

DH R035: PERIODONTICS FOR DENTAL HYGIENE II

Originator

aderdiarian

Co-Contributor(s)
Name(s)

Elkerdany , Amira (amira_elkerdany1)

College

Oxnard College

Discipline (CB01A)

DH - Dental Hygiene

Course Number (CB01B)

R035

Course Title (CB02)

Periodontics for Dental Hygiene II

Banner/Short Title

Periodontics for DH II

Credit Type

Credit

Start Term

Fall 2021

Catalog Course Description

This course enhances assessment skills applicable to the treatment of patients with advanced periodontal disease. This course teaches the dental hygienist ethical and clinical responsibility in periodontal disorders and the relationship of the specialty practice of periodontics within the broad scope of dentistry and legal ramifications thereof. Limitations on enrollment: Physical/clinical examination (within the last 12 months); Negative Tuberculosis Mantoux test or chest x-ray; Hepatitis B vaccine and titer; Vaccine & titer; Tetanus Vaccine; Titers showing immunity to to Rubella, Rubeola, and Varicella; CPR certification.

Taxonomy of Programs (TOP) Code (CB03)

1240.20 - *Dental Hygienist

Course Credit Status (CB04)

D (Credit - Degree Applicable)

Course Transfer Status (CB05) (select one only)

C (Not transferable)

Course Basic Skills Status (CB08)

N - The Course is Not a Basic Skills Course

SAM Priority Code (CB09)

B - Advanced Occupational

Course Cooperative Work Experience Education Status (CB10)

N - Is Not Part of a Cooperative Work Experience Education Program

Course Classification Status (CB11)

Y - Credit Course

Educational Assistance Class Instruction (Approved Special Class) (CB13)

N - The Course is Not an Approved Special Class

Course Prior to Transfer Level (CB21)

Y - Not Applicable

Course Noncredit Category (CB22)

Y - Credit Course

Funding Agency Category (CB23)

Y - Not Applicable (Funding Not Used)

Course Program Status (CB24)

1 - Program Applicable

General Education Status (CB25)

Y - Not Applicable

Support Course Status (CB26)

N - Course is not a support course

Field trips

May be required

Grading method

Letter Graded

Does this course require an instructional materials fee?

No

Repeatable for Credit

No

Is this course part of a family?

No

Units and Hours

Carnegie Unit Override

No

In-Class

Lecture

Minimum Contact/In-Class Lecture Hours

35

Maximum Contact/In-Class Lecture Hours

35

Activity

Laboratory

Total in-Class

Total in-Class

Total Minimum Contact/In-Class Hours

35

Total Maximum Contact/In-Class Hours

35

Outside-of-Class

Internship/Cooperative Work Experience

Paid

Unpaid

Total Outside-of-Class

Total Outside-of-Class

Minimum Outside-of-Class Hours

70

Maximum Outside-of-Class Hours

70

Total Student Learning

Total Student Learning

Total Minimum Student Learning Hours

105

Total Maximum Student Learning Hours

105

Minimum Units (CB07)

2

Maximum Units (CB06)

2

Prerequisites

DH R020 and DH R021 and DH R022 and DH R023 and DH R024 and DH R025

Corequisites

DH R030 and DH R031 and DH R032 and DH R033 and DH R034 and DH R036

Limitations on Enrollment

Current CPR certification for health care provider (American Heart Association) or professional rescuer (American Red Cross)

Proof of freedom from and immunity to communicable diseases

No acrylic or long nails in clinical settings

Current negative TB test or chest x-ray

Physical examination demonstrating general good health

No visible tattoos or visible body piercings except single studs in earlobes

Entrance Skills

Entrance Skills

Students require a general understanding of human anatomy, human physiology, dental anatomy, and microbiology in order to understand the causes and risk factors associated with periodontal disease and periodontal surgical concepts. Students also need the clinical and radiographic skills necessary to conduct or interpret patient assessment data to identify signs of periodontal disease.

Prerequisite Course Objectives

DH R020-Explain the pharmacology, physiology, and proper use of local anesthetic agents

DH R020-Explain the anatomy of the trigeminal nerve, physiology of nerve conduction, and how anesthesia works

DH R020-List the armamentarium for local anesthesia injections

DH R020-Demonstrate techniques used in anesthesia injections in dentistry

DH R020-Explain procedures for the prevention of emergencies

DH R020-Describe the management of medical and dental emergencies

DH R020-Manage the administration of nitrous oxide

DH R021-Identify and explain the various pathological processes of disease, inflammation, immunology defense, degeneration, neoplasm, developmental disorders, and healing and repairs

DH R021-Recognize abnormalities in the human body with a special emphasis on normal and abnormal conditions in the oral cavity

DH R021-Explain the body processes involved in disease formation and the systems the body employs in its defense

DH R021-Identify etiologic factors and the signs and symptoms that are associated with diseases
 DH R021-Describe the body systems responsible for adaptation, wound healing, and repair
 DH R021-Recognize abnormal oral or health related conditions that must be called to the attention of a dentist or those that preclude, or alter, dental hygiene practice
 DH R021-Analyze the social and economic significance of disease and disease control
 DH R021-Report major disease entities with emphasis on those that occur in the oral cavity
 DH R021-Appraise the degenerative and regenerative processes associated with pathogenesis
 DH R021-Examine oral tissues and recognize a deviation from normal that may be present
 DH R022-Select and discuss drug information references available to research information.
 DH R022-Describe basic mechanisms of drug action, including receptor-mediated and receptor-independent actions, agonists and antagonists and dose-effect relationships.
 DH R022-Define the basic principles of pharmacokinetics within the body.
 DH R022-Identify factors that influence the pharmacokinetics of drugs.
 DH R022-Evaluate therapeutic applications of drugs, including routes of administration and variables that affect drug response.
 DH R022-Interpret pharmacologic effects, adverse reactions, contraindications and general methods of toxicity prevention.
 DH R022-Research the mechanism and classification of drug interactions.
 DH R022-Review the toxicological evaluation of drugs.
 DH R022-Identify factors that may alter the effect of a medication.
 DH R022-Analyze the pharmacological effects of each category of drugs as well as their mechanism of action.
 DH R022-Describe the adverse reactions, contraindications and drug interactions for each category of drugs.
 DH R022-Identify dental considerations and modifications to treatment that might be necessary based on the specific drug category.
 DH R022-Identify medications by name (generic and brand) that fall within each of the categories of medications
 DH R022-Gain an appreciation for the role of research in evidence-based dental hygiene practice.
 DH R023-Provide beginning treatment of adult and child patients
 DH R023-Demonstrate various clinical procedures utilizing scaling and polishing techniques
 DH R023-Demonstrate extraoral and intraoral inspections, cancer screening, and dental and periodontal charting
 DH R023-Deliver plaque control instruction
 DH R023-Demonstrate and explain fluoride applications
 DH R024-Describe rationale, method, routine and scientific basis for dental hygiene procedures
 DH R024-Manage dental hygiene treatment planning
 DH R024-Describe instrumentation techniques and instrument selection appropriate for patient treatment
 DH R024-Analyze and describe methods and techniques of plaque control
 DH R024-Interpret pertinent patient treatment sequencing and present findings
 DH R024-Analyze and describe correct radiology techniques used in exposing, developing, mounting, and critiquing radiographs
 DH R024-Describe and assess current clinical issues of concern
 DH R024-Analyze dental hygiene clinical cases and determine patient and clinician needs appropriate for the case
 DH R025-Describe sequentially the embryonic and histologic development of the periodontium
 DH R025-List and recognize the clinical, histologic and radiographic features of periodontal health and the varying classifications of gingivitis and periodontitis
 DH R025-Describe the functions of the periodontium, including the gingiva (attached and unattached), cementum, crevicular fluid, junctional epithelium, periodontal ligament and alveolar bone.
 DH R025-List, describe and differentiate various periodontal diseases in a classification system as established by the American Academy of Periodontology.
 DH R025-Identify periodontal risk factors that affect onset, progression and severity of periodontal diseases
 DH R025-Identify periodontal risk factors that are acquired, environment and genetic.
 DH R025-Evaluate potential periodontal interrelationships to include: stroke, coronary heart disease, respiratory disease, diabetes, preterm low birth weight deliveries and other conditions associated with progression of periodontal disease.
 DH R025-Explain the interplay between periodontal pathogens and the host tissues.
 DH R025-Describe the stages of development bacterial colonization and composition of human supragingival and subgingival biofilm.
 DH R025-Explain microbiologic and immunologic interactions of the host in periodontal disease.
 DH R025-Describe the sequential development of inflammatory periodontal disease.
 DH R025-Define and describe various evaluative methods (probing, clinical attachment levels, bleeding and exudate, mobility, etc.) needed to measure variations from periodontal health.
 DH R025-Recognize the rationale, objectives and therapies involved in the various levels of dental hygiene care (preventive oral prophylaxis, therapeutic root debridement and professional periodontal maintenance).
 DH R025-Explain the role of the re-evaluation appointment in determining the next phase of periodontal treatment.
 DH R025-Describe the components of the re-evaluation appointment.

Requisite Justification

Requisite Type

Prerequisite

Requisite

DH R020

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Prerequisite

Requisite

DH R021

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Prerequisite

Requisite

DH R022

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Prerequisite

Requisite

DH R023

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Prerequisite

Requisite

DH R024

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Prerequisite

Requisite

DH R025

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Corequisite

Requisite

DH R030

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Corequisite

Requisite

DH R031

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Corequisite

Requisite

DH R032

Requisite Description

Course not in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Corequisite

Requisite

DH R033

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Corequisite

Requisite

DH R034

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Requisite Type

Corequisite

Requisite

DH R036

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Student Learning Outcomes (CSLOs)**Upon satisfactory completion of the course, students will be able to:**

- | | |
|---|--|
| 1 | Students will give a presentation at the end of the term related to a treatment modality used in the management of periodontal disease, including a conclusion on the treatment's effectiveness based on a review of the current dental literature; thereby demonstrating competence on evaluating current scientific literature and competence on selecting evidence-based protocols to identify periodontal therapies that will reduce the bacterial load and those that modulate the host response. |
| 2 | Properly identify the systemic factors influencing periodontal disease. |
| 3 | Differentiate between probing depths and clinical attachment levels. |
| 4 | Explain the etiology of periodontal disease. |
| 5 | Explain the pathogenesis of periodontal disease. |

Course Objectives**Upon satisfactory completion of the course, students will be able to:**

- | | |
|----|--|
| 1 | Select appropriate dental hygiene care treatments for all types of classifications of periodontal diseases including patients who exhibit moderate to severe periodontal disease |
| 2 | Competently evaluate current dental and dental hygiene scientific literature for validity and reliability of results and conclusions. |
| 3 | Utilize problem-solving strategies related to comprehensive patient care and management of patients |
| 4 | List, describe and differentiate various periodontal diseases in a classification system as established by the American Academy of Periodontology. |
| 5 | Identify periodontal risk factors that affect onset, progression and severity of periodontal diseases |
| 6 | Define and describe various evaluative methods (probing, clinical attachment levels, bleeding and exudate, mobility, etc.) needed to measure variations from periodontal health. |
| 7 | Recognize the rationale, objectives and therapies involved in the various levels of dental hygiene care (preventive oral prophylaxis, therapeutic root debridement and professional periodontal maintenance). |
| 8 | Determine the patient's use and understanding of preventive (oral self-care) measures and oral health goals. |
| 9 | Recognize the need for medical and/or dental referral when appropriate |
| 10 | Develop individual, evidence-based, comprehensive, sequenced dental hygiene care plans for patients using diagnostic information that incorporates the patient's history, goals, values and motivations, clinical assessment, diagnosis, economics and other dental needs. |
| 11 | Use evidence-based protocols to identify periodontal therapies that will reduce the bacterial load and those that modulate the host response. |
| 12 | Describe the role of occlusal trauma in periodontal disease. |

13	Explain the objectives, rationale, indications, contraindications, and methodology for the most commonly performed periodontal surgical procedures.
14	Describe the types of dental implants used in dentistry, and describe the procedure for implant placement.
15	Describe the techniques, instruments and procedures for implant maintenance, including self-care aids for patients with implants.
16	Explain the role of the re-evaluation appointment in determining the next phase of periodontal treatment.
17	Describe the components of the re-evaluation appointment.
18	Discuss the objectives of periodontal maintenance and describe the components of periodontal maintenance.
19	Describe and demonstrate effective interpersonal relationships and effective oral and written communication skills with patients, colleagues, and other professionals and lay people.
20	Explain how an evidence-based decision-making approach enhances critical thinking and professional decision-making regarding patient care.
21	Conduct an effective literature search using electronic databases (such as PubMed, MEDLINE, CINAHL), professional journals, government documents, product literature and other print publications, video and other forms of multimedia.

Course Content

Lecture/Course Content

1. Clinical assessment procedures
2. Soft tissue curettage
3. Lasers in dentistry
4. Advances in disease detection
5. Oral hygiene for the periodontal patient
6. Systemic, local, and topical drug delivery for the periodontal patient
7. Rationale, treatment, and prognosis
8. Phase I, II, III, IV therapy
9. Systemic factors influencing periodontal disease and its treatment
10. Periodontal emergencies
11. Etiology of periodontal disease
12. Diagnosis, treatment planning, and prognosis of periodontal disease
13. Periodontal surgery (indications and contraindications) review
14. Dental implantology
15. Anatomical considerations for surgery
16. Management modalities for furcation involvement
17. Epidemiology of gingival and periodontal disease
18. Describing periodontal conditions
19. Occlusal trauma and periodontal disease
20. Rationale for treatment and prognosis of periodontal disease
21. Management of an acute periodontal condition
22. Pocket maintenance therapy vs. pocket elimination therapy
23. Periodontal maintenance programs
24. Restoration and prosthetic dentistry (and the relationship to periodontal disease)

Laboratory or Activity Content

In-class instruction, demonstration, and skills practice regarding soft-tissue curettage and the use of the laser in dental hygiene

Methods of Evaluation

Which of these methods will students use to demonstrate proficiency in the subject matter of this course? (Check all that apply):

Problem solving exercises
 Skills demonstrations
 Written expression

Methods of Evaluation may include, but are not limited to, the following typical classroom assessment techniques/required assignments (check as many as are deemed appropriate):

Clinical demonstration
 Essay exams

- Essays
- Group projects
- Individual projects
- Objective exams
- Oral presentations
- Problem-Solving Assignments
- Problem-solving exams
- Quizzes
- Role playing
- Reports/papers
- Research papers
- Skills demonstrations
- Skill tests
- Simulations
- Treatment plans

Instructional Methodology

Specify the methods of instruction that may be employed in this course

- Audio-visual presentations
- Computer-aided presentations
- Collaborative group work
- Clinical demonstrations
- Class activities
- Class discussions
- Case studies
- Distance Education
- Demonstrations
- Group discussions
- Guest speakers
- Instructor-guided interpretation and analysis
- Instructor-guided use of technology
- Internet research
- Lecture
- Other (specify)
- Role-playing
- Small group activities

Specify other method of instruction

None

Describe specific examples of the methods the instructor will use:

PowerPoint presentations and short videos on various topics in periodontics such as periodontal surgical procedures, case studies from textbook such as patients with various stages of periodontal disease, group discussions regarding patient case studies involving patients with varying degrees of periodontal disease and appropriate treatment planning, in-class trivia games to test knowledge of various topics, class discussions regarding relevant journal articles relating to periodontics, in-class research regarding different treatment modalities for periodontal disease, guest speakers on toothpaste ingredients for the periodontally-involved patient, role playing patient-clinician.

Representative Course Assignments

Writing Assignments

Writing assignments include essay exams on periodontics topics, such as "Discuss the benefits of stannous fluoride for the periodontally-involved patient" covered in lecture and assigned reading.

Students will also complete written assignments on the following topics: evidence-based research assignment on different treatment modalities for periodontal disease; the oral health maintenance of dental implants; and a written paper evaluating and critique a periodontal surgery observation

Critical Thinking Assignments

Case study assignments and in-class discussions involving patient health histories and critical thinking questions relating to periodontal disease diagnosis, treatment planning, prognosis, and treatment evaluation. The following assignments also require critical thinking: evidence-based research assignment on different treatment modalities for periodontal disease; the oral health maintenance of dental implants; and a written paper evaluating and critique a periodontal surgery observation

Reading Assignments

Student will spend a minimum of 4 hours per week outside of the regular class time doing independent study and reading from assigned text and professional journals, for example *The Journal of the American Dental Association*, and other related books. Assignments related to the reading include: completing questions at the end of the chapter, writing a one-page summary on the chapter, creating test questions from the chapter, and in-class discussions of the material.

Skills Demonstrations

Demonstration of soft tissue curettage using both hand instruments and the diode laser on a tomato - skill will be observed by fellow classmate and instructor for feedback

Skills will also involve critical thinking skills, which students will demonstrate through the following: Case study assignments and in-class discussions involving patient health histories and critical thinking questions relating to periodontal disease diagnosis, treatment planning, prognosis, and treatment evaluation. The following assignments also require critical thinking: evidence-based research assignment on different treatment modalities for periodontal disease; the oral health maintenance of dental implants; and a written paper evaluating and critique a periodontal surgery observation

Other assignments (if applicable)

None

Outside Assignments

Representative Outside Assignments

Student will spend a minimum of 4 hours per week outside of the regular class time doing independent study and reading from assigned text and professional journals, for example *The Journal of the American Dental Association*, and other related books

Students will also complete written assignments, critical thinking assignments, clinical observational assignments, and practice skills related to soft tissue curettage

District General Education**A. Natural Sciences****B. Social and Behavioral Sciences****C. Humanities****D. Language and Rationality****E. Health and Physical Education/Kinesiology****F. Ethnic Studies/Gender Studies****CSU GE-Breadth****Area A: English Language Communication and Critical Thinking****Area B: Scientific Inquiry and Quantitative Reasoning****Area C: Arts and Humanities****Area D: Social Sciences****Area E: Lifelong Learning and Self-Development****Area F: Ethnic Studies****CSU Graduation Requirement in U.S. History, Constitution and American Ideals:****IGETC****Area 1: English Communication****Area 2A: Mathematical Concepts & Quantitative Reasoning****Area 3: Arts and Humanities****Area 4: Social and Behavioral Sciences****Area 5: Physical and Biological Sciences****Area 6: Languages Other than English (LOTE)****Textbooks and Lab Manuals****Resource Type**

Textbook

Classic Textbook

Yes

DescriptionWeinberg, Theile, Froum & Segelnick (2015). *Comprehensive Periodontics for the Dental Hygienist* (4th Ed.). Pearson. ISBN: 0133077721**Resource Type**

Other Resource Type

Description

Course outline compiled by instructor.

Library Resources

Assignments requiring library resources

Evidence Based Research Assignment

Sufficient Library Resources exist

Yes

Example of Assignments Requiring Library Resources

Evidence Based Research Assignment: The Evidence Based Research Assignment will consist of researching the evidence on a topic in periodontology. This is a group assignment, culminating in a final presentation given towards the end of the semester.

Distance Education Addendum

Definitions

Distance Education Modalities

Hybrid (51%–99% online)

Hybrid (1%–50% online)

Faculty Certifications

Faculty assigned to teach Hybrid or Fully Online sections of this course will receive training in how to satisfy the Federal and state regulations governing regular effective/substantive contact for distance education. The training will include common elements in the district-supported learning management system (LMS), online teaching methods, regular effective/substantive contact, and best practices.

Yes

Faculty assigned to teach Hybrid or Fully Online sections of this course will meet with the EAC Alternate Media Specialist to ensure that the course content meets the required Federal and state accessibility standards for access by students with disabilities. Common areas for discussion include accessibility of PDF files, images, captioning of videos, Power Point presentations, math and scientific notation, and ensuring the use of style mark-up in Word documents.

Yes

Regular Effective/Substantive Contact

Hybrid (1%–50% online) Modality:

Method of Instruction	Document typical activities or assignments for each method of instruction
E-mail	Email submission of assignments
Other DE (e.g., recorded lectures)	Online quizzes or exams

Hybrid (51%–99% online) Modality:

Method of Instruction	Document typical activities or assignments for each method of instruction
E-mail	Email submission of assignments
Asynchronous Dialog (e.g., discussion board)	Discussion board relating to various topics in periodontics
Other DE (e.g., recorded lectures)	Online quizzes and exams
Video Conferencing	Video conference lectures

Examinations

Hybrid (1%–50% online) Modality

Online

On campus

Hybrid (51%–99% online) Modality

Online

On campus

Primary Minimum Qualification

DENTAL TECHNOLOGY

Additional local certifications required

Dental Hygiene faculty members must comply with the requirements set by the Commission on Dental Accreditation (CODA). CODA requires that program faculty member providing didactic instruction must have earned at least a baccalaureate degree in a discipline-related field. All dental hygiene faculty members must have current knowledge of the specific subjects they are teaching and documented background in educational methodology consistent with their teaching assignments. Dentists and dental hygienists who supervise students' clinical procedures should have qualifications which comply with the state dental or dental hygiene act. Individuals who teach and supervise dental hygiene students in clinical enrichment experiences should have qualifications comparable to faculty who teach in the dental hygiene clinic and are familiar with the program's objectives, content, instructional methods and evaluation procedures.

Review and Approval Dates**Department Chair**

04/24/2020

Dean

04/24/2020

Technical Review

05/13/2020

Curriculum Committee

05/13/2020

Curriculum Committee

12/09/2020

CCCCO

MM/DD/YYYY

Control Number

CCC000584177

DOE/accreditation approval date

MM/DD/YYYY