Review of: "The Influence of Hot Extrusion on The Mechanical and Wear Properties of an Al6063 Metal Matrix Composite Reinforced With Silicon Carbide Particulates"

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Potential competing interests: No potential competing interests to declare.

The manuscript presents "The Influence of Hot Extrusion on The Mechanical and Wear Properties of an Al6063 Metal Matrix Composite Reinforced With Silicon Carbide Particulates." For the manuscript to be further considered for publication, the following comments or suggestions need to be considered/answered.

1. What is the novelty of the present work?
2. Reason for 2 – 8% SiC and the hot extrusion at 500 degrees Celsius with an extrusion ratio of 9.0?
3. How does the author reduce the non-uniformity in the particle dispersion?
4. Suggesting the authors to provide the relative density based on the theoretical density which can be calculated by combining the density of the raw materials with their weight fractions.
5. There is a lack of discussion and analysis of mechanisms like how SiC reduced the density: please give a detailed discussion.
6. The authors mentioned that the density was measured through experimental techniques. If so, they need to give a brief description of the process. Also, they then need to obtain the theoretical calculation for any one combination of the composites and compare the results from theory and experiments.
7. The SEM micrographs need to be clearer. Improve the figure resolution.
8. Need to include more recently published work, i.e., from the last 3 years (2021-2023).