

## Review of: "Non-dimensionalization of the Compressible Navier-Stokes Equation by Pressure Wavelength and Period revealing its Singularity"

## Eshetu Haile<sup>1</sup>

1 Bahir Dar University

Potential competing interests: No potential competing interests to declare.

**Title**: Non-dimensionalization of the compressible Navier-Stokes Equation by Pressure Wavelength and Period Revealing its Singularity

I found the paper fine. After the author properly answers the following questions, you may pass your decisions regarding acceptance of the paper.

- 1. There are some topographical errors like inappropriate use of punctuation marks, incomplete sentences, and lack of subject-verb agreement. The document should be reviewed again.
- 2. There are symbols that are not defined or named. For example, go to page 11; Equ. (22b) says something about the function delta. (Is it the Dirac delta function?) What about xi?, etc.
- 3. On pages 17 and 18, Equ(43) and Equ.(45c) are not correctly written. Think of compatibility issues.
- 4. While you transform coordinate systems, the Jacobian is not correct. See the second column of Table 1 and the operators in Equs.(23a-23d). All the transformations are not correct. The solution will come if you interchange the stared and non-stared variables. Check.
- 5. What contributions does your model have to that of turbulent flow models? Briefly answer this question.
- 6. References writing is not proper. Some results within the paper should be cited. You have a limited number of references.

After the questions are properly addressed, the paper has the chance to be accepted. Thus, it falls into the status of acceptance with major revision.

Qeios ID: R55W81 · https://doi.org/10.32388/R55W81