Nasal tip plasty with ear cartilage

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In Asian rhinoplasties, septal extension graft is one of the most widely used surgical techniques, and is a simple yet robust method that uses solid septal cartilage to effectively fix the released alar cartilage into amore caudal position, along with tip projection and correction of columellar retraction -all in a single procedure. But in Asians, septal cartilage is often not enough for sufficient projection and elongation of the tip. And septal cartilage frequently results in nasal tip rigidity with unnatural appearance on smiling.

To overcome the disadvantages of septal extension graft, ear cartilage is a good material for Asian tip-plasties. The flexibility of the ear cartilage graft results in a less rigid nasal tip and avoids interfering with the function of membranous septum.

Histologically, septal cartilage and rib cartilage composed of hyaline cartilage are hard and inflexible, whereas ear and alar cartilage are elastic cartilage with great flexibility and ability to maintain its shape against external forces. Also, one of the great advantages of conchal cartilage is that it can be used with surrounded perichondrium essential for conferring flexibility to prevent cartilage fracture.

The preferred donor site is cymba and cavum concha, rarely tragus (Fig. 1). To obtain sufficient amount of ear cartilage without ear shape distortion, maintaining the integrity of helical crus between cymba and cavum concha is the iron rule. Ear cartilage can be used as a columellar strut (Fig.2), onlay tip graft (Fig.3), derotation graft (Fig.4), alar spreader graft (Fig.5), septal extension graft (Fig.6) and others.