How Do I Do It? Acetabular Fractures

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Introduction

- Post Wall
 - Simple
 - Comminuted
 - Dome involvement
 - Marginal impaction
- Posterior column
- Posterior wall and column

Introduction

• Transverse fracture

• Both column Fracture

Posterior Wall Fractures Fixation Methods

- Kocher Langenbeck approach
- inspect joint surfaces
- lag screws oblique to retroacetabular surface
- supplement with buttress plate
- avoid dissection above sciatic notch

Post Wall -Simple

Kocher- Langenbach

• Lateral/Semi prone position

• Preserve capsular attachment to the fragment

Post Wall -Simple

Wash out the joint

• Remove fragments

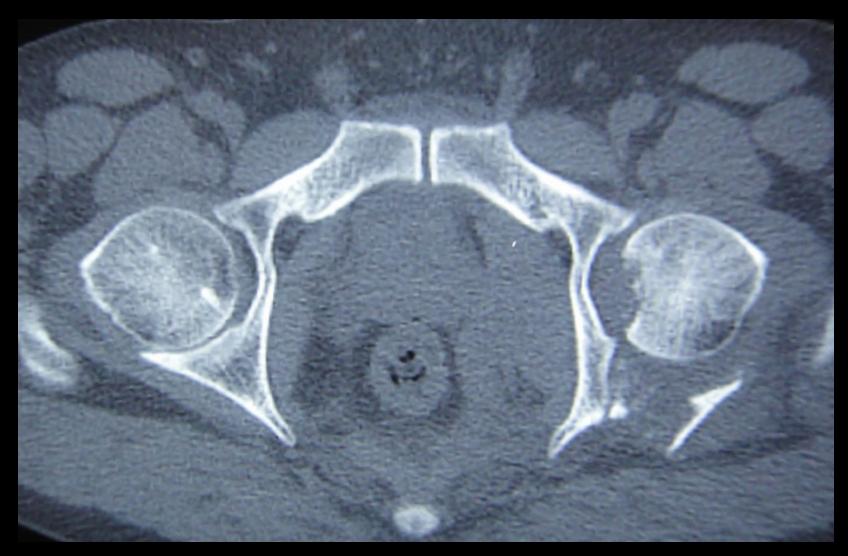
• Reduce and temporarily stabilise fragment with K wires

Post Wall -Simple

- Stabilise with lag screw
 - 3.5mm

- Post wall buttress plate
 - 3.5mm
 - Curved recon
 - Under contoured







Lateral position

KL approach

Irrigate joint

Stabilise PW with K wires



3.5 mm lag screws for PW

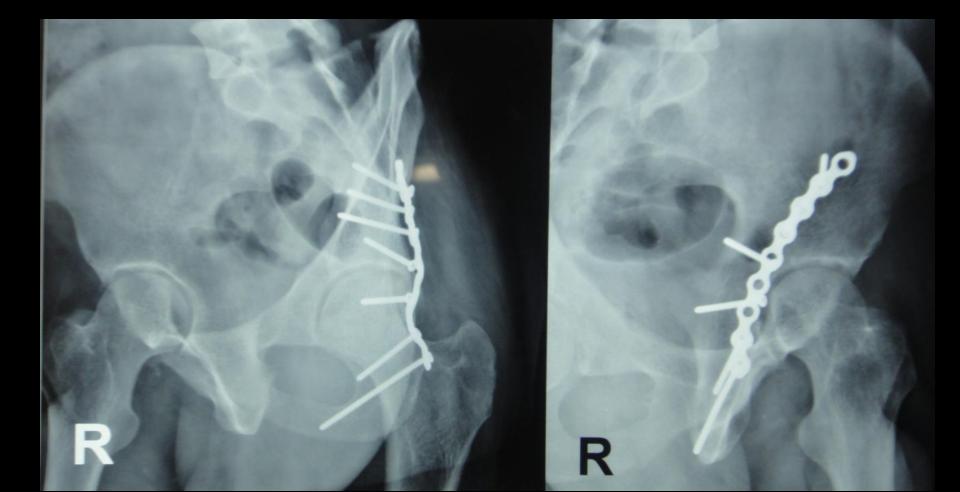
3.5mm recon plate

Undercontoured





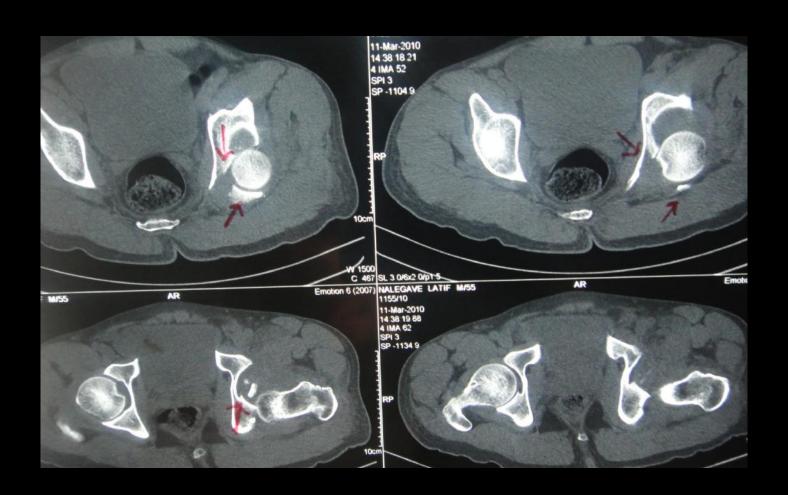




Post Wall Comminuted



Post Wall Comminuted



One third tubular plate

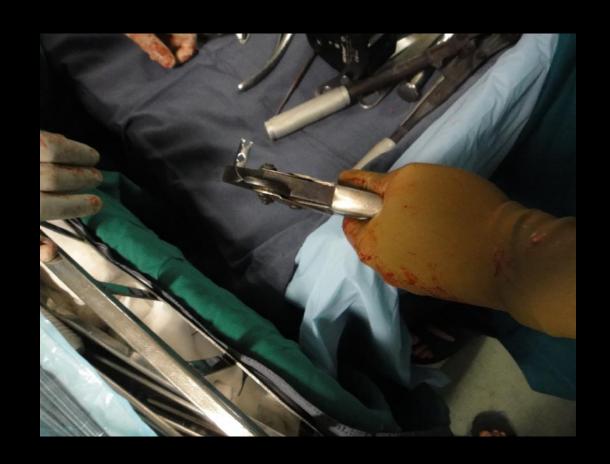
Cut through the hole

Leave long spikes



Bend the spikes

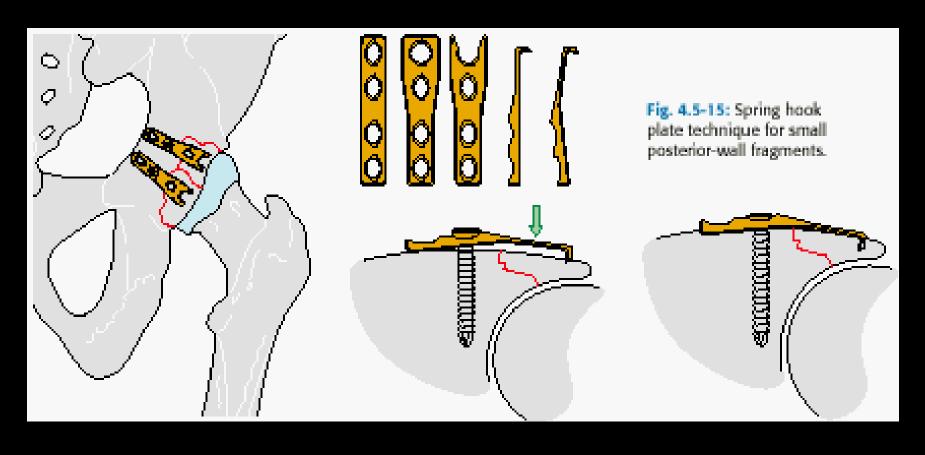
Slight concave contour to the undersurface of plate





Posterior Wall Fx

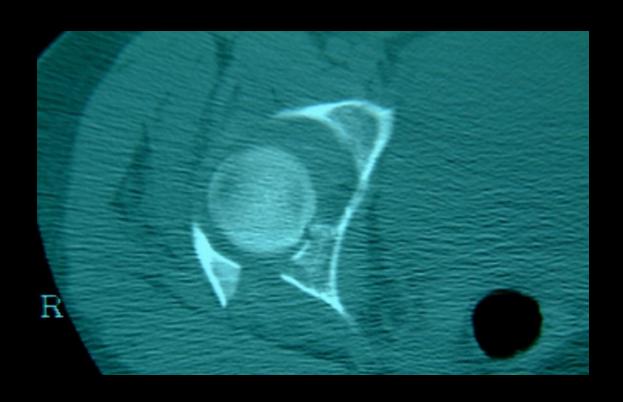
Fixation Methods



Spring plate buttressing wall fragments



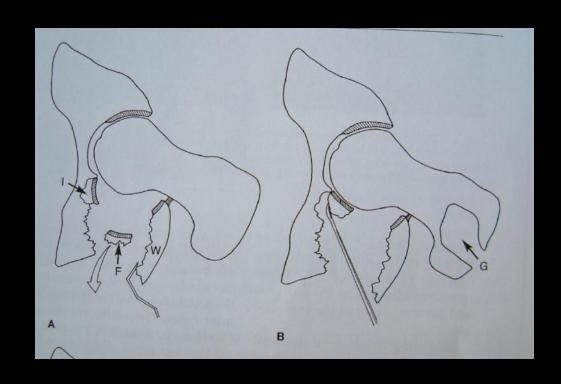
Post wall with Marginal Impaction



Technique- Marginal Impaction

Elevate the impacted fragment

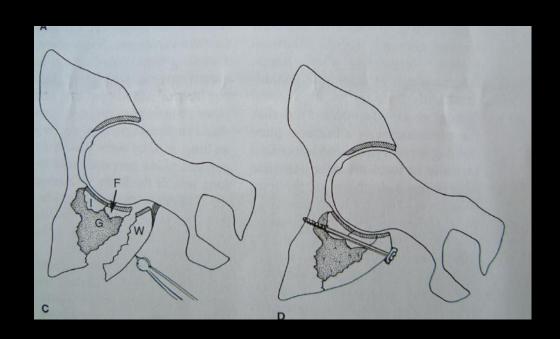
Femoral head is the template for reduction



Technique- Marginal Impaction

Bone grafting for the defect

Lag screw fixation of PW



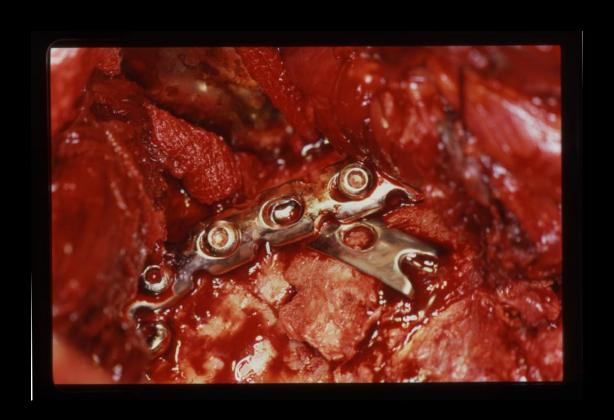
Marginal Impaction

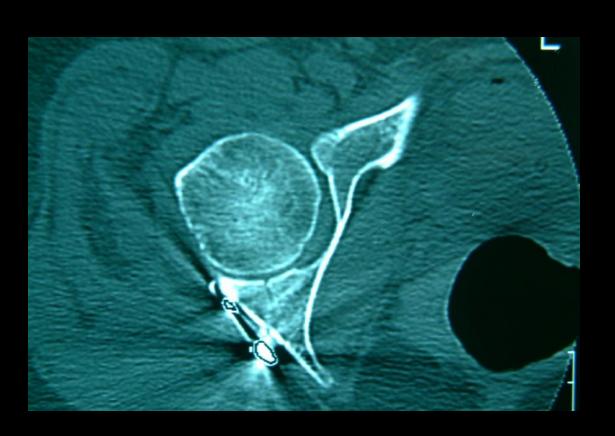


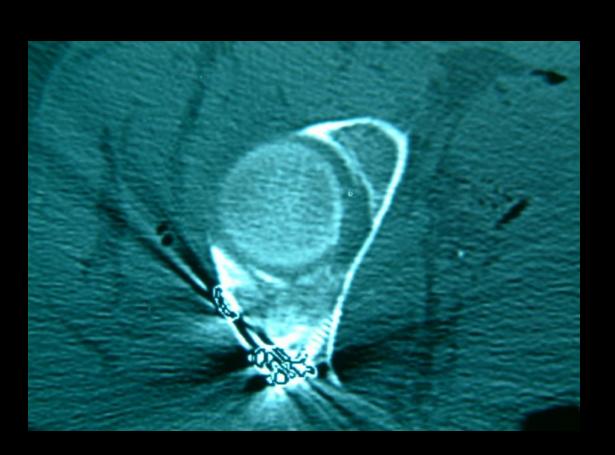
Marginal Impaction



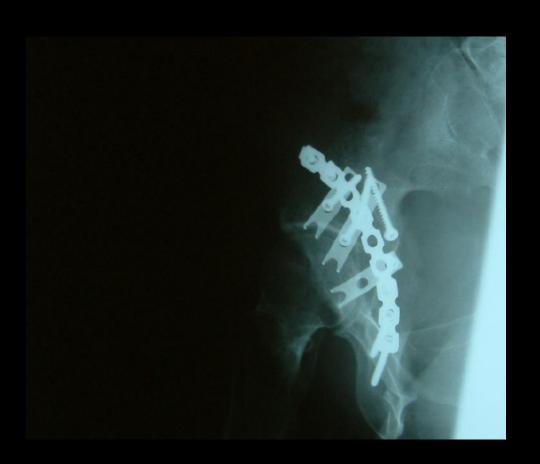
Marginal Impaction



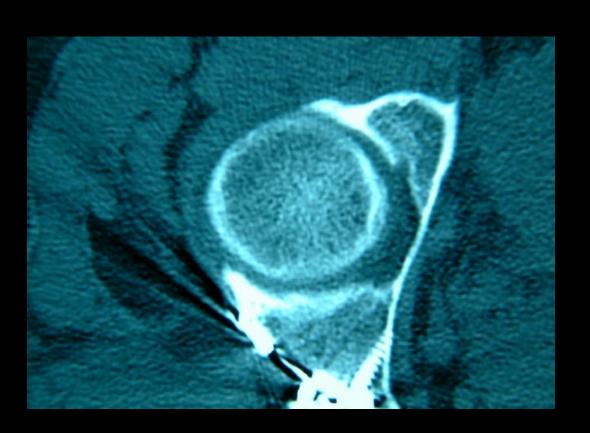


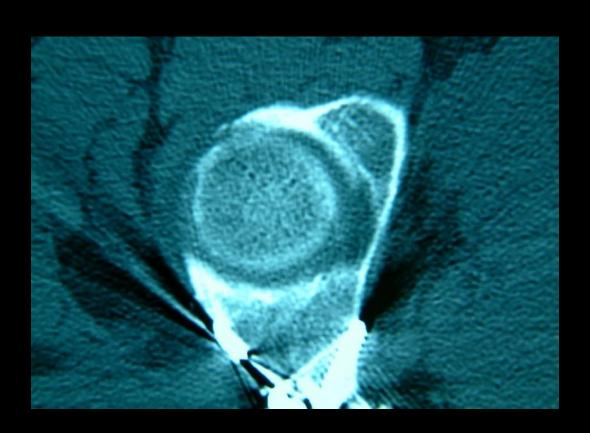












Transverse with Post wall



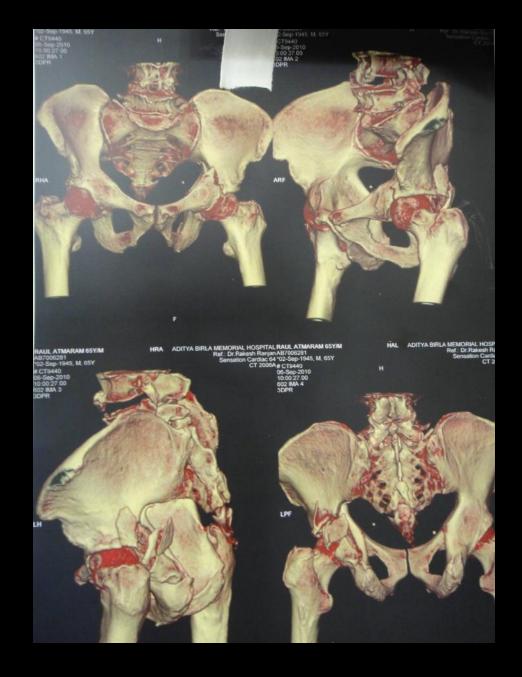




Comminuted post wall

Involvement of dome

Ganz trochanteric Flip



Ganz Trochanteric Flip

Mark post border of vastus lateralis and Gluteus Medius



Ganz Trochanteric Flip

Pre-drill,

measure

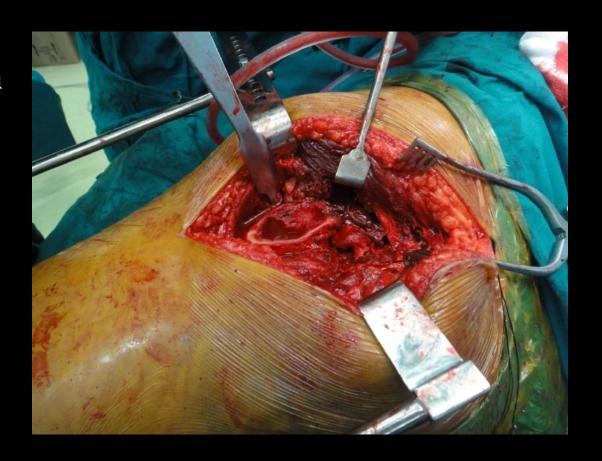
and tap for 6.5mm screws

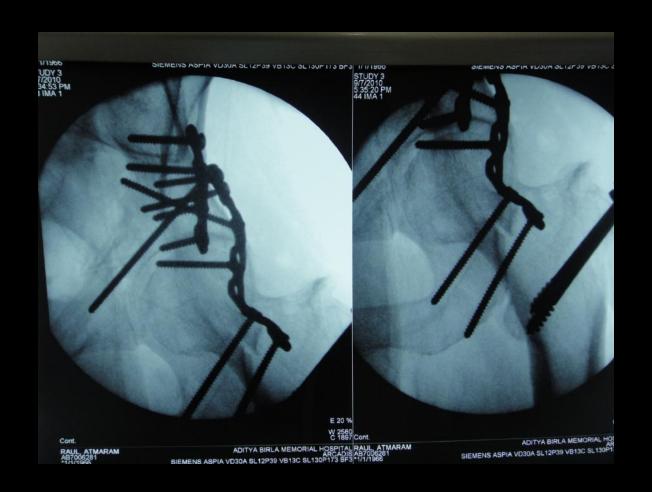


Ganz Trochanteric Flip

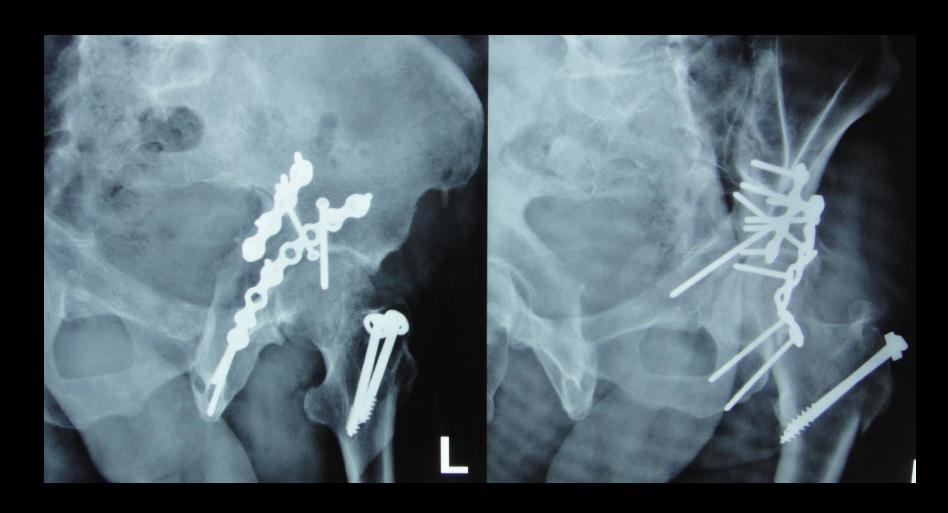
Better visualisation of dome fragment

Less traction on neurovascular bundle

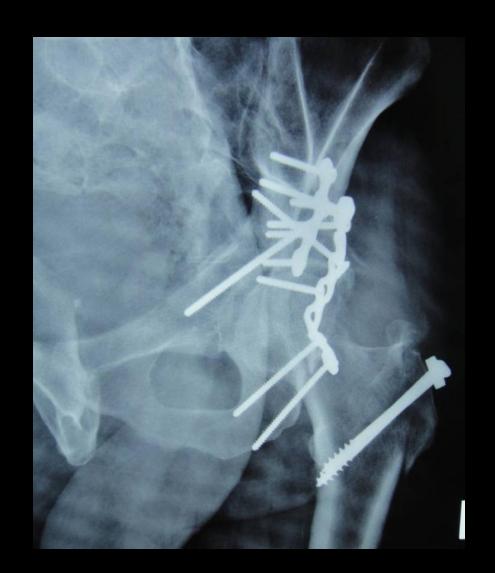












Summary

- Surgical Approach
 - -KL
 - Ilio-inguinal
- Post wall
 - Lag screw
 - Spring plate
 - Marginal Impaction

Summary

- Transverse fracture
 - Ganz trochanteric Flip
 - Anterior column lag screw
- Unreduced Hip Dislocation with T Fracture
 - Post column lag screw
 - Post column plate