

Manuscript ID Submission ID 102359v1

This paper is related to reviewing the manuscript titled " **Predicting EGFR Mutation Status in NSCLC Patients through Logistic Regression: A Model Incorporating Clinical Characteristics, CT Imaging Features, and Tumor Marker Levels**"

The authors created a prediction model for EGFR mutations in NSCLC based on clinical, CT, and serum marker data. Their logistic regression model performed well in both the training and validation populations, indicating that it might be a useful tool for guiding treatment decisions.

Firstly, Although the proposed study is successful in terms of organization, presentation, content and results, major revision given in the following items need to be performed.

- 1) Improve the conclusion section, enhance the manuscript to convey the purpose, objectives, method and major findings.
- 2) Use abbreviations after the first use in the text, in the abstract and throughout the paper.
- 3) The literature review is quite insufficient in the introduction section. Complete the introduction and literature sections of the article by providing similar studies from the years 2023-2024 and/or new and current studies that will attract the attention of the readers.
- 4) Compare Logistic regression based machine learning methods with more performance metrics than ROC and AUC. More analysis results should be included in the results and findings section.
- 5) The resolution of the figures giving the analysis results should be increased.
- 6) Clean the paper of English spelling and punctuation errors

My decision is major revision. I do not see any harm in publishing the manuscript once the above revisions are made.

Best regards.