DENTAL INFECTION CONTROL & STERILIZATION  SYLLABUS DA5.501

INSTRUCTOR: Carrie Johnson, CDA, EFDA, BS

PHONE: LBCC: 541-917-4495  OFFICE: RCH 201A

OFFICE HOURS: By appointment as posted  E-MAIL: johnsonc@linnbenton.edu

EXTENT: Tuesday 1:00 to 2:50 p.m.  CREDITS: 2 credits

Room RCH 207

COURSE DESCRIPTION:

An in-depth study of principles in dental infection control, decontamination, disinfection and sterilization. This course will provide basic requirements for OSHA’s bloodborne pathogen, hazard communication and general safety standards in a dental environment, and includes sterilization principles, machines and techniques. Students will be eligible to take the Infection Control Examination (ICE) administered by the Dental Assisting National Board (DANB) upon successful completion of this course.

COURSE OBJECTIVES:

Given a series of lectures, class handouts, and check offs the student should be able to recognize the Bloodborne Pathogen and Hazard Communication Standards. In addition, decontamination, disinfection and sterilization will be included. This course consolidates recommendations from the Center for Disease Control for preventing and controlling infectious diseases and managing personnel health and safety concerns related to infection control in dental settings.

PREREQUISITES:

Admittance into the Dental Assistant Program

TEXTS (*) AND REFERENCES:

*OSAP Infection Control CDC Guidelines
*Infection Control and Management of Hazardous Materials for the Dental Team
*Modern Dental Assisting 11th Edition
Interim Oregon Occupational Safety and Health Code, Bloodborne Pathogen Standard
OSHA Hazardous Communication Standard
Infection Control in the Dental Environment, ADA

ADDITIONAL RESOURCES:

Center for Disease Control and Prevention (CDC): www.cdc.gov
Occupational Safety and Health Administration (OSHA): www.osha.gov
MEANS OF EVALUATION:

Course grades will be determined by a series of assignments, quizzes, final examination, and laboratory performance objective evaluations.

Grading Scale:

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<tr>
<th>Grade</th>
<th>Percentage Range</th>
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<tbody>
<tr>
<td>A</td>
<td>92% - 100%</td>
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<tr>
<td>B</td>
<td>82% - 91%</td>
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<tr>
<td>C</td>
<td>72% - 81%</td>
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<td>D</td>
<td>65% - 71%</td>
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<td>F</td>
<td>Below 65</td>
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GRADE POINT BREAKDOWN

<table>
<thead>
<tr>
<th>Component</th>
<th>Points</th>
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<tbody>
<tr>
<td>Homework</td>
<td>50</td>
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<tr>
<td>Exams</td>
<td>200</td>
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<tr>
<td>Quizzes</td>
<td>200</td>
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<tr>
<td>Final</td>
<td>200</td>
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<tr>
<td>Total possible</td>
<td>650 points</td>
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SCHOLASTIC REQUIREMENT:

In order to continue in the Dental Assisting Program, the student must achieve 72% or more of the possible points for the Dental Infection Control course.

QUIZZES:

Weekly quizzes are given on Moodle and must be completed on time for credit. No late quizzes will be accepted. It is your responsibility to make sure your computer is working and that you have access to Moodle prior to the exam due date. If you have a problem it is your responsibility to contact tech services to resolve the issue as soon as possible. In addition you must email the instructor, explaining the problem, as soon as an issue arises. Instructor notification does not exempt you from testing regulations.

TEACHING METHODOLOGY:

Lectures, power point and overhead projections, group topic discussions, assigned reading, handouts, independent research, and laboratory experience.

STUDENT CONTRIBUTION:

Two hours of study are required for each hour of lecture. Meaning 4 hours of home study will be required for this course. Assignments are given and you are expected to read those assignments prior to class. It is impossible to cover all portions of every topic in the time allotted for each class. This means that you must accept the responsibility for the material that is not discussed in class. When you find that information is not clear, it is your right and responsibility to raise questions that will clarify these points. Additional information on topics is provided to you in your class pack. You are responsible for all information included in the handouts.

EXAMS:

In addition to weekly quizzes there will be four (4) major exams taken in Moodle. The 4 exams instruction will be provided separately. The final exam will be administered in a classroom setting and will only be giving during the assigned final time. No early or late finals accepted.

All exams and quizzes are given to prepare you for the DANB ICE exam.
WEEKLY ASSIGNMENTS:

Weekly assignments are to be completed on the separate worksheet forms and are due at the beginning of class session unless otherwise indicated by the instructor. **No late** homework will be accepted. It is your responsibility to get any missed notes or handouts from another student if you are absent. To get credit for homework done but not turned in when sick it must be turned in the day of your return to school. Homework will not be accepted after that first day back.

CHECK-OFFS

Various check-offs will be assigned and reviewed prior to their due dates. These check-offs must be completed during dental skills time. No lecture time will be used to complete them.

INFECTION CONTROL EXAMINATION:

The Dental Assisting National Board, Inc. (DANB) offers a certificate of competency in infection control. The Infection Control Exam (ICE) is a component of the Certified Dental Assistant exam. The candidate must meet minimum performance standards to earn a certificate of competency. The computerized format is taken at a Pearson Testing Center. The fee is $175. Preliminary pass/fail results will be provided at the conclusion of the examination. Students will take this exam **immediately** upon completion of this course during winter break. You must successfully pass this exam to continue on to winter term.

Completed application forms and a $175 money order payable to DANB are to be brought to class when the instructor indicates.

AMERICAN DISABILITIES ACT:

Accommodations will be made for any student approved for disability services.

TENTATIVE SCHEDULE:

WEEK:

1. Course and Syllabus Review/Introduction to Dental Infection Control/History
2. Microbiology/Regulatory Agencies
3. Occupational Health Program/Prevention of Bloodborne Pathogen Transmission
4. $175.00 DANB FEE & Application/BBP cont.
5. Hand Hygiene/Personal Protective Equipment/Latex Allergy & Contact Dermatitis
6. Sterilization and Disinfection
7. Environmental Infection Control/Dental Unit Biofilm/Devices Attached to Air & Waterlines
8. Infection Control in Radiology/Aseptic Procedures for Parenteral Medications/Disposable Devices
INSTRUCTIONAL AND LEARNING OUTCOMES:

Following successful completion of this course, the student will have the academic background and should be able to:

1. Name and describe the three Occupational Safety and Health Administration (OSHA and Environmental Protection Agency (EPA) programs of primary concern to the dental office.

2. List and describe the major components of a program to comply with the OSHA Hazards Communication Regulation.

3. Explain the transmission, course and effects of Bloodborne pathogens.

4. Define and explain the Bloodborne Pathogens Standard.

5. Identify four ways to prevent an exposure to bloodborne pathogens.

6. Describe the concept of Universal Precautions and explain the materials that require precautions.

7. Describe the types of Hepatitis B vaccine, their usage, and contraindications.

8. Recognize the importance of immunization.

9. Explain how cleaning work surfaces and equipment can protect you from disease.

10. Define MSDS.

11. State the purpose and use of Material Safety Data Sheets, and demonstrate its use in a simulated chemical exposure.

12. Compare and contrast the various classifications of waste.

13. Describe the appropriate method of discarding wastes in the dental office.

14. Be able to recognize and explain the appropriate labels and containers for containing contaminated items.

15. Explain secondary labeling.

16. Define and differentiate between sterilization and disinfection and compare methods of each.

17. Identify the following terms: infection, pathogen, microorganism, asepsis, sepsis, and antiseptic.

18. Discuss the properties and uses of glutaraldehyde, chlorine dioxide, iodophors, synthetic phenol compounds, and sodium hypochlorite.
19. Define the three job risk categories established by OSHA.
20. Describe the protocol following an exposure incident.
21. State the requirements of the Exposure Control Plan.
22. Institute post-exposure evaluation and follow-up.
23. Introduce work practice controls to reduce occupational risks.
25. Explain record keeping.
26. Explain the guidelines for building and fire safety.
27. Explain the guidelines for medical services and first aid.
28. Describe the infectious disease process.
29. Describe the personal protective equipment to be used during dental treatment.
30. Understand the limits of the medical history in identifying potential sources of infection.
31. Understand the practices involved in establishing and maintaining infection control before, during, and after dental treatment procedures.
32. Know the appropriate actions to be taken in the event of contact with blood and/or saliva.
33. Describe and discern the difference between critical, semicritical, and noncritical items with relation to sterilization/disinfection techniques.
34. Describe the most common methods of sterilization and the advantages and disadvantages of each.
35. Explain the differences between process indicators, integrators, and biologic monitoring.
36. Name the ADA accepted methods of sterilization.
37. Explain how sterilization failures can occur.
38. Describe the importance of infection control in the dental laboratory areas, including necessary asepsis technique in the shipping/receiving areas of the office.
39. Explain the role of an exposure control manager.

This syllabus is subject to change at the instructors’ discretion.