



PEER-REVIEW REPORT

Name of journal: *World Journal of Orthopedics*

Manuscript NO: 91560

Title: Investigation of contact behavior on a model of the dual-mobility artificial hip joint for Asians in different inner liner thicknesses

Provenance and peer review: Invited Manuscript; Externally peer reviewed

Peer-review model: Single blind

Reviewer's code: 02565717

Position: Editorial Board

Academic degree: MD, PhD

Professional title: Chief Doctor, Professor

Reviewer's Country/Territory: China

Author's Country/Territory: Indonesia

Manuscript submission date: 2023-12-30

Reviewer chosen by: AI Technique

Reviewer accepted review: 2024-01-01 14:43

Reviewer performed review: 2024-01-07 07:44

Review time: 5 Days and 17 Hours

Scientific quality	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Very good <input type="checkbox"/> Grade C: Good <input type="checkbox"/> Grade D: Fair <input type="checkbox"/> Grade E: Do not publish
Novelty of this manuscript	<input checked="" type="checkbox"/> Grade A: Excellent <input type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No novelty
Creativity or innovation of this manuscript	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No creativity or innovation



Scientific significance of the conclusion in this manuscript	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No scientific significance
Language quality	<input checked="" type="checkbox"/> Grade A: Priority publishing <input type="checkbox"/> Grade B: Minor language polishing <input type="checkbox"/> Grade C: A great deal of language polishing <input type="checkbox"/> Grade D: Rejection
Conclusion	<input type="checkbox"/> Accept (High priority) <input type="checkbox"/> Accept (General priority) <input checked="" type="checkbox"/> Minor revision <input type="checkbox"/> Major revision <input type="checkbox"/> Rejection
Re-review	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Peer-reviewer statements	Peer-Review: <input checked="" type="checkbox"/> Anonymous <input type="checkbox"/> Onymous
	Conflicts-of-Interest: <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

SPECIFIC COMMENTS TO AUTHORS

The article utilizes finite element analysis to assist surgeons in choosing the thickness of the femoral head and inner lining in clinical scenarios. While the finite element analysis process in the article is rigorous and meticulous, some concerns persist, and the article's integration with clinical practice is deemed insufficient. Specific feedback is outlined below: 1. The absence of a discussion section in the article is noted, and it is recommended to enhance the text by incorporating clinical applications for a thorough analysis and interpretation of the results within the context of clinical practice. 2. An essential consideration is that the primary cause of failure in artificial joint linings is attributed to long-term wear rather than short-term direct pressure. Consequently, the mechanical finite element analysis should emphasize fatigue testing over static analysis. 3. Upon reviewing the results depicted in the experimental cloud chart (Fig 8), it is observed that all stresses concentrate in one area, while pressures at other sites register as zero. This discrepancy does not align with the realistic biomechanics governing forces on the human hip joint during movement.