Introduction

Postpartum hemorrhage (PPH) is the major cause of maternal death particularly in developing countries, and most cases are due to atonic uterus. Hemorrhage can occur despite active management of third stage of labour **(Lokugamage et al, 2001).**

PPH has many potential causes, but the most common, by a wide margin, is uterine atony, i.e. failure of the uterus to contract and retract following delivery of the baby. PPH in a previous pregnancy is a major risk factor and every effort should be made to determine its severity and cause. In a recent randomized trial in the United States, birth weight, labour induction and augmentation, chorioamnionitis, magnesium sulfate use, and previous PPH were all positively associated with increased risk of PPH **(Jackson, 2001).**

The third stage of labour refers to the period following the completed delivery of the newborn until the completed delivery of the placenta. Relatively little thought or teaching seems to be devoted to the third stage of labour compared with that given to the first and second stages. But significantly more to the complications that may arise immediately following delivery **(Cunningham, 2001).**

Active management of the third stage of labour was defined in the recent **(Figo, 2004)** as the administration of uterotonic agents, controlled cord traction, and uterine massage

The recommended protocol for management of PPH:

Give uterotonic drugs e.g.(methergine) within one minute of the birth of the baby, clamp and cut the umbilical cord soon after birth and,

deliver the placenta by applying downward traction on the umbilical cord during a strong uterine contraction, while at same time applying counter pressure on the uterus through the abdomen **(Prendiville et al., 2001).**

The treatment of patients with PPH has 2 major components : (1)resuscitation and management of obstetric hemorrhage and, possibly,hypovolemic shock &(2) Identification and management of the underlying cause of the hemorrhage.

For the purpose of discussion, these components are discussed separately; however, remember that successful management of PPH requires that both components be simultaneously and systematically addressed **(Maier, 1993).**

Uterine packing has been reported to control PPH in seven out of nine patients when left in place for up to 96 hours **(Maier, 1993).** Similar to packing, good results with tamponade of the uterine cavity using a Sengstaken-Blakemore tube have been reported. The tube was left inflated for 24 hours and then slowly deflated. Several studies have reported the use of a large, 30-mL Foley catheter placed into the uterine cavity **(Kartmark, 1994).**

Recently, tamponade with a condom catheter inflated with 250-500 ml of normal saline has been demonstrated to be help full in controlling postpartum hemorrhage resulting from atony **(Akhter, 2003)**.

If the postpartum hemorrhage occurs secondary to atony and is unresponsive to medical management or packing, vascular ligation often will be necessary (hypogastric artery ligation) which reduces arterial pulse pressure to pelvic organ. Ligation of the ascending branch of the

uterine artery should be attempted, as first step if the hemorrhage not stops **(Abdraboo, 1994).**

There are two described surgical techniques for the control of hemorrhage secondary to uterine atony,(haemostatic suturing a through and through suture of number one chromic with this procedure, and B-Lynch surgical technique) **(B-Lynch et al, 1997; Choo et al, 2000).**

Another haemostatic suturing technique recently described involved placing multiple 2-3 cm suture in myometrium using segment of the anterior and posterior uterine wall are sewn together and tightly compressing the intervening myometrium, this technique can be used in the portion of the uterus to control bleeding from atony **(Choo et al.,2000;Hyman et al.,2002)**. Intractable atony may mandate hysterectomy as life saving measure **(Cunningham et al., 2001).**