skeleton. A survey of 85 cases from Kaduna, Nigeria. Oral Surg. 1980;38:355-358.

- 3. Oji C. Fractures of the facial skeleton in children; a survey of patients under the age of 11years. J Cranio-Maxfac Surg. 1998;26:322-325.
- Ugboko VI, Odusanya S, Ogunbodede E. Maxillofacial fractures in children. Paed Dent J. 1998;8:31-35.
- Gassner R, Tuli T, Hachl O, Moreira R, Ulmer H. Cranio maxillofacial trauma in children: a review of 3385 cases with 6060 injuries in 10years. J Oral Maxillofac Surg. 2004;62:399-407.
- Norholt SE, Khrishnan V, Sidet-Pedersen S, Jensen IB. Paediatric condylar fractures: a longterm follow-up study of 55 patients. J Oral Maxillofac Surg. 1993;41:1302-1310.
- Odusanya SA. Maxillofacial fractures in Southwestern Nigeria (1997-1981). Trop Dent J. 1985;3:153-156.
- Abiose BO. Maxillofacial skeleton injuries in the Western states of Nigeria. Br J Oral Maxillofac Surg. 1986;24:31-39.
- Ugboko VI, Odusanya SA, Fagade OO. Maxillofacial fractures in a semi-urban Nigerian teaching hospital. A review of 442 cases. Int J Oral Maxillofac Surg. 1998;27:286-289.
- Adebayo ET, Ajike SO, Adekeye EO. Analysis of the pattern of maxillofacial fractures in Kaduna, Nigeria. Br J Oral Maxillofac Surg. 2003;4:396-400.
- Maclennan WD. Injuries involving the teeth and jaw in young children. Arch Dis Child. 1957;32:492.

- Kazanjian VH, Converse JM. The surgical treatment of facial fractures. 2nd edn. Williams and Wilkins Co., Baltimore 1959, pg 306.
- Hagan EH, Huelke DF. An analysis of 319 case reports of mandibular fractures. J Oral Surg. 1961;19:93-104.
- Rowe NL, Killey HC. Fractures of the facial skeleton. Churchill Livingstone, London 1968. pg 173-9.
- Al-Aboosi K, Perriman A. One hundred cases of mandibular fractures in Iraq. Int J Oral Surg. 1976;5:8-12.
- Bamjee Y, Lownie JF, Cleaton-Jones PE, Lownie MA. Maxillofacial injuries in a group of South Africans under 18years of age. Br J Oral Maxillofac Surg. 1996;34:298-302.
- Posnick JC, Wells M, Pron GE. Paediatric facial fractures in children: evolving patterns of treatment. J Oral Maxillofac Surg. 1993;51:836-844.
- Choung R, Donoff RB, Guralnick WC. A retrospective analysis of 327 mandibular fractures. J Oral Maxillofac Surg. 1983;41:305-309.
- 19. Brown RD, Cowpe JG. Patterns of maxillofacial trauma in two different countries. A comparison between Riyadh and Tayside. J R Coll Surg Edinb. 1985;30:299-302.
- 20. Kaban LB, Mulliken JB, Murray JE. Facial fractures in children. Plast Reconstr Surg. 1977;59:15-20.
- 21. Moreno JC, Fernandez A, Ortiz JA, Montalvo JJ. Complication rates associated with different treatment for mandibular fractures. J Oral Maxillofac Surg. 2000;58:273-280. discussion 280-1.

SPONTANEOUS VAGINAL DELIVERY OF UNDIAGNOSED BIPAGOUS CONJOINT TWINS

Conjoint twins are usually rare events. The incidence in our environment has not really been documented but there have been previous reports.^{1,2} Conjoint twins are classified in different ways. If they are fully formed except for the parts of con-junction, they are called bipagous conjoint twins (or duplicata completa).

Vaginal delivery of conjoint twins was documented in 1950³ and 1981⁴ in Western countries. None, to our knowledge, has been reported in Nigeria. We report a case of undiagnosed bipagous conjoint twins that were delivered by Spontaneous vaginal delivery, unassisted and in a primary level health facility.

A 29-year old woman on the 18th of September 2004 with history of delivery of a set of conjoint twins at a Rural Health Centre. She was gravida 4 para 3 with 2 living children. Though she registered for antenatal care in a private hospital, she did not carry out any investigation including ultrasound or plain x-rays. She had nothing suggestive of "big –for- date" pregnancy or polyhydramnios during the pregnancy. At about 39weeks, she went into spontaneous labor and was rushed to the nearest rural health center where she was assisted by the attendant midwife to have a spontaneous vaginal delivery of a set of conjoint twins. Both twins cried immediately after birth, passed meconium from their respective ani and also passed urine normally. They were promptly referred to our Teaching Hospital.

At presentation the babies were about four hours old, cold to touch and wrapped in their mother's delivery cloths. Both were females with a combined weight of 2.7kg. They were both conscious, satisfactorily active with good intermittent cries. They were neither pale nor jaundiced. Their skins were joined from the sternum down to the hypogastrium. Twin 1 looked smaller and dehydrated. There was cyanosis on the left leg and right foot. There was also edema on the left foot. Her respiratory rate was 34 cycles per minute, the heart rate was 120bpm, and the femoral pulse on that left leg was not palpable. First and second heart sounds were heard; there were no murmurs. The breath sounds were vesicular in both lungs fields. The Bowel sounds were present and normal. A rectal examination confirmed that she had patent anal orifices with good sphincteric tone. All other systems were grossly normal. Twin 2 was bigger and looked generally healthier than twin 1. All her vital signs and clinical findings were essentially normal. The diagnosis of Thoraco-omphalopagous conjoint twins was then made.

Size 6 feeding tube was successfully passed into the stomach of each of the babies and gastric juices with bile were obtained from each of them. 10% Dextrose in 1/5 normal saline was set up on each of them to run as calculated by their combined weight. Vitamin K injection was given to each intramuscularly. The babies were kept warm by wrapping with warm packs and blanket. It was decided to refer them to center that is conversant with management of conjoint twins. After three days at the referral hospital, the babies suddenly died one after the other. Aspiration of feeds was highly suspected, because there were no ante-mortem signs of distress.

Postmortem examination revealed that all the joining from the sternum to the hypogastrium was predominantly at the skin level. No organs were shared. The sternae, the ribs, the thoracic cavities and viscera were all separate. However, the heart of twin 1 had a single chamber from which emanated the aorta. The heart of twin 2 had the usual 4 chambers but they were enlarged. Other systems were essentially normal. Cause of death was then ascribed to Heart failure.

The exact incidence of conjoint twinning is unknown and figures are unreliable because not all cases reach the hospital; some are aborted while some are thrown away as monsters. The figure however is in the range of 1 in 14 000 births in the non-caucasian. $^{\rm 5}$

Although vaginal delivery for conjoint twins has been reported, ¹when diagnosed in utero, the recommended mode of delivery is cesarean section not vaginal delivery, because of the attendant risks to both mother and twins.^{2,4} Undiagnosed conjoint twins may cause dystocia in labor leading to emergency operative delivery thereby endangering the survival of the twins. Surprisingly, there were none of such in this case. When diagnosis is made after birth, prompt transfer to a more ideal institution is a wise decision, as was done for these twins.

There is great need to improve the health care delivery system to make it available and accessible to all our pregnant women. Education of our women on the need for antenatal registration, regular antenatal clinic attendance and hospital delivery should be emphasized. This will make for early detection of such anomalies so that proper arrangement could be made for safe delivery and management of the conjoint babies.

P. C. Ibekwe¹ and C. E. O. Onuoha²

¹Department of Obstetrics and Gynaecology, Ebonyi State University Teaching Hospital, P. M. B .077, Abakaliki, Ebonyi State, Nigeria ²Department of Paediatric Surgery, Ebonyi State University Teaching Hospital, P. M. B .077, Abakaliki, Ebonyi State, Nigeria

Reference

- Grower JI, Teste DW, Teich S. Dicephalic dipus dibrachius an unusual case of conjoint twins. J Pediatr Surg. 1996;31:1698-1700.
- Owolabi AT, Oseni SBA, Sowande OA, et al. Dicephalus dibrachius dipus conjoined twin in a triplet pregnancy. Trop J Obstet Gynaecol. 2005;22:87-889.
- 3. Siegel I. Thoracopagous. Vaginal delivery without destructive operation. Med J Aust. 1950;97:40.
- 4. Green DJ. Vaginal delivery of conjoint. Med J Aust. 1981;2:356-360.
- 5. Nelson MM, Bhethay E, Beighton P. Excessive Siamese twinning. S Afr Med J. 1976;50:697-698.

Perception and Management of Guinea Worm Disease In Infected and At Risk Non- Infected Communities in Oyo State, Nigeria

Dracunculiasis or guinea worm disease caused by worm infestation continues to be a public health

problem among rural communities in Africa, which depend upon unprotected water sources for drinking.