

P-25

CONTINUOUS SPINAL ANESTHESIA FOR CESAREAN SECTION IN A MORBIDLY OBESE PATIENT WITH MULTIPLE SCLEROSIS *Wison, D.C., Goodman, S.R., Ciliberto, C.F., Smiley, R.M. Anesthesiology, Columbia University, New York, NY* **Introduction:** Morbid obesity is defined as a body mass index (BMI) of greater than 40. Multiple sclerosis (MS) is an acquired, demyelinating disease of the CNS, which is marked by periods of relapses and remissions. **Report of case:** A 34 yo G3P1 African-American woman presented at 37 weeks gestation for elective 2° cesarean section and bilateral tubal ligation. She had a fetus in breech position and oligohydramnios. The patient weighed over 500 pounds (BMI 90) and had MS diagnosed 16 months prior to presentation. She initially had blurry vision and loss of balance, a confirmatory MRI, and was treated with corticosteroids and interferon beta-1a with resolution of symptoms. Her first cesarean section was performed under general anesthesia after awake fiberoptic intubation. On examination, she had a Mallampati class II airway with several missing teeth, full range of neck motion, and normal thyromental distance. She had a normal CBC, EKG, echocardiogram, CXR, and PFTs. The risks and benefits of general and regional anesthesia were thoroughly discussed and continuous spinal anesthesia was planned. Intravenous and arterial access was obtained. In the sitting position, a 13cm 17g Tuohy needle was passed until CSF was obtained at a depth of 10cm. A flexible, single-orifice catheter was inserted and sutured at a depth of 16cm. The patient was placed supine with left uterine displacement. The catheter was dosed with 7.5mg of 0.5% bupivacaine, 25mcg of fentanyl, and 250mcg of preservative-free morphine, which provided a T4 level. Surgery proceeded uneventfully and a female weighing 3090gm was born 18 minutes after skin incision with Apgars of 8,9,9. Bupivacaine 2.5mg was administered 45 minutes after the initial dose, and surgery lasted for 2 hours. One week postoperatively, the patient experienced numbness and sharp, shooting pains in her legs. She was started on gabapentin and interferon with moderate improvement. Her neurologist attributed her symptoms to MS relapse. **Discussion:** It has been shown that morbidly obese parturients have a higher incidence of failed epidurals, difficult intubation, and prolonged cesarean section operation times.¹ While there is no absolute contraindication to the use of spinal anesthesia in MS, many feel that spinal anesthesia may contribute to MS relapse. However, one third of all women with MS have postpartum relapses.² We believe that continuous spinal anesthesia provided our morbidly obese patient with MS a safe alternative for cesarean section, but we cannot rule out a role for spinal anesthesia in her relapse. 1. *Anesthesiology* 1993; 79: 1210-8. 2. *JAMA* 1988; 259: 3441-3.

P-26

INTRA-OPERATIVE MYOCARDIAL INFARCTION IN A PARTURI- ENT: ANESTHETIC IMPLICATIONS *Costello, J.W., Greenberg, M., Kuczkowski, K.M. Anesthesiology, University of CA, San Diego, San Diego, CA* **Introduction:** We present a case of a parturient with unrecognized severe 3-vessel coronary artery disease who developed acute myocardial infarction (MI) during an emergent C-section under regional anesthesia. **Report of case:** A 42 y/o G3P2 previously "healthy" female admitted with non-specific chest and abdominal pain in active labor at 36 weeks gestation required emergent C-section secondary to previous classical uterine incision. Preoperative ECG evaluation revealed non-specific (1 mm) ST-segment depression. Invasive intra-arterial blood pressure monitoring was initiated and a T4 sensory level of spinal anesthesia was established with 12 mg of 0.75% bupivacaine and 0.25 mg of morphine. Immediately after the delivery of the fetus the patient developed intense chest pain, hypotension and ST-segment depression (5 mm). A Swan Ganz catheter was deemed necessary to facilitate intra-operative monitoring. Chest pain was successfully treated with sublingual nitroglycerin while iv phenylephrine and ephedrine restored BP to normal. Surgery was promptly completed. Thirty hours postoperatively, continuous ECG monitoring and cardiac enzymes were indicative of a non-Q wave MI. A trans-thoracic echocardiogram showed significantly reduced (25%) left ventricular ejection fraction. Coronary angiogram demonstrated severe coronary artery disease. Coronary artery bypass graft x 5 was successfully conducted in the immediate postpartum period. **Discussion:** The literature concerning intra-operative MI in pregnancy is very limited (1). The most common mechanisms include coronary artery vasospasm, dissection, and hypercoagulability or plaque rupture (2). We are not aware of any reports documenting emergent, intra-operative anesthetic management of a parturient presenting with unrecognized severe coronary artery disease and an acutely evolving MI. **Conclusion:** In summary, this case should serve as warning that although extremely rare, evolving MI may be occasionally encountered intra-partum, particularly in an "advanced maternal age" (AMA) parturients. Because of the increasing incidence of pregnancy in AMA group of women, increased vigilance on the part of an anesthesiologist is indicated. **References:** 1. *Anaesthetist* 2001; 50: 280-284. 2. *Angiology* 1996; 47:739-756.