**Title:** An intergenerational reading of climate change-health concern nexus: A qualitative study of the Millennials' and Gen Z participants' perceptions

Version: 3 Date: 15 Dec 2022

## **Reviewer's report:**

Review of "An intergenerational reading of climate change-health concern nexus: A qualitative study of the Millennials' and Gen Z participants' perceptions"

This paper presents results from a qualitative study on the perspectives of individuals representing the Millennial generation (Millennials) and Generation Z (Gen Z) on the causal link between climate change and health concerns. My main concern with this paper is that the research objective and exploratory question focuses on intergenerational similarities and differences in the climate change-health nexus citing potential conflict and communication problems in the workplace. The introduction elaborates upon this concept, and the tables (figures) provided compare the responses from the demographic cohorts on each of the "dimensions" studied. Yet the result summaries do not provide a similar comparison, which is the purpose of the study. It's not until the last paragraph in the Conclusions and recommendations section that the differences between the generations are mentioned again. The qualitative responses need to be presented in a comparative format to continue with the direction that is established at the beginning of the paper. In addition, the explanations need to be more carefully worded and edited to defend the statements being made. Last from a substantive standpoint, a clearer connection between the literature review and methods section needs to be established.

Related to the writing, the use of adverbs such as, "thus, therefore, hence" and other leading expressions are meant to show that what is said follows logically from what was said before. Use of these words is only appropriate when they support the meaning of a prior statement or enhance an argument or point. However, there are multiple areas in the paper where these words are used improperly. Also, use of more succinct sentence structure may support overall comprehension and ease of reading. In cases where direct information is cited from the literature, use of quotation marks is necessary.

Below, I offer substantive and editorial suggestions for the author(s):

Abstract. Pg. 2, line 1. The opening statement, "Each generation has distinct attitudes, behaviors, values, and motivational buttons; and thus, the study of climate change through a generational lens becomes meaningful" makes a big assumption. Perhaps, rephrase as follows, "The study of climate change through a generational lens is meaningful when one considers the distinct attitudes, behaviors, values, and motivations of each generation."

Abstract. Pg. 2, line 2. Rephrase, "Although Millennials and Z people," as your audience may not know what "Z people are." Consider, "Individuals born between 1980 and 1999, referred to as the Millennial Generation (Millennials) and individuals born up to five years before or after 2000, referred to as Generation Z (Gen Z) may differ widely in their views, values, attitudes, and behaviors. This may lead to conflicts between these two cohorts.

Abstract. Pg. 2, line 3. Rephrase the ending of the sentence "... who will encounter challenges... and replace with "may view the topic of climate change-health concern nexus very differently

than their Gen Z subordinates. This may create challenges when considering climate change priorities and work ethic."

Abstract. Pg. 2, line 4. Rephrase, "Looking at people from the perspective of their generation could..." with "Considering the perspectives of each generation may.."

Abstract. Objective. Reference Millenials and Gen Z consistently throughout the paper.

Abstract. Method. Italicize references to procedural tools throughout the paper; i.e., Quirkos, COREQ.

Abstract. Results. Rephrase, "....between the scrutinized generations" as the generations were not scrutinized. Consider, "...participants representative of each of the generations examined." Address this in the Discussion section as well.

Abstract. Conclusion. Rephrase, "... as playing a role..." to "... as active participants in the goal to fight climate change."

Abstract. Conclusion. The last statement is weak as the paper did not stress the need to inform and educate people about the health risk associated with climate change or refer to educational and public health systems. Elaborate this point further in the paper.

Background. Pg. 4, line 56. It is unclear what is meant by "motivational buttons." Rephrase with "motivations."

Background. Pg. 4, line 58-60. The subject of "...how to act in a more environmentally friendly way" is unclear. Consider, "... engage them to act in an environmentally responsible way."

Background. Pg. 4, line 64. Change tense of "showed" to "has shown." The reference to "these values" is unclear. Consider, "Research shows that the values of a generation are influenced by their prior social life experiences during the historical period in which they were born and raised."

Background. Pg.4, line 66. What is the "intergroup dimension?" What is "an intergenerational reading?"

Research objective. Pg.4, line 71. Remove "still," as the time frame is not specified. Change the tense of "focusing" to "focused." Are the "similarities and differences in

climate change issues" or in "perspective" on climate change issues?

Research objective. Pg.4, line 73. What is an "intergenerational reading?"

Research objective. Pg. 5, line 78. Define "climate change-health nexus"

Theoretical framework. Pg.5, line 82. Rephrase, "they" with "individuals in this group."

Theoretical framework, Pg. 5, line 98. Replace, "voiced for firm public action" with "have been promoting"

Theoretical framework, Pg. 6, line 2. Following "pandemic" add "further illuminated the value of technology across all age groups." Continue with "We learned that being digitally connected.. could."

Theoretical framework, Pg. 6, line 114. When will Gen Z surpass Millennials? Provide a year. Move the voting-age sentence in this section since it adds content to the surpass concern.

Theoretical framework, Pg. 6, line 10. Spell out EU or use an acronym appropriately by stating the full phrase the first time followed by the acronym.

Climate change-human health nexus, Pg. 8, line 166. Replace "that are valued" with "who are valued."

Overall from Literature Review to Methodology. Need to re-state the research purpose and/or research questions at the end of the literature review, and then need to make sure you make the case for this study. Some additional phrases or sentences would help to explain how this study is specifically advancing the literature.

Methodology, Pg. 9, line 177. "From the perspective of those experiencing it" Aren't we all experiencing climate change? Please explain?

Methodology. Pg. 9, line 184. Why is "section iii)" included here?

Methodology. Pg. 9, line 191. Use "meaning" instead of "i.e." in the sentence.

Methodology, Pg. 10, line 2. Change "Participants were explained" to "Participants were instructed on."

Methodology. Pg. 10. Was this study IRB-approved? Make sure to state it as such.

Results, Pg. 10, line 213. Replace "Other 7 persons...." with something like "Seven individuals were unable to participate due to time constraints."

Results. Pg. 11, line 226. Why are spirituality/religion compared to the environmental aspects in the next sentence? This seems like an odd comparison.

Results, Pg. 12, Figures. The figures are somewhat difficult to read, particularly with all the abbreviations. Consider simplifying these figures in some way.

Results overall. The results section needs to be re-written in such a way that similarities and differences across the two generations are more clear & better understood across the key areas for the study.

Discussion. Pg. 18, lines 318-320. Explain what you mean by people confusing climate with climate change with an example.

Discussion, Pg. 19, line 340. Change "believe" to "believed" and add a comma after "impacts". Consider breaking up this long run-on sentence.

Discussion, Pg. 19, line 343-345. Change "warmer climate could affect mainly those suffering" to "warmer climate may mostly affect those suffering.." and change "colder climate could increase in coughs/" to "colder climate may cause an increase in the prevalence of coughs..".

Discussion, Pg. 20, first paragraph. Unclear meaning "pro-active (proactive) behaviors". "Therefore what..." This paragraph needs to be clarified.

Discussion. Pg. 20, line 364. What rich and documented solutions to fight climate change were offered?

Discussion, Pg. 20, line 365. "From the views..." What views?

Discussion, Pg. 20, line 378. Change "participants with a declared good health status" to "participants self-reported good health status..".

Discussion, Pg. 21, line 397. Change "adopted qualitative research" to "conducted qualitative research."

Discussion, Pg. 21, line 406. What is meant by "maladaptation?"

Discussion overall. The Discussion is a strength of the manuscript. However, the authors need to make sure the Results section leads to and corresponds with the Discussion section.