



## Synopsis

# High or low dose oxytocin for nulliparous women delayed in the first stage of labour: the HOLDS RCT

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## Plain language summary

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### Why did we do this trial?

About 20% of first-time mothers develop delay (their labour progresses too slowly) in the first stage of spontaneous labour, and the recommended treatment is an intravenous drug called oxytocin. This is carefully used to increase contractions and is known to shorten labour but not affect the way in which women give birth. There is some information that a higher dose regimen may reduce the need for a caesarean section. We wanted to compare the standard-dose regimen of oxytocin with a higher dose to see if it did reduce caesarean sections safely.

### What did we do?

Between June 2017 and November 2022, 118 women with confirmed delay in the first stage of labour agreed to join the trial. Half were randomised to the standard-dose regimen of oxytocin and half were randomised to a high-dose regimen. We collected pregnancy and birth information until mother and baby were discharged home.

### What did we find?

Unfortunately, we did not recruit the number of women needed to find a meaningful answer – we intended to recruit 1500 women. The number of women going into labour spontaneously and becoming delayed has reduced over time, so fewer women could join the trial. It was difficult to recruit women in labour, and clinical staff struggled to undertake the additional tasks required. We had several problems with the drug (oxytocin) related to robust production and the close temperature monitoring required in trials like this.

### What does it mean for women with delay in the first stage of labour?

We still do not know whether a higher dose regimen of oxytocin prescribed for women with delay in the first stage of labour reduces the need for caesarean section. Future studies should consider whether the option of delayed consent would be suitable in this acute, but not emergency, situation.