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Case Report

Ocular globe Rupture following Forceps assisted-delivery

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Abstract: Forceps assisted delivery can cause serious eye damage to the neonates. In some cases it can even cause the loss of the eyeball with a subsequent blindness. We report a case of a neonate who lost his eye during a prolonged forceps extraction.
Keywords: ocular, globe rupture, forceps

INTRODUCTION

Obstetric forceps are to guide fetal movement during delivery, ideally accompanied by active pushing by the mother. Application and traction differ according to the type of instrument and require extensive training and knowledge of obstetric mechanics. Certain deliveries can be difficult and require careful evaluation informed by experience. If the fetus is not progressing after three pulls, this route of delivery can be abandoned [1].

In developing countries like Mali, forceps is used by many general practitioners and obstetricians. In some cases, forceps delivery is associated with huge traumatic injuries like the one presented here.

CASE REPORT

Fig-1: Photograph of the neonate with rupture of the left eyeball

A neonate, male, weighting 4.125 grams, first born of his mother who is an illiterate housewife of 16 years old. The pregnancy evolved normally. The indication of the forceps was a maternal exhaustion with a vertex presentation. After the delivery, the patient was sent immediately to our office because of ocular injury.

After a thorough clinical examination, the clinical findings were: Deformity of temporal bone of the skull and a rupture of the left eyeball. The right eye was normal. Evisceration was completed in the Institute of Ophthalmology.

DISCUSSION

The ocular injuries related to forceps seems to be uncommon [2], they have a major risk: amblyopia [3]. In the United Kingdom, the rate of instrumental delivery range from 10% and 15%; by the years 2000, the rate has declined [4]. Instrumental delivery is often an alternative to cesarian section according to some authors [5]. In the application of forceps in a direct occipito-anterior position, the long axis of the blades should lie symmetrically between both sides of the head. The forceps should lock easily without any force and the handles should lie parallel to the plane of the floor. The most crucial point of the forceps delivery is precise knowledge of the position and the station of the fetal head [6]. Inappropriate forceps application can cause serious injuries to the neonate like cuts, bruises and even death [7]. Ocular trauma following forceps delivery is commonly minor, involving ocular surface;

injuries such as breaks in Descement's membrane, hyphema and cornea abscess have been reported [8, 9]. In the current case, the forceps application was very injurious because of the''traumatic evisceration'' of the eyeball with a subsequent unilateral blindness.

CONCLUSION

Forceps assisted-delivery is injurious for the neonate particularly when used in an inappropriate way by an unskillful practitioner. The ocular injury may damage the eye and leave permanent sequelae. The use of forceps must be avoided by reckless medical practitioners.

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