High spinal

Obstetric simulation

Name:	Claire Mathews	**Observation at start**		**CRT:**	2s
D.O.B.	11/02 (28Y)	**RR:**	18	**Temp:**	36.5
Address:	(Insert local address)	**ETCO2:**	-	**BM:**	7.2
		Sats:	98% on A	**Weight:**	65Kg
Hospital ID:	113 224 6841	**Heart Rate:**	60	**Allergy**	NKDA
Ward:	Labour ward	**BP:**	90/45		

Background to scenario	Specific set up
A patient has a spinal anaesthetic for an elective Caesarean section which develops into a high/total spinal requiring resuscitation/GA	Pregnanct mannequin or simulated patient On theatre table, tilt applied Cannulated, IV fluids/phenylephrine connected Anaesthetic induction drugs, airway trolley Anaesthetic chart
Required embedded faculty/actors	**Required participants**
Patient Partner ODP Obstetric team/midwife	Anaesthetist ODP – can be participant in MDT sim

Past Medical History

Usually fit and well. P1 G0. No issues during pregnancy
Elective Caesarean section for breech presentation. No placental concerns, Group and save done.
Airway MP III, normal mouth opening, normal neck and jaw movement, no loose teeth

Drugs Home	Drugs Hospital
Pregnancy vitamins	Omeprazole 20mg (or PPI according to local protocol) Spinal anaesthetic Antibiotics (acc to local protocol)

Brief to participants

You have just placed a spinal anaesthetic (2.4ml 0.5% heavy bupivacaine with 300mcg diamorphine) for a patient undergoing an elective Caesarean section for breech presentation. She is cannulated, vasopressor (acc to local protocol) is running, antibiotics have been given. Her partner is with her in theatre. Please do your block check and communicate with the obstetric team when the anaesthetic is ready.

Scenario Direction

Stage 1, 0– 5 minutes Deteriorating patient

A	Awake and talking
B	RR 18, sats 98% on A
C	HR 60, BP 90/45
DE	Feeling dizzy and nauseous Block height C5/T1
Rx	Structured approach to assessing a patient with hypotension, consider differentials (LA toxicity, anaphylaxis, high spinal) including block check Call for help Resuscitation – ABCDE (oxygen, fluid, vasopressor, treat bradycardia, patient positioning (tilt on table))

Stage 2, 5–10 minutes Cardiovascular collapse

A	Intermittent snoring
B	Sats 92% on RA or oxygen. RR 10
C	HR 50 BP 80/38
DE	Fluctuating GCS – drowsy with slurred speech/distressed by difficulty in breathing and moving arms Surgeons keen to carry on due to high labour ward pressures
Rx	Declaration of critical incident 'high/total spinal', communication with other teams Resuscitation – simple airway manoeuvres, management of cardiovascular collapse Call for appropriate help Communicates with patient and partner Preparation for GA – Scenario can end when first induction drug is given

Guidelines

Obstetric Anaesthetists Association – High Spinal Block

Guidance for Patient Role

Opening lines/questions/cues/key responses	Relevant HPC / PMH
Why do I feel so dizzy	Previously fit and well
Partner	**Actions**
What is going on? Is she going to be OK? Is the baby going to be ok? (Very concerned for baby and mother, wants to stay with her but not obstructive when asked to step outside)	

Guidance for ODP role	Guidance for obstetrician role
Opening lines/questions/cues/responses/Concerns That blood pressure is quite low, do you need to give something for it? Do you need some more hands in theatre?	Keen to start surgery due to labour ward pressures, however not prepped or draped until asked to do so/critical incident declared
Actions Depending on level of participant can suggest next steps, suggest additional staff or equipment that might be needed	
Guidance for Role e.g. ITU/Anaesthetic Senior	**Guidance for midwife/theatre team role**
Expectations/actions Able to support by phone, support with decision making	Support in their capacity Call for help – but ensure specific team is specified by participant

Session Objectives	
Clinical	Management of patient with high spinal
Non-technical skills	
Teamworking	Coordinating activities in emergency (assessing and preparing for GA), exchanging information with MDT, assertiveness in emergency, assessing capabilities of team
Task management	Planning and preparing for further deterioration/next steps, maintaining standards – using guidelines, identifying and utilising resources – using team to do tasks such as call for help, resuscitation
Situational awareness	Gathering information as patient deteriorates, anticipating changes
Decision making	Identifying and balancing cause for deteriorating patient, continuous re-evaluation