CARDIAC ARREST IN PREGNANCY

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PRESENTING COMPLAINT: Arrest

FINDINGS

- **A** Check airway, Consider early intubation if unable to ventilate with bag mask
- **B** **Bag-mask ventilation with 100% oxygen**
- **C** **Loss of pulse; Chest compressions in the left lateral decubitous position**
- **D** Unconscious
- **E** Variable depending on the etiology
- **U_{PC}** **variable, abnormal fetal heart rate**
- **L_{PC}** **hypoxia, academia, elevated lactic acid, electrolyte abnormalities**

***V** (verbal), **P (**pain), **U** (unconsciousness), **D** (delirious)

U_{PC} (point of care ultrasound) **L_{PC}** (point of care labs)

1) Causes: The approach to ACLS in nonpregnant patients has a strong focus on managing the complications of ischemic heart disease, particularly shockable ventricular arrhythmias. By contrast, obstetrical arrest usually has a nonarrhythmogenic cause

- **5 Hs:** Hypovolemia (Abruptio placentae, Placenta previa/ accreta/increta, Subcapsular hepatic hematoma, Ectopic pregnancy, Uterine rupture), Hypoxia, Hyperkalemia/hypermagnesemia/[H+] ↑ (acidosis), Hypoglycemia, Hypertension-related complications of eclampsia/preeclampsia
- **4 Ts:** Thrombosis/embolism (Pulmonary embolism, Myocardial infarction, Amniotic fluid embolism, Venous air embolism), Tension pneumothorax, Tamponade, Toxins/tablets (epidural anesthesia)

2) Management

- **Same as non-obstetric patient**
- **Additional issues:**
  - **summon help immediately; call for an obstetrician, anaesthesiologist and neonatologist;**
  - **commence cardiopulmonary resuscitation according to advanced life support algorithms;**
  - **if gestation > 20 weeks, use a left lateral tilt (15 degree) to avoid aorto-caval compression; consider perimortem cesarean delivery if ongoing collapse after**

approximately 4 hours of resuscitation despite left lateral tilt and or manual abdominal shift

- **A definitive airway should be secured as early as possible given the increased risk of aspiration;**
- **establish large bore iv access above the diaphragm; initiate aggressive volume resuscitation unless suspicious of pre-eclampsia/eclampsia;**
- **defibrillation and resuscitation drugs should be administered according to established algorithms;**
- **prepare for perimortem caesarean section**

3) REFERENCES & ACKNOWLEDGMENT

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