

vobiocin (60 mg/kg) should be given daily. A combination of ceftazidime (100 mg/kg) and trimethoprim-sulfamethoxazole is likely to emerge as the treatment of choice in the future. In less acute cases, tetracycline with cotrimoxazole has been used successfully. Prolonged treatment (at least for 1 month) is important in all cases: 3 to 6 months therapy may be necessary in some cases (2,6,7).

Melioidosis is best prevented by avoiding undue exposure to soil and surface water, especially after the start of heavy rain. No preventive vaccine is available. In endemic areas vigorous cleaning of abrasions and lacerations is recommended. Though India is not endemic to melioidosis, sporadic cases may occur, especially in the monsoons in the areas of heavy rainfall.

#### REFERENCES

1. Thurnheer U, Novak A, Michel M, Ruchti C, Jutzi H, Weiss M. Septic Melioidosis following a visit to India. *Schweiz Med Wochenschr* 1988; 118: 558-564.
2. Brown M, Thin RN. Melioidosis. In: *Infectious Diseases and Medical Microbiology*, 2nd edn. Eds Braude AI, Davis CE, Fierer J. Philadelphia, WB Saunders Company 1986, pp 802-804.
3. Prevatt AL, Hunt JS. Chronic systemic Melioidosis: Review of literature and report of a case, with a note on visual disturbance due to chloramphenicol. *Am J Med* 1957; 23: 810-823.
4. Everett DE, Nelson RA. Pulmonary Melioidosis. *Am Rev Resp Dis* 1975; 112: 331-340.
5. Pigott JA, Hochholzer L. Human Melioidosis-A histopathologic study of acute and chronic melioidosis. *Arch Path* 1970; 90: 101-111.
6. Sanford JP. Melioidosis and glanders. In: *Petersdorf, Adams, Braunwald, Issel-*

*bacher, Martin, Wilson Harrison's Principles of Internal Medicine*, 10th edn New York, McGraw Hill International Book Company: 1983, pp 954-956.

7. Eickhoff TC, Bennett JV, Hayes PS, Feely J *Pseudomonas pseudomallei*: Susceptibility to chemotherapeutic agents. *J Infect Dis* 1970; 121: 95-102.

### Intrauterine Amputation Associated with Amniotic Band Syndrome

B. Vishnu Bhat  
K.K. Pandey  
S. Srinivasan  
S. Habeebullah  
A. Bupathy

The amniotic band syndrome (ABS) is a rare collection of fetal malformations associated with fibrous bands that appear to entangle or entrap various fetal parts *in-utero* leading to deformation, malformation or disruption. The segmental amputation of body parts with this condition is uncommon(1,2). A case of intrauterine amputation of right leg and terminal phalanges due to amniotic band is described.

*From the Departments of Pediatrics and Obstetrics and Gynecology, Jawaharlal Institute of Postgraduate Medical Education and Research, Pondicherry-605 006.*

*Reprint requests: Dr. B. Vishnu Bhat, Associate Professor and Incharge of Neonatal Division, Department of Pediatrics, JIPMER, Pondicherry-605 006.*

*Received for publication June 27, 1990;  
Accepted September 23, 1990*

## Case Report

A male baby, weighing 1.25 kg at 34 weeks gestation, was born of consanguineous marriage (first cousin) to a 27 years old, 5th gravida mother, by Cesarean section. The mother earlier had one still-birth and another neonatal death due to prematurity. She had attempted abortion by ingestion of some indigenous medicine at 3rd month of pregnancy. Her membranes ruptured spontaneously 6 days prior to delivery, and had draining of blood-stained amniotic fluid. There was no family history of congenital anomalies.

The Cesarean section was performed following premature rupture of membranes with antepartum hemorrhage. The baby's Apgar score was 6/10 and 9/10 at 1 and 5 minutes, respectively. The neonate had below-knee amputation of right leg and the well formed distal portion was lying freely in the lower segment of the uterus below the presenting part (vertex). The left hand showed syndactyly of the index, middle and ring fingers with amputation of the distal phalanges of the middle and index fingers with a fibrous amniotic band coiled around that area. There were few superficial ring constrictions on the left leg without any pressure effect on the distal segment (*Fig.*). No other malformation was present. There was Type II posterior placenta previa, but the placenta and cord were normal.

The X-ray of the right lower limb showed below knee amputation. Baby made an uneventful recovery after a course of antibiotics and was discharged on 10th day.

## Discussion

The amniotic band syndrome is a rare

anomaly(1-4). It may occur once in 1,200 to 15,000 live births(5). The sex ratio is equal and there is no racial predisposition. It is sporadic in distribution without any recurrence risk in siblings or children of affected adults(1). The greater frequency of amniotic band syndrome in monozygotic twins indicates teratogenic insult as a possible cause(6,7) but no definite association has been found. Amniocentesis has been implicated in a few cases(8).

The exact etiology of amniotic band syndrome remains unclear. According to Streeter's theory (dysplasia fetalis), the cause for all the anomalies of the amniotic band syndrome is defective local embryologic development. However, Torpin postulated that the amniotic band syndrome results from extra-amniotic, intra-chorionic entanglement of fetal parts with mesodermic strands(2). In this case, the presence of well formed amputated distal portion of right leg and the fibrous bands coiling around the amputated segment of the fingers supports this hypothesis. Deformation or disruption results depending upon the time of the amniotic disruption. Rupture early in gestation would lead to the more severe craniofacial and visceral manifestations. But interference in later gestation period, is expressed as constrictions or disruptions in non-embryologic site(1).

There is a wide spectrum of anomalies associated with this syndrome. Constriction ring defects of the extremities are the commonest presentation, while amputation of digits and limb are very rare. Cranio-facial defects and visceral manifestations are infrequent(4).

The prenatal diagnosis of this condition is now possible by sonographic visualiza-



*Fig. Clinical photograph showing below knee amputation of the right lower limb, syndactyly of the left index, middle and ring finger with amputation of the distal phalanges of the middle and index finger, and superficial amniotic bands over the left leg.*

tion of either amniotic sheets or bands associated with fetal deformities in non-embryologic distribution(9). As soon as the diagnosis is made, the deep constrictions should be released by Z-plasty, as severely compromised circulation may lead to auto-amputation. The ultimate prognosis for the mildly affected infants with digital or limb defects is good and life expectancy is normal in such cases(5).

## REFERENCES

1. Higinbottom MC, Jones KL, Hall BD, Smith DW. The amniotic band disruption complex: Timing of amniotic rupture and variable spectra of consequent defects. *J Pediatr* 1979, 95: 544-549.
2. Torpin R. Amniochorionic mesoblastic fibrous strings and amniotic bands. *Am J Obstet Gynecol* 1965, 91: 65-75.
3. Joshi RM, Bharucha BA, Kumta NB. Congenital limb defects. *Indian Pediatr* 1985, 22: 107-112.
4. Seeds JW, Cefalo RC, Berbert WNP. Amniotic band syndrome. *Am J Obstet Gynecol* 1982, 144: 243-248.
5. Rusthon DI. Amniotic band syndrome. *Br Med J* 1983, 286: 919-920.
6. Benirschke K. Multiple gestation. In: *Maternal-Fetal Medicine*. Eds. Creasy PK, Resnick R. Philadelphia, WB Saunders Co. 1984, pp 511-538.
7. Lockwood C, Ghidini A, Romero R. Amniotic band syndrome in monozygotic

- twins: Prenatal diagnosis and pathogenesis. *Obstet Gynecol* 1988, 71: 1012-1016.
8. Moessinger AC, Blanc WA, Byrne J, *et al.* Amniotic band syndrome associated with amniocentesis. *Am J Obstet Gynecol* 1981, 141: 588-591.
9. Mahony BS, Filly RA, Callen PW, Golbus MS. The amniotic band syndrome. Antenatal sonographic diagnosis and potential pitfalls. *Am J Obstet Gynecol* 1985, 152: 63-68.
- 

## **NOTES AND NEWS**

### **THE INTERNATIONAL ACADEMY OF PEDIATRIC TRANSDISCIPLINARY EDUCATION (IAPTE)**

The 6th International Conference of IAPTE/ICP is being held in Beijing, China on Prevention and Treatment of Problems of Children from 28th May to 1st June, 1991. It is a multidisciplinary meeting which is not only discussing the problems of health of children but also preventive aspects and a large number of other colleagues who are concerned with the total care of children would be attending.

Those interested in participating in the Conference may either make enquiries with the Organizing Secretary, Dr. Hua Chin Chen in New York or Dr. P.M. Udani, Bombay so as to get the circular information as well as the abstract proforma. The addresses are:

Dr. Hua - Chin Chen  
Kingsbrook Jewish Medical Centre,  
585 Schenectady Ave,  
Brooklyn,  
New York-11203

Dr. P.M. Udani,  
69, N. Subash Road,  
Bombay-400 020