Ref. No. 464/1-05-2026

Terms of reference for the engagement of

Locally contracted expert – To support the Transport Demand Modelling and Network Analysis in Kosovo*

PS/SRV/LCE/019/2026

1. Background

The Transport Community is an international organisation in the field of mobility and transport. It has 36 participants – the European Union Member States represented by the European Commission, the Southeast European Parties (the Republic of Albania, Bosnia and Herzegovina, Kosovo, Montenegro, the Republic of North Macedonia, and the Republic of Serbia - hereinafter referred at collectively as "regional partners") and the three observing participants (Georgia, Republic of Moldova and Ukraine). Transport Community is working on integrating Western Balkans' transport markets into the EU by assisting the regional partners in adopting and implementing the EU legislation in the transport field and supporting projects connecting the region with the EU.

The organisation was founded with a Treaty[1] Establishing the Transport Community, signed on 9 October 2017 by all partners (Council Decision (EU) 2019/392).

The aim of the Treaty, therefore, is the creation of a Transport Community in the fields of road, rail, inland waterway, and maritime transport as well as the development of the transport network between the European Union and the Western Balkan Parties. The Transport Community shall be based on the progressive integration of transport markets of the South East European Parties into the European Union transport market based on the relevant acquis, including in the areas of technical standards, interoperability, safety, security, traffic management, social policy, public procurement and environment, for all modes of transport excluding air transport. For this purpose, this Treaty sets out the rules applicable between the Contracting Parties under the conditions set out hereinafter.

* This designation is without prejudice to positions on status, and is in line with UNSCR 1244/1999 and the ICJ Opinion on the Kosovo declaration of independence

[1] https://www.transport-community.org/wp-content/uploads/2022/10/treaty-en.pdf

In the framework of the implementation of the Kosovo Multimodal Transport Strategy 2023–2030 and in support of Kosovo's alignment with EU transport policy, TEN-T planning requirements, and the objectives of the EU Growth Plan for the Western Balkans, the Ministry of Infrastructure and Transport (MoIT) seeks technical assistance to strengthen its transport demand modelling and network analysis capabilities.

The Multimodal Transport Strategy identifies the need to strengthen analytical tools and forecasting capacities to support evidence-based transport planning, investment prioritisation, infrastructure development, and network performance monitoring.

Kosovo possesses an existing transport demand model; however, the model requires review, updating, and further development to reflect current transport demand patterns, recent infrastructure developments, and available traffic data. The assignment will contribute to strengthening analytical planning tools for transport policy and investment planning, while also providing important inputs for the future development and operationalisation of a Road Asset Management System (RAMS).

To support the implementation of the assignment, MOIT will make available to the selected expert:

- The existing transport demand model and all available related documentation;
- The most recent traffic count data and vehicle classification data available;
- Updated GIS-based road network data;
- Information on completed, ongoing, and planned road infrastructure projects;
- Any additional transport and socioeconomic datasets deemed relevant for the assignment.

2. Description of the assignment

The assignment aims to strengthen MoIT’s capacity for evidence-based transport planning and infrastructure management through the review, updating and enhancement of the existing transport demand model.

The assignment will provide an improved analytical basis for assessing transport demand, analysing network performance, forecasting future traffic conditions and supporting infrastructure investment prioritisation, with particular attention to the indicative TEN-T network and key national and regional corridors.

The assignment will also assess how outputs from the updated transport demand model can support the future development and operationalisation of a Road Asset Management System (RAMS), particularly through the provision of reliable traffic volumes, vehicle composition information and traffic growth forecasts.

The specific objectives of the assignment are to:

- review and assess the existing transport demand model and supporting datasets;
- update and enhance the model to reflect current transport demand patterns, network conditions and recent infrastructure developments;
- assess current transport demand and network performance on key national and indicative TEN-T corridors;
- develop traffic demand forecasts under selected scenarios;
- provide analytical inputs to support transport planning and infrastructure investment prioritisation;
- assess how transport demand modelling outputs can support future RAMS development, maintenance planning and infrastructure management;
- provide recommendations for the future use, maintenance and further development of the transport demand model; and
- transfer to MoIT an updated, documented and operational transport demand model, including all relevant files, assumptions, input data and technical documentation developed under the assignment.

3. Scope of work

The assignment will be implemented through four interrelated tasks covering the review of the existing model and available data, model updating and enhancement, network analysis and demand forecasting, and assessment of the use of transport demand data for future RAMS development.

Particular attention shall be given to the indicative TEN-T network, key national and regional transport corridors, network performance and demand forecasting, as well as the requirements for the future use of transport demand data within RAMS.

Task 1 – Review of Existing Model and Available Data

The expert shall:

- Review the existing transport demand model and its methodological assumptions;
- Assess available traffic count data, vehicle classification data, GIS network data, and other relevant datasets;
- Evaluate the strengths, limitations, and applicability of the current model;
- Identify data gaps, modelling constraints, and opportunities for improvement.

Task 2 – Updating and Enhancement of the Transport Demand Model

The expert shall:

- update the transport network, zoning and relevant input datasets, as required;
- review and update model parameters, assumptions and demand matrices, where appropriate;
- incorporate available traffic count and vehicle classification data and relevant network changes;
- update the representation of completed, ongoing and planned infrastructure projects, as appropriate;
- calibrate and validate the updated model against available observed traffic data, to the extent supported by the available data;
- document any limitations affecting calibration and validation and identify additional data requirements, where relevant;
- Ensure that the model is fully documented and transferable to MoIT.

Task 3 – Network Analysis and Demand Forecasting

The expert shall:

- Analyse current traffic flows and network performance;

- Assess key corridors, including the indicative TEN-T network;
- Develop indicative traffic demand forecasts under selected scenarios;
- Identify potential bottlenecks, capacity constraints, and areas requiring further assessment;
- Provide analytical inputs to support infrastructure planning and investment prioritisation.

Task 4 – Support to Future Road Asset Management System (RAMS) Development

The expert shall:

- Assess how the updated transport demand model can support future RAMS implementation;
- Identify traffic-related inputs required for asset management processes, including traffic volumes, vehicle composition, and traffic growth forecasts;
- Provide recommendations for the integration of transport demand data into future maintenance planning, lifecycle costing, and infrastructure management processes.

4. Deliverables

The expected deliverables are:

Deliverable 1 – Review of Existing Model and Available Data Report

The Report shall include:

- Review of the existing transport demand model;
- Assessment of available datasets;
- Identification of key data gaps, modelling limitations, and proposed improvements;
- Recommendations for the approach to updating the model.

Submission: Within 10 working days from commencement of the assignment

Deliverable 2 – Updated Transport Demand Model and Interim Technical Report

The Interim Technical Report shall include:

- Description of updates made to the model;

- Updated network and data inputs;
- Revised assumptions and modelling parameters;
- Summary of calibration and validation activities, where applicable;
- Preliminary findings and observations.

The deliverable shall be accompanied by the updated model files, relevant input data and supporting technical documentation. The model may be further refined following the network analysis undertaken under Deliverable 3.

Submission: Within 25 working days from commencement of the assignment

Deliverable 3 – Network Analysis and Forecasting Report

The report shall include:

- Analysis of current traffic conditions and network performance;
- Assessment of key national and TEN-T corridors;
- Traffic demand forecasts under selected scenarios;
- Identification of bottlenecks and network constraints;
- Recommendations for transport planning and investment prioritisation.

Submission: Within 35 working days from commencement of the assignment

Deliverable 4 – Final Report and RAMS Integration Recommendations

The assessment shall include, at a minimum:

- Identification of traffic-related parameters required for RAMS implementation;
- Assessment of the availability and quality of traffic data relevant for asset management purposes;
- Analysis of how traffic forecasts, vehicle composition data, and traffic growth projections can support pavement deterioration modelling and maintenance planning;
- Recommendations for integrating transport demand modelling outputs into future RAMS processes and databases;

- Identification of data gaps and recommendations for future data collection and monitoring activities to support RAMS development;
- Recommendations for ensuring interoperability between the transport demand model and future asset management systems.

Submission: Within 40 working days from commencement of the assignment

5. Qualifications and exclusion criteria

The expert shall meet at least the following criteria:

a) University degree (minimum Master's level or equivalent) in transport engineering or civil engineering or transport planning

b) Any professional working in the end-beneficiary institution is ineligible to apply.

c) Any expert submitting more than one application for the same assignment, shall be automatically excluded from the tender procedure. In cases where multiple applications involving the same expert are identified, all applications concerned will be disqualified

6. Work experience

The expert shall have demonstrated professional experience relevant to transport planning, traffic engineering, urban mobility, transport demand modelling and spatial/network analysis, including:

a) Minimum 5 years of professional experience in transport planning, traffic engineering, transport modelling, traffic forecasting, network analysis, or related fields.

b) Experience in the application and/or updating and/or calibration of strategic transport demand models, such as PTV Visum or equivalent, undertaken at local, national or regional level.

c) Experience in the use of Geographic Information Systems (GIS) for transport planning and network analysis, including the integration and analysis of GIS-based network data, traffic data and transport demand modelling outputs, and the preparation, management, analysis and visualisation of geospatial data, maps and spatial analyses supporting transport planning and infrastructure investment decisions. Specific experience with Quantum GIS (QGIS) would be considered an asset.

d) Experience in traffic data collection, processing and analysis, including traffic counts, vehicle classification, traffic flows and other relevant transport datasets, would be considered an asset.

e) Experience in the Western Balkans region would be considered an asset.

Reference letters/contracts confirming the professional experience should be included in the Technical Offer.

7. Methodology

A detailed methodology describing the approach to delivering the assignment, including the proposed activities, implementation methodology.

The methodology shall demonstrate, at a minimum:

- understanding of the objectives and scope of the assignment;
- proposed approach to reviewing the existing transport demand model and available data;
- proposed approach to updating, calibrating and validating the model;
- approach to network analysis and traffic demand forecasting;
- proposed treatment of data gaps and modelling limitations;
- approach to assessing the use of transport demand outputs for future RAMS development;
- proposed sequencing and work plan for the four tasks and deliverables;

The submitted methodology shall be evaluated as part of the technical assessment and, if accepted, shall form an integral part of the contract

8. Languages

The working language is English and Albanian.

9. Timing and Location

The assignment foresees work from home/online or if needs arise in the premises of end-beneficiary institution in Prishtina. The assignment is expected to start in October 2026.

10. Remunerations

The assignment foresees up to 320 working hours or 40 working days of engagement for the expert with a maximum value of EUR 10,000.

Each deliverable will be subject to quality control and approval by the end-beneficiary and TCT Secretariat.

Payment will be processed upon submission and approval of all documents by the TCT Secretariat and end-beneficiary as stipulated in the contract

Note: No other costs will be covered besides the expert cost per day as indicated in the offer.

11. Financial Offer

The financial offer should be shown in a form showing the price per working day of 8 hours.

The offer with the lowest price will be scored with a maximum of 20 points.

12. Selection and Award criteria

Selection will be done based on work experience and methodology.

Work experience	Minimum score	Maximum score
Minimum 5 years of professional experience in transport planning, traffic engineering, transport modelling, traffic forecasting, network analysis, or related fields.	20 points for at least 5 years experience in transport modelling, transport planning, traffic forecasting, or network analysis. Every additional year of relevant experience will be awarded 5 points, up to the maximum score.	40
Proven experience in the application and/or updating and/or calibration of strategic transport demand models, such as PTV Visum or equivalent, undertaken at local, national or regional level	5 points for 1 relevant assignment. Every additional assignment will be 5 points up to the maximum score.	20

Experience in the use of Geographic Information Systems (GIS) for transport planning and network analysis. Specific experience with Quantum GIS (QGIS), including the preparation, management, analysis and visualisation of geospatial transport and network data, would be considered an asset	0	5 points for 1 relevant assignment.
Experience in traffic data collection, processing and analysis, including traffic counts, vehicle classification, traffic flows and other relevant transport datasets, would be considered an asset.	0	5 points for 1 relevant assignment.
Experience working in Kosovo, the Western Balkans.	5 points for 1 relevant assignment. Every additional assignment will be 5 points up to the maximum score.	10
A short, detailed methodology/proposal on how the assignment will be delivered	5	20
Total	35	100

The abovementioned work experience will be scored based on the information provided in the CV and confirmed by the reference letters as per point 6) of this ToR.

The total maximum score for the selection criteria is 100. The total maximum score for the financial offer is 20.

The offer with the highest score, combining work experience and offered price, will be proposed for the assignment, and the contract shall be signed.

No subcontracting is allowed for the assignment.

Ranking of tenders

The contract will be awarded to the most economically advantageous tender, i.e. the tender offering the best price-quality ratio determined in accordance with the formula below. A weight of 80/20 is given to quality and price.

Score for tender X	=	cheapest price _____ price of tender X	*	100	*	20%	+	total quality score (out of 100) for all award criteria of tender X	*	80%