Summary & Conclusion

This study was carried out on 200 women who delivered vaginally at Benha University and Kafr El-Zayat General Hospitals from November 2009 to May 2010. They were randomly divided into two groups:

Group I: included 100 women who received misoprostol (Misotac, Sigma, Egypt) one tablet (200 µg) sublingually immediately after delivery of the anterior shoulder of the baby.

Group II: included 100 women who received methylergometrine (Methergine,Sandoz, UK) one ampole after delivery of the anterior shoulder of the baby.

The results showed the postpartum features of the two studied groups. There were no significant statistical differences among the two groups with regard to estimated blood loss where the mean amount of estimated blood loss was 174.9 ± 97.039 mL in misoprostol group; this was less than the methylergometrine group which was 189.35 ± 85.244 mL. No significant statistical differences were found when the misoprostol group and methylergometrine group were compared with regard to the percentage of women requiring additional uterotonic agents administration.

There were significant statistical differences among the two groups with regard the mean duration of the third stage of labor where it was 6.21 ± 4.368 minutes and 7.52 ± 4.389 minutes in misoprostol group and methylergometrine group respectively. It was statistically less in misoprostol group.

This study has shown that sublingual misoprostol 200 µg after delivery of the anterior shoulder of the baby appears to be as effective as methylergometrine 0.2 mg in minimizing the blood loss in low risk pregnant women in the third stage of labor.

Adverse effects were minor and the drug has the advantages of stability at room temperature and ease of administration and therefore it does not require refrigeration, dark storage or administration by an attendant. It is inexpensive and has a shelf life of several years. It can additionally be administered to hypertensive patients and also those with cardiac disease as it does not cause hypertension.

So, 200 µg of sublingual misoprostol could be tried as a standard uterotonic drugs used for minimizing blood loss in low-resource settings where no alternatives exist. It can be recommended for routine use in home deliveries and peripheral centers in low-resource settings where both refrigeration facilities and skilled personal continue to be scarce.