

## **PRACTICE POINT**

### **SECOND STAGE CAESAREAN SECTION : POINTS TO PONDER**

**DR .K. SARASWATHI...MD..DGO..**

A caesarean delivery defines the birth of a fetus through a surgical procedure in which a fetus is delivered through an incision in the maternal abdomen and intact uterus. The rate of caesarean delivery is increasing , currently 32.8% according to World Health Organisation (WHO). The reasons include the following

- 1) The rising maternal age and related medical complications
- 2) Widespread usage of Electronic fetal monitoring
- 3) Increased rates of labour induction
- 4) Changing trends in the management of breech delivery, Preterm delivery
- 5) Reduction in acceptance for instrumental vaginal deliveries
- 6) Demand CS
- 7) Increase in ART pregnancies
- 8) Small family norm (single child)

We should keep in mind that primary c section has major impact on the future pregnancies – which being the importance of this topic.

Second stage c section is defined as c section done at the time of full dilatation of cervix. Incidence of second stage c section is 6% according to RCOG in which more than half of the deliveries, instrument application was not even attempted. The increasing rate of second stage c section is of major clinical concern in obstetrics today. This trend is multifactorial -

- a) Lack of training and supervision for junior staffs in second stage decision making,
- b) Lack of adequate knowledge and skill about the techniques of assisted vaginal deliveries
- c) A negative impact on the obstetrician's decision regarding the mode of delivery ,due to compulsion for vaginal delivery by the relatives.
- d) Concerns relating to litigation issues.

### **IMPACT**

In general the c section have higher complications than vaginal births. A c section at second stage has additional associated complications. C section in second stage is very challenging because of the distorted pelvic anatomy and fetal head which is most often deeply impacted. They have higher incidence of sepsis, haemorrhage, intraoperative trauma and prolonged hospital stay causing higher maternal and perinatal morbidity and mortality.

### ***How to overcome this impact ?***

#### **A) Prevention:**

- i)To implement proper protocols and obstetric training programmes for instrumental application and methods of second stage c section.
- ii) Adequate supervised training opportunities in decision making
- iii) Quick access to senior consultants and requirements for emergency c section

iv) Proper counselling of the mother and the relatives about the present situation and the decision, to substantiate the same

v) Monitoring of labour with partograph and proper documentation

For proper decision making – Proper knowledge of maternal and neonatal morbidity associated with second stage c section and instrumental delivery is mandatory.

Maternal and neonatal morbidity	Second stage caesarean section	Instrumental vaginal delivery
1) Tissue trauma	24% ( uterine incision extension)	8% ( 3 <sup>rd</sup> degree tear)
2) Maternal hemorrhage	Increased	Comparatively lesser
3) Psychological impact	Most women would not want the bitter experience again, in addition their main aim of vaginal delivery is not fulfilled	Better than c section because they get the gratification of vaginal delivery at the end
4) Subfertility	Increased	Lesser
5) Urinary incontinence and loss of bowel control	Lesser	Increased
6) Fetal trauma	Lesser	More common
7) NICU admissions	Comparable	Comparable

Hence with all this knowledge, each case has to be assessed individually and decided accordingly for the ultimate outcome of a healthy baby and mother.

#### **B) Overcoming the hurdles in second stage c section:**

i) Pre operative safety measures : Oxytocin infusion should be stopped, use of uterine relaxants is controversial, immediate access to emergency c section, conformation of position and station of the head in theatre to decide on the method of disimpaction, FHS monitoring

ii) Intraoperative disimpaction methods – a) Push method

b) pull method or reverse breech extraction

c) Patwardhan technique

d) Medical devices like The Fetal Disimpacting system (fetal pillow), C-Snorkel (curved tube with multiple ventilation ports to create vacuum between vaginal wall and fetal head)

#### **CONCLUSION**

Achieving vaginal delivery lowers the risk associated with repeat cesarean deliveries. But this doesn't mean that it is mandatory to decide on a vaginal delivery when there is a doubtful outcome. Therefore each case has to be assessed and to be planned accordingly. A senior consultant review is warranted when a junior doctor takes a decision regarding instrumental delivery or c section. Proper training programmes for both instrumental delivery and second stage c section will not only bring down the rate of second stage c section but also the associated morbidities.

