

Dental Hygiene Baccalaureate Program

Proposed Curriculum

Analysis of the proposed curriculum for this degree including an example of the upper division discipline work that may be required. In OC's current ASDH program, students would complete the same major standards as in any BSDH program per the requirements to be accredited by CODA. The differences between the associate and bachelor dental hygiene degree programs are in the total number of units and upper division course designations.

OC's proposed baccalaureate program is outlined below.

Lower Division Coursework

UNIT CREDIT

ANAT R101 General Human Anatomy

4

This course is organized into two parts: lecture and laboratory. The lecture portion is an introduction to gross anatomy as well as organization and histology of human organ systems. The laboratory portion reinforces the lecture material and consists of hands-on experiments and demonstrations used to illustrate the principles and concepts of anatomy. These include but are not limited to microscope use, model and specimen examination, dissection of the cat as well as other livestock organs and demonstration of the dissected human cadaver. This course meets the requirements of students anticipating transfer to university, medical school, dental school, holistic medicine, kinesiology programs and other health care certificated programs.

**BIOL R101 General Biology 3 + BIOL R101L – Required prerequisite for Anatomy at OC only*

This course is an introduction to the science of life, cell biology, metabolism, diet, genetics, evolution and ecology and will include current issues and news on these topics.

CHEM R110 Elementary Chemistry

5

This is an introductory course in chemistry stressing the basic principles of atomic and molecular structure, compound formation and chemical reactivity, the periodic table and states of matter. Quantitative techniques involved in elementary chemical calculations will be emphasized. In addition, the course serves as an introduction to lab techniques with experiments illustrating principles covered in lecture.

CHEM R112 Elementary Organic and Biological Chemistry

5

The major emphasis of this course will be on general organic chemistry and biological chemistry as they apply to the living systems. The section of organic chemistry includes naming, structure and bonding, classification by functional groups and reactions, polymerization, optical isomerism, and physical properties based on molecular polarity. Biochemistry includes carbohydrates, proteins, and amino acids, fats, enzymes, DNA and RNA, and cell biochemistry. The lab illustrates the principles covered in the lecture. This course provides training and practice in basic principles of effective oral communication through participation in public speaking, group discussion, and oral reading. It emphasizes being at ease in front of, and with, a group, and developing constructive attitudes, organized thinking, proper use of voice and body, and critical listening.

COMM R101 Introduction to Oral Communication

4

This course provides training and practice in basic principles of effective oral communication through participation in public speaking, group discussion, and oral reading. It emphasizes being at ease in front of, and with, a group, and developing constructive attitudes, organized thinking, proper use of voice and body, and critical listening.

DH R001 Pre-Dental Hygiene 1

This course is an introduction to the field of dentistry with a specific focus on the basics of dental hygiene. Emphasis will be placed on dental terminology, communication, critical thinking skills, along with some of the basic clinical techniques required for the practice of dental hygiene.

ENG R101 College Composition 4

This course provides training and practice in basic principles of effective oral communication through participation in public speaking, group discussion, and oral reading. It emphasizes being at ease in front of, and with, a group, and developing constructive attitudes, organized thinking, proper use of voice and body, and critical listening. This course covers the theory and practice of critical reading applying critical thinking skills for academic success. The course emphasizes methods of analysis, criticism, and interpretation including application of logic and reasoning with college-level academic texts and research.

READ R105 Critical Reading 3

This course covers the theory and practice of critical reading applying critical thinking skills for academic success. The course emphasizes methods of analysis, criticism, and interpretation including application of logic and reasoning with college-level academic texts and research.

MATH R105 Introductory Statistics 4

This course covers descriptive and inferential statistics for students of social sciences, science, education, business, and engineering. Included are discussions of graphing and interpreting graphs, measures of the center and variation, probability, normal curves, binomial tests, hypothesis testing, correlation and regression, chi-square tests, t-tests, and analysis of variance. This course uses technology to analyze data sets.

MICRO R100 Principles of Microbiology 3

MICRO R100L Principles of Microbiology Lab 2

This course is an introduction to the structure, metabolic activities, utility and pathogenicity of bacteria, fungi, algae, protozoa and viruses. The topics will include distribution, metabolism, molecular genetics, biotechnology, immunity, cancer, probiotics and the physical/chemical methods used in control of microbes and cellular pathogens. The principles of disease transmission, prevention and immunity will also be presented. The diversity of the microbial world and its applications to improving human health and quality of life are emphasized.

PHSO R101 Human Physiology 5

This course emphasizes principles of cellular and systemic functions of the human body. Lecture topics include scientific method, basic inorganic and organic chemistry, solute as well as water transport and balance, homeostatic mechanisms, and functions of the major organ systems. This course emphasizes demonstrations and techniques of commonly utilized laboratory equipment. Laboratory topics will primarily consist of analysis, interpretation and evaluation of data gathered

relating to homeostatic mechanisms, functions of the major organ systems and disease. Experiments reinforce material presented in lecture.

PSY R101 General Psychology

3

Psychology is the scientific study of behavior and mental processes. This course will introduce students to major psychological theories and concepts, methods, and research findings in psychology. The course will cover the biological bases of behavior, perception, cognition and consciousness, learning, memory, emotion, motivation, development, personality, social psychology, applied psychology, and psychological disorders and therapeutic approaches. In addition, the course will examine the impact of diversity on psychological research, theory and application, including (but not limited to): age, race, ethnicity, culture, gender, socio-economic status, disability, and sexual orientation.

SOC R101 Introduction to Sociology

3

This course introduces students to the field of Sociology; a scientific field that emphasizes how structural, institutional, and group related social forces shape our society. These issues are addressed through an examination of historical and modern theoretical developments in the field. Students encounter topics such as the Sociological Imagination, socialization, culture, social class, race, ethnicity, age and gender in a context of social change.

Additional units required to fulfill CSU-GE breadth

18

Subtotal

71

Upper Division Coursework

DH R310 Oral Biology

3

This course focuses on dental embryology, dental histology, the clinical recognition of normal oral structures, the physiological and structural functions of teeth and supporting tissues, and oral anatomy as related to dental hygiene procedures.

DH R311 Oral Radiology

3

This course teaches the fundamentals of radiation safety and the operation of dental radiology equipment, along with the clinical application of procedures involved in exposing, processing, mounting and interpreting dental radiographs. This course presents the opportunity to gain certification to legally take dental radiographs.

DH R312 Head and Neck Anatomy

2.5

This course studies the anatomical structures of the head and neck regions and relates these structures to the clinical practice of dental hygiene.

DH R313 Dental Health Education Seminar

1

This course teaches the principles and practices of prevention and control of dental diseases with emphasis on nutrition, plaque control, motivation, and chairside patient education.

DH R314 Introduction to Dental Health Practice 3

This course is an introduction to all theoretical and didactic components of the practice of dental hygiene, including disease transmission and prevention, universal precautions, record keeping documentation and protocol, and dental hygiene instrumentation for scaling and root planing.

DH R315 Introduction to Pre-Clinic/Clinic 2

This course is an introduction to all clinical procedures, such as maintaining the chain of asepsis, and skills, like identifying plaque and calculus, needed for the practice of dental hygiene.

DH R320 Local Anesthesia and Nitrous Oxide 2

This course teaches pharmacology, physiology, and proper use of local anesthetic agents. The course also teaches the anatomy of the trigeminal nerve, physiology of nerve conduction, how anesthesia works, and prevention and management of emergencies.

DH R321 General and Oral Pathology 4

This is a study of the pathological processes of inflammation, immunology defense, degeneration, neoplasm, developmental disorders, and healing and repair. This class focuses on the recognition of abnormalities in the human body with a special emphasis on normal and abnormal conditions in the oral cavity.

DH R322 Pharmacology 2

This course focuses on the classification and study of drugs according to origin, physical and chemical properties, therapeutic effect and values, particularly of drugs used in dentistry.

DH R323 Clinical Practice I 3

This course provides beginning clinical experience in the treatment of adult and child patients. Various clinical procedures utilizing scaling and polishing techniques, extraoral and intraoral inspections, cancer screening, dental and periodontal charting, plaque control instructions and topical fluoride application will be put into supervised practice.

DH R324 Clinic Dental Hygiene Seminar I 3

This course is designed to provide additional didactic material for clinical procedures that students apply in clinical situations. Information presented in previous clinic/patient treatment-related courses is reviewed. Clinical issues and cases are reviewed and discussed.

DH R325 Periodontics I 2

This course in periodontics provides identification of the normal periodontium and recognition of deviations from norm. The etiology and principles of periodontal diseases, examination procedures, treatment and preventive measures are also examined.

DH R430 Special Patients/Geriatrics 1

This course teaches characteristics and alternative management techniques of individual patients with special needs, including providing motivation and honing interpersonal communication for these patients. The treatment of the compromised patient and myofunctional therapy is presented.

DH R431 Nutrition in Dentistry 1

This course provides the basic principles of nutrition and its relationship to oral health and well-being. The students perform dietary surveys on clinic patients and plan nutritional dietary problems.

DH R432 Dental Materials 2

This course teaches the composition and application of various materials used in dental procedures. The fundamentals of chairside assisting while using dental materials are taught and the roles of the entire dental team in working with various dental materials in the care of oral dentition are covered.

DH R433 Clinic II Seminar 2

This course expands knowledge of comprehensive dental hygiene care through lecture and group discussions. Didactic material from other courses is reviewed and supplemented. Clinical issues and cases are also covered.

DH R434 Clinical Practice II 4

This course provides intermediate experience in the treatment of dental hygiene patients to expand on the procedures and techniques and provides additional experience on more difficult patient cases.

DH R435 Periodontics II 2

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.

DH R436 Community Oral Health I 2

This course introduces students to the principles and practices of dental public health. The emphasis is placed on the role of the dental hygienist as an innovator of and educator in community health programs. Public health issues will be introduced and discussed.

DH R440 Advanced Clinical Topics 2

This course emphasizes advanced dental hygiene skills and procedures; state board patient selection; ways to minimize occupational hazards common to dental practice; and interactional skill development for the dental practice.

DH R441 Practice Management 1

This course presents office practice management; ethical and legal aspects of dentistry and dental hygiene; and business matters relating to dental hygiene practice.

DH R442 Clinic III Seminar 2

This course emphasizes advanced treatment planning and treatment of advanced periodontal patients, and State Board review and preparation.

DH R443 Clinical Practice III

4

This course provides advanced clinical experiences in the treatment of adult patients. Various clinical procedures utilizing advanced scaling and root planing, polishing techniques, extraoral and intraoral inspections, cancer screening, dental and periodontal charting, plaque control instructions, nutritional counseling, and topical fluoride will be put into supervised practice.

DH R444 Community Oral Health II

1

This class is the laboratory portion of the community oral health courses (the lecture portion is Community Oral Health for Dental Hygiene I, [DH R036](#)). It uses community settings as the forum to relay the principles of dental public health as they relate to both children and adult

DH R445 Ethics and Jurisprudence

1

This course examines the fundamental factors necessary to be employed and practiced within the ethical and legal framework of the state dental practice act and the code of ethics of the American Dental Association.

Subtotal

55.5

Total

126.5

Some examples of additional upper division discipline work that may be appropriate for this program are: Health Policy; Management; Essentials of Public Health; Sales Management; Preventive Dentistry; Career Development/Life Planning; Public Health and Special Populations; Ethical Principles in Public Health; Organizational Behavior; Legal Issues in Healthcare; Family and Personal Health; Principles of Education; Educational Psychology for Health Professions; Argumentation and Critical Thinking Modules; Intercultural Communication; Principles of Clinical Instruction Techniques; DH Methodology and Leadership; Contemporary Issues in DH; Etiology and Management of Dental Caries; Research Methodology; Research Writing; and Grant Writing.

The above degree pattern, when combined with those found in section F, will form the foundation of a truly outstanding BSDH program.