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Opponent assessment of the doctoral thesis

Type of thesis: Dissertation thesis

Title of the thesis: Advancing efforts to improve sanitation conditions: insights from India

Autor: Mgr. František Ficek

Affiliation: Charles University, Faculty of Science

Supervisor: prof. RNDr. Josef Novotný, PhD.

Dissertation thesis evaluation:

Evaluation	Excellent	Very good	Average	Poor	Failed
Relevance of the topic	X				
Meeting the goal and fulfilling the task of the thesis		X			
Quality of the scientific work	X				
Methodological approaches	X				
Merit of the thesis and applicability of results	X				
Formal level of the thesis		X			

Comments and remarks on the dissertation thesis:

The dissertation addresses the significant challenge of inadequate sanitation in India and evaluates the effectiveness of the Swachh Bharat Mission (SBM), launched in 2014 to eliminate open defecation by 2019. Through case studies, cross-sectional household surveys, and qualitative interviews conducted in rural Jharkhand, along with a comparative analysis of sanitation policies in India and Ethiopia, the research investigates the impact and sustainability of sanitation interventions. The findings highlight an increase in toilet coverage but continued issues with open defecation, emphasizing the need for a comprehensive approach that includes technical solutions, education, and behaviour change strategies.

As I am very much in favour of dissertation thesis compiled from scientific articles, I also enjoyed going through this dissertation thesis.

The thesis addresses a critical global issue, with a particular focus on India, a country with one of the highest incidences of sanitation-related problems. The research is highly relevant to current global health and development agendas, particularly the Sustainable Development Goals. Even though, the logic and further clarification for comparison of sanitation policies of India and compare them with typologically distinct sanitation policies employed in Ethiopia would be beneficial and help the readers.

It also means, that the overarching goal of dissertation to apply the geographical approach to analyse the efforts to improve sanitation conditions in India and put them into a global perspective of achieving universal access to safely managed sanitation is quite clear. But more elaboration should go behind explaining and elaborating the specific goals.

Otherwise, the use of mixed methods, including household surveys, qualitative interviews, and comparative analysis of strategies, provides a solid examination of the sanitation interventions. Generally, I consider the multi-faceted approach as a well-chosen methodological approach. I would, however, recommend to have the methods section longer and providing more background information and reasoning. The methods are clearly described in the accepted articles, but the reasoning for the chosen methods could be elaborated in the dissertation thesis a bit more.

Let me get back to the India / Ethiopia aspect. By focusing on rural Jharkhand and comparing it with another developing country (Ethiopia), the thesis underscores the importance of contextual factors in sanitation interventions. This adds depth to the analysis and highlights the need for tailored solutions in different settings. However, it is not so clear the reasoning for this choice. Especially from the dissertation thesis. On the other hand, it is well described in the one of the published papers (Sanitation strategies for reducing open defecation in rural areas of India and Ethiopia).

This is rather a personal comment – but with pictures being involved in some of the published articles, I believe it would be also beneficial to have some of the pictures in the dissertation thesis.

While the thesis covers a broad range of topics and it is interesting to read, it sometimes lacks the depth required to thoroughly explore more complex issues and it could go more deeply. But, the dissertation thesis is providing a lot of valuable information. Then, the research itself builds on existing knowledge of sanitation interventions but (or maybe therefore) offers limited novelty in terms of findings or new theoretical contributions. While the study reinforces known issues and solutions, it does not that significantly advance the current understanding of sanitation challenges or introduce innovative approaches.

Nevertheless, the thesis makes a valuable contribution to the field of sanitation research and therefore I recommend the thesis to be defended in front of the Committee.

Questions:

1. Your research suggests the need for effective behavioural change approaches in sanitation interventions. Could you elaborate on the specific behavioural change methods that were most successful in your study, and why do you think they worked well? And what differences you would see, if you would try to cross-compare it with some Latin American countries?
2. The thesis highlights concern about the sustainability of sanitation improvements achieved under the Swachh Bharat Mission. What specific recommendations do you have for ensuring the long-term sustainability of these improvements in rural areas like Jharkhand? And which of those could be more generally applicable in various conditions?
3. In your comparative study of sanitation policies between India and Ethiopia, what were the key differences in policy approaches, and how did these differences impact the effectiveness of sanitation interventions in each country?
4. Smaller question: The topic might be sometimes sensitive, especially in some regions. Given the challenges of conducting field research in rural areas, especially over multiple years, what were the main obstacles you maybe had during data collection, and how did you overcome them to ensure the reliability and validity of your findings?
5. One more smaller question: How can policymakers and practitioners better integrate these two components in future sanitation programs to achieve more holistic and impactful outcomes?

Opponent's statement whether the dissertation thesis meets the academic title requirements and whether it is recommended for defense:

I recommend Dissertation thesis "Advancing efforts to improve sanitation conditions: insights from India" by Mgr. **František Ficek** to be allowed for defense and after successfully defending the thesis to award the title Ph.D.

Date: 17.6.2024

With best regards,



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