Intergovernmental Twelfth Regional Environmentally Sustainable Transport (EST) Forum in Asia
28-31 October 2019
Hanoi, Viet Nam

Achieving Smart and Resilient Cities Through Low-Carbon and Intelligent Transport System

Country Report

(Draft)

<Japan>

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This country report was prepared by the Government of Japan as an input for the Twelfth Regional EST Forum in Asia. The views expressed herein do not necessarily reflect the views of the United Nations.
Country EST Report (covering from Mongolia EST Forum 2018 to Viet Nam EST Forum 2019)

With the objective of demonstrating the renewed interest and commitment of Asian countries towards realizing a promising decade (2010-2020) of sustainable actions and measures for achieving safe, secure, affordable, efficient, and people and environment-friendly transport in rapidly urbanizing Asia, the participating countries of the Fifth Regional EST Forum in Asia discussed and agreed on a goodwill and voluntary declaration - “Bangkok Declaration for 2020 – Sustainable Transport Goals for 2010-2020.” At the Seventh Regional EST Forum held in Bali in 2013, the participating countries adopted the “Bali Declaration on Vision Three Zeros- Zero Congestion, Zero Pollution and Zero Accidents towards Next Generation Transport Systems in Asia” reinforcing the implementation of Bangkok 2020 Declaration (2010-2020) with emphasis to zero tolerance towards congestion, pollution and road accidents in the transport policy, planning and development. Bali Vision Three Zeros calls for a paradigm shift in thinking on the role of motorization and mobility in realizing sustainable development in Asia. Subsequently, EST member countries adopted the “Colombo Declaration” for the promotion of next generation low-carbon transport solutions in Asia.

Each member country of the Forum is kindly requested to prepare a consolidated country report (by 15 September 2019) reflecting how EST trends and developments have taken place in the country from Mongolia EST Forum 2018 to Viet Nam EST Forum 2019 around the Goals of the Bangkok 2020 Declaration as an interim assessment following the below format. You are most welcome to add extra pages or sections to share any major on-going initiatives or future plans, including mega transport projects, transport master plans, special transport corridor development, expansion of railways and rail route developments, etc.

The objective of the Country Reporting is to share among international community the voluntary progress/achievements/initiatives include various challenges faced by countries in implementing each of the underlined goals of the Bangkok 2020 Declaration to realize the Bali Vision Three Zeros - Zero Congestion, Zero Pollution, and Zero Accidents towards Next Generation Transport Systems in Asia. This would help development agencies, donors, development banks in assessing the sustainable transport needs and challenges to better devise their existing as well as future capacity building programs and operations in sustainable transport areas.

Timeline for submission by 15 September 2019.
by email to: est@uncrd.or.jp
<table>
<thead>
<tr>
<th>Goal No.</th>
<th>Goal Description</th>
<th>Voluntary Progress/Achievements/Major Initiatives, including any transport master plans, development of special transport corridors, in Implementing the Bangkok 2020 Declaration from Mongolia EST Forum 2018 to Viet Nam EST Forum 2019.</th>
</tr>
</thead>
<tbody>
<tr>
<td>I. Strategies to <strong>Avoid</strong> unnecessary travel and reduce trip distances</td>
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</table>
| 1        | Formally integrate **land-use and transport planning** processes and related institutional arrangements at the local, regional, and national levels | Any action had been taken so far?  
☐ Not yet  
☐ Some progress (design – piloting)  
■ Largely in Place  
☐ Fully Completed  
(Please Check the box) | **Barriers/Challenges faced in implementation:**  
From the viewpoint of realizing a desirable urban and rural image, promotion of comprehensive and strategic transport policy, integrated transport business with urban development is required.  
From the perspective of promoting low carbon city development in urban areas where the population and buildings are concentrated to a certain extent, it is required to create sustainable and vigorous city design by low carbonization measures for urban structure and transport sector.  
In the regional areas, the decrease of the public transport passengers might cause a concern about shrinkage of the public transport network and degrade of service level. Therefore it is necessary to ensure local public transport network in cooperation with planning a compact city in the region. |
Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

Urban and regional comprehensive transport strategy
Implemented to support planning the comprehensive urban and regional transport strategies and the overall measures based on these strategies. For instance, in the City of Toyama, city design with integration of land-use and transport is being implemented centering around public transportation such as inducing settlement to the center of the city or along the line of public transportation.


Based on the “Low Carbon City Act”, “Low Carbon City Plan” in terms of promoting low-carbon urban development by intensifying urban function and the use of collaborative public transportation, has been established by 24 municipal governments currently as of March 2019.

Local governments, in order to rebuild the region-wide public transport network, in cooperation with the urban development, have amended the “Law on Activation and Regeneration of Local Public Transport” in August 2014, to support the efforts in formulating sustainable local public transport network "Regional Public Transport Network Formation Plan". As of June 2019, 519 local governments have currently established the plan.

http://www.mlit.go.jp/sogoseisaku/transport/sosei_transport_tk_000055.html
http://www.mlit.go.jp/sogoseisaku/transport/sosei_transport_tk_000058.html

Examples of important actions that you plan to carry out in next year (2019~2020)
<table>
<thead>
<tr>
<th>“Avoid” Strategy</th>
<th>Achieve <strong>mixed-use development</strong> and medium-to-high densities along key corridors within cities through appropriate land-use policies and provide people-oriented local access, and actively promote transit-oriented development (TOD) when introducing new public transport infrastructure</th>
<th>Any action had been taken so far?</th>
<th>Barriers/Challenges faced in implementation:</th>
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<td>[ ] Fully Completed</td>
<td>What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?</td>
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What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation

Goal 11. Make cities and human settlements inclusive, safe, resilient and sustainable

Any action had been taken so far?

- [ ] Not yet
- [ ] Some progress (design – piloting)
- [ ] Largely in Place
- [ ] Fully Completed

(Please Check the box)
### "Avoid" Strategy

<table>
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<tr>
<th>3</th>
<th>Institute policies, programmes, and projects supporting <strong>Information and Communications Technologies</strong> (ICT), such as internet access, teleconferencing, and telecommuting, as a means to reduce unneeded travel</th>
<th>Any action had been taken so far?</th>
<th>Barriers/Challenges faced in implementation:</th>
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Examples of important actions that you plan to carry out in next year (2019–2020)

What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

### II. Strategies to **Shift** towards more sustainable modes

<table>
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<tr>
<th>4</th>
<th>Require <strong>Non-Motorized Transport</strong> (NMT) components in transport master plans in all major cities and prioritize transport infrastructure investments to NMT, including wide-scale improvements to pedestrian and bicycle facilities,</th>
<th>Any action had been taken so far?</th>
<th>Barriers/Challenges faced in implementation:</th>
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Although the construction of free passages is based on “Guidelines for the Maintenance and the Management of Free Passages (June 2009)”, there are often cases where discussions with the railway business operators run into difficulties to decide the cost allocation.
development of facilities for intermodal connectivity, and adoption of complete street design standards, wherever feasible

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Implementation of communicate transportation methods for transfer & transit facilities maintenance (The Promotion of Upgrading Transport Nodes)

http://www.mlit.go.jp/road/sisaku/tdm/Top03-02-01.html

About the promotion of transportation knotting point maintenance etc.
The station square of Matsumoto Station, Nagano pref. and Hatsukaichi City Office Station in Hiroshima pref. devise the guideline for passenger flow in terms of interconnection between trolley and bus.

BUSTA Shinjuku (Shinjuku station South exit transportation terminal)
-It had developed in coordination between public (road administrator of National Highway No 20) and private (terminal business) sectors.
And, 19 scattered expressway bus stops are aggregated in the terminal that is integrated with the railway station.


Active Use Measures of Bicycle
- Formulating "Bicycle Parking Attachment Standard Obligation Regulations", and "Guidelines on Maintenance of Bicycle Parking Facilities", and supporting the promotion of usage patterns of bicycle-sharing system has been in place.

http://www.mlit.go.jp/toshi/crd_gairo_tk_000015.html
- Formulating "Bicycle Utilization Promotion Plan".

Examples of important actions that you plan to carry out in next year (2019~2020)
Continue to develop facilities such as station square, pedestrian deck, free passage and public transport.

In accordance with Article 9 of the Bicycle Utilization Promotion Act, the "Bicycle Utilization Promotion Plan" will be formulated (scheduled) to promote comprehensive and systematic measures for promoting the utilization of bicycles.
Promote the utilization of bicycles in accordance with "Bicycle Utilization Promotion Plan".

What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?
Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation
Goal 11. Make cities and human settlements inclusive, safe, resilient and sustainable

<table>
<thead>
<tr>
<th>&quot;Shift&quot; Strategy</th>
<th>Improve public transport services including high quality and affordable services on dedicated infrastructure along major arterial corridors in the city and connect with feeder services into residential communities</th>
<th>Any action had been taken so far?</th>
<th>Barriers/Challenges faced in implementation:</th>
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<td>5</td>
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<td>Local public transport network is falling in decline due to higher dependence on the private owned vehicles in provincial cities.</td>
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<td>☐ Some progress (design – piloting)</td>
<td>Promotion of standardization and reciprocal usage of Public Transport IC Cards: Since each operator had different IC Cards, there were troubles not to be able to use the same card as usual at the same time when transferring to public or private transports by different operators.</td>
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</table>
Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include website Public transport usage conversion business toward a low-carbon community

Promotion of installation and usage of LRT/BRT toward a low-carbon community.
For promotion of using public transportation of less CO2 emission than private owned vehicles, we support to improve convenience, reconstruction and the expansion of the public transportation network system, such as the adoption of LRT, BRT, etc.

Standardization on IC Cards (the end of 2014)
To enhance the convenience for the users’ interoperation as well as expanding versatility of Public Transport, IC Cards was improved to make it possible the interoperation of 10 IC Cards issued by JR Companies and other major private railways in Tokyo Metropolitan, Nagoya, Osaka, and Kyushu Areas and started operation on 23rd March 2013.

[http://www.mlit.go.jp/tetudo/tetudo_tk6_000015.html](http://www.mlit.go.jp/tetudo/tetudo_tk6_000015.html)

Examples of important actions that you plan to carry out in next year (2019~2020)

What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation
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<th>6</th>
<th>Reduce the urban transport mode share of private motorized vehicles through <strong>Transportation Demand Management</strong> (TDM) measures, including pricing measures that integrate congestion, safety, and pollution costs, aimed at gradually reducing price distortions that directly or indirectly encourage driving, motorization, and sprawl</th>
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### Achieve significant shifts to more sustainable modes of inter-city passenger and goods transport,
including priority for high-quality long distance bus, inland water transport, high-speed rail over car and air passenger travel, and priority for train and barge freight over truck and air freight by building supporting infrastructure such as dry inland ports

<table>
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<th>&quot;Shift&quot; Strategy</th>
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<td>7</td>
<td>☐ Not yet ☐ Some progress (design – piloting) ■ Largely in Place ☐ Fully Completed (Please Check the box)</td>
<td>In promoting modal shift, the consignors have worries about the expense burden and transportation quality (i.e. punctuality, damage, etc.), so that the coordination by the parties concerned such as logistics company, shipper should be required for the solution. For promotion of modal shift from trucks to railways, the introduction of 31ft container on trains (the same size as 10t trucks often used for long distance freight) would be effective. But a large investment in equipment installation could be an obstacle to expanding the implementation. To reduce CO2 emission of large sized vehicles which account for one third of CO2 emissions in the transportation sector, it is necessary to carry out the introduction of low carbonization for large sized vehicles. Developing the national economy, expanding people’s living sphere, and local development permanently are required.</td>
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Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

Modal shift for promotion project etc.
Support for initiatives such as modal shift implemented by a council consisting of shippers and logistics companies.  
http://www.mlit.go.jp/seisakutokatsu/freight/ms_subsidy.html

Promotion of CO2 reduction measures in logistics sector
In low carbonization in total logistics system, including modal shift to shippers, the introduction of facility or technology to constrain CO2 emission originated from energy consumption in logistics sector has been supported.  

Low carbon promotion planning, making use of railway(2012 through 2016)

Promotion of low carbonized large-sized vehicles
Accelerate the diffusion promotion of low-carbon type diesel truck
In order to reduce CO2 emissions in the large-sized Automobile field where diffusion of next-generation vehicles is more difficult than passenger cars, from fiscal 2016, for the transportation industry with a long mileage and high transportation efficiency, the introduction of low-carbon type diesel truck with advanced fuel efficiency performance for small and medium-sized enterprises with poor capital are intensively supported.

Expediting introduction of advanced environmental trucks and busses
Supporting to expedite introduction of advanced ecological vehicles (EV, FCV, HV, High-Velocity CNG), still at the initial stage of spread, in conjunction with related ministries, could bring about a mass prevail of advanced ecological vehicle in large sized vehicles sector which has been far behind passenger cars progress.
Examples of important actions that you plan to carry out in next year (2019~2020)

Promotion of motorization of large-sized vehicles
Accelerating the introduction of electrified trucks and buses

It is important to reduce CO2 emissions from trucks and buses, which accounts for 30% of CO2 emissions in the transportation sector, in order to achieve the global warming countermeasure target. Not only are electric powered trucks and buses expensive compared to diesel trucks, but the fact that charging facilities for trucks and buses are not enough, and it impede popularization.

We also aid in the development of charging infrastructure indispensable for the spread of electrified trucks and buses, and we will start a project to support accelerating the introduction in the early stage of diffusion will be started (on budget request).

- Shinkansen (super express train) network
Currently, the construction of three sections, Hokkaido Shinkansen (between Shin-Hakodate-Hokuto and Sapporo), Hokuriku Shinkansen (between Kanazawa and Tsuruga) and Kyushu Shinkansen (between Takeo-Onsen and Nagasaki), are steadily progressing.
http://www.mlit.go.jp/tetudo/tetudo_fr1_000041.html
What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

Goal 7. Ensure access to affordable, reliable, sustainable and modern energy for all

### III. Strategies to Improve transport practices and technologies

<table>
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<tr>
<th>“Improve” Strategy</th>
<th>Any action had been taken so far?</th>
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<tr>
<td>8</td>
<td>□ Not yet</td>
<td>Next-generation automobiles such as Electric Vehicles (EVs) have limitations in implementation due to obstacles such as costs, cruising distance, and insufficient supply of recharging stations.</td>
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<td>□ Some progress (design – piloting)</td>
<td>We set a goal for the ratio of the next generation vehicles of the total new vehicle sales to be 50-70% by FY2030, which requires the raise from the existing of 35.6% in FY2016, which implies the double increase in the ratio.</td>
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- Diversify towards more sustainable transport fuels and technologies, including greater market penetration of options such as vehicles operating on electricity generated from renewable sources, hybrid technology, and natural gas.
Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

The Government aims to capture 50-70% of next-generation automobiles such as FCVs and EVs to total new car sales by 2030. To this end, the Government has taken measures such as tax breaks, subsidy for creating initial demand and supporting R&D.

Implementation of Tax Reduction for Automobiles, etc. to support buying new next generation cars.

Toward the diffusion and promotion of next-generation vehicles such as EVs including Super Light-weight Vehicles, we will focus on supporting pioneer measures that are integrated into urban development of the local governments.

Technological development of fuel cell forklifts, fuel cell waste collection vehicles and fuel supply stations derived from renewable energy etc.

In order to further promote greening the Motor Vehicle Taxation and by other taxations according to the environmental performance.

Reduction of effective environmental burden through the improvement and dissemination of environmental technology

Simultaneously realize reducing the burden for a person who choose to purchase vehicles with superior environmental performance.

**Examples of important actions that you plan to carry out in next year (2019~2020)**

We will continue to specifically subsidize the introduction of hydrogen stations derived from renewable energy.

Implement introduction assistance to disseminate and promote fuel cell buses and fuel cell forklifts.
<table>
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<th>Goal 7. Ensure access to affordable, reliable, sustainable and modern energy for all</th>
<th>What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?</th>
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| 9 | Set progressive, appropriate, and affordable **standards** for fuel quality, fuel efficiency, and tailpipe emissions for all vehicle types, including new and in-use vehicles | Any action had been taken so far?  
☑ Not yet  
☐ Some progress (design – piloting)  
■ Largely in Place  
☐ Fully Completed  
(Please Check the box) | **Barriers/Challenges faced in implementation:**  
Based on the fact that CO2 emission from vehicles accounts for 15% of our total emission, by setting up vehicle fuel standard, it is required to promote improvement of fuel efficiency. From the viewpoint of further reducing CO2 emissions, it is important to formulate the next fuel economy standard for passenger vehicles.  
Taking our atmospheric environment into account, we need to regulate vehicle emissions, while our regulations would harmonize for UN regulations. It is important to promote international harmonization as the automotive industry is a global industry.
Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

The goal for vehicle fuel cost standard

We have participated in the United Nations Economic Commission for Europe (UN-ECE), World Forum for Harmonization of Vehicle Regulations (WP29) and contributed to the global harmonization of vehicle emissions regulations.

Examples of important actions that you plan to carry out in next year (2019~2020)

Formulation of passenger car fuel efficiency standard for 2030
From 2020, the regulation value for emissions considering the UN regulations will be applied to two-wheeled vehicles. From 2020, the regulation value for emissions considering the UN regulations will be applied to two-wheeled vehicles.

What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation
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<table>
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<th></th>
<th>Strategy</th>
<th>Establish effective vehicle testing and compliance regimes, including formal vehicle registration systems and appropriate periodic vehicle inspection and maintenance (I/M) requirements, with particular emphasis on commercial vehicles, to enforce progressive emission and safety standards, resulting in older polluting commercial vehicles being gradually phased-out from the vehicle fleet, as well as testing and</th>
<th>Any action had been taken so far?</th>
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<td>There is no method for proper maintenance and inspection of electronic devices which can handle the safety equipment and exhaust gas control.</td>
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<td>EQSs for Air at Roadside</td>
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<td>Although achievement rates of Environmental Quality Standards (EQSs) for Air at roadside nitrogen dioxide (NO2) and Suspended Particulate Matter (SPM) have largely increased (i.e. NO2 improved from 80% in 2000 to 99.5% in 2017), there remain polluted spots that are not meeting EQSs within the metropolitan areas along the arterial roads.</td>
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### Compliance regimes for vessels

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**Vehicle Registration and Inspection system**

By being registered to the government, taking hold of the actual state of ownership and the authentication of proprietary rights are performed securely. The government inspects each vehicle periodically according to technical regulations and checks to meet safety and emission standards.


**Practices based on Act on automobile NOx · PM**

Based on the strict regulations (Act on automobile NOx · PM), which prohibit the registration of old-fashioned trucks and buses (not pass vehicle inspections), we are trying to promote substitution of old vehicles, and improve the atmospheric environment.

Furthermore, in compliance with “National Basic Policy for Total Reduction” (Mar. 2011). 8 prefectures located in metropolitan area have made total reduction plan to secure environment standard by 2020 in their regions and progress in the restriction for vehicles in use, in cooperation with the national government, local communities and road administrators.


### Examples of important actions that you plan to carry out in next year (2019~2020)

Method for maintenance and periodical inspection of electronic devices/systems are under consideration.

Details of systems for maintenance and inspection of electronic devices are under consideration.

**Roadside air environment measures**

Take necessary measures to secure environmental standards in the countermeasures area for the target of 2020.
### 12th Regional EST Forum in Asia, 28-31 October 2019, Hanoi, Viet Nam

<table>
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<th>“Improve” Strategy</th>
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**Adopt Intelligent Transportation Systems (ITS), such as electronic fare and road user charging systems, transport control centres, and real-time user information, when applicable**

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<tr>
<td>■ Largely in Place</td>
<td>In addition to the existing services such as the provision of the congested routes and road safety information, new services has also been implemented by using vehicle running records and developing roadside devices.</td>
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</table>

(Please Check the box)
### Examples of important actions that you plan to carry out in next year (2019~2020)

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<tr>
<th>Strategy</th>
<th>Description</th>
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<tbody>
<tr>
<td>12</td>
<td>Achieve improved <strong>freight transport</strong> efficiency, including road, rail, air, and water, through policies, programmes, and projects that modernize the freight vehicle technology, implement fleet control</td>
</tr>
</tbody>
</table>

- Implementation of operation management for all bus and truck companies using specified probe data of ETC 2.0, and offering delay information to users at the bus terminal.
- Utilizing data information through public-private partnerships, so as to promote the creation of new services among the private sectors.
- Sharing data owned both by the public and by the private sectors has been promoted by applying a wide range of measures, which are management for arranging bus and freight transportation, for providing users with delay information at the bus terminals and for creating new business from the private sectors.

### What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

| Goal 9 | Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation |
| Goal 11 | Make cities and human settlements inclusive, safe, resilient and sustainable |

### Any action had been taken so far?

- [ ] Not yet
- [ ] Some progress (design – piloting)
- [x] Largely in Place
- [ ] Fully Completed

### Barriers/Challenges faced in implementation:

By transforming inefficient distribution system of the conventional facilities to those that are comprehensive, efficient, and environmental friendly, reduction of distribution costs as well as impact on the environment must be required.
| and management systems, and support better logistics and supply chain management | Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.  
Implementation of providing support for projects that contribute to reduction of environmental load and labor-saving by integration and efficiency improvement through collaboration among businesses conducting multiple distribution businesses  
Act on Advancement of Integration and Streamlining of Distribution Business  
http://www.mlit.go.jp/seisakutokatsu/freight/bukkouhou.html  
Revision of the above Act  
| IV. Cross-cutting strategies | Examples of important actions that you plan to carry out in next year (2019~2020)  
What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?  
Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation  
Goal 11. Make cities and human settlements inclusive, safe, resilient and sustainable |
### 12th Regional EST Forum in Asia, 28-31 October 2019, Hanoi, Viet Nam

<p>| “Cross-Cutting” | 13 | Adopt a zero-fatality policy with respect to road, rail, and waterway safety and implement appropriate speed control, traffic calming strategies, strict driver licensing, motor vehicle registration, insurance | Any action had been taken so far? | □ Not yet | □ Some progress (design – piloting) | ■ Largely in Place | □ Fully Completed | (Please Check the box) | <strong>Barriers/Challenges faced in implementation:</strong> Amongst G7 countries, Japan has the highest number of pedestrians and bicycle drivers fatalities, and a half of them come across the accidents within 500m away from their homes. |</p>
<table>
<thead>
<tr>
<th>requirements, and better post-accident care oriented to significant reductions in accidents and injuries</th>
<th>Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.</th>
</tr>
</thead>
</table>
| Measures to Prevent Traffic Accidents  
- On arterial roads in areas with high traffic accident risk according to the data and from the local input, effective measures responding to accident factors are implemented intensively.  
  [link](http://www.mlit.go.jp/road/road/traffic/sesaku/torikumi.html#2-1)  
- On community roads, by effectively and efficiently arranging Speed Bumps, etc., we are trying to control speed reduction and entry suppression of through-traffic in order to promote the creation of pedestrian-bicycle zone space.  
  [link](http://www.mlit.go.jp/road/road/traffic/sesaku/torikumi.html#2-2) |
| Automobile Accident Compensation Security System  
- According to the Automobile Accident Compensation Security Act, in case of a car accident, all the automobile owners' service operators are obliged to take out automobile liability insurance for insuring compensation capability of damages and reliable relief for victims. To guarantee the insurance enforceability, the cooperative relationship with the vehicle inspection / registration system are interrelated.  
- In order to help victims of accidents caused by hit-and-run and/or uninsured vehicles that are not covered by automobile liability insurance, government is implementing a government security program that directly compensates for the damages. Business funds are levied as an included number of insurance premiums.  
  [link](http://www.mlit.go.jp/jidosha/anzen/04relief/index.html) |
### 14

**Promote monitoring of the health impacts from transport emissions and noise, especially with regard to incidences of asthma, other pulmonary diseases, and heart disease in major cities, assess the economic impacts of air pollution and noise, and devise mitigation strategies, especially aiding sensitive populations near high traffic concentrations**

**Examples of important actions that you plan to carry out in next year (2019~2020)**

Identifying potential hazards such as excessive speed and sudden braking on the living road, and implement effective measures by means of utilizing BIG DATA.

**What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?**

Goal 3. Ensure healthy lives and promote well-being for all at all ages

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**Any action had been taken so far?**

- [ ] Not yet
- [ ] Some progress (design – piloting)
- [ ] Largely in Place
- [ ] Fully Completed

(Please Check the box)

**Barriers/Challenges faced in implementation:**

Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

**Examples of important actions that you plan to carry out in next year (2019~2020)**

What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?
### 12th Regional EST Forum in Asia, 28-31 October 2019, Hanoi, Viet Nam

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<th>15</th>
<th>Establish country-specific, progressive, health-based, cost-effective, and enforceable air quality and noise standards, also taking into account the WHO guidelines, and mandate monitoring and reporting in order to reduce the occurrence of days in which pollutant levels of particulate matter, nitrogen oxides, sulphur oxides, carbon monoxide, and ground-level ozone exceed the national standards or zones where noise levels exceed the national standards, especially with regard to environments near high traffic concentrations</th>
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#### Barriers/Challenges faced in implementation:

Although the status of achievement of EQSs for air has slowly improved, there still remain substances that are not meeting EQSs. While the status of achievement of EQSs for Noise is gradually improving, 6% has not yet achieved it and around 10%, particularly on arterial roads in large cities.

#### Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

**Constant Monitoring of Air Pollution by Local Governments under Air Pollution Control Law:**

For systematic implementation of measures for air pollution, constant monitoring of local air pollution is conducted by local governments and the data is gathered by the national government. Results are available at real-time via online (“Soramame-kun”).

http://soramame.taiki.go.jp/

**Constant Monitoring of Motor Vehicle Traffic Noise by Local Governments under Noise Regulation Law:**

For systematic implementation of measures for road traffic noise, constant monitoring of local traffic noise is conducted by local governments at sampling stations. The data is simulated for all residential buildings to see sound propagation paths for evaluation of noise exposure. The data is aggregated by the national government and made public annually via the website (note: annually updated).

http://tenbou.nies.go.jp/gis/monitor/?map_mode=monitoring_map&field=8
### 12th Regional EST Forum in Asia, 28-31 October 2019, Hanoi, Viet Nam

<table>
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<tr>
<th>“Cross-Cutting” Strategy</th>
<th>Examples of important actions that you plan to carry out in next year (2019~2020)</th>
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<td>16</td>
<td>Implement sustainable low-carbon transport initiatives to mitigate the causes of <strong>global climate change</strong> and to fortify national <strong>energy security</strong>, and to report the inventory of all greenhouse gases emitted from the transport sector in the National Communication to the UNFCCC</td>
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<td><strong>Barriers/Challenges faced in implementation:</strong></td>
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| 17                     | Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation  
|                         | Goal 11. Make cities and human settlements inclusive, safe, resilient and sustainable  
|                         | Any action had been taken so far?  
|                         | ☐ Not yet  
|                         | ☐ Some progress (design – piloting)  
|                         | ■ Largely in Place  
|                         | ☐ Fully Completed  
|                         | (Please Check the box)  
|                         | Barriers/Challenges faced in implementation:  
|                         | For realizing “convivial society”, City planning with universal design should be required to devise removing physical and informative hazards for hampering handicapped people to freely move, enjoy sports.  
|                         | For highly senior society, high level of barrier-free design should be required for city planning as well at every corner of the country.  
|                         | On the occasion of Olympic/Paralympic Games 2020, substantial number of barrier free designed facilities at the site, as well as its enhancement all over the country including the promotion of barrier-free minds are definitely required.  

Adopt **social equity** as a planning and design criteria in the development and implementation of transport initiatives, leading to improved quality, safety and security for all and especially for women, universal accessibility of streets and public transport systems for persons with disabilities and elderly, affordability of transport systems for low-income groups, and up-gradation, modernization and

- Adopt **social equity** as a planning and design criteria in the development and implementation of transport initiatives, leading to improved quality, safety and security for all and especially for women, universal accessibility of streets and public transport systems for persons with disabilities and elderly, affordability of transport systems for low-income groups, and up-gradation, modernization and
| **integration of intermediate public transport** | **Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.**  
Promoting barrier-free minds and universal design for community development throughout the country by the following efforts:  
- Revision of traffic barrier-free standards and guidelines  
- Full-scale enforcement of the Revised Barrier-Free Law which indicated the partial amendment of the Law concerning promotion of movement of elderly people and persons with disabilities. Full-scale enforcement of the Revised Barrier-Free Law which indicated the partial amendment of the Law concerning promotion of movement of elderly people and persons with disabilities.  
- Based on the Revised Barrier-Free Law, holding a facilitation of evaluation conference for the participation of persons with disabilities  
- Announcement of reception guideline / service training model program for the transport operators  

**Examples of important actions that you plan to carry out in next year (2019~2020)**  
- Steady enforcement of Revised Barrier-Free Law, thoroughly disseminating the traffic barrier-free standards and guidelines, aiming to raise the barrier-free level nationwide.  
- Steady enforcement of Revised Barrier-Free Law, thoroughly disseminating the traffic barrier-free standards and guidelines, aiming to raise the barrier-free level nationwide.  
- Dissemination of reception training model programs for improving service for the transport operators |
| “Cross-Cutting” Strategy | 18 | Encourage innovative **financing** mechanisms for sustainable transport infrastructure and operations through measures, such as parking levies, fuel pricing, time-of-day automated road user charging, and public-private partnerships such as land value capture, including consideration of carbon markets, wherever feasible | Any action had been taken so far? | ☐ Not yet | ☐ Some progress (design – piloting) | Largely in Place | ☐ Fully Completed | (Please Check the box) | Barriers/Challenges faced in implementation: | Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant. | Examples of important actions that you plan to carry out in next year (2019~2020) | What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development? |
| 19 | Encourage widespread distribution of **information and awareness** on sustainable transport to all levels of government and to the public through outreach, promotional campaigns, timely reporting of monitored indicators, and participatory processes |

Any action had been taken so far?
- [ ] Not yet
- [ ] Some progress (design – piloting)
- [ ] Largely in Place
- [ ] Fully Completed

(Please Check the box)

**Barriers/Challenges faced in implementation:**
- **Challenges faced in implementation:**
  - Review the mobility to switch it smart by promoting travel modes with less CO2 emissions such as public transportation, bicycles and walking.
  - Implementation of environmental-friendly driving methods is necessary (i.e. by restraining sudden acceleration, hard braking and idling, etc.) to reduce CO2 and air pollutants emissions.
  - Although the usage of Eco-drive Management Systems are becoming popular among transport operators which show certain positive effects, the dissemination of public awareness among individual drivers still remain a challenge.
  - About 20% of CO2 emission inland is derived from the transport sector of which 80% are from automobiles.
  - By way of using automobiles, considering environmental impact (preventing from rapid acceleration, rapid brake, idling, etc.), CO2 emission derived from exhaust gas and air pollution particles should be reduced.
Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant.

Promotion of “Smart Move”:
Promotion of 5 approaches for smart move: recommended use of public transportation; encourage to use bicycles and walk; promotion of car sharing, bike sharing and other means of transportation; innovation in long-distance travel and recommendation of Eco-Driving and driving environmental-friendly cars. These are listed online and introduced at some events.
https://ondankataisaku.env.go.jp/coolchoice/smartmove/index.html

Formulation and dissemination of "Recommendation for Eco-Drive 10"
Every November is designated as “Eco-Drive Promotion Month” so that relevant organizations and local governments hold lectures and other promotional events regularly.
http://www.env.go.jp/air/car/ecodrive/index.htm
http://www.mlit.go.jp/sogoseisaku/environment/sosei_environment tk_000013.html
https://ondankataisaku.env.go.jp/coolchoice/ecodriver/

Training human resources
In order to train human resources to lead the transportation by environmental measures in the region, the training and seminars are implemented. In addition, excellent measures of the regions are awarded.
**Examples of important actions that you plan to carry out in next year (2019~2020)**

<table>
<thead>
<tr>
<th>Cross-Cutting</th>
<th>Develop dedicated and funded <strong>institutions</strong> that address sustainable transport-land use policies and implementation, including research and development on environmentally-sustainable</th>
<th>Any action had been taken so far?</th>
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<td>20</td>
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<td>□ Not yet</td>
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**What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?**

Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation

Goal 11. Make cities and human settlements inclusive, safe, resilient and sustainable

**Barriers/Challenges faced in implementation:**
<table>
<thead>
<tr>
<th>transport, and promote good governance through implementation of environmental impact assessments for major transport projects</th>
</tr>
</thead>
<tbody>
<tr>
<td>Please add few specific examples of initiatives, pilot projects, major policies or programmes developed or under development (or) any major investment decisions. Please attach reports or include websites where relevant. EST related research institute: <a href="http://www.estfukyu.jp">http://www.estfukyu.jp</a></td>
</tr>
</tbody>
</table>

The following research is conducted at National Institute for Land and Infrastructure Management, MLIT:

Study on the Reduction of CO2 Emissions in Road Transportation:
Study on reduction of CO2 emission in driving and on CO2 emission process models of the transport sector.
[http://www.nilim.go.jp/lab/dcg/kadai/kadai2.htm](http://www.nilim.go.jp/lab/dcg/kadai/kadai2.htm)
[http://www.nilim.go.jp/lab/dcg/seika/ronbun/h29/2h29.htm](http://www.nilim.go.jp/lab/dcg/seika/ronbun/h29/2h29.htm)

Research on Implementation and Promotion of Life-Cycle Assessment on Social Capital:
To assist low-carbon, sound material-cycle, sustainable social capital development technically, we conduct research for practical use and spread of social capital LCA (Life Cycle Assessment).
[http://www.nilim.go.jp/lab/dcg/lca/top.htm](http://www.nilim.go.jp/lab/dcg/lca/top.htm)

Examples of important actions that you plan to carry out in next year (2019–2020)
What importance does this particular EST Goal attach in your country’s on-going efforts in achieving the Sustainable Development Goals (SDGs) under the 2030 Agenda for Sustainable Development?

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