

Vision Zero in the United Nations

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Abstract

This chapter examines the development and use of Vision Zero policy and its related strategy, safe system approach, in the road safety programs of the United Nations and its specialized agencies. The chapter shows that progressively, Vision Zero moved from being cited in documents as an example of a transformative policy to being promoted as a way of thinking about or approaching road safety for countries to adopt. In addition, it has been used as a principle in the *Road safety strategy for the United Nations System and its personnel*. This strategy embraces the ethical imperative that "no road users, including pedestrians, should be killed or seriously injured in road crashes involving United Nations vehicles." It commits United Nations organizations to Vision Zero. It calls for a shift from a traditional road safety approach to a safe system approach.

Keywords

United Nations · World Health Organization · United Nations Road Safety Collaboration · Resolutions · Injury · Violence · Vision Zero · Safe system approach · World Health Assembly · United Nations General Assembly

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Introduction

Vision Zero is currently emphasized as an ideal principle or aspiration to pursue in the internal road safety strategy of the United Nations (United Nations 2019). This development shows how Vision Zero has traveled from Sweden and penetrated road safety policy discourse not only in countries and cities but also in international organizations. How did this development happen? How is Vision Zero reflected in the road safety policies and programs of the United Nations? These two questions constitute the focus of this chapter which examines the development and use of Vision Zero as an ideal principle or aspiration in the road safety programs of the United Nations and its specialized agencies. This chapter essentially examines turning points that led to Vision Zero becoming a key principle promoted or emphasized by the United Nations.

Vision Zero and its associated concepts are briefly clarified before moving to the rest of the analysis in this chapter. As already indicated, Vision Zero is a policy that advances the idea of no deaths and injuries on the roads (Belin 2012). Associated with this aspiration are three other concepts: safe system approach, sustainable safety, and Toward Zero. The safe system approach is a holistic and proactive strategy that seeks to realize the aspiration of Vision Zero through managing the elements of the road transport system to prevent crashes and reduce their impact when they occur (International Transport Forum 2016). Sustainable safety is the approach adopted by the Netherlands toward improving its road safety along the lines that Sweden pursued (Peden et al. 2004; Weijermars and Wegman 2011). While some scholars see sustainable safety as the Dutch version of Vision Zero, others perceive the two to be different. The concept of Towards Zero expresses the idea that the emphasis should be on the effort or process toward zero deaths. New Zealand uses the idea of "Road to Zero" in its 2020–2030 road safety strategy (New Zealand Government 2019). There is also an organization with the name "Towards Zero Foundation," seeking to realize the ideal of a world free from road traffic fatalities and serious injuries by promoting safe and sustainable mobility (Towards Zero Foundation 2020). Thus, Vision Zero was a new idea that has inspired other concepts.

Road Safety in the United Nations and Its Specialized Agencies Before Vision Zero

One of the chapters in this handbook discusses the development and adoption of Vision Zero by Sweden in 1997. This section examines road safety in the United Nations before Vision Zero was formulated or adopted. The United Nations and its specialized agencies such as the World Health Organization (WHO) and United Nations Economic Commission for Europe have been concerned about the prevention of road traffic injuries for several years., implying that the recent road safety efforts in the United Nations are part of an evolving policy. A paper on road traffic injury data mentions discussions on road safety at WHO in 1946, when WHO was

formed and inherited the health functions of the health division of the League of Nations (World Health Organization 1972). One of the key roles that the League of Nations played was promoting the need for official road traffic injury statistics, different from general statistics on the causes of death.

Another United Nations agency that was established in 1947 was the United Nations Economic Commission for Europe (UNECE) (2017). UNECE established a transport division in 1947. This division has focused on road safety and other transport topics. It created a Working Party on Road Traffic Injury that has revised several road safety agreements and regulations as needed. The work of UNECE on road safety conventions and agreements is highlighted in different parts of this chapter. UN Economic Commissions in other regions also focus on road safety.

The Geneva Convention on Road traffic was signed on 19 September 1949 in Geneva, Switzerland (UNECE 2017). It entered into force on 26 March 1952, addressing minimum mechanical and safety equipment needed to be onboard, and defines an identification mark to identify the origin of the vehicle (Wikipedia 2020). This and other subsequent conventions became the core work of UNECE.

In 1961, World Health Day, observed every year on seventh April in honor of the date WHO was created, was dedicated to "Accidents and their Prevention." This was followed by a comprehensive report on the epidemiology, control, and prevention of road traffic accidents in 1962 (Norman 1962). This report discussed the nature and dynamics of the problem. It should be noted that WHO has played an important role in the epidemiological analysis of the magnitude and effects of road traffic injuries. For example, mortality from road traffic crashes, with special reference to motor vehicle collisions for the period 1950–1962, was the special subject in the Epidemiological and Vital Statistics Report of 1965.

In 1966, the World Health Assembly, the decision-making body of WHO, adopted resolution WHA19.36 which requested "the Director-General to consider the possibilities of WHO playing a more active role in the prevention of traffic accidents, with special emphasis on human and medical aspects of the problem and on the coordination of international research in this field" (WHO 1966). There was a discussion on road traffic injuries in the WHO Executive Board of 1969 that suggested that WHO should continue its close collaboration with the national, intergovernmental, and nongovernmental organizations working in this field (WHO 1969). These two examples indicate that road traffic injuries received attention from key decision-making bodies at WHO such as the World Health Assembly and Executive Board.

Another key development in the 1960s was the United Nations Conference on Road Traffic held from 7 October to 8 November 1968 in Vienna, Austria. The International Labour Organization, the World Health Organization, and the International Atomic Energy Agency were represented at the Conference in a consultative capacity. A major outcome of this Conference was the signing of the Convention on Road Traffic (UNECE 2017). This convention formed the basis for the work of UNECE, one of whose key activities "is the updating of the existing legal instruments in the field of road transport administered by ECE, such as the Vienna Convention on Road Signs and Signals and on Road Traffic of 1968, and the 1971

European Agreements supplementing them" (UNECE 2008). UNECE has carried on this work over the years and has regularly updated these legal instruments for road safety. There are currently six priority road safety conventions that UNECE and its member countries have produced for Europe and the rest of the world. These are:

- The 1968 Convention on Road Traffic
- The 1968 Convention on Road Signs and Signals
- The 1958 Agreement concerning the adoption of Harmonized Technical United Nations Regulations for Wheeled Vehicles, Equipment, and Parts which are fitted and/or Used on Wheeled Vehicles and the Conditions for Reciprocal Recognition of Approvals Granted on the Basis of these United Nations Regulations
- The 1997 Agreement Concerning the Adoption of Uniform Conditions for Periodical Technical Inspections of Wheeled Vehicles
- The 1998 Agreement concerning the Establishment of Global Technical Resolutions for Wheeled Vehicles, Equipment, and Parts
- The 1957 Agreement Concerning the International Carriage of Dangerous Goods by Road (ADR)

These conventions provide the basis for states to develop national legal frameworks on road safety. In addition to these conventions, UNECE produced a consolidated resolution on road traffic in 2010, aimed at supplementing the 1968 Convention on Road Traffic and the 1971 European Agreement, covering subjects not considered in these conventions (UNECE 2010). Further, the International Transport Forum, EUROSTAT and UNECE produced the fourth edition of illustrated glossary for transport statistics, which includes key definitions on road traffic injuries (International Transport Forum, EUROSTAT and UNECE 2010).

In 1974, the World Health Assembly adopted Resolution WHA27.59, declaring road traffic accidents a major public health issue and calling for Member States to address the problem (WHO 1974). In the 1970s and 1980s, the World Health Organization adopted primary health care as a strategy to address health issues in member states. One of the elements of this strategy was community involved. It is therefore not surprising that a WHO road safety technical report on "New approaches to improve road safety" has an annex on the development of a community-based accident prevention program that emphasizes the role of local accident prevention groups and national accident prevention councils (WHO 1989). There were other road safety efforts going on in the world in the 1980s. For example, the safe community movement, which had origins in Sweden, was established toward the end of the 1980s, following the first World Conference on Accident and Injury Prevention, which was held in 1989 in Stockholm. The safe community movement creation was in line with a major premise of the conference that community-level programs for injury prevention are key to reducing injuries (Rahim 2005).

Administratively, within WHO, there was an effort to decentralize coordination of some global programs from headquarters to regional offices in the 1980s as part of institutional restructuring approach during the leadership of Director-General

Halfdan Mahler. This is the context in which the global coordination of road safety work was conducted by the WHO office of the European region during this period.

There were other external developments in the 1980s and early 1990s that laid the groundwork and provided space for conversations on road safety research and policy. For example, the first conference Road Safety on Four Continents was held in 1987. Within a space of 2 years, as already noted, the first World Conference on Accident and Injury Prevention was held in 1989 in Stockholm. This conference was the mustard seed for a series of World Injury Conferences that are currently a key global forum for interaction and conversations on science, policy, and practice of injury prevention. A conference on vulnerable road users was held in 1991 in New Delhi, organized by the Indian Institute of Technology Delhi and World Health Organization. The conference issued a declaration on vulnerable road users, calling for better planning for these key road users (International Conference on Traffic Safety 1991).

In 1993, the World Health Day, with the theme "Handle life with care" (WHO 1993), was dedicated to violence and injury prevention. Road traffic injury prevention was one of the topics highlighted. The Global Burden of Disease in 1996 projected road traffic injuries to become the third contributor to global burden of disease by 2020 (Murray and Lopez 1996). This study, funded by the World Bank, drew the attention of WHO and its member states to a growing global health problem of road traffic injuries. UNECE continued with its work on road safety conventions and agreements. Other United Nations Economic Commissions also continued with their activities on road safety.

Road Safety in the United Nations and Its Specialized Agencies After Vision Zero

This section examines road safety in the United Nations after Vision Zero was adopted in Sweden. Given the growing attention to road traffic injuries, the World Health Organization established the Department of Injuries and Violence Prevention within the Cluster of Noncommunicable Diseases and Mental Health in March 2000 to facilitate a coordinated response to road traffic injuries and other injuries. For the 17 years prior to this, injuries and violence prevention had been housed as a unit within three consecutive departments: Department of Health Protection and Promotion, the Department of Emergency and Humanitarian Action, and the Department of Disabilities, Injuries Prevention, and Rehabilitation. Road traffic injuries prevention was identified as one of the focal activities for this department. The other was interpersonal violence.

The creation of a department devoted to injuries and violence prevention led to a major change in the focus and approach to road traffic injuries within WHO. In 2001, WHO produced a 5-Year Strategy for Road Traffic Injury Prevention (Peden et al. 2001). It emphasized a public health approach to road traffic injury prevention, consisting of problem definition, identifying and implementing interventions, and evaluating these interventions. The objectives of the strategy were:

• To build capacity at a national and local level to monitor the magnitude, severity, and burden of road traffic injuries

- To incorporate road traffic injury prevention and control into public health agendas around the world
- To promote action-oriented strategies and advocate for prevention and control of the health consequences of motor vehicle collisions

Several road safety activities were undertaken within the framework of this strategy: development of normative documents, implementation of country demonstration projects, and advocacy and revitalization of WHO Helmet Initiative. In 2001, WHO secured financial support from the Federation Internationale de l'Automobile Foundation, which enabled WHO to start supporting pilot road safety programs in five focal countries: Cambodia, Ethiopia, Mexico, Poland, and Vietnam. In addition to projects in the five countries, WHO developed a road safety report between 2002 and 2004. The year 2004 was a significant milestone in the road safety work of WHO since World Health Day 2004 was dedicated to road traffic injury prevention. The theme was "Road Safety," drawing the attention of the world community to the growing problem of road traffic injuries and the need to step up interventions. World Health Day is one of the major advocacy opportunities for public health. Activities were organized at the global, regional, national, and local levels, engaging millions of people worldwide and raising awareness effectively. On that same day, 7 April 2004, WHO launched the World Report on Road Traffic Injury Prevention. The report provided a global reference on the magnitude of the problem and pointed out directions for road traffic injury prevention. There were also regional reports like the one for the European Regional of the World Health Organization that tailored the content and recommendations to issues relevant to the regional settings. The report was used not only as a wake-up call but also as a tool to be used by governments, industry, and civil society in all countries to identify some of the actions they need to take to reduce this burden in their own country. Its six recommendations provided a basic framework of action that road safety stakeholders at national and international levels were expected to pursue (Peden et al. 2004):

- Identify a lead agency in government to guide the national road traffic safety effort.
- Assess the problem, policies, and institutional settings relating to road traffic injury and the capacity for road traffic injury prevention in each country.
- Prepare a national road safety strategy and plan of action.
- Allocate financial and human resources to address the problem.
- Implement specific actions to prevent road traffic crashes, minimize injuries and their consequences, and evaluate the impact of these actions.
- Support the development of national capacity and international cooperation.

The preceding overview highlights that there were several turning points or actions in the United Nations after 1997 that eventually led to Vision Zero being used or promoted as a viable road safety strategy:

- Creation of a department devoted to violence and injury prevention in WHO
- World Health Day 2004 that was dedicated to road safety, on which occasion WHO and the World Bank released the World report on road traffic injury prevention (Peden et al. 2004)
- The initiation of the United Nations Road Safety Collaboration in 2005, coordinated by WHO and UN regional economic commissions
- · Organizing United Nations Road Safety Weeks
- Passing of resolutions on road safety by WHA and UNGA
- Increased focus on road safety by several UN agencies and other organizations
- Decade of Action for Road Safety 2011–2020
- Holding of two/three global ministerial conferences on road safety
- · Implementation of road safety programs in countries
- Appointment of the United Nations Secretary-General's Special Envoy for Road Safety
- Inclusion of road safety in the 2030 Agenda for Sustainable Development (United Nations 2015)
- Development of the Voluntary global performance targets for road safety risk factors and service delivery mechanisms (WHO 2017)

Vision Zero in the United Nations Road Safety Documents and Programs

Vision Zero was cited as an example of a transformative policy in the *World report* on road traffic injury prevention (Peden et al.2004). It is described as a long-term strategy in which improvements are delivered in gradual increments, and where, over time, the responsibility for safety becomes shared by the designers and users of the road traffic system. The report argues that Vision Zero is relevant to any country that aims to create a sustainable road transport system, and not just for the excessively ambitious or wealthy ones. The report further posits that the basic principles of Vision Zero can be applied to any type of road transport system, at any stage of development. The report discusses Vision Zero within a framework of a paradigm shift in road safety policy. Other approaches discussed in the report are Haddon Matrix and public health approach.

The Global Plan for the Decade of Action for Road Safety (WHO 2011) indicated that its guiding principles are those included in the safe system approach. It emphasized that this approach aims to develop a road transport system that is better able to accommodate human error and take into consideration the vulnerability of the human body. The Plan reiterates the key principles of a safe system approach and advances a set of activities to be implemented under five pillars: road safety management, safer roads and mobility, safer vehicles, safer road users, and postcrash care.

In pursuit of the Decade of Action for Road Safety and the objectives of the United Nations Road Safety Collaboration, resolutions were passed by the United Nations General Assembly and World Health Assembly, calling for sustained action and spelling out key activities to be undertaken. Vision Zero is variously highlighted

in these resolutions and other reports such as the United Nations Secretary General's reports on the global road safety crisis.

The safe system approach, a strategy related to Vision Zero, is described as an operational framework in several technical documents providing guidance on interventions. For example, a road safety package produced by WHO in 2017 reiterates that the Safe System Approach provides a viable framework to examine road traffic injury risk factors and interventions from a holistic perspective (WHO 2017). Like the *World report on road traffic injury prevention*, this document highlights the key principles of the Safe System Approach and presents 22 interventions that countries can implement. Examples of other documents that highlight the safe system approach or Vision Zero are pedestrian safety manual (WHO 2013) and powered two-and three-wheeler safety manual (WHO et al. 2017).

Another example of drawing on Vision Zero is in the *Road safety strategy for the United Nations System and its personnel* (UN 2019). This strategy makes explicit reference to Vision Zero, stating: "The strategy embraces the ethical imperative that 'no road users, including pedestrians, should be killed or seriously injured in road crashes involving United Nations vehicles.' The United Nations organizations hereby commit to 'Vision Zero.' The United Nations is engaged in developing a pro-active, forward-looking approach to road safety, which requires managing the interaction between speed, vehicles, road infrastructures and road user behaviours in a holistic manner" (UN 2019:8) It commits United Nations organizations to Vision Zero and calls for a shift from a traditional road safety approach to a safe system approach. It indicates it is based on a safe system approach and presents a set of activities under five pillars: road safety management, safer fleets, safer road users, postcrash response, and safer driving environment.

The trajectory presented in the preceding paragraph shows that, progressively, Vision Zero moved from being cited in documents as an example of a transformative policy to being promoted as a framework for countries to use. In addition, it has been used as a vision in the *Road safety strategy for the United Nations System and its personnel*. Vision Zero is promoted alongside other frameworks such as the public health approach. Vision Zero's emphasis on a system approach and evidence-based solutions is in line with effective solutions and integrated policy-planning perspective at the center of international health and development programs. Resolutions, documents, and strategies by UNRSC, UN, UNGA, and WHA have steadily referred to and used Vision Zero policy and its related strategy of safe system approach as an aspiration and a planning model to be used by organizations, countries, and cities in their road safety programs.

Conclusion

The development of the road safety policy and programs in the United Nations and its specialized agencies such as the United Nations Economic Commission for Europe and World Health Organization has a long history, embedded in both internal and external institutional processes. Policy and programs advance not only specific

interventions to solve a problem but also strategies, visions, and tools for institutions and countries to use. This chapter has traced turning points in the United Nations and its specialized agencies that led to Vision Zero moving from being cited in documents as an example of a transformative approach to being promoted as an ideal for countries to use. In addition, the chapter has shown that Vision Zero has recently been used as a vision in the *Road safety strategy for the United Nations System and its personnel*. This strategy embraces the ethical imperative that "no road users, including pedestrians, should be killed or seriously injured in road crashes involving United Nations vehicles." It commits United Nations organizations to Vision Zero. It calls for a shift from a traditional road safety approach to a safe system approach. The contribution of this chapter is in examining processes and contexts that either favor or hinder the promotion of a strategy or framework in an international context, in this case Vision Zero in the United Nations.

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