

## HABILITATION THESIS REVIEWER'S REPORT

### Masaryk University

**Applicant**

Ing. Vilém Pařil, Ph.D.

**Habilitation thesis**

The sustainable transport system and policy design in metropolitan context: environment facing transport or vice versa?

**Reviewer**

Prof. Laurent Guihéry, PhD

**Reviewer's home unit, institution**

Labo MATRiS, CY Cergy Paris Université

The habilitation report of Vilém Pařil from Masaryk University is a long and impressive report of 146 pages and covers researches, with a background of economic analysis, of sustainable transport planning and activities in the context of metropolisation tendencies that are today the cornerstone of economic development in Europe. If the main researches concern mainly the Czech Republic and Slovakia, the European perspective is deeply linked with the researches as all the topics are impacted by European regulations on environmental issues, on competition or related to the transport sector that must be sustainable in the future. One interesting perspective of all the research done by Vilém Pařil is the Central or Eastern European point of view: Czech Republic, central Europe is the beacon of Vilém Pařil. The main proof of this observation is this sentence:

"In terms of the processes of development differentiation, the results showed a significantly better position of "western" metropolises with a three-time weaker representation for the least developed elementary types of metropolises in comparison with the "eastern" metropolises". (p. 78).

The sensibility of the gap West / East can be found too in the fare and discount prices analysis: "Czech and Slovak fare levels are lower than those in Western Europe" (p.44).

This will be the first question I would be happy to ask to Vilém Pařil: p. 18, you write in the beginning of your report on the metropolitan process: "the literature usually refers to the following characteristics of suburbanization, especially in Western countries, namely the internal decentralization of the population within agglomerations, the expansion of lower density housing in close proximity to cities, and the blurring of the boundaries between urban and rural areas, including sociological changes in the attitudes of such populations (Tamaru, 2001). Page 12, you mention explicitly this Eastern perspective: "The first part of the habilitation thesis includes two chapters focused on metropolisation process in Central Europe and its impacts caused by suburbanisation (...)".

- My question would then be: do you see now some differences between western and eastern metropolization and suburbanization, for example linked with public transport?

The first 67 pages are a synthesis of researches done on the process of metropolization and suburbanization in the Czech Republic (first part) and a survey of the researches done on air pollution and sustainable transportation pricing that is aiming at reducing these environmental issues. The last pages between page 67 and page 143 are papers published in good scientific

journals, for instance Case Studies on Transport Policy and Research in Transportation Business & Management. The diversity of analysis shows a large curiosity in research objects that is important today to try to understand the transport sector and its impact on urban sprawl. The list of references and literature is impressive: between page 47 and page 65: 18 pages of literatures listed. All papers listed in the habilitation report and below are collective papers. This shows the ability of the candidate to work in a research group complementary with other researchers. Only one paper has two authors.

List of papers:

- 1) The Metropolisation Processes: A Case of Central Europe and the Czech Republic
- 2) The cost of suburbanization: spending on environmental protection
- 3) Assessment of the burden on population due to transport related air pollution: The Czech core motorway network
- 4) Competition in long-distance transport: Impacts on prices, frequencies, and demand in the Czech Republic
- 5) Fare Discounts and Free Fares in Long-distance Public Transport in Central Europe

The papers presented and the habilitation report have the key international standards for scientific researches: clear and relevant methodologies, data collection and limitations, passengers survey, models, results and evaluation, discussions of the results at the end, limitations and opening further researches.

The second beacon of Vilém Pařil is that his scientific economic analysis is never “out of roots”, is never disconnected with facts and is linked with applied economics and regional sciences. On the transport sector, the paper listed in the habilitation report are not only focused on railway transport and greening transportation but also on motorway network, on interurban coach transport, on passengers survey and choices (see the last paper of fare discount and free fare). This shows the wide spectrum of knowledge of the candidate. The geographical perspective is both inked with Central Europe and the Czech Republic.

Recommendation for better public policies are often presented and assessed in conclusion. For instance, page 141, the paper that analysis two policies of significant fare reductions – covered trains and buses in the Czech Republic and only trains in Slovakia - reveals that elderly reacted significantly stronger to free fare policies than the younger generation. This is an interesting result for public policy making in order to offer public transport opportunity to elderly people. The same ability to try to influence public policy design can be found page 81 in the paper: “the metropolisation process: a case of central Europe and Czech republic”. The results of researches lead to clear advices to improve the attractiveness of Brno: “Strengthening the position of Brno requires a “smart” strategy, the priorities of which we consider to be increasing the innovation potential and the development of business and R&D clusters in interaction with the improvement of the QSE”. In this analysis of attractiveness, the role of transport is not forgotten: “Overall, we consider as a fundamental constitution (currently deprived) the Central Moravian axis Brno-Olomouc-Ostrava to be an integral component of the Baltic-Adriatic axis Gdansk-Warsaw-Brno-Vienna-Graz-Venice-Ravenna”.

This “trade mark” of Vilém Pařil, and to sum up to the economic Team of Masaryk university, is to conduct researches that give inputs for public policy making to the stakeholders for the Czech republic and, in a larger perspective, for the European union. This a great research strategy toward the public interest and the collective choice – “Social Choice and Individual Values” - which means benefit for taxpayers and Czech (and maybe European) society. Last example in this direction: “The paper has the potential to provide new arguments for ongoing policy discussion on trade-offs between open access regime and more traditional regulation on railways”. (p. 130).

One other characteristic of the habilitation report of the candidate is linked with *bottom up* research –“revealed preferences”, p. 121 - which is often useful to understand the complicated and sometimes hidden forces in the transport sector and, in a broader view, in the society. In the paper on open access competition, Vilém Pařil, with the co-autors, is conducting two focus groups (p.122) for the Prague–Brno transport relation and the results are widely influencing the research and the conclusion of the papers.

Researches are also modern and up-to-date and cover sometimes research topics that are characterized by lack of data or very recent case studies in transportation. The paper “Competition in long distance transport: Impacts on prices, frequencies, and demand in the Czech Republic” is dealing with a very modern and highly interesting topic, as the open access competition in railway transport is the leading motor of improving efficiency of rail operation on European railway undertakings.

As Vilém Pařil is showing his ability of research with open eyes on the society and trends that change life, the second question I would like to ask is the following:

- What is behind the strategy of the European Commission in the new regulation of open access competition in Europe? In this question I try to move from the level of the Czech republic – or Slovakia – to a more integrated European perspective : by allowing foreign operators - as you know maybe RENFE is now the primary partner in Leo Express (owns 50 % of the share) – what is the idea behind the strategy of open access ? This can be a very simply logic but highly important for the future.

Based on this evaluation, I would like to congratulate Vilém Pařil for all these interesting and useful researches.

#### **Reviewer's questions for the habilitation thesis defence:**

Question 1: My question would then be: do you see now some differences between western and eastern metropolization and suburbanization, for example linked with public transport?

Question 2 (see review) : What is behind the strategy of the European Commission in the new regulation of open access competition in Europe ? In this question I try to move from the level of the Czech republic – or Slovakia – to a more integrated European perspective : by allowing foreign operators - as you know maybe RENFE is now the primary partner in Leo Express (owns 50 % of the share) – what is the idea behind the strategy of opened access ? This can be a very simply logic but highly important for the future.

#### **Conclusion**

The habilitation thesis entitled *The sustainable transport system and policy design in metropolitan context: environment facing transport or vice versa?* by Ing. Vilém Pařil, Ph.D. fulfils requirements expected of a habilitation thesis in the field of Economic Policy.

Date: 3.09.2023

Signature: Laurent Guihéry