

## 2. ABSTRACT

**Introduction** – A new guideline and a strict protocol of Oxytocin infusion administered via an infusion pump had been adopted for induction of labour (IOL) in the University Obstetric Unit, Teaching Hospital Mahamodara, Galle, in 2006.

**Objective** – To study induction of labour and its outcome before and after adopting this new guideline and strict protocol of Oxytocin infusion.

**Design** – A prospective observational study.

**Method** - Using a pretested form data collected from 322 consecutive women who had IOL during a period of nine months commencing 15<sup>th</sup> June 2006, were compared with those obtained earlier in 2003, before the new guideline and strict protocol was implemented in the unit.

**Results**- The leading indications for IOL were past dates 45.8% (2003) and 45% (2006), pre labour rupture of membranes 28.2% (2003) and 35.4% (2006). Successful vaginal deliveries showed a possible increase from 84.7% in 2003 to 90.4% in 2006 and failed inductions showed a possible reduction from 3.8% in 2003 to 2.2% in 2006. Mean induction delivery interval for successful vaginal deliveries varied from 343 minutes (95% CI 333-370) in 2003 to 318 minutes (95% CI 307-327) in 2006. Mean number of oxytocin units for successful vaginal deliveries increased from 6.7 units (95% CI 5.8-7.4)

in 2003 to 10.4 units (95% CI 6.7 – 16.2, p= 0.02) in 2006. Mean duration prior to a diagnosis of a failed induction decreased from 932 minutes (95% CI 790-1073) in 2003 to 699 minutes (95% CI 590-809, p=0.008) in 2006. Mean number of oxytocin units prior to a diagnosis of a failed induction increased from 15 units (95% CI = 15) in 2003 to 25.8 units (95% CI 21-30 p=0.002) in 2006. Caesarean sections after IOL showed a possible reduction from 15.3% in 2003 to 9.6% in 2006. There was no significant change in neonatal outcome from 2003 to 2006.

**Conclusion** – After the adoption of the new guideline and Oxytocin infusion protocol in 2006 IOL and its outcome have improved in the University Obstetric Unit, Galle.