



Essentials of Infection Prevention and Environmental Hygiene

Continuing Professional Education Credits (CPE): **10 Hours**

Course Duration: **7 Weeks**

Materials and access requirements:

- Reading materials are included electronically as part of the course
- Computer with Internet access
- Basic computer skills
- Most recent version of Java
- Flash player

Who should participate?

- Non-clinical directors and managers interested in expanding their infection prevention knowledge.
- Non-clinical supervisors aspiring to manager or director level responsibilities.
- Directors, managers, and supervisors in environmental services, patient transport, and engineering fields.
- Other non-clinical employees of health care or other facilities.

Course Description:

The **Essentials of Infection Prevention and Environmental Hygiene** course was designed for non-clinical staff in health care facilities. The content of this online program covers a wide spectrum of infection prevention topics – from a brief introduction to the microbiology of major organisms like MRSA and Clostridium difficile to transmission and prevention. The course also covers content on disease outbreaks, precautions, Personal Protective Equipment (PPE), guidance documents from the CDC, and OSHA standards for Blood Borne Pathogens (BBP).

This course was designed to be a self-directed, but facilitated educational program for non-clinical health care employees. Individuals are responsible for logging on to the course and completing the assigned reading material and answering all questions for each week. Participants of this program will collaborate and interact online, review material, and ultimately, learn from the reading materials and each other's knowledge and experiences.

Course Objectives:

The objective of this course is to facilitate an adult learning and collaborative environment in which non-clinical managers, directors, and other professionals can expand their knowledge and prepare for the many challenges facing healthcare facilities related to the transmission of infectious diseases.

Course Requirements:

- Each week's assignments must be completed in order for learners to pass the course. Learners who do not complete the minimum required assignments by their due dates will not receive continued professional education (CPE) credits.
- The readings must be completed on time in order to prepare learners to participate fully and contribute to online discussions.
- All assigned coursework must be submitted within the designated timeframe. By reading and reviewing all the required materials, the coursework can be successfully completed and the course learning objectives can be met.

Week 1 – Introduction

Lesson Objectives:

- Review the importance of cleaning in infection prevention and control
- Explore the factors that differentiate cleaning versus disinfection
- Evaluate disinfection of various types of surfaces (medical equipment, housekeeping surfaces, and special care areas)
- Discover the challenges of effectively managing VRE, MRSA, C. difficile, viruses, and prions

Week 2 – Microorganisms: The Efficacy of Cleaning and Disinfection

Lesson Objectives:

- Delineate between cleaning, disinfection, and sterilization
- Discuss the factors that affect the efficacy of disinfection and sterilization
- Compare the various kinds of disinfectants, including the mode of action, microbial activity, and the uses of each disinfectant
- Discuss the evidence-based strategies for environmental monitoring used by EVS professional to detect the presence of healthcare pathogens

Week 3 – The Chain of Infection and Healthcare Associated Infections

Lesson Objectives:

- Assess the magnitude of HAIs and their effects on the US population, as well as their magnitude in terms of health care costs
- Explore the steps in the chain of infection
- Develop and articulate strategies for lowering the risk of HAI

Week 4 – Infection Prevention – PPE and Precautions

Lesson Objectives:

- Critically examine the guidelines for hand-washing, hand antisepsis, and hand hygiene and discuss the factors that contribute to poor adherence to hand-washing guidelines
- Evaluate the role of standard precautions in infection prevention
- Compare and contrast standard precautions and transmission-based precautions, and relate them to the healthcare setting

Week 5 – Occupational Health Practices

Lesson Objectives:

- Demonstrate familiarity with the components of Blood-borne Pathogen Exposure Control Plan and the Hazard Communication Program, as required by OSHA
- Discuss the potential hazards of sharps and hazardous chemicals and offer strategies to minimize risk

Week 6 – Healthcare Preparedness for Disease Outbreaks

Lesson Objectives:

- Explain the procedure for obtaining help from Federal agencies in emergency or disaster situations
- Contrast natural disasters, man/human made scenarios, and technological events; reflect on the ways in which environmental services can prepare for each type of event
- Identify the various types of healthcare waste, and describe the proper handling of each type in the event of an emergency
- Demonstrate the proper procedure for conducting a viable Hazard Vulnerability Analysis

Week 7 – Recognition, Containment, and Prevention of Infection Transmission

Lesson Objectives:

- Assess the clinical significance and environmental prevalence of C. difficile and MRSA, and discuss the possible complications of these infections
- Describe the proper precautions to prevent C. difficile infection