Strengthening cooperation between transport research, education and training institutions and government agencies on sustainable transport development in some countries of the Asia-Pacific region

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According to the UN, sustainable development means that the development of the current generation does not run counter to the interests of future generations.
Transport infrastructure and sustainable development

Infrastructure plays a key role in achieving sustainable development and has a direct impact on over 80% of the UN SDG targets. Through the creation and use of sustainable infrastructure, it is possible to achieve the necessary economic, social and environmental results within the framework of the sustainable development goals.

- Transport infrastructure is vulnerable to emergencies
- Transport rates one of the top industries in greenhouse gas emissions and negatively affects biodiversity, destroying natural ecosystems
- Sustainable transport facilities also contribute to regional development, improved public health and education, as well as other areas.
- Transport projects can improve the living standards of the population
- The adoption of information and communications technologies to improve the efficiency of transport systems will have a major impact on the ability of the transport sector to actively contribute to sustainable mobility.
Low employment of women in the transport sector

- Harsh conditions of manual labor in most professions
- Tension and high psychophysical stress
- Job duties require relocation from the place of residence, often for a long period

Restrictions on women's employment opportunities in transport

Railway transport - train drivers and track fitters, as well as more than 15 professions
Road transport - bus and heavy truck driver
Sea transport - boatswain, fireman and 6 more professions
Aviation - a porter and a few more professions
Typical Problems of Coordination of Regional and Intergovernmental Agreements

- The non-binding nature of the cooperation between the central and regional systems
- Variety of mechanisms available to governments for the implementation of intergovernmental relations
- Ambiguous attitudes of various countries towards integration and the potential negative consequences of globalization
- Some organizations created to integrate in a specific area or to achieve specific goals prefer to build work on the basis of informal interaction (processes).
- Economic sanctions lead to a decrease in interstate contacts.

- Ethnical mentality in a region
- Significant ethnical and regional differences
- Significant religious and cultural differences

COVID-19 pandemic

political factors

cultural factors
Development goals of the APR transport system

Increased sustainable development through social and infrastructure projects
Investing in sustainable infrastructure is central to meeting global commitments to tackle climate change and improve disaster risk management. Infrastructure development is also important to meet the growing demand for high quality education, health care and other social services; tackling challenges such as aging population; adaptation of new technologies.

Lower greenhouse gas emissions
The economies of the Asia-Pacific countries, which are developing at a high rate, require significant measures aimed at mitigating the effects of climate change, giving priority to the development of energy and transport with low volumes of greenhouse gas emissions.

Complex solutions
Building green, competitive, sustainable and inclusive cities, projects to improve urban ecology, mobility, promote gender equality and environmental sustainability.
Strengthening cooperation project

Project “Strengthening cooperation between transport research, education and training institutions and government agencies on sustainable transport development in some countries of the Asia-Pacific region”

- Transport connectivity and regional integration
- Green sustainable transport systems and services;
- Safe and inclusive transport and mobility
- Reducing transport impact on climate change

Fields of scientific discussions in educational institutions
Strengthening cooperation project concept

Transport policy-makers in ESCAP countries need to be more aware of and better understand the long-term implications of their actions for the achievement of the SDGs.

Establishing a regional mechanism for the exchange of knowledge and innovation between transport research, education and training institutions and government agencies in the ESCAP region and developing a training and education program for sustainable transport professionals

It is essential to have access to data from analytical studies and scientific conclusions on the social, economic and environmental consequences of the functioning of transport systems, as well as on new technologies for the development of sustainable transport systems.
The result of the project is the solution of problems in the field of international relations and interaction between countries in the implementation of the Sustainable Development Goals policy

- regional promotion of research results, lack of reliable data on all SDGs and in all subregions
- no above-national platform to publish the UN directives in the field of SDGs and achieved expert solutions
- communication barriers to such fields as interaction between transport researchers and institutions in the region, participation in ESCAP research projects and projects of international institutions, participation in training workshops for researchers and policymakers and other activities to build knowledge capacity in the implementation of the SDGs
Special programs of retraining and refreshment at universities
General analysis of SDG coverage in higher education of Asia-Pacific region

• 228 curricula of 24 higher educational institutions in Asia-Pacific region are considered

<table>
<thead>
<tr>
<th>Country</th>
<th>Number of curricula</th>
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<tr>
<td></td>
<td>SDG-focused</td>
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<tr>
<td>Korea</td>
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<td>China</td>
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<td>Japan</td>
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<td>Australia</td>
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Experimental educational module of the program for transport professionals: "Sustainable Development Goals in transport development programs"

The draft educational program is designed for policymakers and other practitioners in the field of transport.

The program is targeted and variable in nature, the scope of the program depends on organizations and the level of competence development. There are four options for the scope of the program:

1. top managers of transport organizations and government agencies
2. mid-level managers who practically develop measures for the development of transport in accordance with the UN Agenda
3. operational managers of transport organizations and university professors
4. basic educational programs for university students (master's level).
<table>
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<tr>
<th>№</th>
<th>Topics and study blocks</th>
<th>Program level, Hours</th>
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<tbody>
<tr>
<td>1</td>
<td>Socio-economic and environmental aspects of transport (Asian Highway networks, Trans-Asian Railway networks and dry port networks)</td>
<td>20 26 40 204</td>
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<td>2</td>
<td>Use of alternative fuels and new powertrain technologies (road and rail)</td>
<td>20 28 64 204</td>
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<tr>
<td>3</td>
<td>Energy efficiency of transport (road and rail) (under SDG 7 Affordable and Clean Energy)</td>
<td>18 28 64 108</td>
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<td>4</td>
<td>Gender representation in the transport sector</td>
<td>18 28 64 80</td>
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<td>5</td>
<td>Safe and inclusive transport and mobility</td>
<td>18 28 64 80</td>
</tr>
<tr>
<td>6</td>
<td>Transport safety and working conditions</td>
<td>22 32 72 212</td>
</tr>
<tr>
<td>7</td>
<td>Elimination of losses in the transport system (under SDG 12 Responsible Consumption and Production)</td>
<td>20 36 48 136</td>
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Organizational TREN Model

ESCAP Secretariat and Consultation Board

The Secretariat will implement policy, review and evaluate performance and review its program of activities in cooperation with the Advisory Board

Membership

Founding Members
actively participated in developing of the transport partnership mechanism and made a significant contribution to the creation of a partnership network

Associated members
Associate Members are international or regional institutions that participate in TREN on a special basis

Website and online platform
TREN ADMITTANCE

Criteria for joining the network:
• involvement in the field of transport research and policy on the implementation of the SDGs;
• regular academic and study programs at various levels;
• transport advisory services to public and private sector institutions;
• willingness to enter research results into the TREN knowledge base;
• availability for active participation in online and offline events organized within the TREN platform.

How to join?
• Joining the ESCAP Transport Partnership Network (TPN) is free of charge.
• Interested agencies are encouraged to contact the ESCAP Secretariat by contacting the Transport Division:
  – half-page institutional profile,
  – a list of recent studies related to transport (for the last 2 years or more),
  – a copy of the research findings related to transport,
  – the name and contact information of the institution employee who will be the contact person.
Thank you for your attention!

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