Ping-pong Skull Fracture: Is it always caused by Birth Trauma? A Case Series

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ABSTRACT

Introduction: Depressed skull fracture (DSF), also coined as ‘Ping-Pong’ fracture is not uncommonly seen in newborn. Although mainly due to iatrogenic trauma, spontaneous fracture is possible due to soft and resilient nature of the skull. Its low incidence makes the pathogenesis, natural history and outcome of DSFs remains unclear. Case Report: First case – Patient was delivered via emergency LSCS from a mother known to have Type 2 Diabetes Mellitus, with body mass index (BMI) of 36 kg/m². LSCS was indicated for 2 previous caesareans in labour. Antenatally mother has well control diabetes with appropriate fetal growth. Intraoperatively, adhesiolysis was done to access the lower segment. Upon uterine incision, fetal head was high requiring forceps delivery and gentle fundal pressure. The forceps blades were applied without force. Physical and neurological examination was normal except for indented skull noted at the right parietal region measuring 3x4 cm. Computed Tomography (CT) brain done showed depression of the right parietal bone with a small acute bleed at the left posterior parietal region extending into the left cerebellar tentorium. No active intervention was done and patient was discharged after 5 days of observation. Second case – Patient was delivered via emergency LSCS from 37 years old mother at 40 weeks gestation due to poor labour progress. Mother diagnosed to have gestational thrombocytopenia. Prior to LSCS fetal the head was not engaged with os of 4 cm dilated at right occipito-transverse position. Intraoperatively, the fetus turned to transverse lie and was delivered via breech extraction. Examination of newborn was unremarkable except indentation of right parietal skull bone 5x4 cm. CT brain revealed right fronto-parietal depressed skull with suspicious small interhemispheric subdural bleed. Patient was discharged with no neurosurgical intervention required. Discussion: There are no apparent traumas to the fetuses on both cases although instrumental delivery needed. Spontaneous fracture was possible. Largest comparison of ‘instrument-associated’ and ‘spontaneous’ group in 68 neonates showed intracranial lesion is more associated with instrumental deliveries, however persistent disabilities are rare.

Predictors of Successful Vaginal Delivery after previous Caesarean Section in a Klang Valley Tertiary Hospital

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ABSTRACT

Objective: To identify predictors of successful trial of labor in women after one caesarean delivery. Method: Retrospective observational review from June 2008 until December 2012 of women with one caesarean delivery who delivered at our institution, a tertiary hospital in Klang Valley with delivery rate between 9000-10000 per year with caesarean rate from 25-30%. They were identified from the labour ward registry. Clinical characteristics and intrapartum data were reviewed and analysed using SPSS v 21 to identify predictors of successful VBAC. Result: Of 1574 studied, 456 had recurrent indications for previous caesarean section, while 1119 had non-recurrent indications. The group with recurrent indications for previous caesarean section had less vaginal delivery and more repeat caesarean sections as compared with the group with non-recurrent indications (21.9% and 78.1% vs 46.8% and 53.2%, respectively, p = 0.01). Three women had scar rupture/dehiscence, whom had gone to labour spontaneously. On initial examination, Bishop’s score of more than 6 were likely to deliver vaginally. Patients with previous vaginal delivery and spontaneous labour were more likely to have successful VBAC (85.2 vs. 76.4%, p=0.02) and less oxytocin use (49.7% vs. 70.8%, p < 0.0001). Conclusion: A spontaneous labour, previous vaginal delivery and a non-recurrent indication for the previous caesarean section are important predictors of VBAC in this cohort of women.