

MEMORANDUM

TO: Members of the Academic and Research Advancement Committee
of the Board of Visitors

Mary Maniscalco-Theberge, Chair
Michael J. Henry, Vice Chair
Carlton F. Bennett, (*ex-officio*)
Lisa B. Smith, (*ex-officio*)
R. Bruce Bradley
Richard T. Cheng
Toykea S. Jones
Kay A. Kemper
Frank Reidy
Andres Sousa-Poza (*Faculty Representative*)

FROM: Augustine O. Agho
Provost

DATE: November 18, 2016

The purpose of this memorandum is to provide you with background information for our meeting on Thursday, December 8, 2016. The committee will meet from 9:00-10:30 a.m. in the River Rooms in Webb Center.

I. Approval of Minutes of the September 22, 2016 Meeting

The minutes of the September 22, 2016 meeting will be presented for approval as previously distributed.

II. Closed Session

The members of the Academic and Research Advancement Committee will receive information related to the items to be discussed in closed session.

III. Reconvene in Open Session and Vote on Resolutions

IV. Consent Agenda

Included in the consent agenda materials are resolutions recommending eight faculty appointments, 20 administrative appointments, three emeritus/emerita appointments, and one posthumous emerita appointment.

V. Vote on Consent Agenda Resolutions

VI. Regular Agenda

The regular agenda includes a proposal for a Master of Science in Exercise Science and a proposal for a Master of Science in Speech-Language Pathology

VII. Vote on Regular Agenda Resolutions

VIII. Information Items

Information items include the report from the Provost and a report from the Vice President for Research. The report from the Provost will include a presentation by Andrew Casiello, Associate Vice President for Distance Learning.

IX. Topics of Interest to Board of Visitors Members

Committee members will have an opportunity to discuss topics of interest.

C: John R. Broderick
 Donna Meeks

OLD DOMINION UNIVERSITY
BOARD OF VISITORS
ACADEMIC AND RESEARCH ADVANCEMENT COMMITTEE
THURSDAY, DECEMBER 8, 2016
AGENDA

9:00-10:30 a.m. – River Rooms, Webb Center

- I. APPROVAL OF THE MINUTES OF SEPTEMBER 22, 2016
- II. CLOSED SESSION
- III. RECONVENE IN OPEN SESSION AND VOTE ON RESOLUTIONS
- IV. CONSENT AGENDA
 - A. Faculty Appointments (p. 4-5)
 - B. Administrative Appointments (p. 6-9)
 - C. Emeritus/Emerita Appointments (p. 10-12)
 - D. Posthumous Emerita Appointment (p. 13)
- V. VOTE ON CONSENT AGENDA RESOLUTIONS
- VI. REGULAR AGENDA
 - A. Proposal for a Master of Science in Exercise Science (p. 14-37)
 - B. Proposal for a Master of Science in Speech-Language Pathology (p. 38-66)
- VII. VOTE ON REGULAR AGENDA RESOLUTIONS
- VIII. INFORMATION ITEMS
 - A. Report from the Provost
 1. Presentation from Andrew Casiello, Associate Vice President for Distance Learning
 - B. Report from the Office of Research
- IX. TOPICS OF INTEREST TO BOARD OF VISITORS MEMBERS

December 8, 2016

FACULTY APPOINTMENTS

RESOLVED that, upon the recommendation of the Academic and Research Advancement Committee, the Board of Visitors approves the following faculty appointments.

<u>Name and Rank</u>	<u>Salary</u>	<u>Effective Date</u>	<u>Term</u>
Dr. Abby Braitman Research Assistant Professor of Psychology	\$83,200	9/16/16	12 mos

Dr. Braitman received a Ph.D. in Applied Experimental Psychology and an M.S. in Experimental Psychology from Old Dominion University and a B.A. in Psychology from the University of Maryland. Previously she was an Adjunct Assistant Professor and Research Associate in the Department of Psychology at Old Dominion University.

Dr. Cory D. Champagne Research Assistant Professor of Biological Sciences	\$29,000	12/25/16	12 mos
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Dr. Champagne received a Ph.D. in Ecology and Evolutionary Biology from the University of California Santa Cruz and an M.S. and B.S. in Biology from Sonoma State University. Previously he was a Research Scientist at Old Dominion University and the National Marine Mammal Foundation. (Half-time appointment)

Dr. Karen Eagle Lecturer of Management	\$55,000	10/25/16	10 mos
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Dr. Eagle received a Ph.D. in Occupational and Technical Studies and an M.S. in Business and Industry Training from Old Dominion University and a B.S. in Marketing Education from James Madison University. Previously she was an Adjunct Professor at Regent University and a Dissertation Fellow at Old Dominion University.

Dr. Bo Guo Post-Doctoral Research Associate Frank Reidy Research Center for Bioelectics	\$34,000	11/1/16	12 mos
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Dr. Guo received a Ph.D. in Biochemistry and Molecular Biology from the Medical College at Xi'an Jiaotong University, China and a B.S. in Biotechnology from Guangxi University, China. He participated in several research grants as a Ph.D. student.

Dr. He Huang	\$45,000	12/25/16	10 mos
Lecturer of Mathematics and Statistics			

Dr. Huang received Ph.D. in Condensed Matter Physics, an M.Sc. in Computational Engineering and Applied, and an M.Sc. in Astrophysics from Michigan State University, and an M.Sc. in Astrophysics and a B.Sc. in Astronomy from Beijing Normal University. Previously he held a joint position as a Postdoctoral Fellow in the Department of Mathematics and Statistics at Old Dominion University and the Center for the Advanced Study of Accelerators at Thomas Jefferson National Accelerator Facility.

Dr. Oluwaseyi Olayinka	\$55,000	11/1/16	10 mos
Lecturer of Community and Environmental Health			

Dr. Olayinka received an M.Sc. and a DLSHTM in Public Health from the London School of Hygiene and Tropical Medicine and a MBChB in Medicine and Surgery from Obafemi Awolowo University. Previously she was a Clinical Extern at Chesapeake Regional Medical Center.

Dr. Sarah Peters	\$21,500	12/15/16	5 mos
Lecturer of Communication Disorders and Special Education			

Dr. Peters received a Ph.D. in Education from George Mason University, an M.Ed. in Speech Language Pathology and Audiology from UNC-Greensboro and a B.A. in Education from Radford University. Previously she was a Speech Pathologist for the Henrico Parent Infant Program. (Half-time appointment)

Dr. Melanie Wilhelm	\$37,000	7/25/16	10 mos
Lecturer of Nursing			

Dr. Wilhelm received a Doctor of Nursing Practice and a Master of Science in Nursing from Old Dominion University and a Bachelor of Science in Nursing from Bowling Green State University. Previously she was a Dr. of Pediatric Nurse Practitioner at Pediatric Specialists, a Clinical Assistant Professor of Nursing at the University of Virginia and an Adjunct Faculty member at Old Dominion University. (Half-time appointment)

December 8, 2016

ADMINISTRATIVE FACULTY APPOINTMENTS

RESOLVED that, upon the recommendation of the Academic and Research Advancement Committee, the Board of Visitors approves the following administrative faculty appointments.

<u>Name and Rank</u>	<u>Salary</u>	<u>Effective Date</u>	<u>Term</u>
Ms. Susan Boyd Executive Director of Housing and Residence Life and Instructor	\$80,000	10/10/16	12 mos

Ms. Boyd received an M.S. in Organizational Behavior from the University of Hartford. Previously, she worked for Rutgers University as the Director of Residence Life for Personnel and Organizational Development.

Mr. Stephen Chilmaid First Assistant Women's Rowing Coach and Assistant Instructor	\$46,360	9/10/16	12 mos
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Mr. Chilmaid received an M.B.A. from the University of Kingston. Previously, he worked as the Regatta Director for River City Crews in Richmond, VA.

Dr. Erin Crede Grant Development Specialist for Engineering and Assistant Professor	\$58,000	11/10/16	12 mos
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Dr. Crede received a Ph.D. in Engineering Education from Virginia Tech. Previously, she worked as a Missions Operation Commander for the Virginia Air National Guard.

Mr. Rohit Dalal Enrollment Planning and Data Analyst, Student Engagement and Enrollment Services and Instructor	\$52,000	10/25/16	12 mos
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Mr. Dalal received an M.B.A. from Old Dominion University. Previously, he worked as a Graduate Assistant for the University's Strome Entrepreneurial Center.

Ms. Danielle Faulkner Research Compliance Coordinator, Office of Research and Assistant Instructor	\$50,000	9/25/16	12 mos
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Ms. Faulkner received a B.S. in Exercise Science from the College of Charleston and is currently pursuing an M.B.A. from the University of Delaware. Previously, she was a Protocol and Data Management Coordinator for the BADER Consortium, located at the Naval Medical Center Portsmouth in Portsmouth, VA.

Ms. Jennifer George Creative Director, Center for Learning and Teaching and Instructor	\$78,000	9/21/16	12 mos
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Ms. George received an M.B.A. from Pennsylvania State University. Previously, she worked as a Marketing Manager for Larson Design Group in Williamsport, PA.

Ms. Tiffany Hampton Associate Budget Officer and Instructor	\$87,500	9/10/16	12 mos
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Ms. Hampton received an M.B.A. from Saint Leo University and a B.S. in Business Commerce and Finance from Norfolk State University. Previously, she served as a Financial Planning Analyst for Vista Outdoor.

Ms. Tammy Hanna Academic Advisor and Program Manager, Modeling, Simulation and Visualization Engineering and Instructor	\$45,200	9/10/16	12 mos
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Ms. Hanna earned an M.A. in Higher Education from the University of South Carolina. Previously, she served as an Academic Advisor for the Corinthian Colleges in Ormond Beach, FL.

Ms. Dong Liu Assistant Director of Institutional Research and Instructor	\$60,000	10/19/16	12 mos
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Ms. Liu received a B.S. in Pharmaceutical Sciences from Tianjin University. Previously, she was employed as a Laboratory Assistant for the College of Sciences at Old Dominion University.

Dr. Keiwana Perryman Coordinator for Student Organizations and Leadership and Assistant Professor	\$35,000	9/10/16	12 mos
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Dr. Perryman received a Ph.D. in Adult Education from Pennsylvania State University. Previously, she was employed as the Student Engagement Director at Lenoir Rhyne University.

Ms. Leslie Person Admissions Coordinator for Student Guides and the Campus Experience and Assistant Instructor	\$35,700	10/25/16	12 mos
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Ms. Person received a B.S. in Communications from East Carolina University and is currently pursuing an M.S. in Higher Education from Old Dominion University. Previously, she served in the Office of Undergraduate Admissions at Old Dominion University as the Future Monarch Center Office Assistant.

Delegate Kenneth R. Plum Contributing Author for the Old Dominion University State of the Commonwealth Report Strome College of Business	\$16,000	12/1/16 - spring semester	5 mos
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Delegate Plum received a B.A. from Old Dominion University and an M.Ed. from the University of Virginia. He is a retired teacher and school administrator with Fairfax County Public Schools, where he served as Director of Adult and Community Education. Delegate Plum is a member of the Virginia House of Delegates, representing the 36th District. He has served in the House of Delegates from 1978-80 and 1982-present. He has been a contributing author each year since 2004.

Ms. Elise Rankins Assistant Director for Conference Services, Housing and Residence Life and Instructor	\$50,000	11/25/16	12 mos
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Ms. Rankins received an M.S. in Sports Leadership from Duquesne University. Previously, she worked as the Senior Event Manager for the Hampton Roads Convention Center.

Ms. Shannon Sauerwald Director for Webb University Center and Auxiliary Services and Instructor	\$80,000	9/25/16	12 mos
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Ms. Sauerwald received an M.S. in Sports and Recreation Management from Old Dominion University. Previously, she was the Assistant Director for Webb University Center.

Ms. Brittany Shearer Academic Advisor and Instructor	\$41,340	9/25/16	12 mos
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Ms. Shearer received an M.S.Ed. in Educational Leadership from Old Dominion University. Previously, she worked as a Graduate Assistant for the Office of Leadership and Student Involvement at Old Dominion University.

Ms. Megan Shearin Marketing Coordinator, Housing and Residence Life and Instructor	\$57,500	11/14/16	12 mos
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Ms. Shearin received an M.S.Ed. in Educational Policy from the College of William and Mary. Previously, she was employed by the University's Department of Housing and Residence Life as the Assistant Director for Communications.

Mr. Brett Smiley Gift Planning Officer and Assistant Instructor	\$85,000	11/10/16	12 mos
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Mr. Smiley received a B.S. in Forest Science from Pennsylvania State University. Previously, he worked as the Director of Development with Eggleston Services.

Ms. Tracy Williams Instructor of Early Care and Education	\$40,000	10/25/16	12 mos
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Ms. Williams received a B.S. in Elementary Education from Eastern Mennonite University. Previously, she worked as a Title 1 reading tutor for Willard Elementary School in Norfolk, VA.

Dr. Jing Zhao Associate Director of Institutional Research and Assistant Professor	\$65,000	10/25/16	12 mos
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Dr. Zhao received a Ph.D. in Quantitative Research, Evaluation, and Measurement in Education from Ohio State University. Previously, she worked as the Assistant Director of Institutional Research at the College of William and Mary.

Ms. Xiyu Zheng Research Associate, Institutional Research and Instructor	\$50,000	10/10/16	12 mos
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Ms. Zheng received an M.S. in Biostatistics from Virginia Commonwealth University and a B.A. in Statistics and Mathematics from the University of Virginia. Previously, she served as a Research Assistant with the Department of Healthcare Policy and Research at Virginia Commonwealth University.

December 8, 2016

EMERITUS/EMERITA APPOINTMENTS

RESOLVED that, upon the recommendation of the Academic and Research Advancement Committee, the Board of Visitors approves the granting of the title of emeritus/emerita to the following faculty members and faculty administrators/faculty professionals. A summary of their accomplishments is included.

<u>Name and Rank</u>	<u>Effective Date</u>
Paul Champagne Professor Emeritus of Management	January 1, 2017
Carolyn Eakin Director Emerita of Technology and Data Analysis	March 1, 2017
Richard A. Massey Associate Vice President Emeritus of Foundations	January 1, 2017

PAUL J. CHAMPAGNE

Paul J. Champagne received a B.A from Providence College, an M.A from the University of Hartford and a Ph.D. in Sociology from the University of Massachusetts at Amherst. He joined Old Dominion as an Assistant Professor of Management in 1980 and achieved the rank of Professor in 1993. During his time at Old Dominion, Champagne has been actively involved with the Faculty Senate since 1984. In addition to serving as the Chair of numerous Senate committees, he has been Senate Chair on three occasions for a total of 13 years. In addition, Champagne served as the Chair of the Management and Marketing Department from 1993-1997 and the Chair of the Department of Management from 2008-2014.

Champagne has published more than 25 articles in referred journals and has more than 30 professional papers in the Proceedings of National meetings. He has also co-authored three books. Champagne has offered and directed an array of management training workshops as well as consulted with a number of local business firms. He has served as the outside member of Dissertation Committees in both Psychology and Health Sciences.

CAROLYN S. EAKIN

Carolyn Eakin received a B.S.W. in Social Welfare and an M.A. in Guidance and Counseling from East Tennessee State University. She joined Old Dominion University in 1986 as an Enrollment and Student Services Assistant in the Office of the Registrar. During her tenure, she served as the Assistant Registrar, Acting University Registrar, Director of Enrollment Services for Registration, Records and Military Student Services, and Director of Registration and Records. In late 2000, Eakin transitioned from the Office of the Registrar to the Office of Admissions as the Student Information Systems Administrator where she again demonstrated her leadership skills and ability to utilize technology and data to orchestrate organizational change. In 2002 she was promoted to Assistant Director for Information Technology and in 2004 was named to her current position, the Director of Technology and Data Analysis.

In her capacity within the Office of the Registrar, Eakin played a significant role in the application of numerous University technology innovations including the implementation of Banner Student (the University-wide system for student information), the Grade Forgiveness policy, the Leo Online system, the initial degree audit solution CAPP, Events 25 Scheduling software (the University's first automated scheduling system), and Voice Response (telephone) Registration aimed at improving customer service and eliminating long registration lines.

As a leader in the Office of Admissions, Eakin developed and deployed the state's first online admissions application and created the initial version of admissions notification letters generated by the Banner system. She implemented the use of Axiom, a data transfer middleware automating the transfer of application and test score data into the Banner system, and partnered with colleagues in the Information Technology Services department to implement Monarch Transformation (the transfer evaluation/articulation portal), improve the Leo Online self-service portal, create the Admissions dashboard and report generation in Insight, and implement the Banner Document Management (BDM). She assisted in the application of the Hobsons CRM, implemented countless new modules and discovered process efficiencies and automated various functional operations giving Admissions the agility to meet the changing demands of the recruitment/enrollment environment.

Eakin has served on the Ellucian Development Partner Advisory Group, operated as an officer in VACRAO and SACRAO, and presented at state, regional, and national conferences.

RICHARD A. MASSEY

After graduating from the University of Dayton in 1971, Richard A. "Rick" Massey was commissioned as a U.S. Army officer and served on active duty for 24 years, including two extended tours in the Republic of Korea. He served as a Field Artillery Officer, Army Aviator, and a Military Comptroller. In 1979, he earned a Master of Business Administration from the University of Dayton. Massey served in progressively important assignments including service on the Army General Staff with duty in the Office of the Comptroller of the Army and the Chief of Staff of the Army. His final assignment was as the Director of Resource Management for

U.S. Army Cadet Command responsible for funding and logistics for the Army's ROTC program nationwide. His military decorations include the Legion of Merit.

Massey joined Old Dominion University in 1995 as the Associate University Budget Officer. In 1998, he was appointed as the first Chief Financial Officer (CFO) for the Foundations that support the University, which include the Old Dominion University Educational Foundation, Old Dominion Athletic Foundation, Old Dominion University Real Estate Foundation, and the Community Development Corporation. As the CFO, he organized the financial and administrative functions of the Foundation to support the University's first capital campaign and the creation of the Old Dominion University Real Estate Foundation.

Massey's role was later expanded to include appointment as the Associate Vice President for Advancement for Foundations and Chief Investment Officer (CIO) for the Foundations. As CIO, he assisted in the implementation of the endowment model for the University and saw the endowment exceed \$200 million. Under Massey's leadership, the Foundations had 20 consecutive years of clean audits with no comments from the auditors.

December 8, 2016

POSTHUMOUS EMERITA APPOINTMENT

RESOLVED that, upon the recommendation of the Academic and Research Advancement Committee, the Board of Visitors approves the posthumous granting of the title of emerita to the following faculty member. A summary of her accomplishments is included.

Name and Rank

Effective Date

Karen A. Polonko
University Professor Emerita and Professor
Emerita of Sociology and Criminal Justice

Posthumous

Karen Polonko joined Old Dominion University as an Assistant Professor in 1983. She achieved the rank of Professor and was designated a University Professor. Her career was marked by outstanding achievements in teaching, research and service, and she had a lasting impact on her students, the department, the College of Arts and Letters, and the University.

Polonko was the first faculty member from Old Dominion to win the Outstanding Faculty Award from the State Council of Higher Education for Virginia. Her research, publications and advocacy focusing on the rights of children earned her and the University a national and international reputation in protecting the rights of children and preventing child abuse and helped improve the lives of children around the world. Her paper on “Law Reform, Child Maltreatment and the CRC” was selected and discussed at the September meeting of the United Nations Committee on the Rights of the Child. Polonko also led the ODU Women’s Caucus and worked tirelessly to ensure a campus climate of gender equity and fairness.

December 8, 2016

APPROVAL OF A NEW MASTER OF SCIENCE IN EXERCISE SCIENCE

RESOLVED that, upon the recommendation of the Academic and Research Advancement Committee, the Board of Visitors approves the proposal for a new Master of Science in Exercise Science degree program to be effective with the fall 2017 semester.

Rationale: The Darden College of Education is seeking approval to initiate an M.S. in Exercise Science in fall 2017. The purpose of the M.S. in Exercise Science will be to prepare students for advanced roles in careers that utilize exercise to improve the fitness and health among a wide variety of populations: individuals with chronic disease, healthy adults, fitness enthusiasts, and athletes. Moreover, students will be prepared to engage in research and scholarship to advance the knowledge base in the field of exercise science, leading to faculty positions that require M.S. degrees or leading to entry into Ph.D. programs, as the Ph.D. is required for the majority of faculty positions.

Exercise science has been offered as a concentration within the M.S. in Education—Physical Education since the early 1980s. This proposal requests that it become a stand-alone M.S. in Exercise Science. While physical education focuses on pedagogy, exercise science focuses on understanding the physiological and biomechanical processes that explain human movement and its effect on health and human performance. It is also aimed at the preparation of professionals in fitness-related fields (such as corporate health promotion, cardiac rehabilitation, strength and conditioning) and of scholars seeking to go on to doctoral programs in exercise science, kinesiology, rehabilitation, physical therapy, and related programs. The primary sub-disciplines of exercise science are exercise physiology and biomechanics, and both are represented in Old Dominion's existing program.

**STATE COUNCIL OF HIGHER EDUCATION FOR VIRGINIA
PROGRAM PROPOSAL COVER SHEET**

<p>1. Institution Old Dominion University</p>	<p>2. Academic Program (Check one): New program proposal <u> x </u> Spin-off proposal <u> </u> Certificate document <u> </u></p>
<p>3. Name/title of proposed program Exercise Science</p>	<p>4. CIP code 31.0505</p>
<p>5. Degree/certificate designation Master of Science</p>	<p>6. Term and year of initiation Fall 2017</p>
<p>7a. For a proposed spin-off, title and degree designation of existing degree program</p> <p>7b. CIP code (existing program)</p>	
<p>8. Term and year of first graduates Spring 2018</p>	<p>9. Date approved by Board of Visitors TBA</p>
<p>10. For community colleges: date approved by local board date approved by State Board for Community Colleges</p>	
<p>11. If collaborative or joint program, identify collaborating institution(s) and attach letter(s) of intent/support from corresponding chief academic officers(s)</p>	
<p>12. Location of program within institution (complete for every level, as appropriate and specify the unit from the choices).</p> <p>Departments(s) or division of <u>Department of Human Movement Sciences</u></p> <p>School(s) or college(s) of <u>Darden College of Education</u></p> <p>Campus(es) or off-campus site(s) <u>Norfolk campus</u></p> <p>Mode of delivery: face-to-face <u> x </u> distance (51% or more web-based) <u> </u> hybrid (both face-to-face and distance) <u> </u></p>	
<p>13. Name, title, telephone number, and e-mail address of person(s) other than the institution's chief academic officer who may be contacted by or may be expected to contact Council staff regarding this program proposal.</p> <p>Jeanie Kline, Ed.D. Special Asst to the Vice Provost, 757.683.3261, jkline@odu.edu</p>	

**Proposal for M.S. in Exercise Science
Table of Contents**

DESCRIPTION OF THE PROPOSED PROGRAM.....	1
PROGRAM BACKGROUND.....	1
MISSION.....	2
ADMISSIONS CRITERIA.....	2
TARGET POPULATION.....	3
CURRICULUM.....	3
TIME TO DEGREE	5
STUDENT RETENTION AND CONTINUATION PLAN.....	5
FACULTY.....	6
PROGRAM ADMINISTRATION.....	6
STUDENT ASSESSMENT	7
PROGRAM ASSESSMENT.....	10
EXPANSION OF EXISTING PROGRAMS.....	12
RELATIONSHIP TO EXISTING PROGRAMS.....	13
COLLABORATION OR STANDALONE PROGRAM.....	13
JUSTIFICATION FOR THE PROPOSED PROGRAM.....	13
RESPONSE TO CURRENT NEEDS.....	13
EMPLOYMENT DEMAND.....	14
STUDENT DEMAND.....	15
SUMMARY OF PROJECTED ENROLLMENTS.....	15
DUPLICATION.....	15
PROJECTED RESOURCE NEEDS	16
APPENDICES.....	22
APPENDIX A—SAMPLE PLANS OF STUDY	
APPENDIX B—COURSE DESCRIPTIONS	
APPENDIX C—ABBREVIATED CVs FOR FACULTY	
APPENDIX D—EMPLOYMENT DEMAND	
APPENDIX E—STUDENT DEMAND - SURVEY	

Description of the Proposed Program

Program Background

Old Dominion University (ODU) seeks approval to offer a Master of Science in Exercise Science to begin fall 2017 in Norfolk, Virginia. The program will be offered by the Department of Human Movement Sciences in the Darden College of Education.

The purpose of the M.S. in Exercise Science will be to prepare students for advanced roles in careers that utilize exercise to improve the fitness and health among a wide variety of populations: individuals with chronic disease, healthy adults, fitness enthusiasts, and athletes. Moreover, students will be prepared to engage in research and scholarship to advance the knowledge base in the field of exercise science, leading to faculty positions that require M.S. degrees or leading to entry into Ph.D. programs, as the Ph.D. is required for the majority of faculty positions.

The U.S. in general, and Virginia in particular, is beset by an epidemic of chronic diseases. While access to health care and good nutrition is excellent, many Americans suffer from lifestyle diseases of obesity, type 2 diabetes, coronary heart disease, osteoporosis and more. Exercise is a key factor that can be used to reduce these diseases.¹ More than two-thirds of adult Americans are overweight (33%) or obese (36%).² In the Hampton Roads area of Virginia, Norfolk has an obesity rate of 35% and Portsmouth 42%.³ Excess weight greatly increases the risk of type 2 diabetes and contributes to other chronic conditions such coronary heart disease (which is the leading cause of death in the U.S.) and osteoporosis.² Proper exercise can reduce obesity, and it also has a direct effect in combatting diabetes (by increasing insulin sensitivity),^{4,5} heart disease (by multiple mechanisms),^{6,7} and osteoporosis (by stimulating bone mineral density).⁸

The M.S. in Exercise Science will give students the ability to assess clients' fitness, prescribe exercise tailored to individual needs and medical concerns, implement exercise programs, and also provide complementary nutritional advice. At the graduate level, the knowledge, skills and abilities will be infused with a deep understanding of the theoretical background, scientific

¹ Pedersen and Saltin, 2015, <http://www.ncbi.nlm.nih.gov/pubmed/26606383>

² National Institute of Diabetes, Overweight and Obesity Statistics, <https://www.niddk.nih.gov/health-information/health-statistics/Pages/overweight-obesity-statistics.aspx>

³ Robert Wood Johnson Foundation, County Health Rankings, <http://www.countyhealthrankings.org/app/virginia/2015/measure/factors/11/map>

⁴ Way et al., 2016 <http://www.ncbi.nlm.nih.gov/pubmed/27535644>

⁵ Colberg et al., 2010 <http://www.ncbi.nlm.nih.gov/pubmed/21115758>

⁶ Varghese et al., 2016 <http://www.ncbi.nlm.nih.gov/pubmed/26941396>

⁷ Swain and Franklin, 2006 <http://www.ncbi.nlm.nih.gov/pubmed/16377300>

⁸ Castrogiovanni et al., 2016 <http://www.ncbi.nlm.nih.gov/pubmed/27311988>

research background, and critical thinking needed to perform in leadership positions and to advance scholarship in the field.

Exercise science has previously been offered as a concentration within the M.S. in Education—Physical Education. This proposal requests that it become a stand-alone M.S. in Exercise Science. While physical education focuses on pedagogy, exercise science focuses on understanding the physiological and biomechanical processes that explain human movement and its effect on health and human performance. It is also aimed at the preparation of professionals in fitness-related fields (such as corporate health promotion, cardiac rehabilitation, strength and conditioning) and of scholars seeking to go on to doctoral programs in exercise science, kinesiology, rehabilitation, physical therapy, and related programs. The primary sub-disciplines of exercise science are exercise physiology and biomechanics, and both are represented in Old Dominion’s existing program.

Mission

The mission of the institution says: “Old Dominion University, located in the City of Norfolk in the metropolitan Hampton Roads region of coastal Virginia, is a dynamic public research institution that serves its students and enriches the Commonwealth of Virginia, the nation and the world through rigorous academic programs, strategic partnerships, and active civic engagement.”

The M.S. in Exercise Science aligns with this mission by providing a rigorous academic program that will prepare graduates for careers in health-related fields that utilize exercise as preventive or rehabilitative medicine and for conducting research within the areas of exercise physiology and biomechanics.

Admissions Criteria

Applicants who seek to enter this program must provide:

- A completed online application form;
- A baccalaureate degree from a regionally-accredited institution or an equivalent foreign institution.
- An official set of transcripts from each undergraduate and graduate program attended;
- A minimum 2.8 overall grade point average in undergraduate coursework, and 3.0 within the applicant’s major;
- A minimum 3.0 grade point average in all exercise science prerequisite coursework;
- Three letters of recommendation (from former faculty or employers)
- A combined score on the Graduate Record Examination of 291 or higher (verbal and quantitative sections)
- An essay describing the applicant’s educational and career goals
- Current scores for the Test of English as a Foreign Language (TOEFL) of at least 550 (or 79-80 on the iBT) for non-native English speakers

Applicants who do not meet the program's academic standards may be admitted into the program on a provisional basis and may earn regular status by achieving a B (3.0) or higher average after 12 hours of graduate work.

Students with previously completed graduate-level work at a regionally-accredited institution may submit a request for a maximum of 12 credit hours to be transferred. Such transfer hours—to be included as elective or research credit only—would go through the admission committee for approval, and if accepted, added to the transcript.

Admission as a graduate student at ODU does not imply acceptance into the M.S. in Exercise Science. A program admissions committee will consist of the Graduate Program Coordinator and at least two other faculty members from exercise science. The admissions committee will meet in the spring semester to consider applications for fall admission, but could be called together more often if needed. Acceptance into the M.S. in Exercise Science program will be determined by the committee.

Target Population

The primary candidates for this program are all qualified holders of an undergraduate degree in exercise science or related fields, as well as holders of baccalaureate degrees in other fields who have successfully completed necessary prerequisite coursework in anatomy and physiology, exercise physiology, physics and biomechanics. A number of applicants will be professionals in exercise-related fields, such as cardiac rehabilitation, corporate health promotion, strength and conditioning, although many applicants may be recent graduates and may not have been in the workforce.

The M.S. in Exercise Science targets individuals interested in enhancing their knowledge and skills in biomechanics, exercise physiology, and research in order to secure advanced positions in the field. Additionally, students interested in later pursuing a Ph.D. in order to become research scientists and university professors would be candidates for this M.S. program.

Curriculum

The Master of Science in Exercise Science is a 30-credit curriculum with a thesis and a non-thesis option. Twelve credits in the exercise science core include content related to exercise testing, exercise prescription, nutrition, and advanced courses in biomechanics and physiology. An additional six credits comprise the research core in the thesis option, while three credits are required in the non-thesis option.

For the non-thesis option, the experiential/internship course is intended to provide students with hands-on practice in a clinical, corporate, or other professional setting related to exercise science. For the thesis option, the thesis courses provide students with the opportunity to explore an in-depth research topic in exercise science, receive 1-on-1 mentoring from a faculty member, and prepare for the pursuit of a Ph.D.

Students in the thesis option will take two elective courses, while those in the non-thesis option will take three, agreed upon by the student and his or her advisor. The total number of credit

hours will be a minimum of 30 credit hours beyond a baccalaureate degree. Each student will work with his or her advisor to develop a program of study of the appropriate research and elective courses. Sample curricular plans are provided in Appendix A. Current course descriptions are provided in Appendix B.

The curriculum for the Master of Science in Exercise Science is as follows:

Exercise Science Core: (12 credit hours)

EXSC 630	Exercise Physiology	3 credits
EXSC 642	Clinical Exercise Testing and Prescription	3
EXSC 661	Seminar in Nutrition for Sports and Health	3
EXSC 727	Advanced Biomechanics	3

Research Core: (3-6 credit hours)

FOUN 612	Applied Research Methods (required in both options)	3 credits
FOUN 722	Introduction to Applied Statistics and Data Analysis (required in thesis option only)	3

Thesis Option: (12 credit hours)

HMS 698	Thesis	3 credits
HMS 699	Thesis	3
Electives		6

Non-Thesis Option: (15 credit hours)

HMS 668	Internship	6 credits
Electives		9

Restricted Electives (6-9 hours, selected with advisor)

BIOL 523	Cellular and Molecular Biology	3 credits
BIOL 524	Comparative Animal Physiology	3
BIOL 580	Advanced Human Physiology Lab	1
BIOL 590	Advanced Human Physiology Lecture	3
CHP 520	Gerontology	3
CHP 525	Health Aspects of Aging	3
EXSC 528	Exercise Prescription for Chronic Diseases	3
EXSC 531	Wellness Programming and Administration	3
EXSC 621	Strength and Conditioning Applications	3
EXSC 730	Advanced Cardiovascular Exercise Physiology	3
EXSC 738	Exercise Endocrinology	3
HMS 697	Independent Study (research in HMS laboratory)	3

Non-Thesis option requirements

Students completing the non-thesis option will be required to complete an intensive hands-on internship experience in a clinical, corporate, or other professional setting related to exercise science. The purpose is to give the students an opportunity to apply skills from the classroom to a

real-world setting, and to expose the student to practical hands-on skills in preparation for transition into the workforce.

Students must complete all of the requirements of the internship in order to successfully pass the internship course. If a student does not pass the internship, then the internship must be retaken in order for the student to graduate. Students have one opportunity to retake the internship. If the course is not successfully passed the second time, then the student will be indefinitely suspended from the degree program.

Non-thesis option students are required to complete written comprehensive examinations based on the exercise science core courses. These examinations will assess the student's ability to coherently relate information taken from the core and research courses in a critical and scholarly manner. The student must pass the written examinations; however, in the event that students fail to meet these requirements, they will be able to retake the portion(s) of the examination in the semester following the initial attempt in an oral examination. Those who are unsuccessful in their second attempt will be dismissed from the program.

Thesis option requirements

Students completing the thesis option must prepare and present a thesis that is acceptable to the thesis director and committee, the graduate program director, and the academic dean. The thesis document must represent in content and methods the skills, disciplines and knowledge required for graduate study, including competence in written language. Candidates are required to defend the thesis in an oral examination, and the written document is required for the written examination. A student who fails any portion of the thesis (written or oral) may repeat it once. Those who are unsuccessful in their second attempt will be dismissed from the program.

Time to Degree

Students enrolled full-time in the M.S. in Exercise Science will graduate in three semesters (Appendix B). Assuming an initial enrollment during a fall semester, the on-campus student will take 9 hours in the fall, 12 hours in the spring, and 9 hours in the second fall to have a degree conferral date of December. The 9-hour course load in the second fall may be taken in the summer at the end of the first academic year if the student prefers, allowing the student to graduate in 12 months from the start of the program.

Part-time students will vary in time to degree depending on how many courses an individual takes per semester. It is estimated that most part-time students will take an additional 1-2 years to complete the M.S. in Exercise Science.

Student Retention and Continuation Plan

Students are provided support—through orientations, advising, faculty outreach, and general university assistance—for successful completion of the degree program. All necessary resources are available to contribute to student and faculty success in this degree program.

All M.S. in Exercise Science students will be encouraged to attend an orientation session at the beginning of each fall semester to meet program faculty and fellow students, review the general policies and procedures for continuance, discuss program requirements and ask questions. Each student will also meet with his or her faculty advisor prior to registering for classes each semester to discuss career goals and internship options, and to develop a plan that best prepares the student for a competitive job market after graduation.

At the time of the semester meeting, the student and advisor will review the student's academic performance. The advisor will reiterate the continuance requirements for the program, including an overall GPA of 3.0, demonstrated writing proficiencies, satisfaction of all course competencies, and completion of either an internship or thesis as a capstone experience. If a student is struggling to achieve a 3.0, the advisor will work with the student to put a plan of action in place to improve academic performance. This may include such communication as recommending a tutor, recommending a change of study habits, additional resources for a difficult topic, or referral to the University's Student Success Center.

Faculty

Existing faculty in the Department of Human Movement Sciences have both depth and breadth of knowledge in exercise sciences to cover the full range of classes offered in the proposed program. The M.S. faculty in exercise science includes one full professor, one associate professor, and two assistant professors. These individuals have established records as productive researchers with over 200 peer-reviewed publications among them.

Areas of expertise among the faculty include cardiovascular responses to exercise and best practices for cardiorespiratory exercise prescription; research design and statistics; exercise and nutrition; biomechanics; athletic conditioning; wellness programming; and exercise physiology. Abbreviated CVs of the exercise science faculty can be found in Appendix C.

Program Administration

The program will be housed in the Department of Human Movement Sciences (HMS). A full-time faculty member from HMS will serve as Graduate Program Director (GPD), who will direct the coordination of this graduate program. Within the exercise science graduate program, there is a Graduate Program Coordinator (GPC). The GPC will teach in the program, serve on committees, and provide administrative oversight for the M.S. in Exercise Science. The GPC will also ensure program compliance with University policies and procedures.

An administrative assistant, housed in the Department of Human Movement Sciences, will support the program.

The Exercise Science M.S. degree program faculty will meet a minimum of three times per year: (1) just prior to or during the fall semester to review policies and procedures and update them as

necessary; (2) at the beginning of the spring semester to discuss admissions and finalize assistantships and fellowships for the coming year, and (3) at the end of the spring semester to discuss program assessment.

Student Assessment

Learning Outcomes

Students will engage in ongoing formative assessments such as quizzes, exams, and presentations as they complete the respective core and research and components of the academic program. The experiences will culminate in a summative assessment of student learning in written and oral comprehensive examinations.

The expectation is that as a result of completion of the academic program, students will achieve the following learning outcomes:

- Construct and synthesize written, oral, and technological communication skills to express ideas, foster understanding, and effectively interact with others.
- Design and assess appropriate research methods to investigate and answer disciplinary questions or create programs for diverse populations.
- Evaluate and synthesize theoretical and practical knowledge in specific core content areas that are the foundation of the exercise science discipline.
- Organize and assess advanced laboratory measurement techniques and formulate prescriptions relative to individual client needs.

Curricular Map

Master of Science in Exercise Science Program Competencies

Student Learning Outcomes	Courses & Co-Curricular Activities that Develop Competency
	<p>Course Number & Title</p> <p>Assessment (rubric used for grading)</p>
<p>1. Construct and synthesize written, oral, and technological communication skills to express ideas, foster understanding, and effectively interact with others.</p>	<p>Measures:</p> <p>EXSC 630 – Exercise Physiology</p> <p>Assessment: 80% of students will earn at least 80% on the term paper</p> <p>EXSC 661 – Seminar in Nutrition</p> <p>Assessment: 80% will earn at least 80% on the journal presentation assignment</p>
<p>2. Design and assess appropriate research methods to investigate and answer disciplinary questions or create programs for diverse populations.</p>	<p>Measures:</p> <p>EXSC 630 – Exercise Physiology</p> <p>Assessment: 80% of students will average at least 80% on the critical review of article reports</p> <p>FOUN 612 – Research Methods</p> <p>Assessment: 80% of students will earn at least 80% on the thesis proposal written assignment</p>

Student Learning Outcomes	Courses & Co-Curricular Activities that Develop Competency
<p>3. Evaluate and synthesize theoretical and practical knowledge in specific core content areas that are the foundation of the exercise science discipline.</p>	<p>Measures:</p> <p>Comprehensive Exams</p> <p>Assessment: 90% of students will meet the standards of the comp exams</p> <p>Or,</p> <p>HMS 698/699 – Thesis</p> <p>Assessment: 90% will meet the standards of the written thesis and oral defense</p>
<p>4. Organize and assess advanced laboratory measurement techniques and formulate prescriptions relative to individual client needs.</p>	<p>Measures:</p> <p>EXSC 642 – Clinical Exercise Testing and Prescription</p> <p>Assessment: 80% of students will earn at least 80% on the applied case study project</p> <p>EXSC 727 – Advanced Biomechanics</p> <p>Assessment: 80% of students will earn at least 80% on the applied skills project</p>

Workplace Competencies

Students successfully completing the M.S. in Exercise Science will have the ability to:

- Apply theoretical and practical knowledge within the domains of exercise physiology, biomechanics and nutrition to enhancing the health and fitness of clients from a wide variety of populations, ranging from those with chronic disease to athletes.
- Perform and interpret advanced laboratory measurement techniques to assess aerobic and anaerobic fitness; strength, power and flexibility; normal and abnormal heart rhythms (ECG); neuromuscular and biomechanical function; dietary nutritional status.
- Design and implement exercise prescriptions based on individual client needs.
- Demonstrate and apply written, oral, and technological communication skills to express ideas, foster understanding, and effectively interact with clients, professional colleagues, and members of the medical community.
- Conduct research, analyze data, and prepare and disseminate reports.

Program Assessment

The program will be assessed by the Department of Human Movement Sciences, the Darden College of Education, and Old Dominion University. The department review will be completed annually in the fall of each year starting with the second year students are admitted, 2018, and will consist of:

- Analyzing retention and attrition rates in order to maximize the positive influences and ameliorate the negative ones that affect program completion;
- Analyzing the results of the Old Dominion University Graduate Student Satisfaction Survey for areas where additional student support is needed;
- Analyzing graduate job placement to assess if the program is preparing students with the knowledge, skills and abilities for jobs in the field and evaluate the program's ability to meet market demands; and
- Analyzing the dissemination of graduate student related works (theses, abstracts, case-studies, research manuscripts).

Results from these assessments will be used to evaluate the quality of the program, to stimulate program development, and to assess the role of the program in fulfilling ODU's institutional mission. The program review may result in strategic decisions about the program, may identify areas of potential improvement, may make resource recommendations, may articulate considerations for expansion or consolidation, and may consider other aspects of programmatic quality with respect to policies and practices relative to:

- Student recruitment, admissions, advising, and retention;
- Course descriptions and implementation;
- Curriculum changes and development;
- Faculty development and research activities;
- Facilities;
- Internal and external funding; and
- Description of strengths and weaknesses with attention to points of action for the future.

The results of the annual review will be incorporated into the college's annual review. The dean and associate dean will read the program review each year to ensure that progress is being made. The college annual review of the program will be sent to the Vice Provost for review each year.

At Old Dominion University, graduate programs are required to undergo periodic external review either as independent external reviews (for non-accredited programs) or as a part of accreditation reviews.

The Dean and Associate Dean in the Darden College of Education will read the program review each year to ensure that benchmarks are met and excellence is maintained. The department's annual evaluation of the program will be sent each year to the Vice Provost for Academic Affairs for review.

Data related to the student learning outcomes will be collected on an annual basis and reported on the University's assessment database – Performance Cloud. Evidence of student achievement of learning objectives will be assessed during the program through practical and written exams, assignments, research projects and presentations. Each course will have objectives that need to be met in order for the student to successfully pass that course.

In order to assure that students are learning the major objectives of the program, faculty will assess student learning in several ways including annual evaluation of all courses, tracking students' academic progress each semester, reviewing faculty evaluations conducted by the student and through peer evaluation.

The graduate program director will complete the following activities each year as part of the efforts to assess learning:

- Analyze student learning in coursework by evaluating representative student research papers, case study papers, oral presentations, and laboratory assignments;
- Analyze course evaluations to assess faculty performance from the point of view of graduate students as it relates to the delivery of quality instruction in the classroom. Subject matter and pedagogy will be examined for necessary changes that contribute to successful student learning;
- Analyze oral and written examinations of student research experiences to assess how well they have mastered the learning outcomes of the program;
- Analyze exit assessment interviews with his or her graduate advisor and the graduate program director. The exit interviews will focus on core curricular content and the results will be used to revise course requirements and offerings as needed.

Benchmarks of Success

Benchmarks of success for this master's program will include enrollment goals and professional placement of graduates. Success will be determined by the way the program affects academic and career goals as well as the future job prospects and mobility of its students:

- 10-15 new students will be admitted annually (by and after the 5th year);
- 50% of the graduating thesis students will present research or at a regional or national conference;
- 50% of the graduating thesis students will submit a manuscript in conjunction with their research mentor or advisor for peer review;
- 90% of the non-thesis students completing the program will pass the comprehensive exams;
- 90% of non-thesis students will obtain ratings of “consistently achieves what is expected” or higher on supervisor evaluations of internship performance
- 90% of full-time students who begin the program will successfully complete the program within two years;
- 80% of the students will have earned jobs within the exercise science field or entered advanced degree programs within six months of program completion;
- 85% of students will be satisfied with the program as determined by the University's Graduate Student Satisfaction Survey.

Faculty, administrators and students will conduct a yearly evaluation of the success of the program in meeting these benchmarks. Methods of benchmark related data collection will include surveys, interviews, and consultations with interested parties. If program benchmarks are not achieved, the program faculty will examine its admissions policies, curriculum, instructional methods, internship placements, advising practices, and course and lab evaluations to determine where changes need to be made, or if benchmarks need to be updated.

Expansion of an Existing Program

The proposed program represents an expansion of the current exercise science concentration within the MS in Education—Physical Education. Exercise science has existed as a concentration under physical education at Old Dominion since the early 1980s.

The current exercise science concentration does not focus on pedagogy, does not offer pedagogical courses, and does not prepare students to become licensed teachers in the public school system. Rather, this concentration has, for the past 30 years, prepared students for careers in the field of exercise science, e.g., cardiac rehabilitation, corporate health promotion, strength and conditioning, or advanced study in the field/entry to PhD programs.

Upon approval, it will become a stand-alone program, and will no longer be part of the MS in Education. The exercise science concentration in education will be discontinued.

Relationship to Existing Degree Programs

There are no similar degree programs at the master's level at Old Dominion University.

Collaboration or Standalone

This is a standalone program. No other organization was involved in its development, and no other organization will collaborate in its operation.

Justification for the Proposed Program

Response to Current Needs (Specific Demand)

“Prophylactic and therapeutic effects of exercise were key interests of physicians Hippocrates (c. 460-370 B.C.) in Hellenic times and Galen (c. A.D. 129-216) in Roman times.”⁹ From these early eras of civilization, through the last centuries, and into the present day, exercise has been viewed an important contributor to health and wellness for humankind. Indeed, students of exercise science have been making these connections, conducting research, and studying biomechanics and physiology in an effort to advance their knowledge, skills and abilities and to further the study and findings in this discipline.

Berryman described the history of the connections between exercise and health, concluding that “we may be coming to a time in history where we can begin to regain national health through more effective guidance and counseling from the medical community coupled with the expertise of knowledgeable and well-trained exercise practitioners motivated by health outcomes...”¹⁰

According to the American College of Sports Medicine (ACSM), exercise science is “the study of movement and the associated functional responses and adaptations.”¹¹ The focus on exercise and its corresponding physiological responses address the impact on health and wellness for both healthy individuals and for those suffering from disease. The discipline covers organ systems at the cellular level (microscopically) to enhancements of biomechanical efficiency among assembly line workers (at the macroscopic level), along with all areas between the two. The ACSM identifies career opportunities for those who study exercise science, and indicates that several require a graduate degree, including biomechanists (those who study the laws of physics as applied to physical activity, exercise, and sport), occupational physiologists (those who work to improve performance of workers, redesigning work areas, and preventing or rehabilitating workplace injuries), and strength/conditioning coaches.

⁹ Winter, E. (2008). Sport and exercise science: Just how new is new?

¹⁰ Berryman, J.W. (2010). *Current Sports Medicine Reports*, Vol. 9, No. 4.

¹¹ American College of Sports Medicine, <http://www.sfasu.edu/kinesiology/documents/ACSMCareers.pdf>

Advanced education within exercise science leads to professionals being capable of achieving more positive outcomes for their patients/clients. As the American College of Sports Medicine (ACSM) notes, those wanting to be a Registered Clinical Exercise Physiologist are required, at a minimum, to have a “Master’s degree from a college or university in exercise science, exercise physiology, or kinesiology.”¹² Position announcements related to biomechanics, strength and conditioning coaches, and exercise physiologists often require or prefer an individual with a master’s degree.¹³

Employment Demand

The Bureau of Labor Statistics provides a detailed breakdown in job outlook by occupation. For the period from 2012 through 2022, faster than average growth is expected in the occupations of exercise physiologists (19%) and Fitness Trainers and Instructors (13%).¹⁴

The current exercise science concentration within the M.S.Ed. - Physical Education has a successful record of graduate placement. Within Virginia, graduates hold positions such as Cardiopulmonary Rehabilitation Specialist at Chesapeake Regional Medical Center; Exercise Physiologist at Sentara CarePlex – Hampton; Exercise Specialist at Plus One Health Management – Chesapeake; Senior Lecturer of Exercise Science at Old Dominion University; Associate Professor of Exercise, Fitness and Health Promotion at George Mason University; and Doctor of Physical Therapy at multiple sites. Outside of Virginia, graduates hold positions as Aerospace Physiologist (for both the US Navy and Air Force); Senior Exercise Physiologist at Brigham and Women’s Hospital – Boston; Assistant Professor of Kinesiology at Colorado Mesa University; Postdoctoral Scholar at Tufts University; and Cardiac Physiologist at Queen Elizabeth Hospital – Birmingham, England.

Student Demand

The existing program, M.S. Ed. in Physical Education, concentration in Exercise Science, has successfully enrolled an average of 29 students per year over the past 5 years. Given the very large number and growth of students in the undergraduate concentration in exercise science (over 700 majors at present), faculty anticipate growth at the graduate level. A survey of undergraduates completed in spring/summer of 2016 found that 48% (89 of 185 respondents) were “somewhat interested” and 33% (61 respondents) were “very interested” in pursuing a graduate degree in exercise science. Further, 90% of respondents stated they would likely attend graduate school full-time. Among current graduate students in the exercise science concentration, 94% responded that they would prefer an M.S. in Exercise Science over an M.S. Ed. in Physical Education with a concentration in Exercise Science.

¹² Warburton, D.E.R., Bredin, S.S.D., Charlesworth, S.A., Foulds, H.J.A., McKenzie, D.C., Shephard, R.J. Evidence-based risk recommendations for best practices in the training of qualified exercise professionals working with clinical populations. *Appl Physiol Nutri Metab.* 2011, 36, S232-S265. Available online at <http://www.nrcresearchpress.com/doi/abs/10.1139/h11-054#.Veu9yfRXpkA>.

¹³ American College of Sports Medicine. *Careers in Sports Medicine and Exercise Science.* n.d. Available online at <http://www.lipscomb.edu/uploads/1926.pdf>

¹⁴ Bureau of Labor Statistics: Occupational Outlook Handbook <http://www.bls.gov/ooh/a-z-index.htm#K>

The full survey results are in Appendix E.

SUMMARY OF PROJECTED ENROLLMENTS IN PROPOSED PROGRAM

Year 1		Year 2		Year 3		Year 4 Target Year (2-year institutions)			Year 5 Target Year (4-year institutions)		
2017-18		2018-2019		2019-2020		2020-2021			2021-2022		
HDCT	FTE	HDCT	FTE	HDCT	FTE	HDCT	FTE	GRAD	HDCT	FTE	GRAD
<u>25</u>	<u>20</u>	<u>30</u>	<u>25</u>	<u>35</u>	<u>30</u>	<u>35</u>	<u>30</u>	15	<u>35</u>	<u>30</u>	<u>15</u>

Assumptions

- Full-time students: 75%; part-time students: 25%
- Full-time students credit hours per semester: 9
- Part-time students credit hours per semester: 6
- Full-time students graduate in 2 years; part-time students in 3 years

Duplication

Old Dominion University is proposing this degree under the Kinesiology and Exercise Science—CIP code 31.0505. In Virginia, only one other university offers a master’s degree under this CIP code, the University of Virginia. UVA’s degree is a Master of Education, while the proposed degree is a Master of Science. UVA’s degree is similar to the current M.S.Ed. in Physical Education at ODU, in that their degree has three concentrations – Athletic Training, Exercise Physiology, and Kinesiology for Individuals with Disabilities (KIDs). The concentration at UVA that is most similar to the proposed MS in Exercise Science is Exercise Physiology. Similarities include both programs having courses in exercise physiology, exercise testing and prescription, as well as the option of performing a thesis.

UVA’s program requires one course in pediatric exercise physiology and two statistics courses; it also offers nutrition as an elective course. Further, UVA does not offer an internship option. In contrast, ODU’s program requires nutrition and research methods, has statistics as an elective (in the thesis option) and does not have a course in pediatric exercise physiology. These differences demonstrate a clearer distinction in the ODU program between students in the internship and thesis options.

Given that no public institution east of Charlottesville offers a master's program in this discipline, Old Dominion will fill a great need for the central and southeastern area of the state, and particularly for the 1.7 million residents of the Hampton Roads metropolitan area.

PROJECTED RESOURCE NEEDS FOR PROPOSED PROGRAM

Part A: Answer the following questions about general budget information.

- Has the institution submitted or will it submit an addendum budget request to cover one-time costs? Yes _____ No X
- Has the institution submitted or will it submit an addendum budget request to cover operating costs? Yes _____ No X
- Will there be any operating budget requests for this program that would exceed normal operating budget guidelines (for example, unusual faculty mix, faculty salaries, or resources)? Yes _____ No X
- Will each type of space for the proposed program be within projected guidelines? Yes X No _____
- Will a capital outlay request in support of this program be forthcoming? Yes _____ No X

Full-time faculty

There are four faculty members who teach in the current MSED—Physical Education—exercise science concentration. Among these faculty, two members' teaching load are full time. Their load is equivalent to 1 FTE.

Part-time faculty

Among the graduate faculty who teaching in the exercise science concentration, two members' teaching load are part time. Their load is equivalent to 1 FTE.

Adjunct faculty

No adjunct faculty are required to launch and sustain the proposed program.

Graduate Assistants

The Dean's office provides funding for graduate assistantships to each department in the Darden College of Education. Within the Department of Human Movement Sciences, there are currently

five exercise science master's level students receiving graduate assistantships. No additional graduate assistantships are being requested at this time.

Classified Positions

There is currently one classified position within the Department of Human Movement Sciences who will assist (20% of this position's time) with program needs. No additional resources are needed.

Targeted financial aid

This degree program does not offer financial aid and therefore it is not available through this program.

Library

The University Libraries will be able to fully support the M.S. in Exercise Science. The primary search engine for locating research articles in the field is PubMed, which is available to all students and faculty at Old Dominion University. Major journals in the field include the American Journal of Physiology, Clinical Biomechanics, Diabetes, Exercise and Sports Science Reviews, International Journal of Sport Nutrition, Exercise & Metabolism, Journal of Applied Physiology, Journal of Biomechanics, Journal of Strength and Conditioning Research, Medicine and Science in Sports and Exercise, and many others. Obtaining articles is extremely easy through (1) online subscriptions held by the university, (2) physical subscriptions for some journals, and (3) rapid delivery via Interlibrary Loan.

Telecommunications

No new telecommunications resources are required to launch and maintain this program.

Space

Laboratory and classroom space that has been used for delivery of the exercise science concentration will continue to be used for teaching by the proposed program.

Equipment (including computers)

No new equipment is necessary to launch and sustain the proposed program.

Other Resources (specify)

No additional resources are required to launch and sustain the proposed program.

Part B: Fill in the number of FTE and other positions needed for the program				
	Program Initiation Year		Expected by Target Enrollment Year	
	2017- 2018		2021- 2022	
	On-going and reallocated	Added (New)	Added (New)***	Total FTE positions
Full-time faculty FTE*	1.00			1.00
Part-time faculty FTE**	1.00			1.00
Adjunct faculty				0.00
Graduate assistants (HDCT)				0.00
Classified positions	0.20			0.20
TOTAL	2.20	0.00	0.00	2.20

*Faculty dedicated to the program. **Faculty effort can be in the department or split with another unit.
*** Added **after** initiation year

Part C: Estimated resources to initiate and operate the program

	Program Initiation Year		Expected by Target Enrollment Year	
	20__ - 20__		20__ - 20__	
Full-time faculty	1.00	0.00	0.00	1.00
salaries	\$75,000			\$75,000
fringe benefits	\$27,825			\$27,825
Part-time faculty (faculty FTE split with unit(s))	1.00	0.00	0.00	1.00
salaries	\$75,000			\$75,000
fringe benefits	\$27,825			\$27,825
Adjunct faculty	0.00	0.00	0.00	0.00
salaries				\$0
fringe benefits				\$0
Graduate assistants	0.00	0.00	0.00	0.00
salaries				\$0
fringe benefits				\$0
Classified Positions	0.20	0.00	0.00	0.20
salaries	\$6,000			\$6,000
fringe benefits	\$2,226			\$2,226
Personnel cost				
salaries	\$156,000	\$0	\$0	\$156,000
fringe benefits	\$57,876	\$0	\$0	\$57,876
Total personnel cost	\$213,876	\$0	\$0	\$213,876
Equipment				\$0
Library				\$0
Telecommunication costs				\$0
Other costs				\$0
TOTAL	\$213,876	\$0	\$0	\$213,876

Part D: Certification Statement(s)

The institution will require additional state funding to initiate and sustain this program.

Yes _____
Signature of Chief Academic Officer

No _____
Signature of Chief Academic Officer

If “no,” please complete Items 1, 2, and 3 below.

1. Estimated \$\$ and funding source to initiate and operate the program.

Funding Source	Program initiation year		Target enrollment year	
	2017	- 2018	2021	- 2022
Reallocation within the department (<i>Note below the impact this will have within the department.</i>)	\$213,876		\$213,876	
Reallocation within the school or college (<i>Note below the impact this will have within the school or college.</i>)				
Reallocation within the institution (<i>Note below the impact this will have within the institution.</i>)				
Other funding sources (<i>Specify and note if these are currently available or anticipated.</i>)				

2. Statement of Impact/Funding Source(s). A separate explanation is required for each source used.

The same funding sources currently being used to operate the existing M.S.Ed. in Physical Education with a concentration in exercise science will be used to operate the M.S. in Exercise Science.

3. Secondary Certification.

If resources are reallocated from another unit to support this proposal, the institution will **not** subsequently request additional state funding to restore those resources for their original purpose.

 X Agree _____
Signature of Chief Academic Officer

_____ Disagree _____
Signature of Chief Academic Officer

December 8, 2016

APPROVAL OF A NEW MASTER OF SCIENCE IN SPEECH-LANGUAGE
PATHOLOGY

RESOLVED that, upon the recommendation of the Academic and Research Advancement Committee, the Board of Visitors approves the proposal for a new Master of Science in Speech-Language Pathology degree program to be effective with the fall 2017 semester.

Rationale: The Department of Communication Disorders and Special Education in the Darden College of Education has offered a Master of Science in Education, Speech-Language Pathology and Audiology since the early 1980s. The program title changed in 1994 to M.S. Ed. in Speech-Language Pathology. The master's degree in speech-language pathology has been accredited by the Council on Academic Accreditation (CAA) in Audiology and Speech-Language Pathology of the American Speech-Language-Hearing Association since 1988. This proposal seeks to change the degree to an M.S. instead of an M.S.Ed. The M.S. is broader and will represent the professional options of a speech-language pathologist.

The purpose of the M.S. in Speech-Language Pathology is to prepare students to be certified, licensed speech-language pathologists, the entry level degree required for state licensure and certification by the Council for Clinical Certification in Speech-Language Pathology of the American Speech-Language-Hearing Association. The goal of this program is to prepare students for positions in all work settings, including schools, clinics, and medical facilities.

The only differences from the current degree program are the change to an M.S. and a change in the CIP code assigned to the program. The curriculum and admission requirements remain the same.

**STATE COUNCIL OF HIGHER EDUCATION FOR VIRGINIA
PROGRAM PROPOSAL COVER SHEET**

<p>1. Institution Old Dominion University</p>	<p>2. Academic Program (Check one): New program proposal _____ Spin-off proposal <u> X </u> Certificate document _____</p>
<p>3. Name/title of proposed program Speech-Language Pathology</p>	<p>4. CIP code 51.0203</p>
<p>5. Degree/certificate designation Master of Science</p>	<p>6. Term and year of initiation Fall 2017</p>
<p>7a. For a proposed spin-off, title and degree designation of existing degree program MS Ed in Speech-Language Pathology</p>	
<p>7b. CIP code (existing program) 51.0203</p>	
<p>8. Term and year of first graduates Fall 2017</p>	<p>9. Date approved by Board of Visitors</p>
<p>10. For community colleges: date approved by local board date approved by State Board for Community Colleges</p>	
<p>11. If collaborative or joint program, identify collaborating institution(s) and attach letter(s) of intent/support from corresponding chief academic officers(s)</p>	
<p>12. Location of program within institution (complete for every level, as appropriate and specify the unit from the choices).</p> <p>Departments(s) or division of <u>Dept of Communication Disorders & Special Educ</u></p> <p>School(s) or college(s) of <u>Darden College of Education</u></p> <p>Campus(es) or off-campus site(s) <u>Norfolk Campus</u></p> <p>Mode of delivery: face-to-face <u> X </u> distance (51% or more web-based) _____ hybrid (both face-to-face and distance) _____</p>	
<p>13. Name, title, telephone number, and e-mail address of person(s) other than the institution's chief academic officer who may be contacted by or may be expected to contact Council staff regarding this program proposal.</p> <p>Jeanie Kline, Ed.D. Special Assistant to V. Provost 757.683.3261 jkline@odu.edu</p>	

**PROPOSAL FOR
THE MASTER OF SCIENCE IN SPEECH-LANGUAGE PATHOLOGY
TABLE OF CONTENTS**

DESCRIPTION OF THE PROPOSED PROGRAM.....	1
PROGRAM BACKGROUND.....	1
MISSION.....	2
ACCREDITATION	2
PROGRAM DELIVERY.....	3
ADMISSIONS CRITERIA.....	3
TARGET POPULATION.....	4
CURRICULUM.....	4
TIME TO DEGREE.....	6
STUDENT RETENTION AND CONTINUATION PLAN.....	6
FACULTY.....	7
PROGRAM ADMINISTRATION.....	7
STUDENT ASSESSMENT.....	7
WORKPLACE COMPETENCIES.....	12
PROGRAM ASSESSMENT.....	13
EXPANSION OF EXISTING PROGRAMS.....	14
RELATIONSHIP TO EXISTING DEGREE PROGRAMS.....	14
COLLABORATIVE OR STANDALONE PROGRAM.....	14
JUSTIFICATION FOR THE PROPOSED PROGRAM.....	15
RESPONSE TO CURRENT NEEDS.....	15
EMPLOYMENT DEMAND.....	17
STUDENT DEMAND.....	19
DUPLICATION.....	20
PROJECTED RESOURCE NEEDS.....	21
CERTIFICATION STATEMENT.....	24
APPENDICES.....	27
APPENDIX A – SCHEV LETTER APPROVING PROGRAM TITLE CHANGE	
APPENDIX B – ACCREDITATION CERTIFICATE	
APPENDIX C – COUNCIL ON ACADEMIC ACCREDITATION (CAA) STANDARDS	
APPENDIX D – COURSE DESCRIPTIONS	
APPENDIX E – TYPICAL COURSE PROGRESSION/SAMPLE PLAN OF STUDY	
APPENDIX F – ABBREVIATED FACULTY CURRICULUM VITAE	
APPENDIX G – EMPLOYMENT DEMAND-JOB LISTINGS	
APPENDIX H – EXCERPTS FROM SELECTED REFERENCES	
APPENDIX I – STUDENT DEMAND—SURVEY AND SURVEY RESULTS	

Description of the Proposed Program

Program Background

Old Dominion University (ODU) in Norfolk, Virginia, seeks approval to initiate a Master of Science (M.S.) in Speech-Language Pathology to begin in fall 2017. The program will be offered by the Department of Communication Disorders and Special Education in the Darden College of Education.

The purpose of the M.S. in Speech-Language Pathology is to prepare students to be certified, licensed speech-language pathologists, the entry level degree required for state licensure and certification by the Council for Clinical Certification in Speech-Language Pathology of the American Speech-Language-Hearing Association. The goal of this program is to prepare students for positions in all work settings, including schools, clinics, and medical facilities.

The college has offered a Master of Science in Education, Speech-Language Pathology and Audiology since the early 1980s. The program title changed in 1994 to M.S. Ed. in Speech-Language Pathology (see Appendix A). The master's degree in speech-language pathology has been accredited by the Council on Academic Accreditation (CAA) in Audiology and Speech-Language Pathology of the American Speech-Language-Hearing Association since 1988 (see Appendix B).

When the M.S. Ed. program was initiated several decades ago, much emphasis in training was to prepare speech-language pathologists to work in public schools. With changes in accreditation requirements over the ensuing decades, training has evolved to include coursework and clinical experiences to prepare speech-language pathologists to work in all professional settings, including medical facilities (e.g., acute care hospitals, skilled nursing facilities, outpatient clinics). With that professional evolution comes the frequent question as to whether the ODU M.S. Ed. program only prepares professionals for school settings. Students who graduate from this CAA-accredited program meet standards for certification and employment in all work settings. Graduates take positions in schools, clinical practices, and medical facilities (skilled nursing facilities, rehabilitation hospitals, acute care hospitals).

Further, in July 2015 the Commonwealth of Virginia school licensure for speech-language pathology was moved to the Department of Professional Regulations where one license is issued to new licensees regardless of the work setting: school, medical, or clinical. Therefore the purpose of this application is to spin-off from the Master of Science in Education—Speech-Language Pathology—to an updated program designated as Master of Science in Speech-Language Pathology, thereby representing the breadth of training provided in this accredited professional program.

Mission

As noted on the university website, “Old Dominion University, located in the City of Norfolk in the metropolitan Hampton Roads region of coastal Virginia, is a dynamic public research institution that serves its students and enriches the Commonwealth of Virginia, the nation and the world through rigorous academic programs, strategic partnerships, and active civic engagement.”

The M.S. in Speech-Language Pathology program complements the mission of the University by offering a rigorous academic program that is accredited by the Council on Academic Accreditation in Audiology and Speech-Language Pathology. The Old Dominion University (ODU) program prepares graduates for professional practice in schools, clinics, and medical facilities. The training program is supported through strategic partnerships established with school divisions, clinical practices, and medical facilities. Thereby the program addresses ongoing needs of these partners for well-trained, highly-skilled professional employees who meet licensing requirements.

Moreover, students in the Master’s program are encouraged to be civic-minded professionals who participate with professional organizations such as the Speech and Hearing Association of Virginia and the American Speech-Language-Hearing Association to advocate at the state and national levels for legislation and policies that promote access to education and healthcare resources, including speech-language pathology and audiology services for individuals with communication and swallowing disorders.

Accreditation

The Council on Academic Accreditation (CAA) in Audiology and Speech-Language Pathology of the American Speech-Language-Hearing Association (ASHA) serves as the accrediting body for speech-language pathology graduate programs.¹ The CAA is ‘committed to quality’ by promoting excellence in graduate education through a peer review process which fosters ongoing quality improvements as member programs self-assess and advance curricula and training opportunities to provide students with necessary knowledge and skills for independent professional practice.

ASHA is the professional organization of 172,000 certified speech-language pathologists and audiologists.² Since 1965, ASHA has been engaged in accreditation of graduate programs to assure the highest standards in training students for professional practice. The CAA was established as a semi-autonomous arm of ASHA to oversee accreditation and assure compliance with national accreditation standards. The CAA is recognized as the credentialing organization for graduate speech-language pathology programs by both the U.S. Department of Education, most recently in 2016³ and the Council for Higher Education Accreditation⁴ (CHEA). The CAA

¹ asha.org/About/governance/committees/CommitteeSmartForms/Council-on-Academic-Accreditation-in-Audiology-and-Speech-Language-Pathology.htm

² www.asha.org

³ www.asha.org/About/news/Press-Releases/2016/CAA-Receives-Renewal-from-Department-of-Education.htm

⁴ www.asha.org/About/news/Press-Releases/2014/Accrediting-Body-of-Audiology-Speech-Language-Pathology-Graduate-Programs-Earns-Continued-Recognition.htm

currently oversees accreditation for 243 master's programs in speech-language pathology and 73 doctoral programs for audiology. The ODU M.S. Ed. program in speech-language pathology received full accreditation status from CAA in 1988 and has renewed and maintained that status every 7 years since that time. The program is currently in the process of self-study for a 2017 full accreditation review, including an extended report due February 1, 2017 and a site visit in fall 2017. A summary of accreditation standards is provided in Appendix C.

Program Delivery

Courses in the proposed Master of Science in Speech-Language Pathology are taught in a fully face-to-face format on the ODU main campus. The faculty is invested in providing the knowledge and skills necessary to become a speech-language pathologist in a live educational setting where acoustic and visual cues are maximized and demonstrated. Training is enhanced through clinical experiences gained in the ODU Speech and Hearing Clinic, followed by two externships.

To assure that faculty provide a cutting edge educational experience, faculty incorporate technologies to enhance learning, including Blackboard. Faculty members take part in ongoing training in course development and teaching through the Center for Learning and Teaching (CLT) at Old Dominion University.

Admissions Criteria

Criteria for admission to the Master of Science in Speech-Language Pathology include the following:

- A baccalaureate degree from a regionally-accredited institution or an equivalent degree from a foreign institution with a 2.8 cumulative GPA or higher (on a 4.0 scale)
- A score of 146 or higher on the GRE verbal section, 140 or higher on the GRE quantitative section, and 4.0 or higher on the GRE analytic section.
- Three letters of recommendation from current or former faculty or employers
- Essay describing interests in speech-language pathology and unique background experiences
- Test of English as a Foreign Language (TOEFL) score of 550 on the paper-based test (or 79-80 on the iBT) for non-native English speakers

Students with previously completed graduate coursework at a regionally-accredited and CAA-accredited institution may submit a request for a maximum of 12 credit hours to be transferred. Such transfer hours would go through the Graduate Program Director for approval, and if approved, added to the transcript.

Students submit an application through the Communication Sciences and Disorders Centralized Application System (CSDCAS) and to ODU by the annual application deadline of February 1. The graduate admissions committee, consisting of three program faculty members, reviews all applications and applies an admissions rubric to determine qualified applicants and rank applicants for offers of admission. Acceptance into the M.S. in Speech-Language Pathology is

also contingent upon completion of a face-to-face interview where interpersonal and communication skills are screened. Students at a distance can complete the interview via Skype, although students are encouraged to visit campus and tour the speech-language pathology facilities if possible.

Target Population

The proposed degree targets those individuals interested in becoming licensed, certified speech-language pathologists (SLP). While the primary target population is undergraduates majoring in communication sciences and disorders, other candidates come from fields of linguistics, psychology, neuroscience, and human development, among others, and wish to apply their related knowledge to pursue the professional SLP degree.

Curriculum

The 57-hour curriculum for the M.S. in Speech-Language Pathology at Old Dominion University will prepare graduates for a Provisional License from the Virginia Board of Audiology & Speech-Language Pathology and to apply for Certification in Speech-Language Pathology from the Council for Clinical Certification (CFCC) of the American Speech-Language-Hearing Association.⁵ By virtue of graduation from an accredited program, students can apply for licensure in virtually every state in the U.S.

The structure of the curriculum provided through this Master's program is guided by the standards put forth by the CFCC in Speech-Language Pathology⁶ and by the Council on Academic Accreditation (CAA) in Audiology and Speech-Language Pathology,⁷ both associated with the American Speech-Language-Hearing Association.

As such, the curriculum includes 14 required academic courses (42 credits) and 5 required clinical practica/externships (15 credits) where students accrue at least 400 clock hours of clinical experience working with adults and children with speech, language, and swallowing impairments. All academic and clinical courses are required to meet accreditation and licensure requirements.

Students who enter the master's program with a degree from another university or a degree outside of Communication Sciences and Disorders may be required to take pre-requisite undergraduate courses to meet CFCC standards. The graduate program director will review the undergraduate academic transcript with each student to determine if coursework is required as a pre-requisite to taking courses in the program. Descriptions of all graduate courses are available in Appendix D.

⁵ www.asha.org/certification/SLPCertification/

⁶ www.asha.org/Certification/2014-Speech-Language-Pathology-Certification-Standards/

⁷ caa.asha.org

The transition from Master of Science in Education to Master of Science does not require any change in academic or clinical courses offered as this is the same set of courses that all students currently complete.

Courses required for completion of the proposed Master of Science in Speech-Language Pathology are provided below; all are existing courses at the university.

Academic Courses (36 credit hours required)

CSD 649	Clinical Procedures in Speech-Language Pathology (3 credits)
CSD 651	Language Development and Language Disorders (3 credits)
CSD 652	Articulation and Phonological Disorders (3 credits)
CSD 653	Language Diagnosis and Remediation (3 credits)
CSD 655	Voice and Resonance Disorders (3 credits)
CSD 656	Theories and Therapies in Stuttering (3 credits)
CSD 657	Aphasia (3 credits)
CSD 658	Swallowing Disorders (3 credits)
CSD 659	Augmentative and Alternative Communication Disorders (3 credits)
CSD 660	Procedures in Audiology (3 credits)
CSD 662	Cognitive-Communication Disorders (3 credits)
CSD 750	Neuromotor Speech Disorders (3 credits)

Research Core (6 credit hours required)

CSD 612	Evidence-Based Research in Speech-Language Pathology (3 credits)
CDSE 636	Problems Paper: Evidence-Based Case Studies in Speech-Language Pathology (3 credits)

Clinical Courses (15 credit hours required)

CSD 554	Clinical Practica in Speech Pathology/Audiology (I, II, III, IV @ 3 credits each)
CSD 668	Advanced Clinical Externship in Speech-Language Pathology (3 credits)

Comprehensive Exams

The culmination of the academic and clinical training experience is a written comprehensive examination. The exam includes six sections, primarily delivered in essay format. One multiple choice question addresses the professional code of ethics of the American Speech-Language-Hearing Association and public law related to speech-language pathology. Five other sections are chosen from among 7 topics that correspond to 8 primary courses in the curriculum: CSD 652 Articulation/Phonological Disorders; CSD 657 Aphasia; CSD 660 Audiology; CSD 651 and CSD 653 Child Language Disorders; CSD 750 Neuromotor Speech Disorders; CSD 656 Stuttering; and CSD 652 Voice/Resonance Disorders. In the semester of the comprehensive examination, students are given guided study questions for each topic area to foster their preparation for the exam. To assure that students are prepared for the exam, they have the opportunity to meet with faculty individually or in study sessions, and to write sample answers to the study questions for faculty feedback.

Students take the comprehensive examination in one four-hour setting proctored by program faculty. Each question is graded by the faculty member responsible for that topic course using a rubric. A grade of 80% or greater is required to pass each section. Students who fail one or two

sections of the written comprehensive exam must re-write those sections. Students who fail three or more sections must re-write the full comprehensive exam. Prior to rewriting a failed question, the student meets with the specific faculty member in person to review course material and receive feedback to assure preparation for the study question. By university policy, failure to pass all questions on the second attempt results in termination from the program.

Time to Degree

All students are required to enroll full time in the program to accomplish academic and clinical goals. Students who enter the program with all undergraduate pre-requisites complete the graduate program in two years (6 semesters-Fall, Spring, Summer). Students admitted with a degree from a discipline other than speech-language pathology may take an additional 1-2 semesters to complete the program as they complete missing undergraduate prerequisite courses in the first two semesters if necessary. In rare personal circumstances (e.g., new baby, military deployment), students may take fewer courses than is considered a full load in a given semester, thereby extending their plan of study. Students must complete their master's degree at Old Dominion University within 6 years. A sample plan of study for the typical full time graduate student is available in Appendix E.

Student Retention and Continuation Plan

Each admitted graduate student meets with the graduate program director (GPD) in an orientation session where all program policies and procedures are addressed, transcripts are reviewed for missing prerequisite undergraduate courses, and a graduate coursework timeline is finalized. The GPD also meets with each student at least once per semester to prepare for registration, confer on progress, and update the student on coming issues (e.g., comprehensive exams, CDSE 636 case studies papers). All program faculty confer on student progress each semester to allow the GPD to provide additional support or guidance to any individual who is not meeting expectations.

To continue in the program, each student must maintain a GPA of at least 3.0. If the student's GPA fall below 3.0, the student has 12 credits to improve the GPA to 3.0 or the student will be suspended from the program. At the time of the semester advising meeting with the GPD, the student and advisor will review the student's academic performance. The advisor will reiterate the continuance requirements for the program, including an overall GPA of 3.0, satisfaction of all course requirements, and completion of clinical practica. If a student falls below a 3.0, the GPD works with the student and any appropriate faculty member to institute a plan of action to improve academic or clinical performance. This may include such recommendations as retaking a course, taking part in tutoring sessions, completing additional learning experiences, recommending a change of study habits, or providing additional resources for a difficult topic.

Faculty

Six academic faculty and four clinical faculty in the Department of Communication Disorders and Special Education have extensive experience teaching and in clinical service to support the program. All 10 faculty maintain certification in speech-language pathology (9 faculty members) or audiology (1 faculty member). The faculty includes one full professor, one associate professor and four assistant professors, all of whom hold terminal degrees. The four clinical faculty all hold master's degrees and licensure in speech-language pathology. The tenured and tenure-track faculty members have established records as productive researchers with over 80 peer-reviewed publications among the six of them.

The faculty members have a range of expertise, resulting in meaningful course content that allows students to learn from those who are knowledgeable and engaged in topics relevant to the courses they are teaching. Specific faculty members have expertise in adult neurologic communication disorders, evidence-based research to practice, pediatric speech and language disorders, audiology, stuttering, and swallowing disorders. Brief CVs of the speech-language pathology faculty can be found in Appendix F.

Program Administration

The program will be housed in the Department of Communication Disorders and Special Education (CDSE). A full-time faculty member from CDSE will serve as Graduate Program Director (GPD) of Speech-Language Pathology, the recognized leader of the program by the Council on Academic Accreditation. The GPD will teach in the program, advise students, serve on committees, and provide administrative oversight for the accredited M.S. in Speech-Language Pathology program. The GPD will also ensure program compliance with University policies and procedures and will complete annual accreditation reports.

The full-time speech-language pathology program faculty will continue their current practice of meeting bimonthly throughout the academic year to oversee issues pertaining to the graduate program. The GPD may call additional faculty meetings as needed. An administrative assistant and a fiscal assistant housed in the Department of Communication Disorders and Special Education both will support the program as needed.

Student Assessment

Students in the proposed program will engage in ongoing formative assessments across the curriculum, including quizzes, exams, projects and presentations as they complete the respective components of the academic program. In addition, during clinical coursework students prepare lesson plans, work plans, progress report and diagnostic reports as appropriate for their clinical caseload.

Multiple methods of summative assessment are implemented in the program. All students complete a written comprehensive examination. Also, during the final semester enrollment in CDSE 636: Problems in Education, students write two evidence-based case studies on an adult

and a pediatric case involving communication and swallowing disorders. Finally, prior to completion of the program, students take the Praxis 2 in Speech-Language Pathology, the national examination for the profession. The expectation is that as a result of completion of the academic and clinical program, students will meet the following academic and clinical goals:

Academic Goals

1. Meet ASHA requirements, and state licensure and certification requirements
2. Understand trends and issues related to the profession
3. Attain knowledge regarding assessment, identification, and treatment of a wide variety of communication disorders, understand the social and cultural bases of speech and language behaviors
4. Attain a fundamental ability to read and interpret the literature of the profession
5. Gain an appreciation of research, including skills in research design, data collection, research reporting, statistical analysis, and in the application of scientific methodology in the resolution of professional problems.

Clinical Goals

1. Meet ASHA's clinical requirements as well as requirements for state licensure and certification
2. Demonstrate an ability to apply knowledge pertaining to identification, assessment and treatment of communication disorders in closely-supervised, competency-based clinical activities in an on-campus setting
3. Demonstrate the ability to apply such knowledge in a variety of clinical settings
4. Attain competencies as stated in the program's clinical settings
5. Demonstrate the professional, ethical, and clinical behaviors described in the clinic manual and reflective of the highest purposes of the profession.

Specific Student Learning Outcomes (SLOs) have been developed relative to accreditation standards of the Council on Academic Accreditation (CAA) and Council for Clinical Certification (CFCC) and reported on the University's assessment database. Evidence of student achievement of learning objectives for knowledge and skills in speech-language pathology will be assessed during the program through written exams, assignments, research projects and presentations, and clinical assignments and clock hours. Each course will have objectives that need to be met in order for the student to successfully pass that course. Results will be summarized annually in the university assessment database.

Below is a map of the student learning outcomes for the program, as well as the courses where assessment takes place to address a specific standard. Each standard is addressed in multiple courses throughout the curriculum to help students develop and master the knowledge and skills needed for professional practice in speech-language pathology. At completion of the curriculum each student will have had the opportunity to demonstrate mastery for each standard. The GPD will then summarize the results of student achievement in a cumulative tracking sheet.

A curriculum map of accreditation standards and courses that address each standard can be seen in the following table.

**Introduction to and
Intermediate Progression in
Knowledge/Skills (or
equivalent at the
undergraduate level)**

**Advanced Mastery of
Knowledge/Skills
(or equivalent at the
undergraduate level)**

CFCC IV-B: Knowledge of basic human communication and swallowing processes

Biological	Biology, CSD 351, CSD 460, CSD 452	CSD 652, CSD 655, CSD 660
Neurological	CSD 351	CSD 657, CSD 660, CSD 750
Acoustic	CSD 351, CSD 352	CSD 458/558, CSD 660
Psychological	PSYC 201, CSD 352, CSD 453, CSD 461	CSD 651, CSD 656, CSD 657, CSD 662
Developmental	CSD 451, CSD 453	CSD 651, CSD 652, CSD 653
Linguistic	CSD 352, CSD 451, CSD 453	CSD 649, CSD 651, CSD 652, CSD 657
Cultural	CSD 352, CSD 451	CSD 652

CAA 3.1.2B: Foundations of Speech-Language Pathology Practice

CFCC IV-C: Knowledge of communication and swallowing disorders and differences

Articulation	CSD 451	CSD 652, CSD 750
Fluency	CSD 452	CSD 656
Voice/resonance/respiration/phonation	CSD 452	CSD 655, CSD 750
Language	CSD 447	CSD 651, CSD 657
Hearing	CSD 460	CSD 461, CSD 660
Swallowing	CSD 351	CSD 658
Cognitive Communication disorders	CSD 447	CSD 651, CSD 662
Social aspects of communication	CSD 447	CSD 649, CSD 651, CSD 662
Communication modalities	CSD 459	CSD 659

CAA 3.1.3B Identification & prevention of speech, language, and swallowing disorders and differences

CAA 3.1.4B Evaluation of speech, language and swallowing disorders and differences

CAA 3.1.5B Intervention to minimize effects of changes in speech, language, and swallowing mechanisms

CFCC IV-D: Knowledge pertaining to prevention, assessment, and treatment of communication and swallowing disorders

Articulation	CSD 451	CSD 652, CSD 750
Fluency	CSD 452	CSD 656
Voice/resonance/respiration/phonation	CSD 452	CSD 655, CSD 750
Language	CSD 447	CSD 653, CSD 657
Hearing	CSD 460, CSD 461	CSD 660
Swallowing	CSD 351	CSD 658
Cognitive communication disorders	CSD 447	CSD 653, CSD 662
Social aspects of communication	CSD 447	CSD 649, CSD 653, CSD 662
Communication modalities	CSD 459	CSD 659

CAA 3.1.6B General Knowledge and Skills for Professional Practice: Ethical Conduct

CFCC IV-E Knowledge of standards of ethical conduct

CSD 554

CSD 649, CSD 668,
comprehensive exam

CAA 3.1.1B: Professional Practice Competencies: Evidence-Based Practice

CFCC IV-F: Knowledge of research principles and how they are integrated into evidence based clinical practice

CSD 554

CSD 612, CDSE 636

CAA 3.1.6B General Knowledge and Skills Applicable to Professional Practice: Engagement in Contemporary Professional Issues and Advocacy

CFCC IV-G: Knowledge of contemporary professional issues, including professional clinical standards, accreditation requirements, ASHA practice policies/guidelines, reimbursement issues

CSD 554

CSD 668

CFCC IV-H: Knowledge of professional issues concerning:

Certifications

CSD 554

CSD 668

Licensure

CSD 554

CSD 668

Professional credentials

CSD 554

CSD 668

Regulations (national/state/local)

CSD 554

CSD 668

Policies

CSD 554

CSD 668

CAA 3.1.1B Professional Practice Competencies: Effective Communication Skills

CFCC V-A: Satisfactory oral and written communication skills for professional practice

Oral skills

Speech Screening CSD 554

CSD 652, CSD 750

Written skills

CSD 554, CSD 668, CSD 651,
CSD 656

CDSE 636,
comprehensive exam

CFCC V-B: Students will demonstrate effective clinical skills in evaluation

CSD 554

CSD 668

CFCC V-B: Students will demonstrate effective clinical skills in intervention

CSD 554

CSD 668

CAA 3.1.6B General Knowledge and Skills Applicable to Professional Practice: Interaction skills and personal qualities, including counseling and collaboration

CFCC V-B: Students will demonstrate effective clinical skills in interaction/Personal qualities

CSD 554

CSD 668

CAA 3.1.1B Professional Practice Competencies

Accountability

CSD 554

CSD 668

Integrity

CSD 554

CSD 668

Clinical Reasoning

CSD 554

CSD 668

Concern for Individuals Served

CSD 554

CSD 668

Cultural Competence

CSD 554

CSD 668

Professional Duty

CSD 554

CSD 668

Collaborative Practice	CSD 554	CSD 668
CAA 3.1.6B General Knowledge and Skills Applicable to Professional Practice		
Integration/application - interdependence of speech, language, hearing	CSD 461	CSD 660, CDSE 636
Processes of clinical education and supervision	CSD 554	CSD 668
Professionalism/Professional behavior	All courses	All courses
Self-evaluation of effectiveness of practice	CSD 554	CSD 668
CFCC V-C: Students will complete 400 clock hours of clinical experiences.		
CFCC V-D: Students will complete 325 clock hours at the graduate level.		
	CSD 554	CSD 668

To assess the program’s success in meeting the student learning outcomes, faculty will complete the following analyses/activities: annual evaluation of all courses, tracking students’ academic progress each semester, reviewing student opinion survey data, and conducting faculty teaching observations through peer evaluation.

The speech-language pathology faculty will do the following activities each year as part of the efforts to assess learning and effectiveness of the program:

- Analyze **student learning** in comprehensive examinations, evidence-based case studies, and Praxis 2 scores in speech-language pathology;
- Complete an annual review and update of **curriculum, subject matter and pedagogy** to make necessary changes to assure successful student learning;
- Distribute and analyze **Program Evaluation Exit Surveys** with the Graduate Program Director. The exit surveys will align with the accreditation standards and focus on core knowledge and professional skills that students should be accruing across the curriculum. The annual results will be used by the faculty as feedback to revise course content and requirements as needed.

Workplace Competencies

Workplace competencies can be discussed in light of the service delivery domains delineated in the Scope of Practice in Speech-Language Pathology (American Speech-Language-Hearing Association, 2016). Upon completion of the MS in Speech-Language Pathology, students will be able to engage in professional practice as expected of an entry level clinician in the following service delivery domains:

1. Engage in collaboration through team communication and shared decision-making.
2. Provide counseling to clients, families, and caregivers to support and educate about communication and swallowing disorders.
3. Promote prevention and wellness to reduce incidence of or severity of communication and swallowing disorders.
4. Implement screening programs and make appropriate referrals for suspected communication, swallowing, or other disorders.
5. Administer assessments to differentially diagnose communication and swallowing disorders.
6. Provide treatment to optimize the ability to communicate and swallow.
7. Incorporate instrumentation, technologies, and alternative modalities in the care of individuals with communication and swallowing disorders.
8. Improve effectiveness of healthcare and educational service delivery through improved communication in the healthcare, education, and workplace environments.

Course	Service Delivery Domain							
	1	2	3	4	5	6	7	8
CDSE 636 Problems in Education				X	X	X	X	
CSD 612 Evidence-based research in SLP	X			X	X	X		
CSD 649 Clinical Procedures in SLP		X		X	X	X		
CSD 651 Language Development and Language Disorders	X	X	X	X	X	X		X
CSD 652 Articulation and Phonological Disorders	X		X	X	X	X		
CSD 653 Language Diagnosis and Remediation	X	X	X	X	X	X		X
CSD 655 Voice and Resonance Disorders	X	X	X	X	X	X	X	
CSD 656 Theories and Therapies in Stuttering		X		X	X	X		
CSD 657 Aphasia	X	X	X	X	X	X	X	X
CSD 658 Swallowing Disorders	X	X	X	X	X	X	X	X

CSD 659 Augmentative and Alternative Comm.	X	X				X	X	X
CSD 660 Procedures in Audiology	X	X	X	X		X	X	X
CSD 662 Cognitive-Communication Disorders	X	X	X	X	X	X	X	X
CSD 750 Neuromotor Speech Disorders	X	X	X	X	X	X	X	X
CSD 554 Clinical Practica in SLP/Audiology	X	X	X	X	X	X	X	X
CSD 668 Advanced Clinical Externship in SLP	X	X	X	X	X	X	X	X

Program Assessment

The program will be assessed annually by the professional accrediting body, Council on Academic Accreditation (CAA) in Audiology and Speech-Language Pathology, as well as Old Dominion University. The main annual accreditation report is due to CAA each year on February 1. Through the CAA, the program is assessed on three critical indicators: percentage of students completing the program within the established timeline (typically 6 semesters); percentage of students passing the national examination in speech-language pathology, Praxis 2, with a score of 162 or higher; percentage of students employed or pursuing additional education within one year of master's degree completion. In all cases, the CAA stipulates a benchmark of 80% or higher as the acceptable pass rate.

In addition, ODU requires an annual review, as documented through its assessment platform, due each year on September 30. Through the annual ODU review, the program will take into account the following self-assessments: percentages of students achieving the 80% benchmark in each academic class; percentages of graduating students accruing clinical clock hours in designated clinical domains for adults and children; results of the SLP Graduate Program Evaluation Exit Survey administered anonymously to all graduating students.

Results of these assessments will be used to evaluate the effectiveness of the program, the need to modify curriculum or course content, faculty continuing education guidance, and the role of the program in meeting the college and university's strategic planning initiatives. Information from the annual program assessment will be made available to the Dean and Associate Dean in the Darden College of Education and the Dean of the Graduate School.

Graduate programs at ODU are required to undergo a periodic external review either as independent external reviews (for non-accredited programs) or as a part of an accreditation process. The last external review for the Master of Science in Education in Speech-Language Pathology took place in Fall 2010 by the CAA. The program is currently undergoing self-study for an upcoming CAA external review in Fall 2017, with the primary report due on February 1, 2017. Pending reaffirmation of accreditation, the program will undergo external review every 7 years after that, in keeping with the timeline of the CAA.

Benchmarks of Success

Benchmarks of success for this master's program will include enrollment goals and professional placement of graduates. Success will be determined by the way the program affects academic and career goals as well as the future job prospects and mobility of its students:

- Approximately 28 new students will be admitted into the program annually;
- 80% of the students who begin the program will successfully complete the program within 6 semesters;
- 80% of the students will have earned jobs within speech-language pathology within one year of program completion;
- 80% of students will pass the Praxis 2 national examination in speech-language pathology.

Methods of benchmark-related data collection will include analyzing admission and graduation data as well as conducting follow-up surveys with alumni through personal email and social media platforms. If the M.S. in Speech-Language Pathology program has not met one or more of the benchmarks of success, the Graduate Program Director will meet with program faculty and determine what course of action is required to make sure that the inadequacy is addressed. The plan of action will be submitted to the Department Chair and Associate Dean for approval, suggestions, and any allocation of resources necessary for success.

Expansion of Existing Programs

The M.S. in Speech-Language Pathology represents a spin-off from an existing degree, the Master of Science in Education – Speech-Language Pathology. Because of expansion of professional certification standards and changes in licensure in the Commonwealth to one license under the Department of Professional Regulations, it is important that the proposed degree represent the breadth of professional settings where speech-language pathologists may work: schools, clinical and medical. The new degree is not an expansion as much as it is a translation to a broader M.S. degree that represents the professional options of a speech-language pathologist. Once approved, the M.S. in Education, Speech-Language Pathology, will be discontinued.

Relationship to Existing Degree Programs

The proposed Master of Science in Speech-Language Pathology has no relationship with or similarity to other master's programs at the University.

Collaborative or Standalone Program

This is a standalone program. No other organization was involved in its development, and no other organization will collaborate in its operation.

Justification for the Proposed Program

Response to Current Needs (Specific Demand)

Speech-language pathology is a professional discipline that serves people with speech, language, and swallowing disorders and differences. Communication and swallowing disorders are experienced by millions of individuals from birth to geriatric stages of life. According to data provided by the National Institute on Deafness and Other Communication Disorders, 7.7% of children ages 3-17 experience a communication or swallowing disorder.⁸ A number of common pediatric disorders are associated with serious communication impairments, including autism, cerebral palsy, cleft palate, Down syndrome, and deafness and hearing impairment, in addition to various developmental delays. Feeding and swallowing problems are reported for 25-45% of children, and 30-80% of children with developmental disorders.⁹ The Centers for Disease Control and Prevention reports the prevalence of autism at 1 in 68 children.¹⁰ Childhood apraxia of speech occurs in 1-2 in 1000 children.¹¹ Intellectual disabilities which impact on speech and language development occur in 10 in 1000 individuals¹². The prevalence rate for fluency disorders or stuttering is estimated at 1.6% in school-age children.¹³

Likewise in the adult population, a number of acquired medical and neurological conditions are associated with speech, language and swallowing impairments, including stroke, brain injury, Parkinson's disease, oral and laryngeal cancers, ALS, Alzheimer's disease and many others. For example, aphasia, a language impairment that occurs following a left cerebral hemisphere stroke occurs in 80,000 individuals per year, with a prevalence of 1 in 250 individuals living with aphasia.¹⁴ The prevalence of aphasia increases with aging to as many as 43% of those >85 years of age.¹⁵ Similarly, Parkinson's disease, associated with neuromotor speech difficulties or dysarthria, occurs in an estimated 13 in 100,000 adults, with the incidence increasing with age.¹⁶

Aging alone is a huge risk factor for the development of communication and swallowing disorders. The prevalence of voice disorders in aging was reported as greater than 4.8% of the population >60 years of age.¹⁷ From Medicare statistics, an estimated 16,000,000 beneficiaries

⁸ www.nidcd.nih.gov/health/voice-speech-language/percentage-children-ages-3-17-communication-or-swallowing-disorder

⁹ www.asha.org/PRPSpecificTopic.aspx?folderid=8589934965§ion=Incidence_and_Prevalence

¹⁰ www.asha.org/PRPSpecificTopic.aspx?folderid=8589935303§ion=Incidence_and_Prevalence

¹¹ www.asha.org/PRPSpecificTopic.aspx?folderid=8589935338§ion=Incidence_and_Prevalence

¹² Maulik, P.K., Mascarenhas, M.N., Mathers, C.D., Dua, T., & Saxena, S. (2011). Prevalence of intellectual disability: A meta-analysis of population based studies. *Research in Developmental Disabilities*, 32(2), 419-436.

¹³ www.asha.org/PRPSpecificTopic.aspx?folderid=8589935336§ion=Incidence_and_Prevalence

¹⁴ www.asha.org/PRPSpecificTopic.aspx?folderid=8589934663§ion=References

¹⁵ Engelter, S.T., Gostynski, M., Papa, S., Maya, F., Caludia, B., Vladeta, A.G.,...Phillipe, A.L. (2006). Epidemiology of aphasia attributable to first ischemic stroke. *Stroke*, 37, 1379-1384.

¹⁶ Van Den Eeden, S.K., Tanner, C.M., Bernstein, A.L., Fross, R.D., Leimpeter, A., Bloch, D.A., & Nelson, L.M. (2003). Incidence of Parkinson's disease: Variation by age, gender, and race/ethnicity. *American Journal of Epidemiology*, 157(11), 1015-1022.

¹⁷ de Araujo Pernambuco, L., Espelt, A., Balata, P.M., & de Lima, K.C. (2015). Prevalence of voice disorders in the elderly: A systematic review of population-based studies. *European Archives of Otorhinolaryngology*, 272(10), 2601-2609.

have some type of communication change which varies from mild to severe and disabling.¹⁸ Even something as common as elevated blood pressure, a potential sign of cerebrovascular changes, is associated with an increased risk of language disorders in aging.¹⁹ Further, statistics reported by the U.S. Census Bureau²⁰ estimate that the aged population (>65 years of age) will double from 2012 to 2050.

The prevalence of speech, language, and swallowing disorders is extensive across the life span for many developmental and acquired conditions. The incidence is growing with the growth of the aging population. This considerable need places great demands for intervention to address these debilitating problems. Speech-language pathologists place a crucial role in this process.

An extensive literature exists across all domains of speech, language, and swallowing disorders to evaluate the efficacy of speech-language pathology services to address these disorders. Literally thousands of treatment studies and hundreds of systematic reviews and meta-analyses have been conducted to examine the weight of the evidence for the effectiveness of speech-language pathology treatment. The Practice Portal of the American Speech-Language-Hearing Association²¹ and Australia's Speech Pathology Database for Best Interventions and Treatment Efficacy²² coalesce the burgeoning literature. Research evidence demonstrates the positive effects of speech-language pathology interventions across a wide range of disorders, such as aphasia, dysarthria, apraxia of speech, autism, developmental articulation disorders, stuttering, dysphagia, laryngectomy, and many others.

The 2015 Work Life Survey of the American Speech-Language-Hearing Association (ASHA) boasts more than 108,000 speech-language pathologist members.²³ Of those, 55% report working in schools and 42% work in health care settings. Work as a speech-language pathologist, regardless of setting, requires a professional license in every state in the U.S., 46 of which stipulate a master's degree necessary for the license, and the other 4 that stipulate ASHA clinical certification required for the license (which requires a master's degree).²⁴ In Virginia, licensure is overseen by the Virginia Board of Audiology and Speech-Language Pathology (BASLP). Before the first year of clinical work can commence, the individual must have a Provisional License in hand from BASLP. The Virginia SLP license requires a "graduate" degree from an accredited graduate program in speech-language pathology.

¹⁸Yorkston, K.M., Bourgeois, M.S., & Baylor, C.R. (2010). Communication and aging. *Physical Medicine and Rehabilitation Clinics of North America*, 21 (2), 309-319.

¹⁹ Nation, D.A., Wierenga, C.E., ... & Bondi, M.W. (2010). Elevated pulse pressure is associated with age-related decline in language ability. *Journal of the International Neuropsychological Society*, 16 (5), 933-938.

²⁰ Ortman, J.M., Velkoff, V.A., & Hogan, H. (2014, May). An aging nation: The older population in the United States. United States Census Bureau, P25-1140.

²¹www.asha.org/Practice-Portal/Speech-Language-Pathologists/

²²www.speechbite.com/

²³www.asha.org/uploadedFiles/2015-Work-Life-Survey-SLP-Summary-Report.pdf#search=%22survey%22

²⁴www.asha.org/advocacy/state/

Federal laws have a direct influence on the credentials necessary for individuals providing speech-language pathology services to individuals with communication and swallowing disorders. The Social Security Act (1802[3][B]) established Medicare service regulations, including those for speech-language pathologists.²⁵ Anyone providing services to a Medicare beneficiary must enroll as a Medicare Provider to get a National Provider Identifier number. The enrollment requires clinicians, including SLPs, to provide the state licensure number. Thus, Virginia Medicare recipients must be seen by a SLP with a master's degree.

Further, the primary law for schools, Individuals with Disabilities Education Act 2004, stipulates that speech-language pathologists providing services to children in schools “must have met the highest requirement in the state.”²⁶ Virginia House Bill 373, effective July 1, 2014, changed licensing of speech-language pathologists within Virginia from two licenses, one available through the Board of Education and one through the Virginia Board of Audiology and Speech-Language Pathology (BASLP), to one license offered through the BASLP.²⁷ Thus, federal law in conjunction with Virginia law stipulates that speech-language pathologists must practice with a professional license, and that license requires at least a master's degree.

Employment Demand

Given the legal requirements in medical and educational settings, it is not surprising that U.S. News & World Report identified speech-language pathologist on their 2016 list of 100 Best Jobs. According to the U.S. Bureau of Labor and Statistics (BLS), “Employment of speech-language pathologists is projected to grow by 21% from 2014 to 2024, much faster than the average for all occupations.”²⁸ This amounts to 28,900 more jobs in SLP throughout the U.S. by 2024. As the baby-boom population grows older, there will be more instances of health conditions that cause speech or language impairments, such as strokes and hearing” (Occupational Outlook Handbook).

Additional data pertaining specifically to the ODU region of the country can be found in the Virginia Employment Commission statistics. The outlook for employment among speech-language pathologists in the Commonwealth is projected to grow 28% in the next 10 years, from 3,077 estimated jobs in 2014 to 3,950 estimated jobs by 2024.²⁹

Notably, the kinds of jobs that will grow are jobs in healthcare. Further, according to BLS data reported by the American Speech-Language-Hearing Association (ASHA), “speech-language pathology ranked 13th out of 20 occupations projected to add the most new jobs between 2012 and 2022.”³⁰

²⁵Satterfield, L., & Swanson, B.A. (2016). Medicare Survival Guide: For audiologists and speech-language pathologists. Rockville, MD: ASHA Press

²⁶www.asha.org/Advocacy/federal/idea/IDEA04Says/

²⁷lis.virginia.gov/cgi-bin/legp604.exe?141+ful+HB373ER

²⁸www.bls.gov/ooh/healthcare/speech-language-pathologists.htm

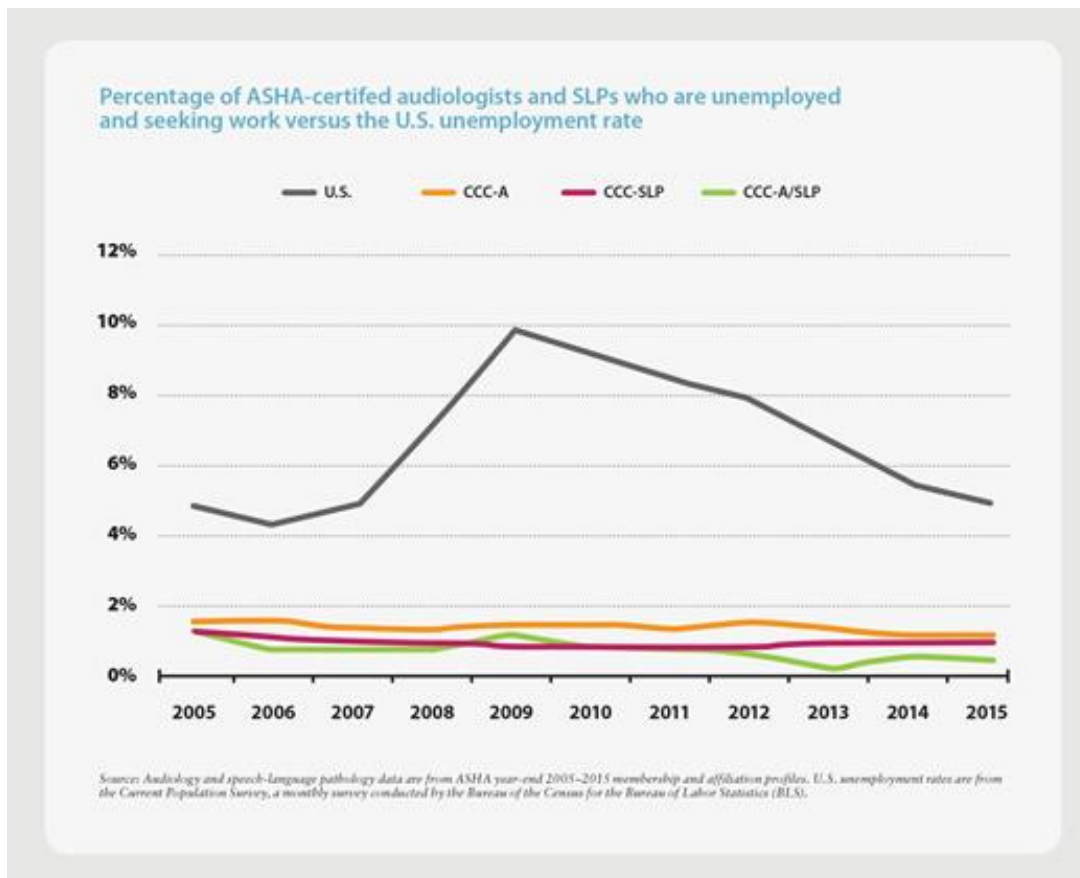
²⁹https://data.virginialmi.com/vosnet/lmi/occ/occsummary.aspx?category=EMPLOYMENT&ff_occprofile_section_controls=1&session=occspecewd&geo=5101000000§ion=outlook&geotype=&city=&zip=&radius=&onetcode=29112700

³⁰www.asha.org/uploadedFiles/Supply-Demand-SLP.pdf#search=%22employment%22

Further, data have been published by the ASHA in the Supply and Demand Resource List.²⁹ Of the more than 108,000 speech pathologists in the organization, 52.6% work in schools and 39.3% work in health care facilities. In addition, 27% of SLPs responding to the semi-annual Health Care Survey³¹ indicated that SLP positions, especially in pediatric hospitals and home health settings, were available and unfilled in their health care facilities. These are well-paying jobs, averaging \$61,000 per year in schools and \$75,000 per year in health care settings.

In an October 2016 article in *The ASHA Leader*³², the employment data for SLPs was compared to national trends (Figure 1). While unemployment soared to as high as 10% in the past 7 years, unemployment rates for SLPs remained below 2% across the same timeframe. On October 17, 2016, a search of the ASHA Career Center indicated job postings for 154 jobs throughout the U.S. Specific to the Tidewater region of Virginia, on October 17, 2016, a search of the premier job finding engine, Indeed.com, showed 32 job postings within 25 miles of Norfolk. At least one-third of those postings were for positions in medical settings, including Sentara Healthcare, Saber Healthcare, Bon Secours Health System, Soliant Health, and Genesis Healthcare. Examples of these job listings can be seen in Appendix G.

Figure 1: ASHA Leader Trends



³¹ www.asha.org/uploadedFiles/2015-Work-Life-Survey-SLP-Summary-Report.pdf#search=%22survey%22

³² leader.pubs.asha.org/article.aspx?articleid=2557689

Finally, evidence for the trends in employment in speech-language pathology can be seen in graduate data at ODU, required to be tracked for our accreditation body, Council on Academic Accreditation in Audiology and Speech-Language Pathology. Of 70 graduates in the past 3 years, 100% were employed as a SLP within one year of graduation, including 21 (30%) in school settings and 49 (70%) in medical or clinical settings. These data indicate the importance of modifying our graduate program to MS in SLP instead of MS Ed. in SLP.

Appendix H includes a number of excerpted references cited in this proposal.

Year	Number of Graduates	Medical/Clinical Jobs	School Jobs
2014	19	63%	37%
2015	33	82%	18%
2016	18	56%	44%

Student Demand

The student demand for admission to graduate programs in speech-language pathology (SLP) across the U.S. is enormous and highly competitive. Each year, the American Speech-Language-Hearing Association conducts a survey of all higher education programs. The 2014-2015 *Communication Sciences and Disorders Education Survey National Aggregate Data Report*³³ indicated that, whereas there were 67,510 applications to 246 graduate programs offering Master’s degrees in SLP, the capacity among those programs was 8,102 students. Because of the competitive nature of admission to graduate programs across the U.S., students apply to multiple programs. Yet many students do not gain acceptance to a program.

The record of applications at ODU is just as competitive as at other institutions across the U.S. For the past 3 years, the ODU SLP master’s program application process has taken place through the Communication Sciences and Disorders Centralized Application System (CSDCAS). The number of applications each year far surpasses the 28 slots available for admission to the clinical training program. Clearly the demand is high.

Years	2013-2014	2014-2015	2015-2016
Applications	258	242	273

To evaluate the effects of a change in degree designation at ODU from M.S. Ed. in Speech-Language Pathology to M.S. in Speech-Language Pathology, a survey was disseminated to our current students (Fall 2016) enrolled in undergraduate and graduate courses at ODU. Responses

³³ www.asha.org/uploadedFiles/2014-2015-CSD-Education-Survey-National-Aggregate-Data-Report.pdf

were received from 24 current graduate students and 43 current undergraduate speech-language pathology students. Complete results of the survey are available in Appendix I.

Undergraduate students were asked about their interest in pursuing graduate education. Among the undergraduate respondents, 100% were very interested (43 students) or somewhat interested (3 students) in pursuing a graduate degree, including 97.87% who were very interested (43 students) or somewhat interested (3 students) in speech-language pathology. Finally, 87.23% were very interested (28 students) or somewhat interested (13 students) in pursuing graduate education in speech-language pathology at ODU.

When current graduate students were asked if they would be likely to change their degree designation from M.S. Ed. to M.S. if given the opportunity, 70.97% of current graduate students were extremely likely (17 students) or somewhat likely (5 students) to change and only 9.68% were not likely (2 students) or not at all likely (1 student) to change.

Finally, all respondents were queried on their opinion of the graduate program should the degree be changed from M.S. Ed. to M.S. in Speech-Language Pathology. Among those responding, 51.38% viewed such a change as much more favorable (23 students) or somewhat more favorable (14 students). Only 2 students viewed such a change as somewhat less favorable (1 student) or much less favorable (1 student). Overall, the results of this brief survey indicate continued high interest in the graduate program in speech-language pathology, and a favorable view of a change from M.S. Ed. to M.S. in speech-language pathology.

SUMMARY OF PROJECTED ENROLLMENTS IN PROPOSED PROGRAM

Year 1		Year 2		Year 3		Year 4 Target Year (2-year institutions)			Year 5 Target Year (4-year institutions)		
2017-2018		2018-2019		2019-2020		2020-2021			2021-2022		
HDCT	FTE	HDCT	FTE	HDCT	FTE	HDCT	FTE	GRAD	HDCT	FTE	GRAD
<u>56</u>	<u>56</u>	<u>56</u>	<u>56</u>	<u>56</u>	<u>56</u>	<u>56</u>	<u>56</u>		<u>56</u>	<u>56</u>	<u>28</u>

Assumptions

- All graduate students enroll as full-time students
- Full-time students credit hours per semester: 9-12
- Full-time students graduate in 2 years

Duplication

Within the CIP code 51.0203, one other master's degree program is offered at a public institution in Virginia: James Madison University offers a Master of Science in Speech Pathology. Both programs at JMU and ODU have proven viable for the past several decades with steady growth. The program at ODU has also had substantial community engagement throughout Southeastern Virginia, and successful job placement for graduates.

Similarities with James Madison University program: Because both JMU and ODU are accredited by the Council on Academic Accreditation in Audiology and Speech-Language Pathology, the curricula between the programs is rather parallel as each program addresses standards set forth by the council. Additionally, both programs have core course requirements that include child language disorders, child phonologic disorders, adult-language disorders, cognitive-communication disorders in adults, voice disorders, swallowing disorders, fluency disorders, research, neuromotor speech disorders, and augmentative communication. Both JMU and ODU offer programs via traditional on-campus formats. In addition, both programs sponsor an on-campus speech clinic where clinical training starts.

Differences from James Madison University: While these two programs are aligned in many ways, the clinical training process of the two programs operates somewhat differently. At JMU, students take part in 4 semesters of on-campus practicum and one off-campus full time externship. At ODU, students take part in 3 semesters of on-campus practicum and two off-campus full time externships.

The location of the ODU program in a large urban community provides a breadth of clinical training experiences working with children and adults, including several dozen medical and clinical placements in addition to several school divisions. The more rural location of JMU limits the number of training placements such that some JMU students leave that location and go elsewhere to access the final clinical placement to complete training.

Both programs have healthy enrollments due to the strong employment needs in the profession. Data from the SCHEV research unit, retrieved on October 28, 2016, in the form of headcounts³⁴ and graduates³⁵ for the JMU program are provided in the table below.

Institution/Year	2011-2012	2012-2013	2013-2014	2014-2015	2015-2016
JMU Headcount	80	70	86	82	110
JMU Graduates	33	33	34	22	41

Projected Resource Needs

The Department of Communication Disorders and Special Education has sufficient resources to initiate and sustain the proposed spin-off program. Existing resources from the current program under the Master of Science in Education in Speech-Language Pathology are available for this updated degree.

Full-time Faculty

Ten existing full-time faculty will teach in the M.S. in Speech-Language Pathology. Six academic faculty carry a 50% teaching load and the four clinical faculty carry a 100% teaching load while fulfilling clinical education duties in the ODU Speech and Hearing Clinic. Thus, there will be a total of 7 FTE among full time faculty when this proposed program is launched.

³⁴ http://research.schev.edu/enrollment/E16_report.asp

³⁵ http://research.schev.edu/Completions/C1Level2_Report.asp

Part-Time Faculty

One part time (25%) clinical faculty member will contribute to training in the ODU Speech and Hearing Clinic.

Adjunct Faculty

No adjunct faculty are needed to conduct and sustain the proposed program.

Graduate assistants

No graduate assistants are required to conduct and sustain the proposed program.

Classified Positions

There is currently one full-time classified position within the Department of Communication Disorders and Special Education that is shared with two programs, allotting .5 FTE to the MS in SLP. Twenty-five percent of a second full-time classified position is dedicated to the proposed program. Thus, .75 FTE in classified staff support the program.

Targeted financial aid

Financial aid is available to qualified students in the proposed program. Six \$6,000 Scottish Rite scholarships (through the Education Foundation) are available each year to support incoming graduate students in the M.S. Ed. in Speech-Language Pathology program. Those scholarships will be transferred to the M.S. in Speech-Language Pathology program.

Library

No new library resources are required for the proposed program. The University Libraries will be able to fully support the MS in Speech-Language Pathology program. Print and digital journal collections are available for a variety of primary journals in the field, including the Journal of Speech-Language-Hearing Research, American Journal of Speech-Language Pathology, American Journal of Audiology, Journal of Communication Disorders, International Journal of Language and Communication Disorders, Aphasiology, Journal of Fluency Disorders, Dysphagia, and Journal of Child Language. Several prominent databases (CINAHL, Cochrane, Medline, PsychINFO), and Interlibrary Loan are available to assist faculty to identify and readily access necessary articles to support teaching and research.

Telecommunications

No new telecommunication resources are required to launch and sustain the proposed program.

Space

No additional space is necessary to launch and sustain the proposed program.

Equipment (including computers)

No new equipment is necessary to launch and sustain the proposed program.

Other resources (specify)

No additional resources are required to launch and sustain the proposed program.

PROJECTED RESOURCE NEEDS FOR PROPOSED PROGRAM

Part A: Answer the following questions about general budget information.

- Has the institution submitted or will it submit an addendum budget request to cover one-time costs? Yes____ No x
- Has the institution submitted or will it submit an addendum budget request to cover operating costs? Yes____ No x
- Will there be any operating budget requests for this program that would exceed normal operating budget guidelines (for example, unusual faculty mix, faculty salaries, or resources)? Yes____ No x
- Will each type of space for the proposed program be within projected guidelines? Yes x No____
- Will a capital outlay request in support of this program be forthcoming? Yes____ No x

Part B: Fill in the number of FTE and other positions needed for the program				
	Program Initiation Year		Expected by Target Enrollment Year	
	2017- 2018		2021- 2022	
	On-going and reallocated	Added (New)	Added (New)***	Total FTE positions
Full-time faculty FTE*	7.00			7.00
Part-time faculty FTE**	0.25			0.25
Adjunct faculty	0.00			0.00
Graduate assistants (HDCT)				0.00
Classified positions	0.75			0.75
TOTAL	8.00	0.00	0.00	8.00
*Faculty dedicated to the program. **Faculty effort can be in the department or split with another unit.				
*** Added after initiation year				

Part C: Estimated resources to initiate and operate the program				
	Program Initiation Year		Expected by Target Enrollment Year	
	2016- 2017		2021-2022	
Full-time faculty	7.00	0.00	0.00	7.00
salaries	\$455,000			\$455,000
fringe benefits	\$168,805			\$168,805
Part-time faculty (faculty FTE split with unit(s))	0.25	0.00	0.00	0.25
salaries	\$15,000			\$15,000
fringe benefits	\$5,565			\$5,565
Adjunct faculty	0.00	0.00	0.00	0.00
salaries	\$0			\$0
fringe benefits				\$0
Graduate assistants	0.00	0.00	0.00	0.00
salaries				\$0
fringe benefits				\$0
Classified Positions	0.75	0.00	0.00	0.75
salaries	\$22,500			\$22,500
fringe benefits	\$8,348			\$8,348
Personnel cost				
salaries	\$492,500	\$0	\$0	\$492,500
fringe benefits	\$182,718	\$0	\$0	\$182,718
Total personnel cost	\$675,218	\$0	\$0	\$675,218
Equipment				\$0
Library				\$0
Telecommunication costs				\$0
Other costs	\$36,000			\$36,000
TOTAL	\$711,218	\$0	\$0	\$711,218

Part D: Certification Statement(s)

The institution will require additional state funding to initiate and sustain this program.

Yes _____
Signature of Chief Academic Officer

No _____
Signature of Chief Academic Officer

If “no,” please complete Items 1, 2, and 3 below.

1. Estimated \$\$ and funding source to initiate and operate the program.

Funding Source	Program initiation year 2016-2017	Target enrollment year 2020-2021
Reallocation within the department (<i>Note below the impact this will have within the department.</i>)	\$675,218	\$675,218
Reallocation within the school or college (<i>Note below the impact this will have within the school or college.</i>)		
Reallocation within the institution (<i>Note below the impact this will have within the institution.</i>)		
Other funding sources (<i>Specify and note if these are currently available or anticipated.</i>)	\$36,000	\$36,000

2. Statement of Impact/Funding Source(s). A separate explanation is required for each source used.

Reallocation within the department: Within the Department of Communication Disorders and Special Education, an existing budget includes base funding for the Master of Science in Education—Speech-Language Pathology. These same funds will be used for the M.S. in Speech-Language Pathology. Therefore, funding will remain in the department for the proposed program. No adverse impact is anticipated within the department.

Other Funding Sources: The Scottish Rite has funded six \$6,000 scholarships through the Education Foundation at Old Dominion University. This funding will continue for students in the Master of Science in Speech-Language Pathology through the target year and beyond. Students receive the scholarships based on merit within the admission rubric established by the Department of Communication Disorders and Special Education.

3. Secondary Certification.

If resources are reallocated from another unit to support this proposal, the institution will **not** subsequently request additional state funding to restore those resources for their original purpose.

Agree _____
Signature of Chief Academic Officer

Disagree _____
Signature of Chief Academic Officer