Background

- Intrathecal dexmedetomidine increases analgesia and prolongs block time
- Prolonged surgery time and blood loss during repeat cesarean delivery (CD) may lead anesthesiologists to prefer a combined spinal epidural (CSE) over spinal anesthesia
- Report on spinal anesthesia with dexmedetomidine adjunct in a 40 yo G10P8 at 33/4 weeks with preterm premature contraction of membranes with history of 9 prior CD presenting for emergent 10th CD

Table of Events

	Event	Details	Comment
Initial admission	Presented to triage with PPROM	History of 9 prior CD with non-reassuring fetal heart tracing; taken emergently to the OR	
Operating Room	In room at 7:24AM Spinal anesthesia at 7:28AM	Spinal solution of hyperbaric bupivacaine 0.75% 2ml (15mg), fentanyl 15 µg, morphine 150 µg and dexmedetomidine 5 µg (total volume 3.8ml)	Institution specific standard spinal solution for CD with addition of dexmedetomidine intrathecal adjuvant
Intra-operative vital signs	Post-spinal hemodynamics	HR remained between 60 to 100 bpm; MAPs between 65-80 mm Hg	Phenylephrine prophylactically started at 50 mcg/min, max phenylephrine drip dose 70 mcg/min, titrated off in an hour
IV analgesics	No IV analgesics for pain administered	IV dexmedetomidine 10 µg at 8:15 AM and 5 µg at 8:55 AM administered for shivering	
Cesarean delivery	Baby delivered at 7:48 AM	QBL 876 cc No intra-operative complications	Total surgery time 113 min
PACU	Arrived to PACU at 9:56 AM Signed out of PACU at 1:37 PM	No nausea, hypotension, or pruritus post-operatively	Total pacu time 3 hours and 41 min
Post-partum floor	Arrived to post-partum unit at 2:25PM	No PO opioids administered	PO Tylenol 975mg q6h and PO ibuprofen 600mg q6h scheduled
Discharge	Discharged on post-op day 3		

Discussion

- Spinal anesthesia is quicker to perform than a CSE
- Spinal anesthesia is associated with lower odds of intraoperative pain than CSE anesthesia
- As intrathecal dexmedetomidine prolongs block time, spinal anesthesia with dexmedetomidine adjunct is a reasonable approach for higher order CDs

Anaesthesia. Jul 2010;65(7):664–9.
Anesthesiology. Nov 24 2025;doi:10.1097/ALN.0000000000005868