



**12-LEAD ECG**

<b>Adult</b>	<b>Pediatric</b>
--------------	------------------

**Definitions**

**Acute Coronary Syndrome (ACS):** refers to any group of symptoms attributed to obstruction of the coronary arteries

**STEMI:** ST Elevation Myocardial Infarction

**PCI:** Percutaneous Coronary Intervention

**Cardiovascular STEMI Receiving Centers (SRC):** Facilities that have emergency interventional cardiac catheterization capabilities

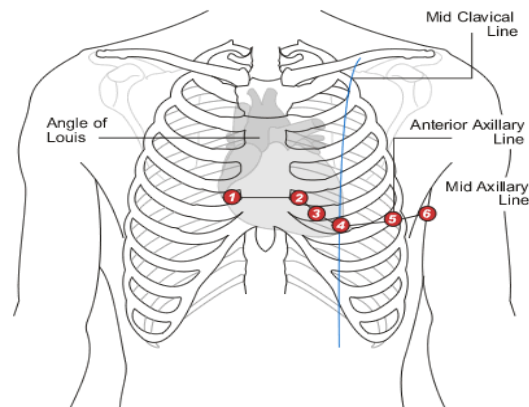
**ALS**

**Indications**

- Chest or upper abdominal discomfort
- Chest discomfort with radiation to jaw, neck, left shoulder, back, or left arm
- Chest discomfort with nausea, diaphoresis, and/or dyspnea
- Unexplained syncope or near syncope
- New onset cardiac dysrhythmia
- Onset of dyspnea suggestive of congestive heart failure
- Patient with suspected stroke (CVA)

**Procedure**

- V1:** right 4<sup>th</sup> intercostal space
- V2:** left 4<sup>th</sup> intercostal space
- V3:** halfway between V2 and V4
- V4:** left 5<sup>th</sup> intercostal space, mid-clavicular line
- V5:** horizontal to V4, anterior auxiliary line
- V6:** horizontal to V5, mid-auxiliary line
- V4R:** right 5<sup>th</sup> intercostal space, mid-clavicular line (use in all suspected inferior STEMI)



**Consider**

- Serial 12-Lead ECGs are encouraged during transport
- Consider right sided 12-Lead for inferior wall MI
- Consider Base Hospital Physician Contact for unstable ventricular tachycardia, ventricular fibrillation, Second Degree Type II Heart Block (MOBITZ II), Third Degree heart blocks, and new onset left bundle branch blocks (LBBB)



# Yolo County Emergency Medical Services Agency

## Procedures

Revised Date: September 1, 2018

Adult	Pediatric
<b>Direction</b>	
<ul style="list-style-type: none"><li>• If the 12-Lead ECG indicates STEMI, transport to a YEMSA approved STEMI Receiving Center</li><li>• Transmit 12-Lead ECG if the receiving facility has transmission receiving capabilities</li><li>• If there is any concern about the destination decision transmit the 12-Lead ECG to the Base Hospital Physician for a destination decision</li></ul>	
<b>Documentation</b>	
<ul style="list-style-type: none"><li>• Interpretation of the 12-Lead ECG (amount of ST elevation in millimeters)</li><li>• Location of reciprocal changes (if applicable)</li><li>• Symptoms (including presence or absence of chest pain)</li><li>• Presence of a LBBB</li><li>• Presence of imposters (early repolarization, left ventricular hypertrophy, pericarditis or paced rhythms)</li><li>• Significant vital signs and physical findings</li><li>• Attach a copy of the 12-Lead to the ePCR</li></ul>	