Economic evidence tables for review question: What is the effectiveness of uterotonics for the prevention of postpartum haemorrhage?

Table 30: Economic evidence tables for the effectiveness of uterotonics for the prevention of postpartum haemorrhage

Study country and type	Intervention and comparator	Study population, design and data sources	Costs and outcomes (descriptions and values)	Results	Comments
Author and year: Gallos 2019 **Country:** UK **Type of economic analysis:** Cost effectiveness analysis **Source of funding:** National Institute for Health Research (NIHR)	**Interventions in detail:** * ergometrine * ergometrine plus oxytocin * carbetocin * misoprostol * misoprostol plus oxytocin **Comparator in detail:** * oxytocin	**Population characteristics:** Women at risk of PPH after birth **Modelling approach:** Decision analytic model **Source of baseline data:** Oxytocin direct and indirect evidence from trials included in the NMA **Source of effectiveness data:** Direct and indirect evidence from trials included in the NMA **Source of cost data:** Birmingham Women's Hospital, Literature estimates **Source of unit cost data:** NHS Reference	***Vaginal births no adverse events*** **Mean cost per participant:** Oxytocin £2,545 Ergometrine plus oxytocin £2,538 Carbetocin £2,551 Misoprostol plus oxytocin £2,539 Misoprostol £2,548 Ergometrine £2,551 **Primary measure of outcome:** PPH ≥ 500 ml avoided **Mean outcome per participant:** Oxytocin 0.908 Ergometrine plus oxytocin 0.936	***Vaginal births no adverse events*** **ICERs:** carbetocin v ergometrine plus oxytocin £1,889 per PPH ≥ 500 ml avoided ergometrine plus oxytocin dominates all other interventions **Probability of being cost effective:** Carbetocin had a greater than 50% probability of being cost-effective relative to oxytocin for cost-effectiveness thresholds > £864 per PPH ≥ 500 ml avoided **Subgroup analysis:** ***Caesarean births with no adverse events and excluding ergometrine***	**Currency:** GBP **Cost year:** 2016 **Time horizon:** 6 days **Discounting:** N/A **Applicability:** Partially applicable **Limitations:** Potentially serious limitations

Study country and type	Intervention and comparator	Study population, design and data sources	Costs and outcomes (descriptions and values)	Results	Comments
		Costs 2014-15, BNF 71, NHS Electronic Drugs Tariff 2016	Carbetocin 0.944 Misoprostol plus oxytocin 0.931 Misoprostol 0.899 Ergometrine 0.891 :	***and ergometrine plus oxytocin*** Misoprostol plus oxytocin dominates **Sensitivity analysis:** ***Vaginal births with adverse events*** carbetocin v oxytocin £928 per PPH ≥ 500 ml avoided oxytocin dominates all other interventions ***Caesarean births with adverse events and excluding ergometrine and ergometrine plus oxytocin*** carbetocin v misoprostol plus oxytocin £2,480 per PPH ≥ 500 ml avoided carbetocin dominates all other interventions ***Caesarean births with adverse events and including ergometrine and ergometrine***	

Study country and type	Intervention and comparator	Study population, design and data sources	Costs and outcomes (descriptions and values)	Results	Comments
				plus oxytocin ergometrine plus oxytocin dominates all other interventions ***Caesarean births with no adverse events and including ergometrine and ergometrine plus oxytocin*** ergometrine plus oxytocin dominates all other interventions	
Author and year: Matthijsse 2022 **Country:** UK **Type of economic analysis:** Cost effectiveness analysis **Source of funding:** Ferring Pharmaceuticals	**Interventions in detail:** 100 µg carbetocin given intramuscularly **Comparator in detail:** 10 IU bolus oxytocin	**Population characteristics:** Women at risk of PPH after vaginal birth **Modelling approach:** Decision analytic model **Source of baseline data:** Oxytocin direct and indirect evidence from trials included in the NMA **Source of effectiveness data:** Direct and indirect evidence from trials included in the NMA	**Mean cost per participant:** Intervention: £1,375 Control: £1,430 Difference: -£55 **Primary measure of outcome:** PPH event avoided **Mean outcome per participant:** Intervention: 0.0878 Control: 0.1220 Difference: -0.0342	**ICERs:** Carbetocin dominates **Probability of being cost effective:** 79.5% probability that carbetocin dominates Sensitivity analysis: A number of one-way sensitivity analyses presented as a Tornado diagram	**Currency:** GBP **Cost year:** 2019 **Time horizon:** 30 days **Discounting:** N/A **Applicability:** Partially applicable **Limitations:** Potentially serious limitations **Other comments:** Study funded by manufacturer of carbetocin

Study country and type	Intervention and comparator	Study population, design and data sources	Costs and outcomes (descriptions and values)	Results	Comments
		Source of cost data: Survey of midwives in France, Italy, the Netherlands and the UK, expert opinion, North Bristol NHS Trust Postpartum Haemorrhage Study **Source of unit cost data:** NHS Reference Costs 2018-19, MIMS 2020, PSSRU 2019			

GBP = Pounds Sterling; ICER = Incremental cost effectiveness ratio; MIMS = Monthly Index of Medical Specialties; NMA = Network meta-analysis; PPH = Postpartum haemorrhage; PSSRU = Personal Social Services Research Unit