approach
Chapter 5: Effective management and use of safety data
Chapter 6: Road safety targets, investment strategies, plans and projects

KEY MESSAGES:
- Systematic planned approach
- Political/institutional leadership and commitment
- Evidence-based approach and accountability are key elements for a successful implementation of Safe System.
PART 3

PLANNING, DESIGN AND OPERATION

Chapter 7: Roles, responsibilities, policy development, and programmes
Chapter 8: Design for road user characteristics and compliance
Chapter 9: Infrastructure Safety Management: Policies, standards, guidelines and tools
Chapter 10: Assessing potential risks and identifying issues
Chapter 11: Intervention selection and prioritization
Chapter 12: Monitoring and evaluation of road safety interventions

KEY MESSAGES:
- Road infrastructure is often the single most significant factor that contributes to the severity outcome of a crash.
- Few infrastructure investments produce such high benefits as infrastructure measures targeted at making road safety improvements.
Collaborations and Events on Road Safety
Better togheter

• PIARC is NGO partner of **WHO UN Road Safety Collaboration**

• Support of **UN Global Road Safety Week**
  “Safe lives, slow down”, Santiago de Chile May 2017

• **Vision Zero Conference**, Stockholm June 2017

• Lectern session about RSM at **TRB Annual meeting**, Washington January 2018

• **ITF Summit**, May 2018

• **TRB/PIARC Webinar** on Road Safety, April
PIARC events on Road Safety
Meetings, Seminars, Workshops
Proceedings for free at www.piarc.org

**PILLAR 1: Road safety management**

**September 2016 Rome**
International Workshop "Road safety towards a solution: challenging policies and opportunities from new technologies“

**April 2017 Marrakech**
International Workshop on Policies and Programs for Road Safety Management: „Current Practice and Development Prospective“

**PILLAR 2: Safer roads and mobility**

**November 2017 Teheran**
International Seminar on Policies and Programs for Road Safety Management: „Safe System Approach to enhance Traffic Safety in Iran. Recent Activities and Future Directions.“

**April 2018 Lisbon**
International Conference on Road Safety: „A commitment to the present and a challenge for the future.“

**PILLAR 4: Safe road users**

**May 2017 Santiago de Chile**
International Road Safety Congress: „Road Safety for Connectivity and Productivity“
Seminar Technical Program

• Global road safety progress
  ➢ UN Road Safety Trust Fund
  ➢ PIARC commitment to Road Safety
  ➢ PIARC’s Road Safety Manual: Launch of RSM Chinese version
• Road Safety Policy and Strategy Leadership
• Case Studies of Success
• Safer Infrastructure solutions and evidence base
• Highlights from Road Safety Manual
• Interactive sessions, Q+A
• Roundtable discussions
PIARC CONGRESSES
Save the dates!

26th World Road Congress in Abu Dhabi, United Arab Emirates, 6th – 10th October 2019

16th International Winter Road Congress in Calgary, Canada, 8th – 11th February 2022
Thank you for your attention!

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