

CASE REPORT

UNUSUAL CONJOINT TWINS

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INTRODUCTION: A unique anomaly of multiple pregnancy is conjoined twins. They are derived from single fertilized ovum occurring in 200 to 2,50,000 births with incidence 1 per 50,000 to 1,00,000 live births¹. Conjoined twinning arises when the twinning event occurs at about the primitive streak stage of development at about 13-14 days after fertilization^{2,3}. Conjoined twinning occurs by the incomplete splitting of the embryonic axis and, with the exception of parasitic conjoined twins, all are symmetrical and “the same parts are always united to the same parts”. Depending upon the site of fusion or non fusion types of twins may differ, either grossly separable (*duplica completa*), or grossly inseparable (*duplica incompleta*). Embryological classification by Spencer is ventral fusion (87%) and dorsal fusion (13%) . Classification of conjoined twins according to external forms of conjunction has been proposed by Leacham. (Table 1).

CASE REPORT: A 23 year second gravida with 1 living child, resident of a village about 30 km away from our centre presented to labour ward on 5/9/2012 . She was an unbooked case with no antenatal investigations and Ultrasound report. There was no history of congenital anomalies in siblings or family members. Her obstetric examination revealed a live term foetus with transverse lie in second stage of labour, with bulging membranes. She was immediately taken for emergency LSCS and baby was extracted by breech , there was no angle extension or no pph. Twin weighing about 3 kg revealed two heads, 3 upper limbs, two separate lateral normal limbs but 1 central limb which was fused up to wrist with 2 separate palms, 3 lower limbs two were normal and one rudimentary in the lower back in the midline .Two external genitalia of which one well developed and other incompletely developed with one patent anal orifice. Single thorax, abdomen and pelvis. Baby was alive for 15min after resuscitation. Mother had an uneventful recovery.

X-ray of the fetus (Fig. 2) revealed –

1. There were two separate craniums with normal shape and size.
2. There were two vertebral columns separate till the sacrum with evidence of scoliosis in both.
3. Thoracopagus with E/O fusion of the adjacent limbs, Single cardia, lung fields of the foetus on right side appears to be hyper inflated.
4. There were three upper limbs, the central fused arm showed two humeri, two radii two ulnae with two separate palms.

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5. There were three lower limbs two of which are normal and third was rudimentary located in the midline.

DISCUSSION: Conjoined twins are generally incompatible with life i.e. 65% of cases are stillborn while of those that are born alive, 35% die within the first 24 hours [4]. Only 25% survive to an age where surgical separation can be considered [5]. The incidence of monozygotic twinning is independent of race, maternal age and geography. The most common varieties encountered were *thoraco-omphalopagus* (28%), *thoracopagus* (18.5%), *omphalopagus* (10%), *parasitic twins* (10%) and *craniopagus* (6%). Of these, about 40% were stillborn, and 60% liveborn, although only about 25% of those that survived to birth lived long enough to be candidates for surgery..

Dicephalus is a subset of parapagus rare variety of conjoint twins were they share common body from neck or upper chest downwards with fused thorax, abdomen and pelvis which is the most severe form of conjoint twinning of all types. In the literature this type of twins account for about 0.5% of all conjoint twins with incidence of about 0.05% per 10,000 live births with female predominance of 3:1.⁶

Goel and Goel⁷ also reported twin delivery by caesarean section having two heads, two arms, single body and two limbs. The present conjoint twin is a rare case in which the baby had two normal heads with two necks. And two separate vertebral columns with a single pelvis, four upper limbs in which central two were fused up to the palms. As dicephalus twins are always dipus⁸, in our case it is tripus a very rare variety.

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Table 1

Designation	Description
Thoracopagus	Joined at chest
Cephalo-thoracopagus	Joined at head and chest
Dicephalus	Single trunk and two heads
Craniopagus	Joined at head
Omphalopagus	Joined at abdomen
Rachipagus	Dorsal union of head and trunk
Thoraco-omphalopagus	Joined at chest and abdomen



Fig.1. Dicephalus tetrabrachius tripus twin

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Fig.2. X-ray of the twin