College of San Mateo Official Course Outline

1. **COURSE ID:** FIRE 796 **TITLE:** Emergency Medical Technician: Basic

Units: 10.0 units Hours/Semester: 144.0-162.0 Lecture hours; 48.0-54.0 Lab hours; and 288.0-324.0

Homework hours

Method of Grading: P/NP Only

Prerequisite: Current certification in health care provider/professional rescuer CPR (Cardiopulmonary Resuscitation) through an accredited agency. **Corequisite:** Vaccinations for healthcare workers per California Code of Regulations, Title 8, Section 5199 Aerosol Transmissible Diseases; Appendix E. Plus, additional vaccinations as listed on the list provided to EMT students.

2. COURSE DESIGNATION:

Degree Credit

Transfer credit: CSU

3. COURSE DESCRIPTIONS:

Catalog Description:

This course provides instruction in basic life support/pre-hospital care using the National Registry curriculum. A materials fee as shown in the Schedule of Classes is payable upon registration.

4. STUDENT LEARNING OUTCOME(S) (SLO'S):

Upon successful completion of this course, a student will meet the following outcomes:

- 1. Recognize the nature and seriousness of the patient's condition or extent of injuries to assess requirements for emergency medical care;
- 2. Administer appropriate emergency medical care based on assessment findings of the patient's condition;
- 3. Employ the proper methods to lift, move, position and otherwise handle the patient to minimize discomfort and prevent further injury; and,
- 4. Perform safely and effectively the expectations of the job description

5 SPECIFIC INSTRUCTIONAL OBJECTIVES:

Upon successful completion of this course, a student will be able to:

- 1. Recognize the nature and seriousness of the patient's condition or extent of injuries to assess requirements for emergency medical care;
- 2. Administer appropriate emergency medical care based on assessment findings of the patient's condition;
- 3. Employ the proper methods to lift, move, position and otherwise handle the patient to minimize discomfort and prevent further injury; and,
- 4. Perform safely and effectively the expectations of the job description.

6. COURSE CONTENT:

Lecture Content:

- 1. Preparatory
- 2. Public Health
 - A. Emergency Medical Care Systems, Research, and Public Health
 - B. Workforce Safety and Wellness of the EMT
 - C. Medical, Legal and Ethical Issues
 - D. Documentation
 - E. Communication
 - F. Lifting and Moving Patients
- 3. Anatomy, Physiology and Medical Terminology
 - A. Anatomy
 - B. Physiology
 - C. Medical Terminology
- 4. Pathophysiology
 - A. Pathophysiology
- 5. Life Span Development
 - A. Life Span Development
- 6. Airway Management, Respiration and Artificial Ventilation
 - A. Airway Management

- B. Artificial Ventilation
- C. Oxygenation
- 7. Assessment
 - A. Baseline Vital Signs, Monitoring Devices and History Taking
 - B. Scene Size-Up
 - C. Patient Assessment
- 8. Pharmacology
 - A. Pharmacology
 - B. Medication Administration
- 9. Shock and Resuscitation
 - A. Shock
 - B. Resuscitation
- 10. Medicine
 - A. Respiratory Emergencies
 - B. Cardiovascular Emergencies
 - C. Altered Mental Status, Stroke and Headache
 - D. Seizures and Syncope
 - E. Acute Diabetic Emergencies
 - F. Anaphylactic Reactions
 - G. Toxicologic Emergencies
 - H. Abdominal, Gynecologic, Genitourinary and Renal Emergencies
 - I. Environmental Emergencies
 - J. Submersion Incidents: Drowning and Diving Emergencies
 - K. Behavioral Emergencies
- 11. Trauma
 - A. Trauma Overview: The Trauma Patient and the Trauma System
 - B. Bleeding and Soft Tissue Trauma
 - C. Burns
 - D. Musculoskeletal Trauma
 - E. Head Trauma
 - F. Spinal Column and Spinal Cord Trauma
 - G. Eye, Face and Neck Trauma
 - H. Chest Trauma
 - I. Abdominal and Genitourinary Trauma
 - J. Multisystem Trauma and Trauma in Special Patient Populations
- 12. Special Patient Populations
 - A. Obstetrics and Care of the Newborn
 - B. Pediatrics
 - C. Geriatrics
 - D. Patients with Special Challenges
- 13. EMS Operations
 - A. Ambulance Operations and Air Medical Response
 - B. Gaining Access and Patient Extrication
 - C. Hazardous Materials
 - D. Multiple-Casualty Incidents and Incident Management
 - E. EMS Response to Terrorism Involving Weapons of Mass Destruction
 - F. ALS-Assist Skills
 - G. Advanced Airway Management

Lab Content:

- 1. Cardiac Arrest Management/AED
- 2. Airway, Oxygen and Ventilation Skills
 - A. Upper Airway Adjuncts and Suction
 - B. Bag-Valve-Mask (Apneic Patient)
 - C. Mouth to Mask w/Supplemental Oxygen
 - D. Oxygen Administration
- 3. Bleeding Control/Shock Management
- 4. Spinal Immobilization (Seated Patient)
- 5. Emergency Childbirth
- 6. EMT Patient Assessment/Management
 - A. Medical

- B. Trauma
- 7. Immobilization Skills
 - A. Long Bone Injury
 - B. Traction Splinting

7. REPRESENTATIVE METHODS OF INSTRUCTION:

Typical methods of instruction may include:

- A. Lecture
- B. Discussion
- C. Observation and Demonstration
- D. Other (Specify): 1. Critical Thinking: Lecture/discussion/examples will be used to develop an understanding of required knowledge/skills, and how they relate to the performance of an EMT-B. 2. Skills Practice: After a demonstration by the instructor(s), students will be given time during class to practice the skills required for each module. 3. Multimedia: PowerPoint presentation to review for National Registry examination.

8. REPRESENTATIVE ASSIGNMENTS

Representative assignments in this course may include, but are not limited to the following:

Writing Assignments:

Written Assignments: Students turn in descriptions of patient contacts from the ridealongs. Forms used will be similar to those used for report write-ups in the field.

Additional assignments may be assigned as needed to support learning and skill devlopment.

Reading Assignments:

Students will be expected to read the text materials pertaining to the next lecture prior to that class session.

Other Outside Assignments:

Students will be required to accomplish a minimum of 5 patient contacts during scheduled ride-alongs. A minimum of 10 hours of ride-alongs is required.

9. REPRESENTATIVE METHODS OF EVALUATION

Representative methods of evaluation may include:

- A. Final Class Performance
- B. Quizzes
- C. Written examination
- D. 1. Quizzes: Measures comprehension of each topic after it is covered, giving the student an · idea of their strengths/weaknesses. 2. Mid-term Exams: Measures comprehension of topics covered to that point. Allows student to evaluate probability of successful completion. · 3. Final Examination: Measures comprehension of the topics covered in the course. All quizzes and exams will be used to determine eligibility for the National Registry Exam. 4. Skills Testing: As required by the National Registry, to determine the level of competency/proficiency of skills required of EMT-B for pre-hospital care.

10. REPRESENTATIVE TEXT(S):

Possible textbooks include:

A. Mistovich, Joseph; Hafen, Brent; Karren, Keith. *Brady Prehospital Emergency Care*, 10th ed. Pearson/Prentice Hall, 2014

Other:

A. Supplemental handouts for topics and skills developed by the instructor

Origination Date: September 2016 Curriculum Committee Approval Date: October 2016

Effective Term: Fall 2017

Course Originator: Michelle Schneider