



Term Effective:	Fall	2008
	Semester	Year

Title: Adv Cardiac Life Support
 Full Title: Advanced Cardiac Life Support
(limit to 50 characters including spaces)

Course Number: HLH 182

Initiator: Greg Hicks

Date Submitted: 8/26/2008

Units Min: 1.00
 Units Max: 1.00
If this is a variable unit course, then the relationship between units and any difference in expected SLO's should be explained.

Lecture Hours: 17.00 to 17.00 Lab Hours: 0.00 to 0.00 Activity Hours: 0.00 to 0.00

Student Learning Outcomes: *(Enter the SLO's in an outline format. Use the Ctrl + Tab keys to indent for subtopics.)*

At the conclusion of this course students will be able to demonstrate mastery of the following topics necessary for certification in ACLS:

- A. For all ACLS devices and procedures, students must know:
 - 1. Indications (knowledge of when to use and why)
 - 2. Precautions (knowledge of when not to use each and why)
 - 3. Proper use (hands on practice)
- B. For pharmacological agents, students must know:
 - 1. Why an agent is used (actions)
 - 2. When to use an agent (indications)
 - 3. How to use an agent (dosing)
 - 4. What to watch out for (precautions)
- C. Airway management and endotracheal intubation, including:
 - 1. Noninvasive airway techniques and devices (hands on practice)
 - 2. Techniques to administer oxygen (hands on practice)
 - 3. Endotracheal intubation (hands on practice)
- D. Recognition and therapy of the major ACLS emergency conditions:
 - 1. Universal algorithm
 - 2. Ventricular fibrillation/pulseless ventricular tachycardia (VF/VT)
 - 3. Pulseless electrical activity (PEA)
 - 4. Asystole
 - 5. Bradycardia
 - 6. Tachycardias
 - 7. Acute myocardial infarction (MI)
 - 8. Hypotension/shock/acute pulmonary edema
- E. Electrical therapy, including:
 - 1. Defibrillation with automated external defibrillators
 - 2. Defibrillation with conventional defibrillators

Course Level Student Learning Outcomes

3. Attachment of defibrillators as a cardiac monitor
 4. Electrical cardioversion with conventional defibrillators
 5. Transcutaneous pacemakers
- F. Intravenous and invasive therapeutic and; monitoring techniques, including:
1. Peripheral IV lines
 2. Central IV lines
 3. Pericardiocentesis
 4. Thoracentesis for tension pneumothorax
- G. Recognition of the following rhythms
1. Lethal rhythms
 2. Nonlethal arrhythmias
- H. ACLS cardiovascular pharmacology, including the why, when, how, and precautions of the following agents:
1. electricity, oxygen, epinephrine, lidocaine, bretylium, magnesium sulfate, procainamide, sodium bicarbonate, atropine, dopamine, isoproterenol, vagal maneuvers, adenosine, verapamil, diltiazem, beta blocker, nitroglycerin, nitroprusside, dobutamine, morphine sulfate, furosemide, and a thrombolytic agent
- I. Early management (first 30 minutes) of the following special resuscitation; situations:
1. Stroke
 2. Hypothermia
 3. Drowning and near drowning
 4. Cardiac arrest associated with trauma
 5. Electrocutation and lightning strike
 6. Cardiac arrest of the pregnant patient
 7. Possible drug overdose
- J. Megacode leadership and participation including:
1. Knowledge and skill to manage the core Megacode scenario: the first 10 minutes of an adult VF cardiac arrest
 2. The core Megacode scenario covers the following areas:
 - a) Universal algorithm (for pulseless patient)
 - b) Basic adult CPR (primary ABCD survey)
 - c) VF/VT algorithm
 - d) Appropriate use of the secondary ABCD survey
 - e) Acceptable noninvasive airway management techniques
 - f) Endotracheal intubation (only if professional role requires)
 - g) IV techniques (peripheral line only)
 - h) Defibrillation with AEDs and conventional defibrillators
 - i) Use of pharmacologic agents: epinephrine, lidocaine, bretylium, procainamide, sodium bicarbonate, and magnesium sulfate

SIGNATURES / APPROVALS:

Course Level Student Learning Outcomes

Instructor(s)

Signature

Date

Instructor(s)

Signature

Date