

Tibiotalarcalcaneal Arthrodesis Using Fixed Angle Locking Plate With Bamboo Hut Fibular Grafting For Charcoat Arthropathy Ankle –A Case Report

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INTRODUCTION:

Arthrodesis of the ankle joint is a well-established treatment for painful, end-stage ankle arthritis. Managing deformity, poor bone quality or bone loss poses greater challenges for the surgeon. For this case, we use lateral locking plate with fibular grafting via bamboo hut technique to stabilize the joint concurrently to bridge the bone defect and restore the length of the limb.

REPORT:

We reported a case of 57 year old gentlemen with underlying Diabetes Mellitus type 2 and Hypertension, presented with instability ankle pain since 7 months ago. Patient had history of eversion injury during walking on flat surface prior to that. Xray and ct scan reveal erosion of ankle and subtalar joints. Also there was a large defect of the talus with only head of talus present. Patient underwent an ankle and subtalar arthrodesis using anatomical fixed angle locking plate with autologous fibular bone grafting sutured together forming “Bamboo Hut”. Postoperatively, patient was protected with backslab for a period until union was achieved.



Figure 1: Pre Op Xray



Figure 2: ‘Bamboo Hut’ from fibular bone graft

Figure 3: Post op Xray

CONCLUSION:

Debate continues about the best strategies for the management of fixating the ankle joint. Many of these cases are characterised by some or other form of loss of talus resulting in a defect. This issue can be successfully managed with innovative ‘Bamboo Hut’ grafting technique, supported with in-built compression of the fusion site with the use of an anatomically locking plate. Usage of allograft meanwhile may not be easily available in developing countries like Malaysia.

REFERENCES:

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