



COMMON PAEDIATRIC CONDITIONS THAT REQUIRE SURGERY

Edited by: Dr Low Yee, Head and Senior Consultant, Department of Paediatric Surgery; Deputy Chairman, Division of Surgery, KK Women's and Children's Hospital

At a recent forum for general practitioners, specialists from the Division of Surgery at KK Women's and Children's Hospital (KKH) shared updates on some common surgical conditions encountered in their practice. A summary of these updates follow:

FLAT FEET

Dr Tay Guan Tzu, Associate Consultant, Department of Orthopaedic Surgery, KKH

The most common cause of flat feet is generalised ligament laxity. If a child with flatfeet has an associated tight posterior complex, surgical intervention may be required. Rigid flat feet due to tarsal coalition do not exhibit an arch on the tip-toe test, and surgery will be required if the child is symptomatic. The primary healthcare physician should be on the lookout for symptomatic cases of flat feet. These should be referred for further investigation and treatment.

SCOLIOSIS

Dr Reuben Soh, Associate Consultant, Department of Orthopaedic Surgery, KKH

Scoliosis is a common spine-related problem for young children. A simple test, which can be conducted by a general practitioner, is the Adam's forward bend test – which demonstrates asymmetry of the ribs due to undiscovered scoliosis of the spine. Loss of trunk symmetry can also be attributed to scoliosis, and such cases should be referred for a formal standing X-ray, to diagnose and assess severity of the condition. Red flags, such as pain, neurological symptoms or bowel and bladder dysfunction, warrant an expedited referral.

CHILDHOOD EYE CONDITIONS

Dr Zena Lim, Visiting Consultant, Ophthalmology Service, KKH

Itchy eyes and excessive blinking are commonly due to allergic conjunctivitis. Treatment includes avoiding offending allergens and the application of mast cell stabiliser eye drops.

Congenital glaucoma, which can potentially lead to blindness, often presents with a bulgy eye in its late stage. A triad of blepharospam, photophobia and tearing necessitates urgent referral.

For early diagnosis of childhood cataract and retinoblastoma, it is important to conduct red reflex testing in children. Retinoblastoma can be life-threatening, and an untreated cataract can result in amblyopia and irreversible vision loss.

PAEDIATRIC PLASTIC Surgical conditions

Dr Gale Lim, Associate Consultant, Department of Plastic, Reconstructive and Aesthetic Surgery, KKH

Some paediatric conditions require plastic surgery management. These include:

• Dermoid cysts, which are benign congenital lesions around the eyebrow. Imaging is recommended

for lesions suspected of having intracranial extension. Complete excision is recommended.

 Congenital giant nevi, which are dark-colored, often hairy patches of skin. The rate of transformation to malignant melanoma has been reported to be eight to thirty percent. It is recommended that the lesion be surgically removed as early as possible.

CHEST WALL ANOMALIES

Dr Loh Yee Jim, Consultant, Cardiothoracic Surgery Service, KKH

Pectus excavatum is the most common deformity of the anterior chest wall, and is characterised by depression in the breastbone. Most cases are diagnosed at birth or in the first two years of life, and the condition is expected to worsen as the child grows. Treatment may be conservative or surgical.

Pectus Carinatum is a protrusion of the chest over the sternum, and may be associated with severe childhood asthma, scoliosis or a positive family history. The condition usually presents earlier in girls and later in boys (age 11-14 years). Cases should be referred for tertiary assessment and treatment may include bracing and surgery.

