



## Dental Hygiene Bachelor Degree Completion Program Assessment Report 2018-19

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### Section 1 – Program Mission

The mission of the Bachelor of Science in Dental Hygiene *degree-completion* program is to provide an opportunity for licensed dental hygienists at any stage in their career to complete a bachelor's degree for professional growth, current and future employment options, and/or entry into a graduate program.

The mission, goals, objectives, and student learning outcomes for the program are reviewed annually by the program faculty at the fall meeting during convocation.

### Section 2 – Program Goals

The goals were designed to help our diverse population of working professional students achieve our Program Mission.

#### *Our Commitment to our Students:*

- Provide a quality bachelor-degree completion program that recognizes the achievement of passing the dental hygiene national board exam and state or regional clinical exams.
- Recognize the growth in career opportunities and provide core courses to expose students to business management, education, public health, and evidence-based decision making.
- Build positive relationships between core dental hygiene faculty and students to mentor and help students achieve degree goals.
- Help students plan a course schedule that ensures academic success by factoring in professional goals and personal commitments.
- Allow students to explore further areas of interest by offering elective choices.
- Prepare students for graduate-level courses.

### Section 3 – Program Description and History:

Oregon Tech (OT) has offered a dental hygiene degree at the Klamath Falls campus since 1970. Although the program started as an Associate of Applied Science (AAS) degree, beginning in 1985 students had the option of completing a Bachelor of Science (BS) degree by extending their studies one more year. In 2003 the program transitioned to a BS degree only. In 2011 Oregon Tech began a second BS dental hygiene program at Chemeketa Community College in Salem, Oregon.

The licensing requirements are the same whether students graduate with an AAS or BS degree in dental hygiene. In the United States (US), all dental hygienists with an AAS degree have at least three years of undergraduate courses. During the freshman year, pre-dental hygiene students complete required prerequisites and then apply for acceptance into an accredited dental hygiene program. Once admitted, students continue for two more years. In the United States there are approximately 230 AAS and 60 BS accredited dental hygiene programs. ([dentalcareersedu.org](http://dentalcareersedu.org))

In 1996, OT was one of the first colleges in the US to offer dental hygienists with AAS degrees an opportunity to complete their BS degree through 'distance education'. The student's prerequisite courses (one academic year) are reviewed for credit transfer. The student's dental hygiene courses (two academic years) are transferred as 'block credits' through documentation of passing the Dental Hygiene National Board Exam.

Oregon Tech’s Bachelor of Dental Hygiene Outreach (BDHO) was designed to allow dental hygienists the flexibility to plan their course schedules to meet the demands of their professional and personal lives. Depending on credits transferred to our institutions, students’ course plans can all look different. All students must complete a minimum of 45 credits from OT to complete their bachelor’s degree. All courses are offered 100% online. Students may begin any term and choose whether to take one or several courses a term.

Students are exposed to a variety of career opportunities, including business, management, education, and public health. Besides options for general education requirements, students also have dental hygiene elective choices to further explore and learn skills in their area of interest. The BDHO program includes:

- Six required dental hygiene core courses
- Three dental hygiene elective choices from a list approved by the department
- OT general education and elective requirements needed for a bachelor’s degree

In the US we now have approximately 50 BS dental hygiene completion programs ([ADEA degree completion programs](#)). Even with the increased competition, OT has managed to keep a steady enrollment. Because students begin any term and plan the pace of their course schedule, students might graduate after completing four terms or take several years to complete the program. The BDHO has students graduating at the end of every term.

Actively enrolled Spring term:		Graduate totals from Su-F-W-Sp Terms:	
2019	54	2019	19
2018	51	2018	10
2017	50	2017	27
2016	68	2016	22
2015	59	2015	25

Employment rates and salaries are not quantifiable for our BDHO students. Before students enter our bachelor degree completion program they are already licensed, working dental hygienists. Work settings include clinical dental hygiene, education, public health, management, corporate sales, and/or entrepreneur. Graduates might continue in their place of employment, branch out into a new field, begin a graduate program, or a combination of the various options. Currently OT employs several BDHO graduates who teach in clinics, labs, and/or didactic in our Klamath Falls and Salem dental hygiene programs.

For the 2019 Best Online Colleges ranking, SR Education Group researched and analyzed accredited online schools across the nation, taking into consideration academic strength factors as well as annual tuition rates. *“Inclusion on this list shows high academic standards and a commitment to affordability, two key factors important to prospective students.”* Oregon Tech ranked #1 for online bachelor’s degrees in Dental Hygiene. (In 2018 we were ranked #9.) The promotional badge we received from SR Education Group is posted on our website:



[SR Education - Best DH Online Programs](#)

## Section 4 – Program Student Learning Outcomes

The American Dental Hygienist Association (ADHA) addresses six competencies dental hygienists should demonstrate, but our BDHO students achieve those standards in their AAS programs. [ADHA Standards for Clinical Dental Hygiene](#)

The ADHA has identified professional roles for dental hygienists that correlate with our Program Mission and PSLOs:

*“Overview: The dental hygienist plays an integral role in assisting individuals and groups in achieving and maintaining optimal oral health. Dental hygienists provide educational, clinical, and consultative services to individuals and populations of all ages in a variety of settings and capacities. The professional roles of the dental hygienist include the following: Clinician, Corporate, Public Health, Researcher, Educator, Administrator, and Entrepreneur.”* [ADHA Professional Roles of the Dental Hygienist](#)

The American Dental Educators Association (ADEA) also recognizes the expanding roles of dental hygienists, which align with our BDHO Program Mission and PSLOs:

*“For those with a passion for dental hygiene who do not wish to practice clinically, there are many career paths outside of the operatory available in education, research, administration, public health and corporate business.”*  
[ADEA Career Options](#)

BDHO students take a minimum of 15 courses with Oregon Tech, but only six are required core courses that dental hygiene faculty teach. Core courses address the PSLOs listed below with each course aligned with one PSLO and assessment. Even with the assessment limitation of six courses, the PSLOs address the professional roles and career options identified by the ADHA and ADEA. Other required and elective courses in the BDHO program also address the PSLOs, including minor degree options. An updated business minor was approved in January, 2019, to begin in catalog year 2019-20.

**See Appendix** – Professional Courses (Exhibit A), Recommended Electives (Exhibit B), and Business Minor for Dental Hygiene (Exhibit C).

Program Student Learning Outcomes (PSLOs) were reviewed by faculty at the annual program meeting during convocation. No changes were implemented.

Upon graduating from the BDHO program at Oregon Tech, students will:

1. Analyze the strengths and limitations of different research designs and their impact on the dental hygiene profession. (Assessed in **DH 453 – Research and Evidence-Based Dentistry I**)
2. Apply evidence-based decision making to evaluate and incorporate emerging treatment modalities into dental hygiene practice. (Assessed in **DH 455 – Research and Evidence-Based Dentistry II**)
3. Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions. (Assessed in **DH 454 – Dental Practice Management**)
4. Identify current and emerging issues in the profession of dental hygiene. (Assessed in **DH 401 – Overview of Advanced Dental Hygiene**)
5. Assess the oral health care needs of a community and develop a strategic plan that addresses identified needs. (Assessed in **DH 470 – Community Assessment and Program Planning I**)
6. Design instruction that includes teaching strategies and assessments to meet a variety of learning style needs. (Assessed in **AHED 450 – Instructional Methods**)

## Section 5 – Essential Student Learning Outcomes

Oregon Tech's Essential Student Learning Outcomes (ESLOs) support Oregon Tech's institutional mission and core themes. The assessment structure is to have three pathways (foundation, essential practice, and capstone) for each of the six ESLOs.

The uniqueness of the BDHO program is not conducive to following the exact, same assessment pathways as students who achieve most, if not all, of their credits through OT courses.

The reasons BDHO students cannot be assessed in the same manner as BS dental hygiene students is because:

- BDHO students are required to take a minimum of 15 OT courses; BS students (depending on where they took their prerequisite courses) are required to take 51-64 OT courses
- Although BDHO students are required to take general education and elective courses to earn a bachelor's degree, students' course plans are all unique depending on previous courses transferred from other colleges
- Of the 15 required OT courses for BDHO students, only six courses are taught by dental hygiene faculty in the BDHO program

All BDHO students graduated from an AAS dental hygiene program accredited by the Commission on Dental Accreditation (CODA). The accreditation process is rigorous, and programs must address specific standards related to "...student evaluation methods that measure all defined program competencies..." and "...the evaluation methods used in the dental hygiene program should include process and end-product assessments of student performance, as well as a variety of objective testing measures." [CODA Accreditation Standards - 2.6 Curriculum](#)

**ESLO 1: Communication – OT students will communicate effectively orally and in writing**

- Assessed in AAS program – CODA Standard 2-8a: *General education content must include oral and written communications, psychology, and sociology*; CODA Standard 2-15: *Graduates must be competent in communicating and collaborating with other members of the health care team to support comprehensive patient care.*
- Assessed in students' communication courses transferred from previous colleges and/or through OT courses as needed
- The six required BDHO dental hygiene courses do not have an 'oral' communication component, so cannot be assessed
- 'Written' communication is assessed in the BDHO program

**ESLO 2: Inquiry and Analysis – OT students will engage in a process of inquiry and analysis**

- Assessed in AAS program – CODA Standards on Critical Thinking 2-22: *Graduates must be competent in the evaluation of current scientific literature*; and 2-23: *Graduates must be competent in problem solving strategies related to comprehensive patient care and management of patients.*
- Assessed in students' courses transferred from previous colleges and/or through OT courses as needed
- Inquiry and Analysis is assessed in the BDHO program

**ESLO 3: Ethical Reasoning – OT students will make and defend reasonable ethical judgments**

- Assessed in AAS program – CODA Standard 2-19: *Graduates must be competent in the application of the principles of ethical reasoning, ethical decision making and professional responsibility as they pertain to the academic environment, research, patient care and practice management.*
- Assessed in students' required course equivalency for OT's DH 275 - Ethics
- No assessment activity to address from the six required BDHO dental hygiene courses

**ESLO 4: Teamwork – OT students will collaborate effectively in teams or groups.**

- Assessed in AAS program – CODA Standard 2-15: *Graduates must be competent in communicating and collaborating with other members of the health care team to support comprehensive patient care.*
- Assessed in students' SPE 221 – Small Group and Team Communication course transferred from previous college and/or taken through OT
- No assessment activity to address from the six required BDHO dental hygiene courses

**ESLO 5: Quantitative Literacy – OT students will demonstrate quantitative literacy.**

- Assessed in students' MATH 243 – Introductory Statistics or MATH 361 – Statistical Methods course transferred from previous college and/or taken through OT

- Assessed in AAS programs through anesthesia course (i.e. proper dosage calculations) and clinical experiences (i.e. use of indices)

**ESLO 6: Diverse Perspectives – OT student will explore diverse perspectives.**

- Assessed in AAS program – CODA Standard 2-15: *Graduates must be competent in communicating and collaborating with other members of the health care team to support comprehensive patient care. One of the ‘intents’ listed under this Standard is: The ability to communicate verbally and in written form is basic to the safe and effective provision of oral health services for diverse populations. Dental Hygienists should recognize the cultural influences impacting the delivery of health services to individuals and communities (i.e. health status, health services and health beliefs).*
- No assessment activity to address from the six required BDHO dental hygiene courses

Graduates are contacted to complete an Exit Survey that does ask proficiency levels for the six ESLOs.

**See Appendix** – Six Required DH Courses in BDHO with PSLO and ESLO Assessment Plan (Exhibit D); Exit Survey Results for Question #1 and #2 on ESLO proficiency levels (Exhibit E)

**Section 6 – Curriculum Map**

Not included for BDHO because students only have six required Dental Hygiene (DH) courses and remaining nine (approximate) courses vary depending on students’ transfer credits and program plan.

**Section 7 – Assessment Cycle**

<b>Assessment Cycle</b>							
PSLOs and ESLOs – Six Year Cycle	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>1.</b> Analyze the strengths and limitations of different research designs and their impact on the dental hygiene profession <b>(DH 453)</b>	PSLO				PSLO		
<b>2.</b> Use evidence-based decision making to evaluate and incorporate emerging treatment modalities into dental hygiene practice <b>(DH 455)</b>	PSLO						PSLO
<b>ESLO – Inquiry and Analysis</b>	<b>ESLO</b>						<b>ESLO</b>
<b>3.</b> Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions. <b>(DH 454)</b>		PSLO					
<b>4.</b> Identify current and emerging issues in the profession of dental hygiene <b>(DH 401)</b>				PSLO			
<b>5.</b> Assess the oral health care needs of a community and develop a strategic plan that addresses identified needs. <b>(DH 470)</b>			PSLO				

6. Design instruction that includes teaching strategies and assessments to meet a variety of learning style needs. <b>(AHED 450)</b>						PSLO	
<b>ESLO – Written Communication</b>						<b>ESLO</b>	

See Appendix – Six Required DH Courses in BDHO with PSLO and ESLO Assessment Plan (Exhibit D)

## Section 8 – Methods for Assessment

Because of the limitation of only six courses in BDHO that faculty can use to conduct assessments, only one direct and one indirect measure are used for each PSLO and the ESLO.

<b>PSLO 3: BDHO Online, DH 454, 201801, Jill Schultz</b>				
<b>PSLO 3:</b> Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions.				
<b>Assignment overview:</b> Assignment project aligns directly with PSLO. In their work setting, students identify an area for improvement, clarify the problem, propose and develop a viable solution. The assignment is divided into three parts – Project Proposal (Part I), Determine Resources (Part II), and Practice Application Project (Part III). Part I – Students identify a problem, discuss evidence, and justify the project need Part II – Students identify and research resources needed to solve the problem Part III - Students design a project that can be implemented in any aspect of their dental hygiene practice that solves the problem identified in Part I.				
<b>Assessment – direct measure:</b> Objectives, Criteria, Rubric, and Raw Data found in Appendix – Exhibit E. Course instructor assessed Part III of the project with a rubric and measurement scale of excellent, average, needs improvement, or unacceptable. For the PSLO assessment the course instructor and another instructor independently assessed Part I, II, and III using a proficient, competent, and novice scale. The two instructors then met to discuss and rate each performance criteria together.				
<b>Performance Criteria</b>	<b>Assessment Methods</b>	<b>Measurement Scale</b>	<b>Minimum Acceptable Performance (MAP)</b>	<b>Results n = 5</b>
Part I – Student identifies a problem, discusses evidence, and justifies the project need	Final Practice Application Project Paper	Proficient, Competent, or Novice	85% of students scoring excellent or average	3 - Proficient 2 - Competent 0 - Novice  MAP = 100%
Part II – Student identifies and finds resources needed to solve the problem	Final Practice Application Project Paper	Proficient, Competent, or Novice	85% of students scoring competent or proficient	3 - Proficient 1 - Competent 1 - Novice  MAP = 80%
Part III - Student designs a project that can be implemented in any aspect of their dental hygiene practice that solves the problem identified in Part I	Final Practice Application Project Paper	Proficient, Competent, or Novice	85% of students scoring competent or proficient	3 - Proficient 2 - Competent 0 - Novice  MAP = 100%

<b>Assessment – indirect measure:</b> Student Exit Survey; Students were asked to “rate their proficiency in the following area”:	
Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions.	<b>Results (n = 4):</b> 75% High Proficiency (3/4 students) 25% Proficient (1/4 students) 0% Some Proficiency or Limited Proficiency
How much has your experience at Oregon Tech contributed to your knowledge, skills, and personal development in these areas?	<b>Results (n = 4):</b> 100% High Proficiency (4/4 students) 0% Proficient, Some Proficiency or Limited Proficiency

See Appendix - Assessments, Assignment Descriptions, and Rubrics (Exhibit F); BDHO Exit Survey (Exhibit G)

**History of Results:**

PSLO 3 was assessed during Academic Year 2014-15 with no noted weaknesses. The same instructor assessed the PSLO in the same course this cycle, but with an updated project assessment.

**Assessment Shared with Faculty:**

The BDHO has one full-time and one adjunct faculty member who teach the six required dental hygiene courses. Faculty met via web-conferencing on 12-30-19 to discuss outcomes from the direct assessment. Faculty met on 9-18-19 to discuss Exit Survey results. It was noted that assessment data was derived from two sets of students – 1) direct assessments from current BDHO students enrolled in courses that were assessed and 2) indirect assessments from BDHO students as they graduated each term throughout the academic year.

**Interpretation of Results:**

**PSLO 3 Direct Assessment:** The faculty concluded that 100% of the students (n=5) achieved Competent or Proficient for Part I and Part III of the project. Four students achieved Competent or Proficient for Part II, and one student only achieved the Novice level.

**PSLO 3 Indirect Assessment:** Students rated their proficiency level for the PSLO at 75% High Proficiency; 25% Proficient.

The faculty agreed that the assignment was a good match for the PSLO assessment and overall the students achieved the learning outcome.

**9. Evidence of Improvement in Student Learning.**

BDHO did not have a scheduled “closing the loop” assessment from the 2017-18 assessment activities.

**10. Data-driven Action Plans: Changes Resulting from Assessment**

Faculty agreed that the course instructor should create rubrics for Part I and II to help clarify project expectations, as well a student work sample of an exemplary project to help students better visualize the end goal of the assessment. Faculty also discussed the benefits of assessing the work together to clarify assessment goals and expectations. The faculty plan to continue to assess students’ work each assessment cycle. When faculty meet during Convocation they will set a date to review and discuss the assignment and rubric that will be used for the direct assessment for AY 2019-20.

## Appendix

### Exhibit A – Professional Courses Required for BDHO

Course	Description	Credits
AHED 450	Instructional Methods	3
BUS 317	Healthcare Management	3
DH 401	Overview of Advanced Dental Hygiene	3
DH 453	Research & Evidence Based Dentistry I	3
DH 454	Dental Practice Management	3
DH 455	Research & Evidence Based Dentistry II	3
DH 470	Community Assessment and Program Planning I	3
	Humanities electives (two)	6
MATH 243	Introductory Statistics	4
SPE 321	Small Group and Team Communication	3
	Communication elective (from General Education list)	3
	Dental Hygiene electives (three; approved by advisor)	9
	<b>Total Professional Course Credits</b>	<b>46</b>

### Exhibit B – Recommended Electives

Electives approved by Dental Hygiene Department			
Clinical Practice	Management	Education	Public Health
COM 205, Intercultural Communication	BUS 223, Marketing I <b>OR</b> BUS 337, Principles of Health Care Marketing	AHED 451, Instructional Experience	BUS 313, Health Care Systems & Policy
BIO 336, Essentials of Pathophysiology	BUS 308, Principles of International Business	AHED 460, Fundamentals of Distance Ed	WRI 410, Grant Writing
PSY 347, Organizational Behavior	BUS 226, Business Law	SOC 225, Medical Sociology	COM 205, Intercultural Communication
SOC 225, Medical Sociology	BUS 313, Health Care Systems & Policy	PSY 347, Organizational Behavior	PSY 347, Organizational Behavior
BUS 313, Health Care Systems & Policy	PHIL 342, Business Ethics	PSY 301, Basic Counseling Techniques	SOC 225, Medical Sociology
PSY 336, Health Psychology	PSY 347, Organizational Behavior	<b>Master of Science in Allied Health</b>  ALH 515, <i>Scientific Writing &amp; Medical Literature</i>  2 other MSAH courses may be taken for DH electives or to meet residency	SOC 325, Global Population Health
PSY 337, Health Psychology II	BUS 345, Fraud Examination		SOC 335, Health Inequality & Cultural Competency
RCP 326, Disaster Preparedness	BUS 349, Human Resource Management		DH 471, Community Program Planning II



*PSY 301, Basic Counseling Techniques	BUS 441, Leadership requirement		
COM 205, Intercultural Communication	ACC 201/203, Principles of Accounting		
	DH 465, Dental Hygiene Entrepreneurship		

### Exhibit C – Business Minor

New Curriculum Proposed for DH Business Minor		
ACC 201	Principles of Accounting	4
BUS 226	Business Law	3
BUS 317	Healthcare Management	3
BUS 337	Healthcare Marketing	3
PSY 347	Organizational Behavior	3
An elective choice from following options: DH 465, BUS 356, BUS 313, BUS 349, SOC 305, or SOC 335.		3
Total Credits		19

### Exhibit D – Six Required DH Courses in BDHO with PSLO and ESLO Assessment Plan

<b>PSLO 1</b>	Analyze the strengths and limitations of different research designs and their impact on the dental hygiene profession.
<b>ESLO</b>	n/a
<b>Course</b>	DH 453 – Research and Evidence Based Dentistry I
<b>Direct Assessment</b>	Module Four – <i>Analyze Randomized Controlled Trials</i>
<b>Indirect Assessment</b>	Student Exit Survey
<b>Assessment Cycle</b>	2017-18; 2021-22
<b>PSLO 2</b>	Apply evidence-based decision making to evaluate and incorporate emerging treatment modalities into dental hygiene practice.
<b>ESLO</b>	Inquiry and Analysis
<b>Course</b>	DH 455 – Research and Evidence Based Dentistry II
<b>Direct Assessment</b>	Module Four – <i>Critical Analysis of Research II</i>
<b>Indirect Assessment</b>	Student Exit Survey
<b>Assessment Cycle</b>	2017-18; 2023-24
<b>PSLO 3</b>	Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions.
<b>ESLO</b>	n/a
<b>Course</b>	DH 454 – Dental Practice Management
<b>Direct Assessment</b>	Practice Application Project
<b>Indirect Assessment</b>	Student Exit Survey
<b>Assessment Cycle</b>	2018-19; 2024-25

<b>PSLO 4</b>	Identify current and emerging issues in the profession of dental hygiene.
<b>ESLO</b>	n/a
<b>Course</b>	DH 401 – Overview of Advanced Dental Hygiene
<b>Direct Assessment</b>	Module Ten – <i>Workforce Models: Compare and Contrast</i>
<b>Indirect Assessment</b>	Student Exit Survey
<b>Assessment Cycle</b>	2016-17; 2020-21
<b>PSLO 5</b>	Assess the oral health care needs of a community and develop a strategic plan that addresses identified needs.
<b>ESLO</b>	n/a
<b>Course</b>	DH 470 – Community Assessment and Program Planning I
<b>Direct Assessment</b>	Community Oral Health Strategic Plan
<b>Indirect Assessment</b>	Student Exit Survey
<b>Assessment Cycle</b>	2019-20; 2025-26
<b>PSLO 6</b>	Design instruction that includes teaching strategies and assessments to meet a variety of learning style needs.
<b>ESLO</b>	Written Communication
<b>Course</b>	AHED 450 – Instructional Methods
<b>Direct Assessment</b>	Module Ten – <i>Final 4 MAT Lesson Plan Project</i>
<b>Indirect Assessment</b>	Student Exit Survey
<b>Assessment Cycle</b>	2015-16; 2022-23

## Exhibit E – Exit Survey: Question #1 and #2 – Proficiency Levels for Six ESLOs

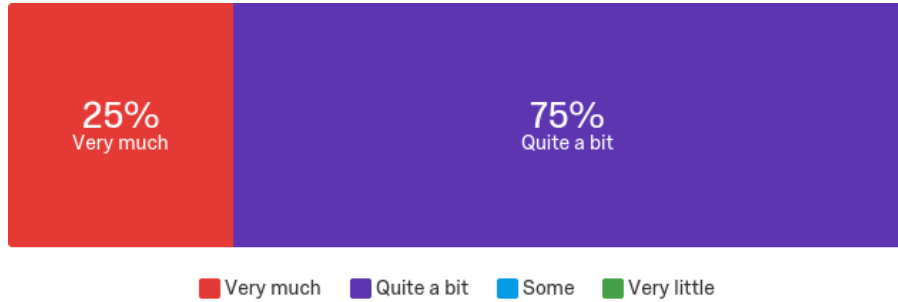
Q ESLO 1 - Oregon Tech Essential Student Learning Outcomes Please rate your proficiency in the following areas.



#	Question	High proficiency	Proficiency	Some proficiency	Limited proficiency	Total
1	ESLO 1a. Communication: Writing effectively	50.00%	2	50.00%	2	4
2	ESLO 1b. Communication: Speaking effectively	50.00%	2	50.00%	2	4
3	ESLO 2. Inquiry & Analysis: Thinking critically and analytically	50.00%	2	50.00%	2	4
4	ESLO 3. Ethical Reasoning: Making ethical judgements	100.00%	4	0.00%	0	4

5	ESLO 4. Teamwork: Work effectively with groups and teams	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4
6	ESLO 5. Quantitative Literacy: Using quantitative/numerical information to solve problems, evaluate claims, and support decisions	25.00%	1	75.00%	3	0.00%	0	0.00%	0	4
7	ESLO 6. Diverse Perspectives: Understanding of diverse perspectives to improve interactions with others	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4

**Q ESLO 2 - Oregon Tech Essential Student Learning Outcomes. How much has your experience at Oregon Tech contributed to your knowledge, skills, and personal development in these areas?**



#	Question	Very much	Quite a bit	Some	Very little	Total
1	ESLO 1a. Communication: Writing effectively	25.00%	75.00%	0.00%	0.00%	4
2	ESLO 1b. Communication: Speaking effectively	25.00%	50.00%	25.00%	0.00%	4
3	ESLO 2. Inquiry & Analysis: Thinking critically and analytically	25.00%	75.00%	0.00%	0.00%	4
4	ESLO 3. Ethical Reasoning: Making ethical judgements	25.00%	25.00%	50.00%	0.00%	4
5	ESLO 4. Teamwork: Work effectively with groups and teams	0.00%	50.00%	50.00%	0.00%	4
6	ESLO 5. Quantitative Literacy: Using quantitative/numerical information to solve problems, evaluate claims, and support decisions	0.00%	75.00%	25.00%	0.00%	4
7	ESLO 6. Diverse Perspectives: Understanding of diverse perspectives to improve interactions with others	25.00%	50.00%	25.00%	0.00%	4

## Exhibit F – Assessments, Assignment Descriptions, and Rubrics

### Final Project: Practice Application Project

The purpose of this project is for you to demonstrate one of the degree completion program objectives and major course objective—your ability to analyze your dental hygiene department to identify strengths and areas where there is needed improvement; clarify the problem; propose and develop viable solutions.

This project is meant to be something that will be useful and meaningful to you. It should help you in your day to day practice. In thinking about what kind of project to develop, you might want to consider what you've been stumped by in your practice or questions that patients ask you that you feel you lack confidence in answering. You may want to look back at your employer interview to see what was identified as something they would like to implement in this next year. You may want to consider running some report from your office computer system to help you determine areas of improvement.

The project should demonstrate your ability to reflect upon your dental hygiene practice; think about how to improve that practice; and use evidence-based decision making to evaluate and incorporate emerging treatment modalities into your practice.

**Due Date: The final project is due by Monday of finals week.**

This assignment has three parts. Please read the directions for this entire assignment before beginning your work. All parts of this assignment are explained below.

1. Part One—Project Proposal (10 points)
2. Part Two—Determine Resources (5 points)
3. Part Three—Practice Application Project (40 points)

#### Assignment Overview

Step 1. Think about an area of your dental hygiene practice that you believe needs improvement. What is it that leads you to believe it needs improvement? You will describe this in more detail in your project proposal.

Step 2. Research solutions and then,

Step 3. Design something you can use that will help you in any aspect of your dental hygiene practice. Here are a few ideas to help you get started:

- Maybe you would like to get multiple people in your office on the same page as far as treatment guidelines. You could create a decision tree or flow chart for your periodontal protocols.
- You could develop other protocols in your office for the low, medium, high caries risk patients; or a protocol for your oral cancer exams and referrals.
- Maybe you would like to customize your oral health education according to different patient personality types. You could develop different "talking points" or scripts for different patients.
- You could design a risk assessment form and process to use in your office.
- Maybe you realize there is a problem with appointment cancellations—you could develop a policy or process to prevent cancellations or fill cancellations
- Maybe your treatment acceptance rate is not as high as you believe it could be. You may want to determine how technology could improve this and develop a proposal for purchasing some newer technology. For example, you may determine that an intraoral camera would be a good investment for the practice.

#### Project Proposal (Part 1) Due Saturday at the end of week 7

Provide a name that describes your project. For example, 'Recare Protocols' or 'Web page analysis and design recommendations'.

**Paragraph 1:** Write a statement or justification for your project. This is basically your reasoning for deciding to do what you want. What is the problem you are having in your practice or what is it that you want to improve? Or, what is the question you are trying to answer? How did you determine this to be a problem? Discuss what evidence you have that this is a problem. You do not have to turn in the 'evidence'. The 'evidence' could be a series of reports from your computer system; it could be from a general discussion of the healthcare providers in your practice; it could be confusion from patients.

**Paragraph 2:** How do you think you will solve this problem or make this improvement? Essentially, what are you producing with this project and why? What is the expected outcome of your project? (This may change a bit after you do your research and that is okay).

**Paragraph 3:** Specifically, what are you submitting for your project? How will you know if this project is successful?

### **Resource Identification (part 2) Due Saturday at the end of week 8**

What resources will you need to solve the problem? Do you need to gather some research or literature? Do you need to interview an expert? Do you need to personally evaluate a procedure or technology?

To develop your project, you will need to do some background research. What resources do you expect you will need? Please submit a list of expected resources by the end of week 8. Please be sure to include the name of your project at the top of your resource page. When you submit your final project, you will also provide a page with references that you used in developing your project.

### **Guidelines for references:**

You may use original research or evidence-based clinical guidelines. Your major references should be from technical or professional journals. This link may help you to decide if you are using an acceptable source.

<http://camellia.shc.edu/literacy/tables/version/lessons/lesson5/periodicals.htm>

You may also use supplemental resources such as a news item, but to a limited extent. Sources from popular journals or news items should not be relied on for the bulk of your research, but may help to frame the problem. You may also use interviews and personal experience when researching possible solutions.

Written resources should be relevant and current and must be **full text articles**, not simply abstracts. Unless you are using a classic study, your sources should be no older than 7 years.

### **Practice Application Project (part 3) Due Monday of Finals week (week 11)**

This is where you will provide a solution to the problem.

1. Create the actual solution to the problem—a protocol, a chart, talking points, mini-manual, decision tree, etc. This should be submitted in the way it will be used. For example, if you are creating a brochure for patient education, it should be submitted as a pamphlet—probably produced using MS Publisher.
2. Include a cover sheet and introduction or separate file that discusses the way you will use your project; how it will be implemented and how you expect to evaluate the effectiveness of your project.
3. Provide a numbered list of **all** your references. Remember to use AMA format for any journal articles you may have used. If you use websites as references, be sure to include the URL. You may also use interviews. For those, please indicate who the interview was with and on what date the interview occurred.
4. Upload your project into the assignment dropbox **AND** into Discussions.

### **Final Practice Application Project (Part III) Grading Rubric**

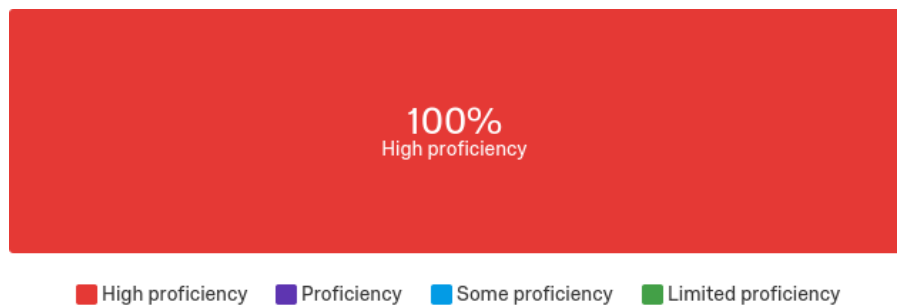
**Note:** The following rubric was used by course instructor to grade Part III of project. PSLO assessment was conducted by two instructors for Part I, II, and III of the project using a Proficient-Competent-Novice scale (see further below).

Criteria	Excellent	Average	Needs Improvement	Unacceptable (0)
<b>Submission Format</b>	Cover page with student name and title of project; introductory page that describes how the project will be used in practice and how it will be evaluated (4)			Not submitted
<b>Spelling &amp; Grammar</b>	No errors in spelling or grammar (4)	Minor spelling error (3)	Several errors in spelling or grammar that interfere with understanding the project (0-2)	Assignment not submitted
<b>Originality</b>	Project is something student has created or is an original compilation of existing work, such as a compilation of SEVERAL charts in a different format. (10)			Assignment not submitted, or submission is obviously a re-submission of a technical report or report from another class. A 0 grade in this category will result in a 0 for the assignment.
<b>Project</b>	Useful in practice. Meets the need as described. Project relates to problem statement in proposal. Project can be implemented as described in introductory page. Project is submitted in the form it will be used in practice. Information included in project is current and accurate. (9-12)	Project information is useful, but project is not submitted in the way it will be used in practice. Is useful but does not incorporate emerging or newer treatment modalities. (7-8)	Project offers minimal information. Reflects little creativity or effort. Inaccuracies in the project information. (2-6 pts)	Assignment is not submitted or is severely lacking in usefulness.
<b>Resources</b>	Clear relationship between references and project. All journal sources cited in AMA format. Date and subject of interviews cited. If project is a pamphlet, resources	Minor error in AMA format. Obvious references that should be included, are not. (7-8 pts)	AMA format not followed. Resources not listed correctly. Lack of clear relationship between references and project. (1)	Not submitted.

	are listed in the pamphlet. (9-10 pts)			
<p><b>Raw Data – PSLO 3 Assessment Rubric: n = 5</b>  <b>Two instructors assessed independently Part I, II, and III for each of the five students. The instructors met in December, 2018, via Zoom video conferencing to discuss and rate each performance criteria together.</b></p>				
<b>Performance Criteria:</b>		<b>Proficient</b>	<b>Competent</b>	<b>Novice</b>
Part I: Identify a problem, discuss evidence, and justify the project need				
Part II: Identify and research resources needed to solve the problem				
Part III: Design a project that can be implemented in any aspect of their dental hygiene practice that solves the problem identified in Part I				

### Exhibit G – BDHO Exit Survey - PSLOs

Q BDHO 1 - Program Student Learning Outcomes for Dental Hygiene B.S. Degree Completion. Please rate your proficiency in the following areas.

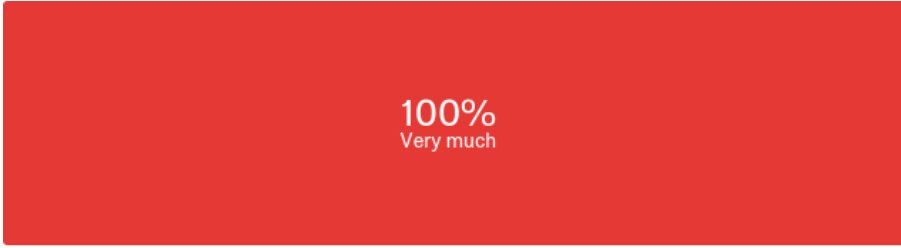


#	Question	High proficiency	Proficiency	Some proficiency	Limited proficiency	Total
1	1. Analyze the strengths and limitations of different research designs and their impact on the dental hygiene profession.	100.00% 4	0.00% 0	0.00% 0	0.00% 0	4
2	2. Use evidence-based decision making to evaluate and incorporate emerging treatment modalities into dental hygiene practice.	100.00% 4	0.00% 0	0.00% 0	0.00% 0	4
3	3. Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions.	75.00% 3	25.00% 1	0.00% 0	0.00% 0	4



4	4. Identify current and emerging issues in the profession of dental hygiene.	100.00%	4	0.00%	0	0.00%	0	0.00%	0	4
5	5. Assess the oral health care needs of a community and develop a strategic plan that addresses identified needs	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4
6	6. Design instruction that includes teaching strategies and assessments to meet a variety of learning style needs.	50.00%	2	25.00%	1	25.00%	1	0.00%	0	4

Q BDHO 2 - Program Student Learning Outcomes for Dental Hygiene B.S. Degree Completion. How much has your experience at Oregon Tech contributed to your knowledge, skills, and personal development in these areas?



■ Very much  
 ■ Quite a bit  
 ■ Some  
 ■ Very little

#	Question	Very much		Quite a bit		Some		Very little		Total
1	1. Analyze the strengths and limitations of different research designs and their impact on the dental hygiene profession.	100.00%	4	0.00%	0	0.00%	0	0.00%	0	4
2	2. Use evidence-based decision making to evaluate and incorporate emerging treatment modalities into dental hygiene practice.	100.00%	4	0.00%	0	0.00%	0	0.00%	0	4
3	3. Analyze your dental hygiene department to identify problems and areas where there is needed improvement; clarify the problem; and propose viable solutions.	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4
4	4. Identify current and emerging issues in the profession of dental hygiene.	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4
5	5. Assess the oral health care needs of a community and develop a strategic plan that addresses identified needs	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4
6	6. Design instruction that includes teaching strategies and assessments to meet a variety of learning style needs.	75.00%	3	25.00%	1	0.00%	0	0.00%	0	4