

**Elective No. 3**

|                                                              |                                                                                                                                                                                    |
|--------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Name of Block                                                | Block 1                                                                                                                                                                            |
| Name of Elective                                             | <b>Disorders &amp; Paediatric Orthopaedics + CTEV</b>                                                                                                                              |
| Location of hospital Lab or research facility                | IPD / EMERGENCY                                                                                                                                                                    |
| Name of internal preceptor(s)                                | Dr. Deepak Jain                                                                                                                                                                    |
| Name of external preceptor (if applicable)                   |                                                                                                                                                                                    |
| Learning objectives of elective                              | <ol style="list-style-type: none"><li>1. Classification</li><li>2. Modalities of treatment</li><li>3. Rehabilitation</li></ol>                                                     |
| Number of students that can be accommodated in this elective | 3 – 5                                                                                                                                                                              |
| Prerequisites for elective                                   | --                                                                                                                                                                                 |
| Learning resources for students                              | Text Book of Orthopedics by Maheshwari                                                                                                                                             |
| List of activities of student participation                  | <ol style="list-style-type: none"><li>1.history taking</li><li>2. clinical examination</li><li>3. identify fractures on x-ray</li><li>4. application of cast &amp; Brace</li></ol> |
| Portfolio entries required                                   | Yes                                                                                                                                                                                |
| Log book entry required                                      | Yes                                                                                                                                                                                |
| Assessment                                                   | <ol style="list-style-type: none"><li>1. Demonstration</li><li>2. MCQ's</li></ol>                                                                                                  |
| Other comments                                               |                                                                                                                                                                                    |

## **Disorders of Paediatric Orthopaedics + CTEV**

### **Introduction**

Paediatric orthopaedics is the branch of medicine that deals with the diagnosis and treatment of disorders of orthopaedic nature affecting children up to 18 years of age. The practice of paediatric orthopaedics relies heavily on knowledge of principles and on technical skills

Fractures are common in children, occurring at a rate of 12 to 30 per 1000 children every year. The risk of sustaining a fracture between birth and 16 years of age has been reported to be 42% to 64% for boys and 27% to 40% for girls.

A paediatric orthopaedician deals with congenital and acquired diseases, along with traumatology of the musculoskeletal system. In particular, issues dealt with include CTEV or club foot, scoliosis, genu Varus or valgum, rotational deformities, flat feet, hip dysplasia, osteochondritis, hip epiphysiolysis, congenital malformations, bone cysts, aneurysmal cyst etc. Others include bone dysplasia's, asymmetry of lower limbs, hypoplasias, arthrogryposis, deformity of the lower limbs due to peripheral neuropathy, Blount's disease, axial deviation of the limbs, osteogenesis imperfecta, cerebral palsy, spina bifida, spinal dysraphism, pseudarthrosis, and trauma.

DMC & H is successfully running a dedicated clinic for management of club foot – **'Step Well Clinic'** in association with Anushkaa Foundation.

A pediatric orthopedic surgeon has extensive experience in casting and bracing. Many fractures in children can be treated without surgery. Other conditions, such as hip dysplasia or clubfoot, may also be treated with casting and bracing rather than surgery. When surgery is necessary, a pediatric surgeon has specialized training with implants and techniques unique to the growing body, such as guided growth for limb length differences or deformity.

Treatment planning for pediatric patients takes into account the family's situation in addition to the child's medical needs.