

**MEMO**

**To:** The UVM Faculty Senate  
**From:** Curricular Affairs Committee of the Faculty Senate, Laura Almstead, Chair  
**Date:** September 8, 2017  
**Re:** Approval of a proposal for a new Master of Science in Physical Activity and Wellness Science submitted by the College of Nursing and Health Sciences

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At its meeting on September 7, 2017, the Curricular Affairs Committee approved the action recommended in the following memo.

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The Curricular Affairs Committee unanimously approved a proposal for a new Master of Science in Physical Activity and Wellness Science submitted by the College of Nursing and Health Sciences (CNHS). The proposal was also reviewed and approved by the Graduate College Executive Committee. The new program will be housed in the Department of Physical Rehabilitation and Movement Science. If approved by the Faculty Senate and Board of Trustees, the program will be offered beginning Fall 2018.

***Program Description and Rationale***

The proposed Master of Science in Physical Activity and Wellness Science (MS in PAWS) is designed to provide future exercise professionals a defined scope of theoretical understanding and translational knowledge, skills, and abilities. This training will allow them to design, deliver, and monitor physical activity programming to prevent, treat, and ameliorate chronic disease. The proposed program is a succinct, rigorous, one-year MS degree structured to allow students with complementary educational backgrounds or trajectories to pursue specialized expertise in translational physical activity programming for healthy and clinical populations. After completion of the program, individuals may pursue related national certifications and employment in a wide variety of healthcare and public health settings. Additionally, students that complete the proposed MS in PAWS will be, in part, prepared to pursue additional training in the PhD in Human Functioning and Rehabilitation Sciences offered by CNHS or other similar higher education pursuits.

***Justification and Evidence for Demand***

Due to the high and increasing prevalence of chronic disease tied to lack of physical activity, the societal demand for practitioners with specific expertise in physical activity and exercise programming

is substantial. To meet this need, the proposers indicate that there are 25 to 30 graduate programs nationally comparable to the proposed program. Ten specific aspirant universities were listed in the proposal that offer Master's degree programs in similar areas. Despite the number of programs available nationally, there are currently no existing programs in Vermont, and a paucity of programs in the New England area as a whole. The need for adequately trained exercise professionals to fulfill these roles is enormous, and thus the newly proposed MS in PAWS would put UVM in the position to provide such training in a region in which few similar opportunities exist.

After completion of proposed degree program, graduates would be well-positioned to pursue employment as physical activity and public health specialists, exercise physiologists, worksite wellness directors, fitness directors, primary care physical activity counselors, and community health educators. Graduates of the program would also be eligible to sit for several national certifications from the American College of Sports Medicine ([www.acsm.org/certification](http://www.acsm.org/certification)).

### ***Relationship to Existing Programs***

The Exercise and Movement Science program currently offers a B.S. in Exercise and Movement Science, and students in this program are educated in the theory of human movement and performance throughout the human continuum and across populations. It is a highly competitive program with ~300-500 applications out of which the program accepts approximately 50 students. A majority of undergraduates completing this major pursue graduate work in exercise science, public health, and physical therapy. The proposed MS would provide UVM graduates an opportunity to pursue that additional training at UVM.

The proposers have also considered their relationship to the Wellness Environment and UVM's Living Well program, and have had many formal communications and conversations across units regarding the potential synergies and collaborative growth opportunities moving forward. According to the proposers, the response was positive and encouraging. The proposers feel that students enrolled in the new MS in PAWS could serve as an additional potential resource for these programs. Moreover, undergraduate students from related majors who participate in programs like WE and develop an academic interest in pursuing a graduate degree in this content, would be well positioned to apply for the MS in PAWS.

### ***Curriculum***

The proposed MS in PAWS is a one academic year, course-based masters requiring 30 credits of coursework (10 courses total; 3 credits each). Multi-year options would be considered if a need arose. All courses in the program are new offerings; three (EXMS 302,303 and 350) were approved for the 2017-18 catalogue. The other courses will be approved before the program admits students. The proposers indicate that they foresee collaborations and cross-list potential for the new courses moving forward. General and specific goals and learning outcomes were described in the proposal, and syllabi for all courses provided.

### Required Courses

EXMS 302: Research Methods in Physical Activity  
EXMS 303: Physical Activity and Chronic Disease Epidemiology  
EXMS 350: Physiological Aspects of Physical Activity and Chronic Disease  
EXMS 345: Exercise Assessment and Prescription  
EXMS 368: Physical Activity Program Design and Management  
EXMS 360: Energy Balance  
EXMS 352: Health and Wellness Promotion Theory  
EXMS 353: Behavior Change for Physical Activity  
EXMS 370: Health Policy for Physical Activity and Wellness  
EXMS 363: Exercise in Clinical Populations

### ***Admission Requirements and Process***

Requirements for Admission:

- › Undergraduate degree from an accredited college or university
- › Minimum of a 3.0 overall GPA on the last 60 hours of undergraduate degree
- › One course in the following areas: Exercise Physiology with laboratory, Human Nutrition, Statistics, Human Physiology, and Kinesiology
- › GRE Scores
- › TOEFL scores (international students; minimum of 90)
- › UVM Graduate Application Form
- › Statement of Career Interests
- › Three letters of recommendation

Candidates will be ranked using quantitative and qualitative metrics using admission materials. The applications will be reviewed by a formal admissions committee, which will be comprised of the program director and program faculty. The committee will then make recommendations to the Graduate College for admission.

### ***Anticipated Enrollment and Impact on Current Programs***

Currently, there are no Master of Science or other graduate programs at UVM that provide similar training. The proposers anticipate a cohort size of 15 to 20 students per year for the first five years. This estimate is based on internal focus groups with current students enrolled in the BS in Exercise and Movement Science, 50% of who stated that they would stay on an additional year to complete the new program if it was offered. In addition, students in complementary programs at UVM have likewise expressed interest. Aspirant comparison programs enroll 50 to 100 students per year for their respective Master's degree program.

### ***Advising***

The program director, Dr. Connie Tompkins, will advise all matriculated students.

### ***Assessment Plan***

The new MS in PAWS will be evaluated by program faculty on a yearly basis as part of the ongoing departmental assessment program. There are currently no specific national accreditation standards for the proposed program, but the program will complete the Academic Program Review required for all UVM programs. Additionally, the success of the proposed program will be continuously measured in several multiple ways including:

- number and quality of applications
- graduation rate
- pass rate on national certification exams
- employment rate within six months of graduation
- number of graduates in leadership positions within three and five years of completing the program
- student satisfaction as measured with program exit survey
- employer satisfaction, as measured with employer survey

### ***Staffing Plan, Resource Requirements, and Budget***

A detailed plan for resourcing the program, including additional staffing as well as five-year financial statements was provided in the proposal. Based on the budget plan, the program is anticipated to be cash flow positive from the first year assuming a cohort of 10 students each year (60% in state and 40% out-of-state). The college's commitment to resourcing the proposed program is confirmed in the letter of support from Patricia Prelock, Dean of the College of Nursing & Health Sciences,

“With the approval of the master's program, a full time clinical position will be assigned to EXMS with about 20% of the effort contributing to the graduate program and about 80% of the effort contributing to the undergraduate program. The contribution to the undergraduate program is to provide teaching support for those courses where the program's graduate faculty will be assigned to teach some of the proposed new graduate courses. Undergraduate tuition dollars will cover the commitment at the undergraduate level. I am also supporting a 50% technician who will provide lab support for students and faculty in the clinical teaching labs. Our financial modeling indicates that the proposed program would be in the black even with the addition of a clinical faculty member and a lab technician.”

### ***Evidence of Support***

Endorsements for the proposed Master of Science degree program were provided by the department Chair of Rehabilitation and Movement Science, Jeremy Sibold, as well as the Chair of the College of Nursing and Health Sciences Curriculum Planning Committee, Elizabeth Adams. Additionally, Patricia Prelock, Dean of the College of Nursing & Health Sciences, provided a strong letter of support. Cynthia Forehand, Dean of the Graduate College, wrote a letter in support of the program, but noted that while

the Graduate College Executive Committee unanimously approved the proposal, their approval “is contingent on all courses being approved prior to opening an application for the program in the graduate admissions system.” The proposers explicitly state that the program will not be offered until all courses have been approved.

### ***Summary***

As the prevalence of chronic diseases associated with lack of physical activity increases, so has the societal demand for practitioners with specific expertise in physical activity and exercise programming. The newly proposed Master of Science in Physical Activity and Wellness Science is an exciting opportunity for UVM, known to be an advocate of healthy nutrition and exercise practices, to be a leader in this domain and help realize an emerging career opportunity for UVM students. Importantly, there are no similar programs that currently exist in Vermont and few are available in New England. Thus the proposed MS in PAWS would fill a regional need. As a one-year program the new MS in PAWS is expected to be attractive from a time and financial savings standpoint. It would also provide UVM students completing the current, highly competitive BS in Exercise in Movement Science to complete a BS and MS in five years. Overall, the proposed MS in PAWS would therefore be a valuable addition to UVM’s curricular portfolio.