

## Boot Camp OTA 2016: Practical Technique Lab with Case Discussion – Pilon Fractures

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### Objectives:

1. The participant will understand the surgical treatment principles for definitive management of pilon fractures.
2. The participant will be able to apply these principles in the skills lab
3. The participant will understand the complications and challenges faced when treating pilon fractures

### Outline:

#### Surgical treatment principles for definitive management of pilon fractures

- Soft tissue conditions and skill set of surgeon dictates early definitive surgery versus staged management.
- Get it out to length – either with external fixation or with fixing the fibula
- Reconstruct the articular surface of the plafond
- Bone grafting of the metaphyseal defect
- Plating to support the distal segment

#### Skills performed in the lab

- ORIF of the fibula using AO techniques
- Stepwise reconstruction of the articular fragments using AO techniques
- Anterolateral plate fixation of the distal tibia and use of accessory mini-fragment fixation

#### Case discussion points

- Thorough assessment of the fracture pattern, the soft tissue injuries, other patient issues, and the skill set of the surgeon to create a successful preoperative treatment plans.
- Some pilon fractures can be definitively treated early, while others require a staged management approach with the use of spanning external fixation followed by definitive surgical reconstruction.
- The benefit of concomitant fixation of the distal fibula is controversial.
- Circular external fixation is an alternative to plate fixation.
- Infection, wound breakdown, chronic pain, and nonunion are complications that are faced when dealing with these injuries.