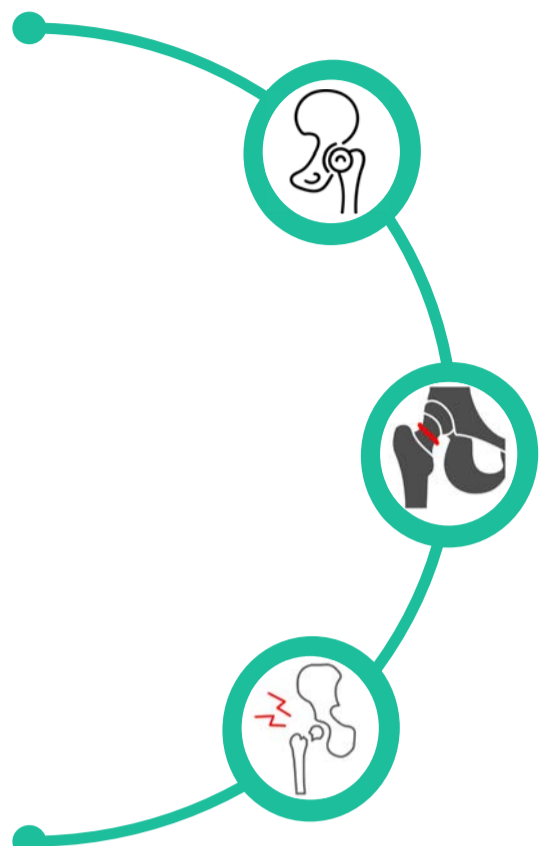




Standard Treatment Workflow (STW) FRACTURE NECK OF FEMUR ICD-10-S72.0



FEMORAL NECK FRACTURES

- Femoral neck fractures are intracapsular fractures

RISK FACTORS

- Osteoporosis
- Advancing age
- Increased number of comorbidities
- Increased dependency with Activities of Daily Living (ADL)

SYMPTOMS

- Severe pain in the hip after fall/Road Traffic Accident (RTA)
- Limb in a deformed position (usually external rotation) and shortening
- Unable to move and stand on the injured limb
- Bruising and swelling around the hip

SIGNS

- Limb is short and externally rotated
- Patient unable to stand or do active straight leg raising
- Marked tenderness at hip joint

FIRST AID

- Pain relief
- Immobilisation of (Splintage including hip, knee & ankle to minimize movements at fracture site during transport)

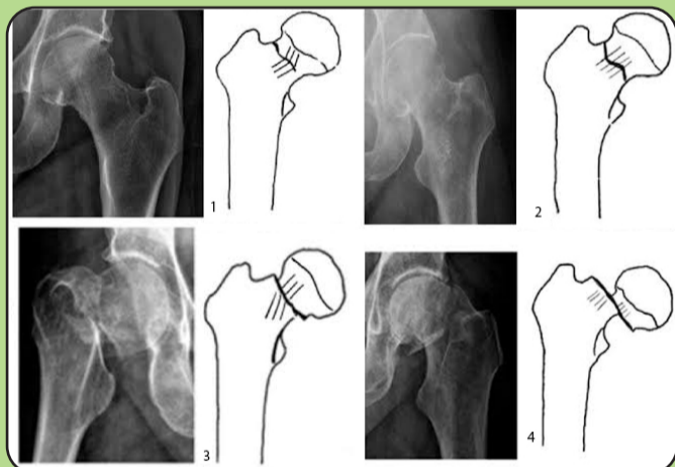
RADIOGRAPHS

- X ray Pelvis with bilateral hips- AP
- Involved hip with thigh – AP (with hips in internal rotation to see the entire neck properly) and lateral view

MANAGEMENT

GARDEN CLASSIFICATION

- **Type I:** Incomplete fracture/Valgus impacted
- **Type II:** Complete fracture without displacement of the fracture fragments
- **Type III:** Complete fracture with partial displacement of the fracture fragments
- **Type IV:** Fracture is complete with total displacement of the fracture fragments



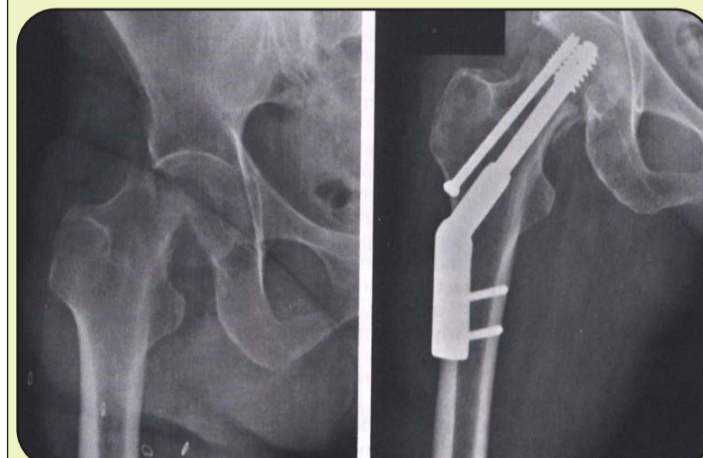
VALGUS/UNDISPLACED (TYPE I & TYPE II)

- In situ internal fixation at the earliest possible
- Three 6.5 cancellous screws (Threads crossing fracture site) should be placed in inverted triangle or triangular configuration



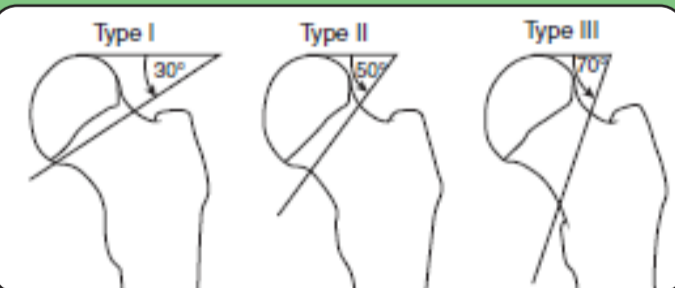
DISPLACED (TYPE III & TYPE IV) UPTO AGE 60 YEARS

- Closed reduction in anatomical position
- If closed reduction is not possible then open reduction should be done
- Fracture fixation is performed by either multiple screw fixation or by Dynamic Hip Screw (DHS) with de-rotation screw



DHS WITH DE-ROTATION SCREW

- Cervicotrochanteric basal neck femur
- Pauwel's type III fracture



MORE THAN 60 YEARS

- Displaced femoral neck fractures require arthroplasty
 - Unipolar (Austin Moore prosthesis)
 - Modular bipolar prosthesis
 - Total Hip Replacement (THR)



INDICATIONS OF THR

- Intracapsular fracture associated with marked arthritis of the hip
- Pathological fractures in patients more than 60 years

ABBREVIATIONS

ADL: Activities of Daily Living

AP: Antero-posterior

DHS: Dynamic Hip Screw

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👉 EARLY SURGICAL TREATMENT IS DESIRABLE

This STW has been prepared by national experts of India with feasibility considerations for various levels of healthcare system in the country. These broad guidelines are advisory, and are based on expert opinions and available scientific evidence. There may be variations in the management of an individual patient based on his/her specific condition, as decided by the treating physician. There will be no indemnity for direct or indirect consequences. Kindly visit the website of ICMR for more information: (icmr.gov.in) for more information. ©Indian Council of Medical Research, Ministry of Health & Family Welfare, Government of India.