Emergency Medical Technician B-II / course # 8335

New Horizons Regional Education Center – Butler Farm

Instructor – J. Brittingham, EMS Education Coordinator Work 766-1100 Ext 3334 Cell (757) 641-4135

email: jeff.brittingham@nhrec.org

Course Name: Emergency Medical Technician – Basic level II

Grade Level: High school seniors – 12

Hours of Instruction: Two semesters – 1.5 credits per semester

Methods of Instruction: Lecture / Discussion with audio-visual aids

Demonstration and Practice (guided and independent)

Small group interaction

Consultation triad / Simulations / Interactive CD

Readings and independent study

Medical Direction: Medical Direction is a required component of Emergency Medical

Services programs. This requirement is paramount in assuring the provision of the highest quality prehospital Medical care. For the school year 2020-2021, J. Michael M.D. Operational Medical Director has agreed

to oversee the program.

Prerequisites: Student must be a rising senior currently certified in the Commonwealth of

Virginia as an EMT-B. They must also have a current basic life support card at the health care provider level, Hazardous materials awareness,

mass casualty I & II and NIMS 100, 200, 700 & 800

Course Description: This course is designed for rising seniors who are currently certified as an

EMT-B in Virginia, to increase their knowledge and skill proficiency. This course is designed to review basic skills and build a foundation for advanced patient care skills based on the EMT and AEMT curriculum. This program will not lead to an advanced certification level of AEMT, EMT-I or EMT-P. The student is not to exceed their scope of practice. Program is designed to provide knowledge and skill development in areas that have been identified as weaknesses for students wishing to move into an EMT I or P program. Specifically, after successful completion of the program, the student will be capable of performing the following functions

at the entry level:

- Perform Drug dosage calculations converting household measure, apothecaries and metric, calculate I.V. dosage based on weight, and determine dilutions and solutions for administration. Identify pharmacology equipment and reading drug labels
- Identify and discuss protocols for use during potential terrorist
 incidents involving weapons of mass destruction, review the local
 emergency management plans for responding to domestic
 terrorism, Discuss and manage a scenario using the National
 Incident Command system, Special rescue and operations, Crime
 scene management and personal safety
- International Trauma Life Support (ITLS) identify the correct sequence of evaluation and the techniques of resuscitation and packaging of the patient to perform these drills rapidly and efficiently thus increasing definitive patient care.

- Participate in continuing education for recertification of the EMT-B status for the State, (40 hours continuing education credit including skills assessment.)
- Participate in community education programs to straighten the "Chain of Survival" including assisting with instruction in Basic Life Support, first aid and infant car seat clinics.
- Demonstrate proficiency in EMT-B skills through a mentorship with the local EMS agency, acting as a mentor and assisting with sills evaluation

EMT's provide service in an environment requiring special skills and knowledge in areas of communications, transportation and record keeping. They also serve as liaisons with other public safety services. (fire, law enforcement, emergency management, FEMA) This course will allow the student to strengthen the skills acquired in the basic course and build on their certifications and mentored experience. Units of instruction include:

- Preparatory 40 hrs. Cont. edu. category 1, reviewing EMT-B basic skills and enhancing the knowledge base of the EMS system
- II. BCLS Instructor (AHA) / Airway Management
- III. Instructor Development theories in education, writing lesson plans, Presentation skills, evaluation and skills mentoring.
- IV. Operations, response to specialized Incidents, Hazmat, Weapons of mass destruction, crime scene and disasters (DMAT),
- V. Pharmacology with a concentration on basic math skills
- VI. Professional Development mentorship role, career planning, evaluating the role of EMS in relationship to other health Care Professionals. Impact of the affordable Health Care Act and changing roles for health care and health care professionals.
- VII. Clinical mentorship in a varied EMS settings
- VIII. EVOC- Emergency Vehicle Operations (VDFP)

competency based task list may be found at the VDOE VERSO site for course # 8335

http://www.cteresource.org/verso/courses/8335/emergency-medical-technician-iii-tasklist

Emergency Medical Services (EMS) Courses for VCCS Institutions- We will cover the following information, You are not dual enrolled.

EMS 115 Emergency Medical Technician- Basic Refresher (2 CR) Provides 36 clock hours of instruction to meet Virginia Office of EMS requirements for recertification at the EMT-Basic level.

EMS 110 Emergency Vehicle Operator's Course (EVOC) (1 CR) Prepares the student for certification in the operation of various emergency vehicles. Teaches proper operating procedures in both emergency and non-emergency situations.

EMS 263 EMS Instructor Training (3 CR)

Develops skills in instructional design, delivery and evaluation. Includes: principles of adult learning and student learning styles; development of instructional objectives; preparation of lesson plans, preparation and use of instructional aids, class participation techniques, practical skill instruction, providing student feedback and evaluating performance.

EMS 211 Operations (2 CR) Prepares the student in the theory and application of the following: medical incident command, rescue awareness

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and operations, hazardous materials incidents, and crime scene awareness. (Conforms to the current Virginia Office of Emergency Medical Services curriculum for EMT-Paramedics.)

Learner outcomes include:

- 1. Ambulance operations: the student will understand standards and guidelines that help ensure the effective ground and air medical transport
- 2. Medical incident command: the student will be able to safely manage the scene of an emergency, demonstrate the ability to integrate the principles of general incident management and multiple casualty incident (MCI) management techniques in order to function effectively at major incidents.
- 3. Rescue awareness and operations: students will be able to integrate the principles of rescue awareness and operations to safely rescue a patient from water, hazardous atmospheres, trenches, highways and hazardous terrain.
- 4. Hazardous materials incident: student will:

Demonstrate the ability to evaluate hazardous materials emergencies Be able to call for appropriate resources

Demonstrate the ability to identify and work in the cold zone

5. Crime Scene awareness: student will be able to develop an awareness of the human hazard of crime and violence and demonstrate the ability to perform safe operations at crime scenes and other emergencies

Mentorship/field rotations:

This course requires a clinical mentorship for development of proficiency in patient skills. An assigned mentor will evaluate performance in the field. The course instructor evaluates documentation and assures basic skill competency. Clinical field rotation time requirement minimal is 60 hours. Appropriate attire and review of expectations can be located in the clinical rotation packet, furnished to the student prior to clinical.

Evaluation / Assessment

The purpose of the evaluation process is to strengthen training efforts There are three components of the overall grade: Related Instruction (test, quizzes and projects), Competencies (skills), and Employability skills (behaviors that impact on the work environment). Related Instructions minimum passing score is 76%. Students who do not meet the requirements will not be allowed to complete the additional certifications.. Attendance is very important and is REQUIRED in some aspects for meeting the requirements for State testing or certifications.

Clinical Agencies:

Gloucester Fire & Rescue

Poquoson Fire and Emergency Medical Services
James City Fire and Emergency Medical Services

Virginia Office of Emergency Medical Services – field reps.

Textbook:

Foundations of Education an EMS approach (2013), 2nd edition, National Association of EMS Educators, Delmar

Nancy L. Caroline,MD (2013) Emergency Care in the Streets, 7th edition, American Academy of Orthopedic Surgeons, AAOS, Jones & Bartlett Learning

BTLS: Basic Trauma Life Support for the EMT-B (2011).

7th edition, John Emory Campbell, Brady / Prentice Hall

Drug Dosage Calculations (2006), 3nd edition, Alan A. Mikolaj, Brady / Prentice Hall

ACLS for EMT-Basics (2003) AAOS, Jones and Bartlett Publishers

References:

Emergency Care and Transportation of the Sick and Injured,10th edition (2011) American Academy of Orthopedic Surgeons, AAOS, Jones & Bartlett Learning

Principles of Advanced Trauma Care (2002), Michael W. Hubble & Johnsie Hubble, Delmar

Tactical Emergency Care – Military Operations Out of Hospital Medicine (1999), DeLorenzo & Porter, Brady / Prentice Hall

Paramedic Care: Principles and Practice(2010) Bleedsoe, Porter, Cherry, Brady/Prentice Hall

Preparing for Terrorism: An Emergency Services Guide (1998) George Buck, Delmar