



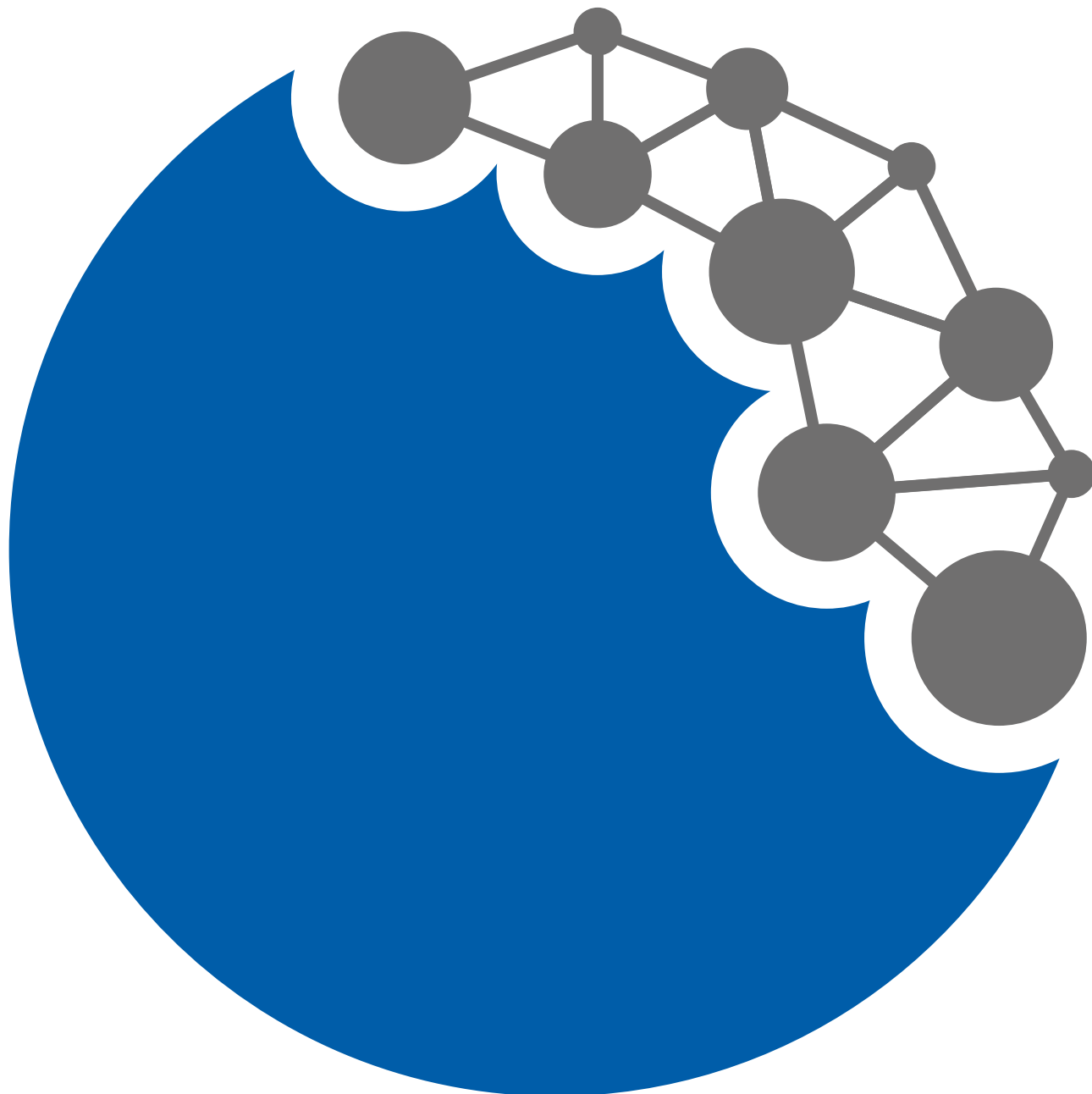
Petr David, Hana Vránová (eds.)

PEFnet 2025

29th European Scientific Conference
of Doctoral Students

November 20, 2025
Extended Abstracts

- MENDELU
- Faculty
- of Business
- and Economics



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PEFnet 2025

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SETTING SUBSIDY CONDITIONS TO SUPPORT SUSTAINABLE INVESTMENTS IN TRANSPORT

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KEY WORDS

transport sustainability assessment, subsidy policy, ESG index, sustainability indicator

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1 INTRODUCTION

The transport sector is a significant polluter of the environment. One of the tools supporting the achievement of climate neutrality is subsidies (including support for sustainable transport). The conditions of subsidies in transport do not focus only on the economic value of the investment but also include the social and environmental aspects of the investment. Policymakers at various levels are asking themselves how to set up evaluation frameworks, criteria and what methods to use to assess the sustainability of investments. Efforts are underway within the EU to harmonise these criteria and methods, including for projects (co-)financed from EU funds. Reporting (use) of some criteria and

methods is mandatory for the disbursement of EU funds; some remain at the level of recommendations. It is up to each EU country to decide with what degree of bindingness it will require the given criteria and methods.

One of the indicators of the success of countries in the field of sustainability are the so-called ESG indices (ESG scores). The Risk Watch Initiative ESG Index [1] was used to assess the relationship between the level of mandatory subsidy requirements and the level of sustainability of individual countries. Efforts to assess the sustainability of transport at the national level can also be found [2].

2 MATERIAL AND METHODS

The aim of this paper is to present the objectives and partial results of the research, which aims to assess:

1. Whether there is a difference in the required level of binding requirements for subsidies in individual EU countries.
2. Whether there is a relationship between the ESG score of selected EU countries, which is used to assess the achieved level of sustainability at the individual country level (dependent variable), and

the level of binding requirements for assessing the social and economic benefits of projects supported by subsidies (independent variable).

3. To propose recommendations for setting binding criteria and methods within the framework of subsidy requirements.

The criteria and methods used in the grant requirements of selected countries and listed in the EU methodologies were obtained in particular from

the European Commission Regulation No 480/2014, the European Commission Implementing Regulation No 2015/207, Regulation (EU) No 1303/2013 of the European Parliament and of the Council, Regulation (EU) 2021/1058 of the European Parliament and of the Council and from the grants and methodologies of selected EU Member States.

The level of bindingness of the requirements was assessed on a scale of 1–5 (5 – mandatory with scenarios, 4 – mandatory, 3 – mandatory for large

projects, 2 – mandatory for certain projects, 1 – recommended).

Ordinary least squares (OLS) and weighted least squares (WLS) methods were used to identify the relationships between the level of bindingness of the monitored criteria and methods for assessing transport infrastructure and the ESG index of the given countries. Multicollinearity of variables was detected using the VIF test.

3 RESULTS AND CONCLUSIONS

When analyzing and comparing regulations, methodologies, etc., it was found that economic and environmental criteria are usually prioritized in subsidy requirements (on average, they reach a higher level of binding requirements) compared to social criteria. This is in line with findings from the scientific literature [3][4]. Quantitative indicators are preferred over qualitative indicators in EU subsidy titles and requirements, which is also evident in the scientific literature. For example, the indicator of comfort and quality of transport reaches the lowest level of binding requirement in subsidy conditions.

The research results so far point not only to a strong link between the setting of subsidy conditions and the level of sustainability measured using the ESG index (WLS; $R^2 = 97.6\%$), but also to which subsidy criteria and methods should be tightened

(e.g. risk matrix, assessment of comfort and quality of transport, assessment of regional impacts of the investment, impact on secondary markets, sustainability analysis) and, conversely, for which criteria and methods it is possible to reduce the level of stringency of requirements (climate emissions criterion).

Central European countries (Czech Republic, Slovakia) have worse results not only in the area of sustainability (measured by the Risk Watch ESG index), but also in the area of transport sustainability [2]. As the analysis and comparison of subsidy conditions of selected countries showed, countries with a worse ESG score usually also have less stringent subsidy conditions in the area of supporting sustainable investments in transport.

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