



## ***Interactive comment on “Mapping the adaptation solution space – lessons from Jakarta for other coastal cities” by Mia Wannewitz and Matthias Garschagen***

**Mia Wannewitz and Matthias Garschagen**

mia.wannewitz@lmu.de

Received and published: 16 March 2021

We would like to thank Referee 1 for the constructive comments, which we consider to be very helpful for improving the manuscript. Overall, we agree to the points raised and the suggestions provided, which have been taken up in the revision of the paper. The below report provides a detailed account of our responses to the individual comments. Main changes to the manuscript include an extension of the search term combination to complement the conducted literature search as well as a revision of the methodology chapter that will then also touch upon epistemological underpinnings to explain the development of the literature categories.

C1

### 1. General comments

RC: The manuscript addresses a relevant scientific topic within the scope of NHES. Scoping literature on the nexus of flood and Jakarta is relevant and provides a new contribution to the literature. I particularly like that the empirical analysis is embedded into a concise theoretical debate on adaptation solution spaces. The title and the abstract clearly highlight the content of the manuscript. The manuscript is well written and easy to understand. The authors provide a concise presentation of the data by appropriate graphics and summaries of the main results. The conclusion is also plausible. The appendix delivers a transparent overview of the empirical material. Besides some minor suggestions for clarifications, my only main concern is the selection of the keywords for the literature scoping. Therefore, I recommend a minor revision to address small suggestions before getting published in the journal.

Answer: We would like to thank Referee 1 for the review and the constructive suggestions. The keyword search had been kept very open in the original manuscript in order to cast the net as widely as possible. However, we agree that this issue deserves more explicit explanation and triangulation. We therefore superimpose a second keyword search in the revised version of the paper and discuss the outcomes of this search in detail, taking on board the few additional papers that the second search has yielded.

### 2. Abstract

RC: Line 14 states that literature related to “retreat from exposed areas” are barely existing. I am wondering whether you considered literature on the contested relocation policy of the Jakarta policy.

Answer: Thank you for this comment. Indeed, the structurally reviewed literature covered retreat from exposed areas through Jakarta’s relocation policies, which is strongly criticized by the publications dealing with this particular issue. However, what did barely come up in the reviewed literature are successful and socially just retreat and/or relocation options. We have clarified this aspect in the revised version of the manuscript.

C2

RC: Lines 20-21: I suggest to emphasize that Jakarta is not only heavily researched but also one of the most vulnerable megacities worldwide. I think this can strengthen the justification of taking Jakarta as an example.

Answer: Thank you for this helpful suggestion. The revised version highlights that argument more strongly in the abstract and introduction, drawing on comparative global studies.

### 3. Introduction

RC: Line 25: The title only mentions coastal cities. Why do you speak here about “coastal and delta cities”?

Answer: Thank you. The reference to delta cities has been deleted as the paper does not explicitly discuss the adaptation needs and options of delta cities which to some extent vary from other coastal cities.

RC: Line 37: You state that problem of flooding and its driver are well researched. However, there is only one reference. I suggest adding more references to underpin your argument.

Answer: Thank for this valid observation. There is indeed ample literature on flooding and flood drivers in Jakarta. Additional key references have been added.

RC: Line 69-71: Please add a brief overview of your methodological approach.

Answer: A brief overview over the methodological approach has been added to the introduction. In addition, the revision of the methods chapter includes a clearer description of the development of the literature categories, including the conceptual and epistemological underpinnings.

### 4. Methods and data

RC: Line 87: I am wondering why you only used the keywords “flood” and “Jakarta”. As your focus is on adaptation and coastal hazards, I assume that you turned a blind

C3

eye to papers related to “adaptation” and “coastal hazards”.

Answer: Thank you for this very valid comment. We chose a very broad search term combination “flood\*” AND “Jakarta” under the assumption that papers elaborating on “coastal hazards” and “adaptation” would mention these terms in their title or abstracts in any case. However, to crosscheck, we conducted an additional search with the search term combination Jakarta AND (flood\* OR adaptation OR coastal hazard). There was considerable overlap with our initial search (238 paper overlapping) but 22 new highly relevant and 12 relevant papers were identified and will be added to the review.

RC: Line 89: I suggest to discuss the limitation of your research that particularly papers in Indonesian have not been included in the analysis. There seems to be a considerable amount of literature in Indonesian language as many Indonesian research do not publish in English.

Answer: Thank you. While the paper briefly mentions that only English literature was included, we agree that the reflection on the limitations of this approach was underdeveloped in the original manuscript. The revised version features a stronger and more explicit discussion.

RC: Line 89: Please explain in more detail how you derived these thematic categories and not other categories.

Answer: Thank you for this important observation. The revised methods section features a clearer explanation of our approach, particularly with respect to the important question of how we arrived at our thematic categories for the analysis.

### 5. Main

RC: Figure 2: Please delete the title within the graphic. The subtitle also mentions the title (the same applies to all other figures). Please add the legend of the Y-Axis “Number of publications”.

C4

Answer: Thank you. All figures are edited following this advice.

RC: Line 146: run-off

Answer: The spelling mistake has been corrected.

RC:Line 403: Please explain Jabodetabek for readers you are not aware of the abbreviation of Jakarta's metropolitan area.

Answer: Thank you. An explanation of the term Jabodetabek has been added.

6. Appendix

RC: Line 562: I suggest to delete the French reference as you mentioned that only English literature had been included in the analysis.

Answer: Thank you for this advice. French references have been deleted in the revised manuscript.

---

Interactive comment on Nat. Hazards Earth Syst. Sci. Discuss., <https://doi.org/10.5194/nhess-2020-370>, 2020.