

**Scenario 2: Infant Cardiopulmonary Arrest**  
**Facilitator will READ OUT LOUD to EMS team**

**CASE#2 INFORMATION**

You are a paramedic responding to the following dispatch call:

“Priority One. 122 South Street, 3-month-old infant with difficulty breathing. The patient is conscious at this time.”

The setting is just outside a house. Transport time to the hospital is 30 minutes.

The patient is a 3-month-old female infant whose mother called 911. The child’s mother states that her infant has been well until today, when she developed respiratory distress. She decided to call 911 when the infant’s skin color became dusky, which began about 30 minutes prior to the call.

When you arrive on the scene, the infant is cyanotic and limp, which occurred seconds before your arrival. The mother is distraught and cannot answer any questions.

**ACTOR’S SCRIPT**

**CASE#2: cardiopulmonary arrest**

**Role-playing the patient’s mother:**

When paramedics arrive, the mother screams: “My baby just stopped breathing.” Because of this emotionally wrenching event, the mother will not be able to provide any information, including weight. Her infant was well until today, when she developed respiratory distress. She called 911 when the infant’s skin color became dusky.

**Practice Scenario: Infant Cardiopulmonary Arrest**

| Learners' action(s)  | Time (minutes)  | Patient's response(s)  |
|--|-----------------|--|
| <p><b>PHASE 1:</b></p> <p>Check pulse, airway, breathing<br/> Recognize pulseless arrest<br/> Start CPR</p>  | <p>0-5 min</p>  | <p><i>FACILITATOR</i> informs paramedics at the start of the scenario that "the infant's extremities and trunk are cyanotic."</p> <p>Mother is unable to answer questions. The infant's weight is "4-5 kilos".</p> <p>Provide information about physical exam <u>only</u> if requested.</p> <p><u>Vital signs</u></p> <ul style="list-style-type: none"> <li>• Rhythm: ASYSTOLE</li> <li>• HR: --</li> <li>• BP: --/--</li> <li>• SpO<sub>2</sub>: --</li> <li>• RR: --</li> <li>• Temp: 37°C</li> </ul> <p><b>After CPR started:</b><br/> CHECK manikin log for</p> <ul style="list-style-type: none"> <li>- Bilateral chest rise</li> <li>- CPR quality</li> </ul>   |
| <p>Obtain IV/IO access</p>   |                 | <p><i>FACILITATOR</i> will state:<br/> "The IV line is unsuccessful."<br/> If IO attempted, it is immediately successful - "You get blood return immediately."</p>   |
| <p><b>PHASE 2:</b></p> <p>Initial drug therapy with epinephrine</p> <p>Use length-based tape or age-based app to estimate weight</p> <p>Ongoing CPR<br/> Pulse checks Q2min (absent)</p> | <p>5-10 min</p> | <p><b>After 1<sup>st</sup> dose epinephrine</b> given, change rhythm within 30 seconds to <b>PEA</b></p> <ul style="list-style-type: none"> <li>• Vital signs <ul style="list-style-type: none"> <li>• Rhythm: <b>PEA</b> (30 seconds after epi)</li> <li>• Pulse: OFF</li> <li>• HR: <b>50</b></li> <li>• BP: --/--</li> <li>• SpO<sub>2</sub>: --</li> <li>• RR: --</li> <li>• Temp: 37°C</li> </ul> </li> <li>• Settings <ul style="list-style-type: none"> <li>• Stomach: <b>distended</b></li> <li>• Lungs: <b>Resistance 50% (R and L)</b></li> </ul> </li> </ul> <p>After epinephrine given, <i>FACILITATOR</i> informs paramedic that "the infant's abdomen is distending, and she's getting more difficult to bag." Repeat every 60 seconds until intubation.</p> |

| Learners' action(s)  | Time (minutes)                         | Patient's response(s)   |
|--|--|---|
| Manage challenges with ventilation<br>May use 2-person BVM, place OPA<br><br>Perform intubation/SGA placement  |  | <b>After intubation:</b><br>CHECK manikin log for <b>BILATERAL LUNG INFLATION</b> .<br>DO NOT change EtCO <sub>2</sub> if intubation is esophageal.<br><br><ul style="list-style-type: none"> <li>• <b>Vital signs</b> <ul style="list-style-type: none"> <li>• Rhythm: PEA (30 seconds after epi)</li> <li>• Pulse: OFF</li> <li>• HR: 50</li> <li>• BP: --/--</li> <li>• SpO<sub>2</sub>: --</li> <li>• RR: --</li> <li>• EtCO<sub>2</sub>: 15 (ONLY if tracheal intubation)</li> <li>• Temp: 37°C</li> </ul> </li> </ul> |
| Second dose of epinephrine<br><br>Contact online Medical Control<br><i>(may be performed at any point prior)</i><br><br>Additional PEA therapy- IV bolus, discuss H&Ts | 10-12                                  | Medical Control may also order: <ul style="list-style-type: none"> <li>• Sodium bicarbonate 1mEq/kg IV/IO (dose 4-5 mEq)</li> <li>• Atropine 0.02mg/kg IV/IO (min dose 0.1mg)</li> </ul> <b>DO NOT score</b> these medications.   |
| ___ min ___ sec Total scenario time  | <b>TIME LIMIT</b><br><b>12 minutes</b> | Terminate scenario after 12 minutes OR after final phase completed (whichever comes first).   |
|  |  | <b>END SIMULATION</b>   |