**Questions**

**1.Please write detailed Comment for - Suitability of Title and quality of the abstract. - Adequacy of literature review and proposed methods -Quality of result analysis and conclusion**

**A) Suitability of Title and Quality of the Abstract:**

* **Title**:  
  The title, *"Brain Tumor Detection Using Deep Learning,"* effectively captures the study's focus. It is concise and relevant to the research subject.
* **Abstract**:  
  The abstract is solid and provides an overview of the objectives, methodology, and results. However, it could be enhanced with minor grammatical corrections and a more concise structure. Expanding on specific contributions and unique aspects of the study would further improve its quality.

**B) Adequacy of Literature Review and Proposed Methods:**

* **Literature Review**:  
  The review is comprehensive and covers relevant works on brain tumor detection using CNN architectures like EfficientNet. However, it lacks critical evaluation of the limitations in existing studies. Adding such insights would better highlight the novelty of the proposed approach.
* **Proposed Methods**:  
  The methodology is detailed, describing data preprocessing, augmentation, and model fine-tuning. However, while EfficientNet-B0 is a strong choice, its application in similar contexts limits its novelty. Addressing the rationale for its selection would strengthen the discussion.

**C) Quality of Result Analysis and Conclusion:**

* **Result Analysis**:  
  Metrics like accuracy, recall, and AUC are well-presented. Adding visual aids, such as confusion matrices or ROC curves, would improve clarity and comprehension.
* **Conclusion**:  
  The conclusion summarizes the findings effectively. However, discussing practical applications and potential future research directions would make it more impactful.

**2. Please write detailed Comment for - Suitability of Title and quality of the abstract. - Adequacy of literature review and proposed methods -Quality of result analysis and conclusion**

**A) The Appropriateness of Title and Quality of the Abstract:**

* **Title**:  
  The current title, *"Brain Tumor Detection Using Deep Learning,"* is relevant and accurately reflects the research topic. However, to enhance its descriptiveness, a more specific title, such as *"EfficientNet-B0-Based Deep Learning Approach for Brain Tumor Detection,"* could be considered. This will provide a clearer indication of the methodology and focus area.
* **Abstract**:  
  The abstract is effective in summarizing the study but lacks sufficient detail. To improve:
  + Include explicit mention of the research problems addressed and the motivation behind the study.
  + Clearly outline the methodologies employed, such as data preprocessing, augmentation techniques, and the EfficientNet-B0 architecture.
  + Highlight key findings and contributions, including metrics like accuracy and AUC, to emphasize the study's impact.
  + Conclude with directions for future research to provide a complete overview.

**B) Sufficiency of Literature Review and Methods Proposed:**

* **Literature Review**:  
  The literature review is concise but insufficiently detailed. To enhance its depth:
  + Include recent and diverse studies to provide a broader context.
  + Critically examine the limitations of existing methods in brain tumor detection to justify the proposed approach.
  + Address how EfficientNet-B0 fills gaps in the existing literature, especially in terms of accuracy and computational efficiency.
* **Proposed Methods**:  
  The methodology is well-defined and addresses the research objectives. However, it can be further strengthened by:
  + Providing detailed explanations of each stage, such as preprocessing, augmentation, and model fine-tuning.
  + Justifying the choice of EfficientNet-B0 over other architectures and discussing its suitability for the task.
  + Including a comparison table that outlines the objectives, techniques, and limitations of existing methods versus the proposed approach.

**C) Quality of Result Analysis and Conclusion:**

* **Result Analysis**:  
  The results are presented clearly and supported by relevant data. However:
  + Expand the analysis to include metrics like sensitivity, specificity, and F1-score to provide a comprehensive evaluation.
  + Compare results with state-of-the-art techniques to highlight the advantages of the proposed method.
  + Integrate figures and tables with detailed explanations in the text to ensure coherence and readability.
* **Conclusion**:  
  The conclusion ties the findings back to the study's aims effectively. To improve
  + Summarize the study's key contributions and implications.
  + Discuss limitations and suggest areas for further research, such as adapting the model for different medical imaging datasets or optimizing it for real-time applications.

**3. Please write detailed Comment for - Suitability of Title and quality of the abstract. - Adequacy of literature review and proposed methods -Quality of result analysis and conclusion.**

**Suitability of Title and Quality of the Abstract**

* **Title**: The title effectively reflects the core subject of the paper, but improvements to make it more specific and descriptive are encouraged. For example, it could highlight key aspects like the application of Random Forest and XGBoost for analysis.
* **Abstract**: The abstract lacks clarity and focus, missing a clear statement of the research question, methodology, and key findings. To enhance the abstract:
  + Specify the research objective and its significance.
  + Briefly describe the methodology, such as Random Forest and XGBoost.
  + Highlight major findings and their implications clearly.

**Adequacy of Literature Review and Proposed Methods**

* **Literature Review**:
  + The review needs to better contextualize the paper within the existing body of knowledge.
  + Mention gaps in prior research that this study addresses, such as detailed explanations of "other relevant features."
  + Provide complete references, ensuring consistency and accuracy (e.g., include DOI, volume, issue, page numbers).
* **Methods**:
  + Strengthen the rationale for choosing Random Forest and XGBoost specifically. Why were these models prioritized over others? Clarify this with citations or theoretical support.
  + Discuss hyperparameter tuning techniques employed for these models, as this is vital for reproducibility and understanding the methodology.

**Quality of Result Analysis and Conclusion**

* **Results Analysis**:
  + The result analysis is insufficiently rigorous.
  + Incorporate clear comparisons through tables rather than excessive figures. Tables should summarize and compare metrics such as accuracy, AUC, and sensitivity.
  + Discuss the integration of figures and tables into the narrative for seamless comprehension.
* **Conclusion**:
  + Provide a concise summary of key findings, discussing their limitations and contributions.
  + Discuss how this research could extend to broader applications or further investigations into Random Forest and XGBoost techniques.