Review of: "The Application of PROMETHEE with the recalculated weight method as a more accurate measurement for the selection of the best Hybrid Renewable Energy Technology for a slum building"

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Potential competing interests: The author(s) declared that no potential competing interests exist.

Qeios ID:3AK8RQ

The Application of PROMETHEE with the recalculated weight method as a more accurate measurement for the selection of the best Hybrid Renewable Energy Technology for a slum building

Comments of Reviewer

- Label of Figure 2 should appear before label of Figure 3.
- Eq.(1) are d_{load} and D_{load} different?
- The initial cost of investment, O&M, replacement, etc. for Solar PV, Wind, Diesel Generator, etc should be varied for current prices as considered higher than prevailing.
- Pg#4,5: solar irradiation data needs to mentioned.
- Diesel Generator specification should be specified.
- Considered Battery life of 20 years is higher than usual!
- Only load details would not be sufficient for such analysis, but actual load profile should be considered for already existing buildings.
- For methods discussed, relevant citation should be included.
- Typos need to be rectified.
- Pg#13: 3.5 Step 1 – The recalculated weight method – The Bayes theorem from…. -> not understood!
- Pg# 23 “hyybrid”!
- Pg# 24,25 Table 17,18 and 19: why ranking of alternatives for PROMETHEE changes with weight recalculated, AHP/entropy and fuzzy AHP/Critic methods?
- Pg#26: “the most accurate measure of accuracy” needs to be rewritten…
- Pg#28: What is “Chi square table value at 95%?
- Moreover, for such study, the primary and secondary criteria should be mentioned for validate work conducted.
- The calculation (sample) should be included to help novice researchers in calculating weights and other parameters.
- Author(s) is(are) suggested to go through some of the following relevant publications for reference and understanding about power/energy requirements.

1. "Multi-criteria planning of microgrids for rural electrification", *J Smart Environ Green Comput* 2021; 1:120-34 . http://dx.doi.org/10.20517/jsegc.2021.06.
2. "A comprehensive review on applications of multicriteria decision-making methods in power and energy systems", *Int J Energy Res.* 2021; 1- 31. doi:10.1002/er.7517
3. "AHP-Assisted Multi-Criteria Decision-Making Model for Planning of Microgrids", *IECON 45th International Conference on Industrial Electronics Society (IES)*, 14-17th October, 2019, Lisbon, Portugal.
4. "Techno-Economic Performance Analysis of GridInterfaced Microgrid for Different Facilities", *IEEE 2021 The International Conference for Intelligent Technologies (CONIT2021)*, 25-27th June, 2021, Hubballi, India