

### 4.3.2. Retrospective cohort study (n=78) comparing outcomes in PPH management using CELOX™ PPH versus balloon tamponade.

#### Uterine packing with CELOX™ PPH compared to balloon tamponade for managing postpartum haemorrhage.

Dueckelmann AM, Hinkson L, Nonnenmacher A, Siedentopf JP, Schoenborn I, Weizsaecker K, Kaufner L, Henrich W, Braun T. Eur J Obstet Gynecol Reprod Biol. 2019; 240:151-155.

Retrospective cohort study (n=78)

- Assessment of the effectiveness and safety of CELOX™ PPH versus balloon tamponade for managing severe PPH
- CELOX™ PPH is an excellent treatment for severe PPH and is at least equivalent to the balloon tamponade
- Following the introduction of CELOX™ PPH the incidence of hysterectomies (versus standard of care) was reduced by 50%
- CELOX™ PPH is particularly effective in managing PPH resulting from uterine atony or placenta bed bleeding following vaginal or caesarean section deliveries.
- CELOX™ PPH is especially beneficial for cases involving lower uterine segment atony, placenta previa bed bleeding, and coagulopathy.
- No adverse events or treatment-related morbidity were linked to CELOX™ PPH

In a retrospective cohort study evaluation set in a university hospital obstetrics department, seventy-eight patients (47 received CELOX™ PPH, thirty-one received balloon tamponade (Bakri Balloon)). The primary objective of the study was to compare the outcomes in management of PPH. The primary outcome of the evaluation was uterine bleeding termination without additional surgical intervention. Secondary outcomes included blood loss, and number of blood transfusions (Dueckelmann et al, 2019). CELOX™ PPH was as effective as balloon tamponade in halting uterine bleeding, or blood loss. Three patients in the balloon tamponade group required a hysterectomy. No hysterectomy was required in the CELOX™ PPH group. During an observation period of 18 months before (5414 deliveries) and 18 months (5430 deliveries) after introduction of CELOX™ PPH at one clinic location four and two, respectively, PPH-related hysterectomies had to be performed. Thus, the rate of peripartum hysterectomies was reduced by 50%. The authors concluded that CELOX™ PPH is an excellent treatment for PPH and appeared to be at least equivalent to the balloon tamponade for treating severe PPH (Appendix 1, Table 13).

