

Special Feature: Progress and Future Prospects Regarding Traffic Safety Measures Preface

The topic of the Special Feature in the White Paper on Police 2017 is “The Progress and Future Prospects Regarding Traffic Safety Measures”.

Traffic accidents have been the cause of an extensive loss of lives, physical injuries and significant damage to property and the police have been working together with related agencies and organizations to ensure that adequate traffic safety measures are in place to protect people from traffic accidents.

Numerous efforts have been made at all levels, such as the police undertaking repeated revisions to the Road Traffic Act, making improvements to traffic safety education and facilities and promoting traffic safety guidance and traffic enforcement, related organizations undertaking the necessary measures and both the government and people of Japan actively working to prevent traffic accidents. Through these concerted efforts, the traffic accident situation has improved significantly compared to a period known as the time of the “Traffic War” during which the number of traffic fatalities exceeded 10,000 people annually.

Despite these efforts, the fact remains that many precious lives are still lost in traffic accidents. Particularly in recent years, the rate at which traffic fatalities are declining has slowed, in part due to the growing elderly population, which adds more challenges to the present day traffic situation.

Under these circumstances, the Japanese government has decided to further strengthen its promotion of traffic safety measures by implementing the 10th Fundamental Traffic Safety Program prepared in March 2016. The Program lays out the objective to “achieve the safest road transport in the world by reducing the number of fatalities within 24 hours after a traffic accident to less than 2,500 by the year 2020” while ultimately aiming to realize a society without traffic accidents under the people-first traffic safety philosophy. In order to achieve this goal, it is not only necessary to further enhance existing measures but also to develop new measures for a new era to which a wide range of expert knowledge is actively incorporated.

When planning and formulating these measures, conducting traffic accident analyses is a prerequisite. All measures developed to prevent traffic accidents must be promoted more effectively and efficiently through a process so-called PDCA cycle, where the implementation of detailed measures to prevent traffic accidents taking into account the specificities of regions based on the results of advanced and sophisticated traffic accident analyses and the reflection of the verification results on the effects of these measures in the subsequent measures are concurrently conducted.

With the rising proportion of the elderly in the total number of traffic accident fatalities in Japan as well as the increasing number of fatal traffic accidents involving elderly drivers, developing and implementing countermeasures has become an urgent issue for Japan, as it faces a super-aging society.

Especially in recent years when domestic and overseas automated driving technologies are developing at a rapid pace, it is extremely important to promote the widespread use of advanced technologies that contribute to ensuring traffic safety to further reduce traffic accidents and realize a society free of traffic accidents.

In this special feature, Section 1 introduces the current status of traffic accidents and new goals in traffic safety measures while outlining the changes in traffic accidents. Section 2 looks back at the changes in the traffic safety measures undertaken until now and Section 3 introduces the efforts of the police for ensuring safe and smooth traffic conditions. Then, Section 4 describes the future prospects of traffic safety measures.

Tragic and cruel traffic accidents cannot be eradicated only by the efforts of the police. It is extremely important for society as a whole to promote traffic safety measures with the understanding and cooperation of the related agencies and organizations as well as every person. This special feature will help people to deepen understanding of the efforts of the police in Japan and think about traffic safety measures going forward.

Special Feature: Progress and Future Prospects Regarding Traffic Safety Measures

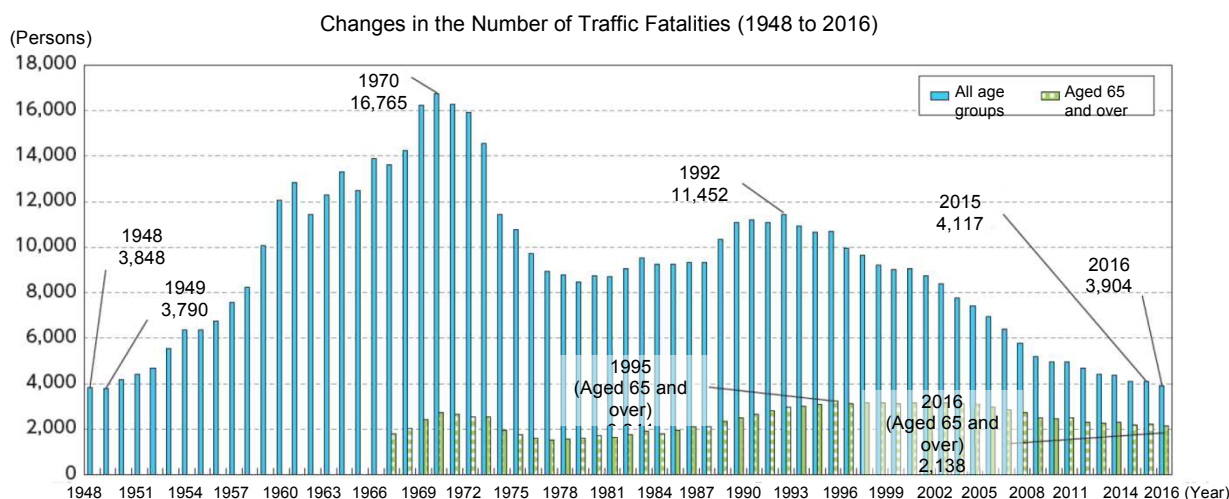
Section 1: Current Status of Traffic Accidents

1. Changes in Traffic Accidents

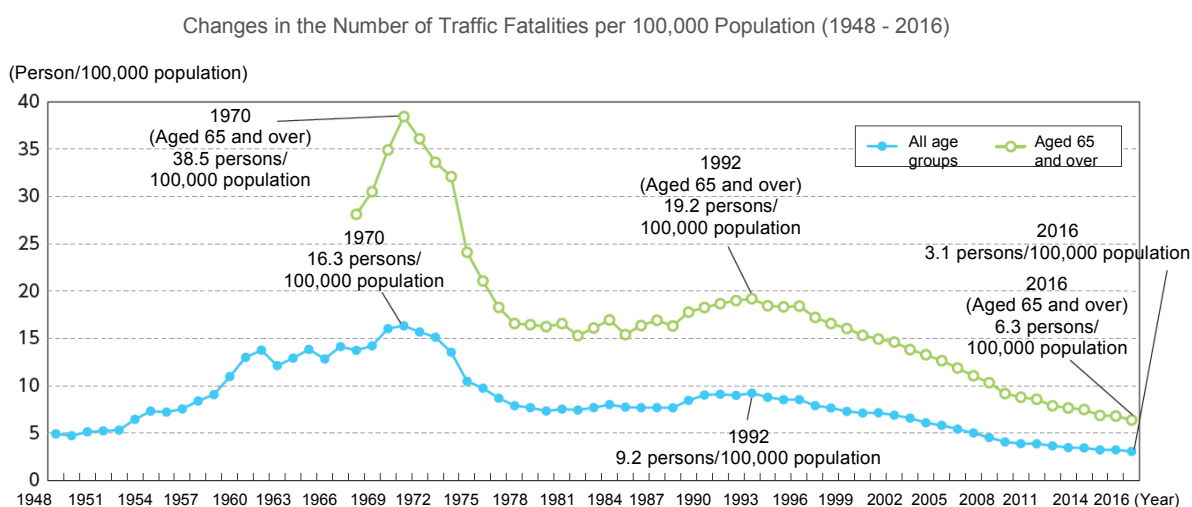
Japan experienced a rapid increase in the number of traffic accidents around 1955, which was partly due to the insufficient development of roads and traffic safety facilities, including traffic lights and road signs, against the rapid progress of post-war motorization. In 1970, the yearly traffic fatalities in Japan peaked at 16,765 and the period was named the “Traffic War” which reflects the serious situation.

The number of traffic fatalities tended to decrease due to the comprehensive promotion of traffic safety measures; however, it began to increase again in 1980, exceeding 10,000 fatalities again in 1988 and consequently was named the “Second Traffic War”. The increase was partly due to a lack of budget for increasing the number of traffic officers and promoting projects to improve traffic safety facilities while the number of driver’s license holders and vehicle ownership steadily increased every year as the period was known as the era of which all the nations are licensed drivers.

In 1992, the number of traffic fatalities reached the second highest peak at 11,452 and since then, the number has been decreasing due to the strengthened traffic safety measures; however, the rate at which traffic fatalities are declining has slowed in recent years, in part due to the growing elderly population. In 2015, the number of traffic fatalities was 4,117, an increase from the previous year for the first time in 15 years and the same number in 2016 was 3,904, a decrease to the 3,000 level for the first time in 67 years since 1949.



Note: Figures before 1971 do not include fatalities in Okinawa Prefecture.



Note 1: The population used in the calculation is based on the Population Estimates (population before the intercensal adjustment of population estimates as of October 1 of each year) or the Population Census by the Statistics Bureau, Ministry of Internal Affairs and Communications.

Note 2: Figures before 1971 do not include fatalities in Okinawa Prefecture.

2. Traffic Accidents in 2016

(1) Overview

The number of traffic accidents and injured persons decreased for 12 consecutive years leading up to 2016. In 2016, compared to 2007, the number of fatalities, the number of fatalities of persons aged 65 and over and the number of fatalities per 100,000 population decreased by 32.6%, 22.2% and 38.9% respectively. However, the number of fatalities of persons aged 65 and over has remained at about twice the rate of all other age groups, with its proportion to the total number of fatalities starting to increase in 2012, reaching a record-high level in 2016 at 54.8%.

Overview of Traffic Accidents (2016)

- Number of traffic accidents 499,201 (a decrease of 37,698 (7.0%) over the previous year)
- Number of fatalities 3,904 (a decrease of 213 (5.2%) over the previous year)
- Number of injured persons 618,853 (a decrease of 47,170 (7.1%) over the previous year)
- Number of fatalities within 30 days from the time of accident
..... 4,682 (a decrease of 185 (3.8%) over the previous year)

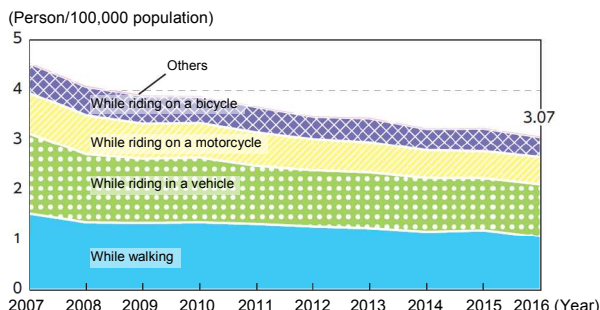
Proportion of Persons Aged 65 and over in the Total Number of Fatalities (2007 to 2016)

Year	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Ratio (%)	47.4	48.4	49.9	50.3	49.2	51.4	52.6	53.3	54.6	54.8

(2) Fatalities by Situation/Type

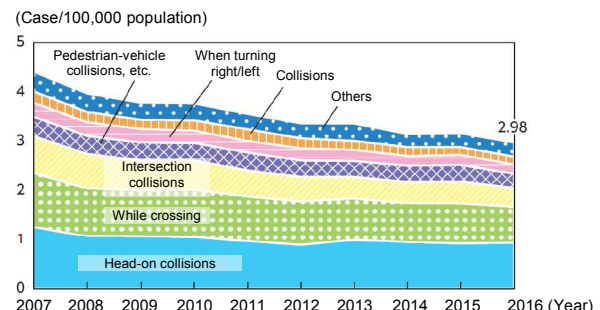
Looking at the number of fatalities per 100,000 population by situation, most fatalities occurred while walking and riding in a vehicle. Looking at the same number by type, most fatalities occurred due to head-on collisions, while crossing and due to intersection collisions.

Changes in the Number of Fatalities per 100,000 Population by Situation (2007 to 2016)



Note 1: The population used in the calculation is based on the Population Estimates (population before the intercensal adjustment of population estimates as of October 1 of each year) or the Population Census by the Statistics Bureau, Ministry of Internal Affairs and Communications.
2: "Motorcycle" means motorcycles and mopeds.
3: "Others" mean fatalities that occurred while using bicycle-drawn carts, etc.

Changes in the Number of Fatalities per 100,000 Population by Type (2007 to 2016)



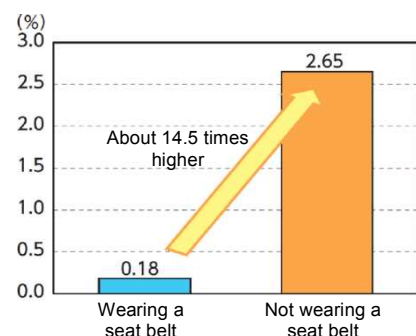
Note 1: The population used in the calculation is based on the Population Estimates (population before the intercensal adjustment of population estimates as of October 1 of each year) or the Population Census by the Statistics Bureau, Ministry of Internal Affairs and Communications.
2: "Pedestrian-vehicle collisions, etc." mean vehicles colliding with pedestrians while the pedestrian's back is facing the flow of traffic, while facing the flow of traffic head-on and while lying down on the street.
3: "Others" mean collisions that result from unsuccessful passing by changing lanes/not changing lanes, rollovers, train accidents, etc.

(3) Fatalities of Vehicle Occupants

Looking at the number of fatalities of vehicle occupants by seat, that of the drivers and front-seat occupants has significantly decreased. The number of fatalities of rear-seat occupants has also decreased but at a slower rate.

Moreover, of all fatalities of vehicle occupants that occurred in 2016, the proportion of those who were not wearing a seatbelt was the highest for rear-seat occupants at 57.0%, followed by drivers at 41.2% and front-seat occupants at 27.1%. The fatality rates in 2016 by use and non-use of seatbelts revealed that the fatality rate was about 14.5 times higher for vehicle occupants who did not use a seatbelt than for those who did.

Fatality Rates by Use/Non-use of Seatbelts (2016)



3. Analysis of Traffic Accidents

(1) Fatal Accidents Caused by Head-on Collisions

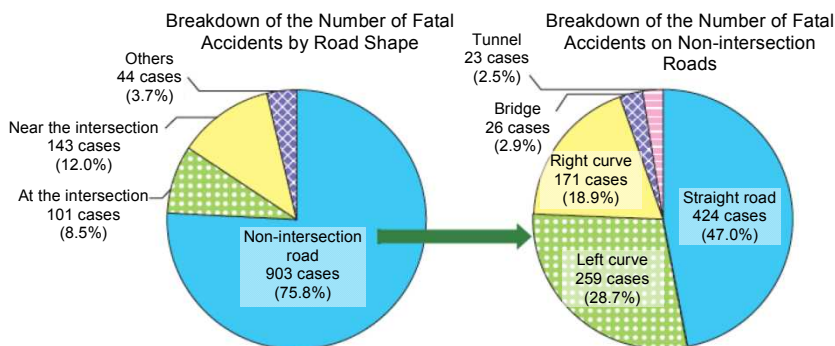
Approximately 80% of fatal accidents caused by head-on collisions occur on non-intersection roads, with about half of the cases occurring on straight roads and the other half on left and right curves.

Of these fatal accidents that occur on non-section roads, the proportion of drivers aged 65 and over is relatively high in those that occur on straight roads whereas the proportion of drivers aged under 65 is relatively high in those that occur on left and right curves, regardless of the time of day.

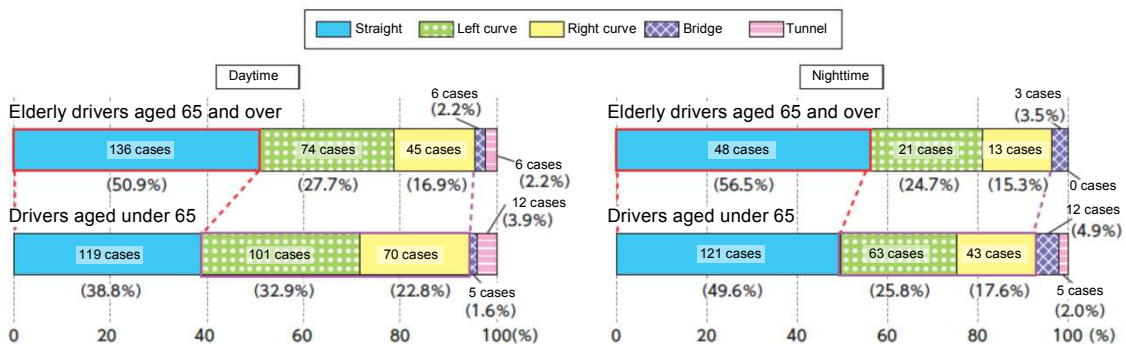
Based on the analysis of danger recognition speed and human elements, the following factors can be assumed:

- Drivers aged 65 and over have a proclivity to cause fatal accidents on straight roads due to reasons such as improper driving and careless driving;
- Drivers aged under 65 have a proclivity to cause fatal accidents on left and right curves due to excess speed.

Breakdown of Fatal Accidents Caused by Head-on Collisions (2016)



Breakdown of the Number of Fatal Accidents on Non-intersection Roads by Daytime/Nighttime

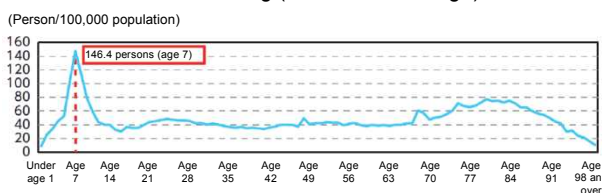


(2) Traffic Accidents Involving Children

The number of fatalities of children aged 15 and under in 2016 was 74 and breaking it down by situation, 44.6% of fatalities occurred while walking and 23.0% while riding on a bicycle.

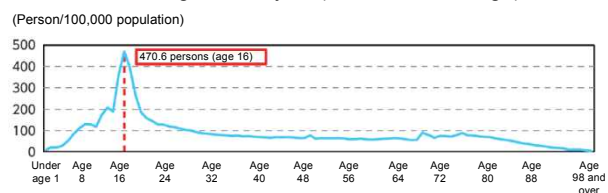
Looking at the number of fatalities per 100,000 population between 2012 and 2016 by age, it was prominently high in fatalities that occurred while walking by children aged 7 and while riding a bicycle by those aged 16.

Number of Fatalities per 100,000 Population that Occurred While Walking (2012-2016 average)



Note: The population used in the calculation is based on the Population Estimates (as of October 1, 2014) (before the intercensal adjustment) by the Statistics Bureau, Ministry of Internal Affairs and Communications.

Number of Fatalities per 100,000 Population that Occurred While Riding on a Bicycle (2012-2016 average)



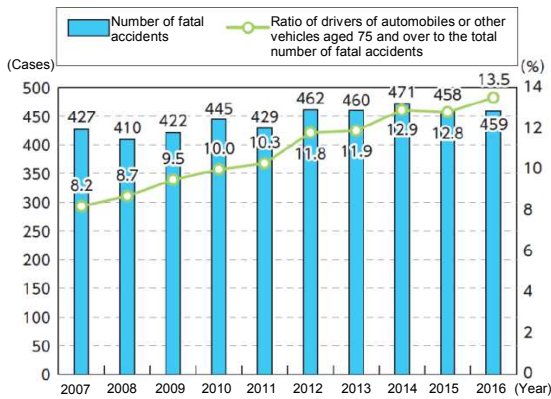
Note: The population used in the calculation is based on the Population Estimates (as of October 1, 2014) (before the intercensal adjustment) by the Statistics Bureau, Ministry of Internal Affairs and Communications.

(3) Fatal Accidents Caused by Elderly Drivers

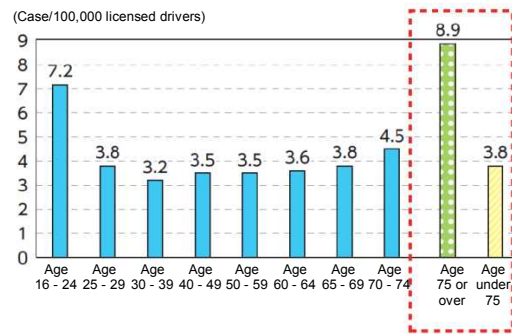
The number of fatal accidents caused by drivers aged 75 and over remains unchanged over recent years, however, the proportion of these drivers is increasing due to the overall decline in the number of fatal accidents.

Looking at the number of fatal accidents per 100,000 licensed drivers by the age group of primary parties, 8.9 fatal accidents were caused by drivers aged 75 and over, which is more than double compared with drivers aged under 75.

Changes in the Number of Fatal Accidents Caused by Drivers of Automobiles and Other Vehicles Aged 75 and over (2007 – 2016)



Number of Fatal Accidents per 100,000 Licensed Drivers by Age Group of Drivers of Automobiles and Other Vehicles (Primary Parties) (2016)

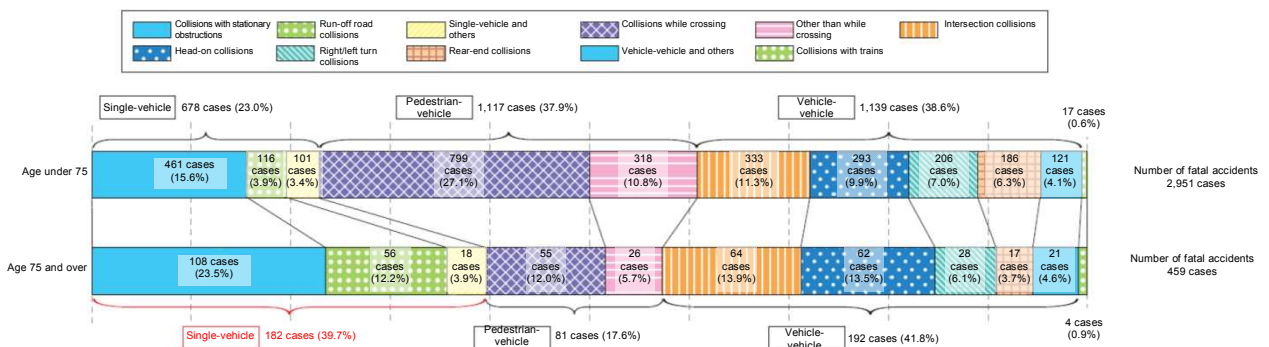


Note: The population of licensed drivers used in the calculation is the value as of the end of 2016.

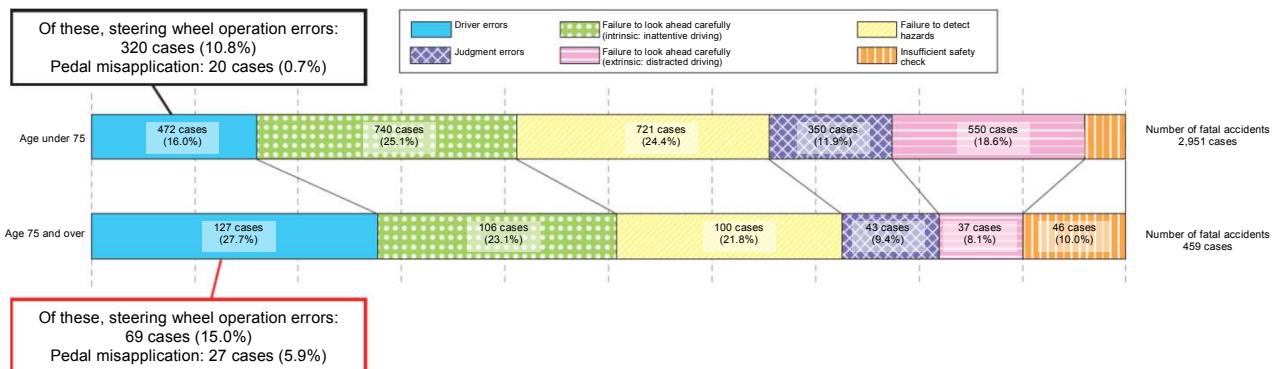
Fatal accidents in 2016 that were caused by drivers of automobiles and other vehicles aged 75 and over revealed the following facts:

- Approximately 80% of the accidents occurred during the daytime and 98% on ordinary roads;
- By accident type, collisions that occurred most frequently were collisions with stationary obstructions, followed by intersection collisions and head-on collisions. Compared to drivers aged under 75, the proportion of single-vehicle collisions was higher in this age group.
- By human factor, driver errors were the most frequently observed. Compared to drivers aged under 75, the proportion of pedal misapplication in which drivers mistakenly step on the accelerator pedal instead of the brake pedal, was higher in this age group.

Breakdown of the Number of Fatal Accidents by Type of Drivers of Automobiles and Other Vehicles (Primary Parties) (2016)



Breakdown of the Number of Fatal Accidents by Human Element of Drivers of Automobiles and Other Vehicles (Primary Parties) (2016)



4. New Goals in Traffic Safety Policies

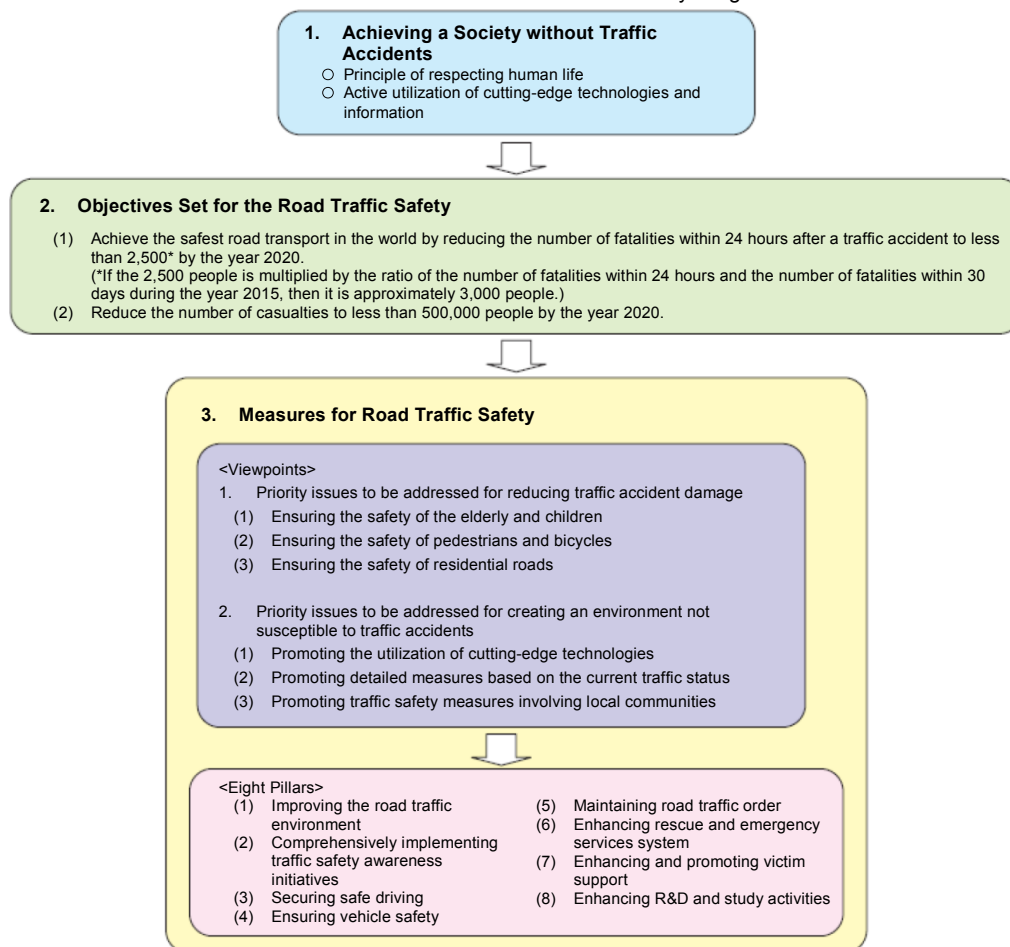
Japan experienced an enormous increase in the number of traffic accidents following the rapid growth of automobile traffic volume after the war. In response to this, the government identified developing and implanting adequate traffic safety measures as an important policy issue that all administrative sectors must address in collaboration with each other. Through the establishment of the Traffic Accident Prevention Headquarters headed by the Chief Cabinet Secretary in 1955, the Traffic Safety Policies Basic Act was enacted in 1970 and the Central Traffic Safety Policy Council was established with the Prime Minister serving as the Chairman under the same Act.

The Central Traffic Safety Policy Council has issued a Fundamental Traffic Safety Program once every five years since 1971, which is composed of the basic principles, basic viewpoints, objectives and measures. In the 8th Fundamental Traffic Safety Program implemented during the five-year term from 2006 to 2010, one of the objectives set was to reduce the number of fatalities to 5,500 or less by 2010. This objective was achieved in 2008 and the Statement by the Prime Minister (Chairman of the Central Traffic Safety Policy Council) released in 2009 declared the government’s intention to further reduce the number of fatalities by half over the next 10 years from 2009 onwards. As a result, a new objective to reduce the number of fatalities to 2,500 or less by 2018 was set.

In the 9th Fundamental Traffic Safety Program implemented during the five-year term from 2011 to 2015, one of the objectives set was to reduce the number of fatalities to 3,000 or less by 2015. However, the objective was not achieved due to the number of fatalities reaching 4,117 in 2015.

Under these circumstances, the 10th Fundamental Traffic Safety Program was formulated in March 2016 after deliberations on the basic policies regarding road traffic safety in the future based on the public opinions and requests obtained from the policy evaluation, public comment procedure and public hearing organized by the Cabinet Office concerning the Program.

Outline of the 10th Fundamental Traffic Safety Program



Section 2: History of Traffic Safety Policies

(1) Formation of the Basic Framework for Traffic Safety Policies

To improve the chaotic conditions of road traffic after the war, the Road Traffic Control Act was enacted in 1947, which aimed at “preventing dangers on the road and ensuring the safety of traffic”, and the basic rules of road traffic were established under the Act.

At the beginning of the enactment of the Act, the general rule was that pedestrians kept to the left side of the road, which was the same as the horse-drawn carts; however, the new bidirectional traffic which assigned “people to the right and vehicles to the left” was adopted after a partial revision of the same Act in 1949 to make the traffic flow in a safer and more reasonable way when walkways and roads were still not sufficiently separated.

After failing to keep pace with changes in road traffic conditions and the inadequacies of the provisions being pointed out, the Road Traffic Control Act was abolished in 1960. Then, the Road Traffic Act was enacted which aimed at “preventing dangers on the road and ensuring the safety and smooth flow of traffic” and since then, the Act has undergone numerous revisions in accordance with the traffic situation of the times.

(2) First Traffic War and the Efforts of the Police

Around 1955, automobile traffic in Japan stepped into a rapid growth period. Before then, the main type of vehicles on the road had been cargo trucks, however, the ownership of other types of vehicles started to increase, particularly motorcycles from 1955 and passenger vehicles from 1965. In 1970, vehicle ownership stood at approximately 18.59 million units, which was a thirteen-fold increase since 1955, and along with vehicle ownership, the number of individuals holding a driver’s license and the number of vehicle-kilometers travelled continued to increase significantly.

In parallel with these trends, road improvement also progressed where the total length of road extension exceeded 1 million km in 1969 and the distance of national expressways in service continued to increase.

The rapid growth of automobile traffic has greatly contributed to improving social, economic and everyday conditions of people’s lives; however, it also led to the period of sudden increase of traffic accidents, known as the “Traffic War”, with the number of fatalities reaching a record high of 16,765 in 1970.

During the period from 1950 to 1979, the police primarily focused their efforts on strengthening the traffic enforcement on traffic violations and promoting the improvement of traffic safety facilities and traffic safety education.

(3) Second Traffic War and the Efforts of the Police

The number of fatalities, which began to decrease after reaching its peak in 1970, started to increase again in 1980, reaching the 10,000 mark for a second time in 1988. The trend continued, earning the name of the “Second Traffic War”, eventually reaching 11,452 fatalities in 1992.

During this period, vehicle ownership continued to increase, although the growth rate declined gradually, and the number of vehicle-kilometers travelled also continued to increase. Starting in 1975 the main types of vehicles seen on the road shifted from cargo trucks and motorcycles to passenger vehicles. Moreover, the number of individuals holding a driver’s license continued to increase.

During the period from 1980 to 2007, the police primarily focused their efforts on improving driver education and the driver’s license system, strengthening measures to mitigate traffic accident damage and to combat malicious and dangerous drivers and promoting measures to tackle illegal parking of vehicles and bicycles.

(4) Recent Efforts of the Police

The number of fatalities, which began to decrease after reaching its 2nd peak in 1992, was down to the 4,000 level in 2009 for the first time in 57 years.

The trend has continued since then, dropping further to the 3,000 level in 2016 for the first time in 67 years, however, the rate at which traffic fatalities are declining has slowed, in part due to the growing elderly population.

Since 2008, the police primarily focused their efforts on promoting measures for elderly drivers, drivers with illnesses exhibiting certain symptoms, driving without a license and traffic enforcement/speed regulations that contribute to ensuring traffic safety on school roads and preventing traffic accidents.

Proposals Concerning the Ideal Status of Crackdown and Speed Regulations to Contribute to Preventing Traffic Accidents (Overview)

Shared Understanding of the Proposal

- Necessity of Speed Control
 - Examining the status of traffic accidents and the relationship between crackdowns and traffic accidents, the reduced speed of vehicles is linked to a reduction in damage from traffic accidents. Therefore, appropriate speed control through means such as speed regulations and crackdowns is necessary to reduce the number of fatalities.

Speed Regulations and Other Measures that Help to Prevent Traffic Accidents

- Concepts for the review of speed regulations for regular roads
 - For regular roads, a low-speed regulation (20 km/hour) that covers a wide area and is easy to understand for drivers should be further promoted.
 - For regular roads, taking into account the status of traffic accidents and other factors, roads with speed limits of 40km/h and 50km/h, and particularly those with speed limits that are significantly different from the speed of actual driving (Rte) should be reviewed periodically.
- Speed regulations for highway
 - Including the Shin-Tomei Expressway, the maximum speed limit on high-standard highways with a design speed of 120 km/h and at least 3 lanes on each side should be given an immediate review concerning the raising of the speed limit to a level exceeding 100 km/h (the review should also cover issues such as safety matters that need to be investigated/verified and the importance of the formulation of regulatory requirements).
 - In addition to these proposals on "raising the policies on speed control with the public" and "measures to promote safe traffic behavior" should also be made.

Crackdowns that Help to Prevent Traffic Accidents

- Speeding crackdowns that help to prevent traffic accidents
 - In addition to well-known measures that are carried out, it is assumed that the introduction of devices that allow the police to conduct crackdowns on individual roads with limited space and during the hours when assigning police officers may be difficult such as late night hours.
 - The practice of the "PCA Cycle" through which the location and time bases of crackdowns are selected based on the analysis results of the status of previous traffic accidents and such locations and time frames are regularly reviewed.
 - All practices intended to prevent traffic accidents, crackdowns, such as those based on the results of the analysis of traffic accidents and conducted to catch offenders off guard, and activities, such as patrolling by police resources, are expected to be carried out in a well-balanced way.
- Information dissemination of the policies of crackdown control
 - After the presenting of police on speed control by individual police, the policies on the crackdown control of the maximum speed limit violation clearly indicating the roads and time zones for intensive crackdowns on such violation should be presented based on the results of the analysis of traffic accidents and other factors.

Matters to be Further Promoted for the Future Measures to Prevent Traffic Accidents

- Further strengthening crackdowns on malicious and dangerous traffic violations and reducing "gentle" collaboration with town development, "promotion of traffic safety education for people other than drivers" and "implementation of appropriate evaluation of police duties that contribute to the prevention of traffic accidents" should also be further promoted.

Note: For example, when 100 units of vehicles that travel a certain section are arranged in descending order of the traveling speed, the speed of the 85th vehicle.

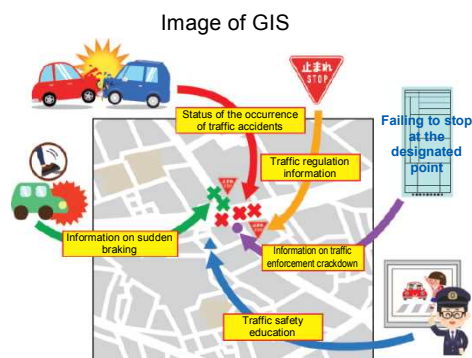
Section 3: Efforts of the Police for Ensuring Safe and Smooth Traffic Conditions

1. Efforts for the Advancement and Refinement of Traffic Accident Analysis

The traffic accident situation has improved significantly through the implementation of comprehensive traffic safety measures.

Nonetheless, the rate at which traffic fatalities are declining has slowed in recent years, in part due to the growing elderly population. Therefore, we must analyze the area in which accidents occur, the locations at which they occur, their forms, and other factors based on detailed data and then implement more fine-tuned measures effectively and efficiently.

In FY2014 and FY2015, the National Police Agency (NPA) conducted surveys to establish a traffic accident analysis method using GIS (Geographical Information System). The method aims at achieving more effective planning and formulation of traffic safety measures, efficient implementation of these measures and objective evaluation of the results by displaying various data—traffic measures such as traffic regulations and traffic enforcement and other information such as the status of traffic accidents—on top of the road image displayed to clarify their relationships that were not previously recognized.



Prefectural police are conducting traffic accident analyses that take their regional circumstances into account by utilizing GIS and other tools. These analyses are also based on the results of the NPA's surveys and are intended to promote effective and efficient traffic safety measures within budgetary and personnel limitations.

2. Boosting Traffic Safety Awareness

(1) Ensuring the Safety of Children

The police are promoting stepwise and systematic traffic safety education according to the physical and mental developmental stages of children. For example, the police provide traffic safety classes for toddlers in collaboration with kindergartens, nursery schools and parents, also, traffic safety classes for elementary school children and bicycle safety classes for junior high school students in collaboration with their schools and PTAs.

(2) Ensuring the Safety of the Elderly

In order to provide an opportunity to receive traffic safety education for the elderly who do not possess driver's licenses, the police, cooperating with related agencies and other organizations, provide guidance calling for observance of traffic rules and conduct publicity/enlightenment activities. The police also provide participation, experience and practice-based traffic safety education that fully utilize various educational instruments to help the elderly understand how changes in their physical functions due to aging affect their behaviors.

(3) Promoting Safe Usage of Bicycles

The number of bicycle-related accidents is on a declining trend; however, it still accounts for approximately 20% of all traffic accidents.

In 2016, the number of fatalities on bicycles was 509, which was a decrease of 63 people (11.0%) from the previous year; however, looking at these fatalities by legal violation, approximately 80 of these people committed certain legal violations, particularly inattentive riding and improper riding being the most prevalent violations.

The police, cooperating with schools and other organizations, are working to enhance and promote bicycle safety education for children and students by providing participation, experience and practice-based bicycle safety classes that use a bicycle simulator and other tools.

In addition, since June 2015, the police have been providing the Cyclists Training Course for cyclists who have repeatedly committed certain violations that may cause traffic hazards. In 2016, 80 cyclists who have repeatedly engaged in risky riding behaviors such as ignoring traffic lights and riding faulty bicycles (such as those without brakes) attended the Course.

(4) Efforts of the Police to Eradicate Drunken Driving

In 2016, after a decrease for 16 consecutive years, the number of traffic accidents caused by drunken driving was 3,757. However, the number of fatal accidents caused by drunken driving increased from the previous year.

Drunken driving is an extremely malicious and dangerous offense whose fatality rate is 8.4 times higher than all other causes.

The police are actively informing and educating the public with accurate information about the dangers of drunken driving, the reality of tragic traffic accidents caused by drunken driving and alcoholism that leads to drunken driving. The police are also promoting traffic safety education to help people deepen their understanding of the impacts of drinking and driving.

Moreover, the police have requested related industries to take measures to prevent drunken driving and are also working to, in collaboration with related agencies and organizations, enhance the public consciousness of “never drink and drive and never let anyone drink and drive” by promoting public participation in campaigns such as the “designated driver campaign”.

[Column] Review of Speed Regulations on High-standard Highways

In March 2016, the “proposals concerning the review of speed regulations on high-standard highways” were compiled by the Research Committee.

The proposals highlighted the possibility of raising the current speed limit to that exceeding 100 kilometers per hour for some sections of the high-standard highways that meet certain conditions. These high-standard highways are those whose structurally allowed maximum speed limit is 120 kilometers per hour. Based on these proposals, it was decided that the speed limit be raised on a trial basis for the section from the Shin-Shizuoka IC to Morikakegawa IC of the Shin-Tomei Expressway and the section from the Hanamaki-Minami IC to Morioka-Minami IC of the Tohoku Expressway.

3. Ensuring Safe Driving by Detailed Measures for Drivers

(1) Promoting Measures to Prevent Traffic Accidents Involving Elderly Drivers

The Act on Partial Revision of the Road Traffic Act (hereinafter referred to as the “revised Road Traffic Act”), which included the improvement of provisions aimed at promoting measures for elderly drivers, came into force in March 2017. Under the revised Road Traffic Act, drivers aged 75 and over who have committed certain traffic violations are required to undergo an occasional cognitive test apart from the test at the time of renewal of driver’s licenses and those whose test results have deteriorated compared to the immediately prior test results are required to take a traffic safety class for elderly drivers.

Moreover, drivers aged 75 and over who are deemed as possibly having dementia based on the cognitive test taken when they renewed their licenses or committed certain traffic violations are obliged to seek an assessment by a doctor regardless of the status of their traffic violations.

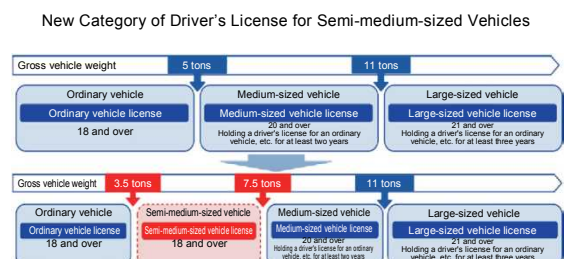
(2) Detailed Measures for Various Drivers

1) Improving Driving Capability Consultations

In order to make an individual assessment of whether or not drivers with disabilities and illnesses exhibiting certain symptoms are capable of driving automobiles or other vehicles in a safe manner, the police established driving capability consultation offices in the Driver’s License Centers, providing consultations to drivers themselves as well as their family members. Driving capability consultation offices are staffed with personnel having extensive expert knowledge and are arranged with careful consideration to protect the privacy of people visiting for consultation. Moreover, while working closely with patient groups, medical associations and other organizations, various efforts are being made to enrich the quality of consultations such as introducing medical specialists to people who sought consultation as necessary.

2) Measures to Prevent Traffic Accidents for Trucks

Based on the revised Road Traffic Act, a new category of driver’s license for semi-medium-sized vehicle was created which can be acquired by anyone who is aged 18 and over. The new license category was created as part of the measures to prevent traffic accidents involving trucks and also to meet a social demand for the necessity of a driver’s license which allows young people to drive trucks.



[Column] Holding the Expert Advisory Council Meeting on Measures to Prevent Traffic Accidents by Elderly Drivers

In light of the current status of fatal traffic accidents caused by elderly drivers, a meeting of the “Ministerial Council on Measures for the Prevention of Traffic Accidents by Elderly Drivers” was held in November 2016 to combat such traffic accidents through concerted efforts of the government. At the meeting, Prime Minister Abe delivered an address in which he instructed cabinet ministers to work on “smooth enforcement of the revised Road Traffic Act”, “development of systems through which the lives of the elderly are supported by society as a whole” and “review of the necessity of further measures”. Then, in the same month, the “Working Group for Measures to Prevent Traffic Accidents by Elderly Drivers” consisting of director generals and other officials from relevant ministries was established under the Traffic Safety Headquarters of the Central Traffic Safety Policy Council. The Working Group is aimed at accelerating the review of the relevant administrative organs on further measures for the prevention of traffic accidents by elderly drivers and promptly taking measures based on the results of such review.

Since January 2017, the NPA has been holding the Expert Advisory Council Meeting on Measures to Prevent Traffic Accidents by Elderly Drivers consisting of academic experts in law, sociology, automobile engineering, traffic psychology and other fields and representatives of related organizations such as medical and welfare organizations. Based on a detailed analysis of traffic accidents involving elderly drivers and the opinions of experts, the NPA is making extensive studies on the measures necessary for preventing traffic accidents associated with the characteristics of elderly drivers through these meetings.

4. Traffic Environment Improvement

(1) Traffic Environment Improvement Based on the Current State of Traffic Infrastructure

In order to ensure a safe and smooth traffic flow, the police are working to improve traffic safety facilities such as traffic lights and road signs.

From FY2015 to FY2020, the police will be promoting the improvement of traffic safety facilities in a prioritized, effective and efficient manner according to the 4th Priority Plan for Social Infrastructure Development, which is implemented during the same period.

Meanwhile, recognizing the issue of deteriorating traffic lights and other traffic facilities that have been in service for a long time after their last maintenance, the NPA formulated its Action Plan for Life Extension of Infrastructure in March 2015. The Action Plan clarified the directionality of mid- and long-term approaches required to steadily promote maintenance and other updates of police facilities based on the Basic Plan for Extending Service Life of Infrastructure formulated at the meeting of the Liaison Council for Ministries Involved in Promotion of Measures on Extending Service Life of Infrastructure in November 2013.

In line with these plans, the police are working on management of stock and reduction of life-cycle costs in a planned way by updating facilities from a mid- and long-term perspective, removing facilities with deteriorating effects due to changes in the traffic environment and extending the service life of facilities.

[Column] Developing Easy-to-understand Road Signs for Foreign Drivers

As the number of foreign visitors is continuing to increase and Japan is gearing up for the 2020 Tokyo Olympics and Paralympics, the NPA partially revised the Order Concerning Road Signs, Demarcation Lines and Road Markings in April 2017 to develop easy-to-understand road signs for both foreign and domestic drivers, and the revised Order was enacted in July of the same year.

As a result of this revision, a regulatory coming-to-a-stop sign will be listed with both the Japanese word “Tomare” and its English translation “STOP” underneath and likewise, a regulatory driving-at-reduced-speed and yield-ahead sign will be listed with both the Japanese word “Joko” and its English translation “SLOW” underneath.



New Bilingual Signs

(2) Promotion of Intelligent Transport Systems (ITS) and Efforts toward the Realization of Automated Driving

1) Promotion of ITS

To optimize traffic control by using cutting-edge information and communication technology and other advanced technologies, the police are working to realize a safe, smooth and comfortable traffic society with a low environmental load by promoting ITS through the development and improvement of the Universal Traffic Management Systems (UTMS) utilizing the function of infrared beacons and other systems.

2) Efforts toward the Realization of Automated Driving

Automated driving technology is expected to contribute to preventing traffic accidents and alleviating traffic congestion, and the police are actively working to support the progress of such technology.

In February 2016, it was approved at the Inland Transport Committee of the Economic Commission for Europe under the United Nations Economic and Social Council that Japan would become a full member of the Global Forum for Road Traffic Safety (WP1) that discusses the consistency between automated driving and international treaties. The NPA aims at early realization of fully automated driving through participation in the WP1 and other international discussions.

Moreover, the NPA has been working on a variety of legal and policy issues regarding the realization of automated driving by inviting experts since October 2015. The NPA formulated and published the “Guidelines for Public Road Testing of Automated Driving Systems” in May 2016 which laid out matters to be considered from the perspective of ensuring a safe and smooth traffic flow and the “Criteria for the permission for use of road for public road testing of Driving Automation System with remote Control Technology” in June 2017.

5. Maintenance of Road Traffic Order

(1) Traffic Enforcement Contributing to the Prevention of Traffic Accidents

1) Traffic Enforcement Based on the PDCA Cycle

Based on the Proposal for Traffic Enforcement and Speed Regulations Contributing to the Prevention of Traffic Accidents, the police are promoting traffic enforcement that contribute to the prevention of traffic accidents by making use of the PDCA cycle, where the situations of traffic accidents are analyzed, traffic enforcement policies such as the time and location are formulated, traffic enforcement is conducted systematically, the effects of traffic enforcement are verified and the verified results are reflected in the subsequent measures.

Moreover, in order to deepen the public’s understanding on the necessity for traffic enforcement, the police have formulated guidelines of speed enforcement based on the situations of traffic accidents caused by violating maximum speed limits and requests from local residents, and are releasing information such as the high-priority road and time frame of speed enforcement on their websites and other media.

2) Measures against Driving Behaviors that are Highly Malicious, Dangerous and Disturbing to Others

The police are promoting street activities for maintaining traffic safety and making efforts to prevent traffic violations. The police are also promoting traffic enforcement focused on highly malicious and dangerous violations directly linked to traffic accidents, such as driving without a license, drunken driving, excessive speeding and violations at intersections, and those focused on violations that are highly disturbing to others such as parking violations.

In recent years, traffic accidents caused by people focusing their attention on the screen of their smartphones have been on the rise. Because using mobile phones or other mobile devices while driving is an extremely dangerous behavior that could lead to a serious traffic accident, the police are promoting publicity campaigns for drivers in cooperation with related agencies and organizations and are reinforcing traffic enforcement on violations related to the use of mobile devices.

In 2016, the police dealt with 6,739,199 violations of the Road Traffic Act.

(2) Support for Traffic Accident Victims

The police are promoting considerate support activities for the victims of traffic accidents based on the NPA’s Basic Plan for Crime Victims.

[Case] Following a fatal tour bus crash that occurred in Nagano Prefecture in January 2016 where many people were killed and seriously injured, Nagano Prefectural Police created a photo book of the items such as clothing of unidentified owners to the victims



Making the Photo Book

of the accident. The police showed the photo book to the victims and returned the items as soon as their owners were identified.

Section 4: Future Prospects

1. Promotion of Effective Measures Based on the Careful Analysis of Traffic Accidents

In recent years, the rate at which traffic fatalities are declining has slowed due to the rate of seatbelt use reaching its peak and the number of traffic accidents caused by drunken driving bottoming out in addition to the increase in the elderly population.

Implementing comprehensive traffic safety measures once significantly decreased traffic accidents. However, under the circumstances where the rate of traffic fatalities is decreasing only very slowly, symptomatic measures that remove the direct causes of traffic accidents will not be enough to achieve the objective set in the 10th Fundamental Traffic Safety Program to “achieve the safest road transport in the world by decreasing the number of fatalities within 24 hours to less than 2,500 by 2020”.

In order to implement effective measures to further reduce traffic accidents, it is indispensable to comprehensively and scientifically analyze complex and diverse factors of traffic accidents and precisely understand the actual conditions of traffic accidents. Considering the severe fiscal challenges facing the national and local governments, efforts must be made to achieve the maximum effect under the limited budget and personnel. To do so, it is extremely important to promote measures based on these traffic accident analyses efficiently and work to improve the measures by objectively evaluating their effects on reducing traffic accidents and alleviating damage.

For this reason, efforts to promote advancement and refinement of traffic accident analysis are being made, for example, the NPA is identifying the tendency of traffic accidents by conducting detailed analyses of traffic accident statistics and prefectural police are using GIS and other technologies. In the future, further efforts will be made to improve the collection of traffic accident information and traffic accident analysis and to clarify the directionality of traffic safety measures. Also, the police will review analyses continuously to develop and implement more effective measures by further reinforcing the PDCA cycle that allows verification of the effects of traffic regulations and traffic enforcement implemented based on the results of traffic accident analysis.

2. Strengthening of the Detailed Measures that Correspond to Characteristics of People

For efficient promotion of effective measures based on the accurate traffic accident analysis, it is extremely important to strengthen detailed measures that correspond to characteristics and behavior of various subject persons.

For example, after entering elementary school, children are involved in a wider range of activities and they get to walk on the road without their parents many times; however, their awareness and ability to predict danger and travel safely by avoiding such danger are still underdeveloped. This makes them significantly more prone than any other age group to accidents of pedestrians crossing the road or rushing out into the road. To prevent traffic accidents involving children, rather than making them merely memorize traffic rules and manners, it is necessary to promote traffic safety measures that take into account their characteristics, for example, providing traffic safety education focused on dangerous areas of the road around their elementary school that they are familiar with, providing opportunities to conduct traffic safety education for their parents and traffic safety education for children that require the participation of their parents.

In the process of becoming a super-aging society, Japan is seeing a rise in the proportion of the elderly in the total number of fatalities as well as the proportion of elderly drivers in the total number of fatal accidents. Though addressing this issue is an urgent need, it is necessary to first understand the characteristics of elderly people in each condition of the accident such as while walking, riding on a bicycle and riding in a vehicle for reviewing the measures to be taken.

Particularly concerning the measures to prevent traffic accidents of elderly drivers, the revised Road Traffic Act enacted in March 2017 and the introduction of occasional cognitive tests allowed the police to take appropriate actions in a timely manner according to the condition of the cognitive function. However, it should be noted that not all accidents associated with the characteristics of elderly people are caused by a decline in their cognitive function.

The Expert Advisory Council Meeting on Measures to Prevent Traffic Accidents by Elderly Drivers discussed this issue from multilateral and diversified viewpoints and it emphasized the necessity of continuously promoting the measures to ensure the enforcement of the revised Road Traffic Act, such as securing the number of doctors who

diagnose elderly drivers and improving the system of traffic safety classes for elderly people to implement them smoothly and continuously. The Meeting also emphasized the necessity of promoting measures to spread and raise awareness about the voluntary surrender of driver's license, ensuring transportation means for elderly and advanced safety technologies such as an automated emergency braking considering the deterioration of physical function due to aging, such as slower reflexes and weaker muscular strength, in addition to dementia and visual impairment, as a driving risk of elderly people.

For this reason, the police will work to promote traffic safety education on the desirable driving experience that corresponds to aging to elderly drivers who intend to continue to drive, such as by conducting traffic safety classes as appropriate and improve and strengthen driving capability consultations for elderly drivers who are not confident with their driving. In order to take detailed measures that correspond to driving risks that each elderly driver has, the police will improve measures for elderly drivers while working closely with relevant agencies and organizations and continue to study comprehensive measures to prevent traffic accidents.

3. Utilization of New Technologies

In order to further prevent traffic accidents in the future, it is necessary not only to enhance various measures that have been taken until now but also to take measures of the new age that actively adopt advanced technologies that contribute to ensuring traffic safety.

In particular, information and communication technology, which is also being utilized in the promotion of ITS, is expected to contribute greatly to improving traffic safety by complementing the abilities and activities of people, such as recognition and judgment, counteracting people's careless mistakes and minimizing damage arising from such mistakes.

In view of the fact that most traffic accidents are caused by the mistakes of drivers, automated driving technology may contribute greatly to improving traffic safety and also resolving existing issues of road traffic society, such as alleviating traffic congestion, reducing environmental load and supporting the mobility of elderly people.

However, fully automated vehicles that practically do not require drivers are completely different from "vehicles" that have been generally understood by people and thus, introducing such vehicles requires careful examination on how the system should work while taking into account the social acceptability. Moreover, it is expected that technological development toward the early realization of various forms of automated driving including platooning of multiple vehicles using electronic coupling technology and remotely-operated vehicles using telecommunications technology will further accelerate. Therefore, it is necessary to take measures to ensure safe and smooth traffic conditions according to specific forms of each vehicle while maintaining consistency with international treaties.

The NPA will continue to promote ITS in order to optimize traffic control by using cutting-edge information and communication technology and other relevant technologies including probe traffic information. During the process of the introduction of automated driving, the NPA will ensure safety by constantly monitoring the directionality of the detailed technological development related to automated driving and promote measures for the step-by-step realization of automated driving including the study of legal aspects.

Technological development is rapidly progressing and the police will strive to realize the safest road transport in the world by taking effective traffic safety measures in view of the future by accurately grasping traffic conditions that change from moment to moment and utilizing new technologies.