

Letter Regarding: Percutaneous Fixation of Posterior Malleolar Fractures: A Contemporary Review

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Dear Editor:

Congratulations to the authors on their recent article discussing percutaneous fixation of the posterior malleolus (PM) in ankle fractures⁵; the article provides a comprehensive and contemporary overview of the technique. However I believe the article misses two important points about fixation of the PM: (1) postoperative stiffness and (2) hardware removal.

Traditional teaching states that if the size of the fragment is 25% to 33% of the articular surface (or greater) on a lateral radiograph then fixation is recommended. With computed tomography, in recent years there has been a paradigm shift; authors are now recommending more aggressive fixation via open approaches,⁴ and there is sound biomechanical evidence to support this.¹


The literature is replete with reports of successful radiographic outcomes with an open approach³ but fails to address critical aspects of this aggressive strategy, postoperative stiffness caused by a large open approach to the posterior malleolus, and the difficulty in removing hardware should the need arise. As the literature in this space focuses on radiographic results and arises from retrospective series,² I fear much of the patient experience cannot be conveyed in these publications.

Our service has seen significant postoperative ankle stiffness in patients treated with an open approach to the PM compared with those who undergo indirect reduction and percutaneous fixation; thus, we have a strong preference for the percutaneous fixation techniques (either AP or PA depending on the case) described in this article and hence welcome its publication. For our department, it is enough of a problem to avoid the technique in all but the worst of fractures (in which patients are likely to be very stiff postoperatively anyway). In addition, there is scant literature on the difficulty and complications of removal of this hardware, and it is not published to my knowledge, but logic would dictate that an anteroposterior screw is much easier to remove, with a lesser complicated profile than a posteroanterior screw or a posterior malleolar plate.

It is not specifically mentioned in the article, but I would raise these issues to the readership's attention and would like to ask the authors directly if they had uncovered any

literature on the postoperative range of motion after PM fixation via open and percutaneous approaches. If not, do they see this as a big problem in their practice, as we do? I would also ask if the authors would provide commentary on their technique and experience for hardware removal in these cases and how it differs from open fixation of the posterior malleolus.

Sincerely,

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