

Doctor of Medical Science

Cohort: DMSc 21



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University**

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Program Description

The majority of practicing Physician Assistants (PAs) in the country have earned the current terminal degree for the profession – a Master’s degree centered around Physician Assistant Studies (such as the MPAS or MMS degree). Healthcare is changing rapidly and PAs are an essential part of the future of healthcare in this country. The Doctorate of Medical Science (DMSc) prepares and supports students to complete a clinical doctoral degree which can provide additional opportunities for leadership positions in institutions of higher education, healthcare and research clinics, hospital settings, and other healthcare venues. The vision of Rocky Mountain University of Health Professions (RMU) is to become widely recognized for excellence in healthcare education. This innovative DMSc program will help RMU accomplish this vision.

The DMSc curriculum is composed of four concentration tracks: 1) Advanced Clinical Practice, 2) Healthcare Leadership & Administration, 3) Healthcare Professions Education, and 4) Psychiatry. Students in these concentration tracks will complete a practicum and applied scholarly project (ASP). The concentration tracks are committed to the development of lifelong learners and scholars who can perform the following: 1) create, evaluate, publish, present, and integrate scholarly works into their daily clinical practice, leadership role, or academic agenda; 2) act in leadership roles within their discipline and community; 3) provide the highest level of intervention to their patients; and 4) participate in undergraduate and graduate education environments to effectively teach the next generation of evidence-based PAs.

The curriculum is designed for PA practitioners and educators to continue professional work obligations while completing this degree. Completion of the program involves completion or awarding of 36 total credit hours for master's-prepared PAs or 42 total credit hours for bachelor's-prepared PAs.

The ASP emphasizes the application of scientific principles related to the evaluation, intervention, and integration of clinically related issues of inquiry seen in healthcare practice. ASP committee members are known experts in the field with members of the RMU faculty providing guidance and support.

Degree Objectives

The DMSc Program is committed to the development of advanced Physician Assistants who can:

- Create and disseminate sound, evidence-based, ethical scholarly projects;
- Demonstrate the ability to make significant and relevant contributions to the current body of medical knowledge or application in the discipline;
- Demonstrate oral and written communication skills sufficient to publish and present scholarly work in their field;
- Develop knowledge expertise in the area of practicum and ASP interest;
- Develops skills in clinical, administrative, or education inquiry and data evaluation;
- Enhance leadership abilities, including competence in the roles of clinician, scholar, educator, and leader;
- Describe and distinguish the various theories associated with the concentration area and develop advanced evidence-based practice knowledge.

Definition of entry points

- Master's-prepared PA: A Physician Assistant (PA) who has earned a master's degree awarded by a PA program, a post-graduate master's degree in medical science (e.g., Master of Medical Science), a post-graduate master's degree in health science (e.g., Master of Science in Health Science), a master's degree in public health (e.g., Master of Public Health), or other post-graduate master's degrees of a healthcare emphasis that included comparable coursework as determined by the DMSc program director.
- Bachelor's-prepared PA: A Physician Assistant (PA) who completed a PA program awarding a bachelor's degree. This also includes those who have a post-graduate master's degree in a field not related to healthcare.

Concentration Tracks:

Students are required to select a concentration track prior to their first semester in the DMSc program. Concentration courses provide further knowledge, skills, and abilities specific to clinical practice, healthcare administration, or healthcare education. Concentration tracks include:

- Advanced Clinical Practice

- Healthcare Leadership & Administration
- Healthcare Professions Education
- Psychiatry

If a student in one concentration track desires to complete the concentration courses offered for another concentration track, RMU may offer a post-graduate certificate in that concentration (with the exception of a certificate in the Advanced Clinical Practice track). For example, if a student in the Advanced Clinical Practice track also completed all concentration courses offered for the Healthcare Leadership & Administration concentration track, they may be eligible to also receive a Certificate in Healthcare Leadership & Administration in addition to their DMSc degree. The student would need prior written approval from the program director before working towards an additional post-graduate certificate in a second concentration.

General Program Requirements

1. Complete 36 credits of coursework, as described in the program outline below, for master's-prepared students. For bachelor's-prepared students, 42 credits of coursework total is required, as outlined below.
2. Submit an article (i.e, literature review, critical appraisal, case report) of publishable quality to the program prior to graduating in consultation with a faculty mentor.
3. Complete the applied scholarly project and submit the project to the program in a poster or podium presentation.
4. Up to 9 credits of equivalent coursework may be transferred from master's or doctoral degree program coursework successfully completed at another accredited graduate university, upon approval of the program director. Up to 12 credits of equivalent coursework completed within a different program at RMU may be accepted for completed coursework within the DMSc upon approval of the Program Director.

Admissions requirements

1. Earned a bachelor's or master's degree from a PA program (or equivalent degree as determined by the Program Director) at a regionally accredited institution, or from a foreign university based on a transcript evaluation completed by an agency from the NACES website, www.naces.org.
2. Official transcripts from the physician assistant (PA) program and any institution from which a post-graduate master's or doctoral degree was earned.
3. Proof of unencumbered licensure and/or certification as a physician assistant (PA), or for new graduates, certification or licensure must be obtained during the first semester of the DMSc program.
4. Resume or curriculum vitae detailing education, employment, volunteer service, and scholarly activity.
5. Completed online application.
6. Applicants may be asked to participate in a phone interview.
7. A \$50 non-refundable application fee is required.
8. For admitted students, a \$500 program deposit is required and will be applied to the first semester's tuition.

Program Outline

Course Code & Title		Master's- prepared PAs	Bachelor's- prepared PAs
DMSc Core Courses:			
DMS 610 Evidence Based Practice*		3	3
DMS 614 Professional & Scientific Writing		3	3
HLA 740 Healthcare Delivery		3	3
HLA 700 Healthcare Legal & Ethical Issues		3	3
DMS 504 Research Methods		--	3
One of the following: ACP 730 Population Health Issues -OR- HLA 620 Healthcare Leadership		--	3
DMSc Core Total:		12	18
Applied Scholarly Project Courses:			
ASP 710 ASP I: Project Development & Proposal		3	3
ASP 720 ASP II: Literature Review		3	3
ASP 730 ASP III: Dissemination		3	3
ASP Total:		9	9
Concentration & Practicum Courses (students select 1 track):			
Advanced Clinical Practice Concentration	ACP 710 Lifestyle Medicine	3	3
	ACP 720 Patient Safety in Clinical Practice	3	3
	ACP 730 Population Health Issues	3	3
	DMS 790 Practicum I	3	3
	DMS 795 Practicum II	3	3
Healthcare Leadership & Administration Concentration	HLA 620 Healthcare Leadership	3	3
	HLA 670 Organizational Behavior & Management in Healthcare	3	3
	HLA 680 Strategic Change Management for Healthcare Organizations	3	3
	DMS 790 Practicum I	3	3
	DMS 795 Practicum II	3	3
Healthcare Professions Education Concentration	HPE 760 Instructional Strategies for Healthcare Educators	3	3
	HPE 740 Learning Theory & Design	3	3
	HPE 754 Evidence-Based Assessment in Healthcare Professions Education	3	3
	DMS 790 Practicum I	3	3
	DMS 795 Practicum II	3	3
Psychiatry Concentration	PMH 710 Advanced Neuroscience of Psychiatry	3	3
	PMH 720 Psychiatry Diagnostics & Therapeutics I	3	3
	PMH 730 Psychiatry Diagnostics & Therapeutics II	3	3
	PMH 790 Psychotherapy Practicum I	3	3
	PMH 795 Psychotherapy Practicum II	3	3
Concentration & Practicum Total:		15	15
Total Program Required Credits:		36	42

Program Calendar

Semester	Course	Master's- prepared PAs	Bachelor's- prepared PAs
Semester 1 Winter 2026	DMS 610 Evidence-Based Practice	3	3
	DMS 614 Professional & Scientific Writing	3	3
	HLA 740 Healthcare Delivery	3	3
	Semester Total:	12	12
Semester 2 Summer 2026	HLA 700 Healthcare Legal & Ethical Issues	3	3
	ASP 710 ASP I: Project Development & Proposal	3	3
	Concentration Course	3	3
	Semester Total:	9	9
Semester 3 Fall 2026	ASP 720 ASP II: Literature Review	3	3
	Concentration Course	3	3
	Practicum Course 1	3	3
	Semester Total:	9	9
Semester 4 Winter 2027	ASP 730 ASP III: Dissemination	3	3
	Concentration Course	3	3
	Practicum Course 2		
	Semester Total:	6	6
Additional Courses for bachelor's- prepared PAs: Taken when taught, in addition to DMSc courses listed above.	DMS 504 Research Methods (<i>Fall semester</i>)	--	3
	<i>Student will take one of the following (any semester)*:</i> ACP 730 Population Health Issues -OR- HLA 620 Healthcare Leadership	--	3
	Required for student without PA Master's:	--	6
Total Program Required Credits:		36	42
<i>Four-year deadline for program completion from start date</i>			

*Students in the ACP concentration will take HLA 620. Students in the HLA concentration will take ACP 730. Students in all other concentrations can choose between the two courses.

Concentration Track Courses

Course Sequence/Semester		Course Code & Title	Credits
Advanced Clinical Practice			
Concentration Courses	Winter	ACP 710 Lifestyle Medicine	3
	Fall	ACP 720 Patient Safety in Clinical Practice	3
	Summer	ACP 730 Population Health Issues	3
Practicum Courses	1	DMS 790 Practicum I	3
	2	DMS 795 Practicum II	3
Healthcare Leadership & Administration			
Concentration Courses	Winter	HLA 620 Healthcare Leadership	3
	Summer	HLA 670 Organizational Behavior & Management in Healthcare	3
	Fall	HLA 680 Strategic Change Management for Healthcare Organizations	3
Practicum Courses	1	DMS 790 Practicum I	3
	2	DMS 795 Practicum II	3
Healthcare Professions Education			
Concentration Courses	Any	HPE 740 Learning Theory & Design	3
	Summer & Fall	HPE 754 Evidence-Based Assessment in Healthcare Professions Education	3
	Winter & Summer	HPE 760 Instructional Strategies for Healthcare Educators	3
Practicum Courses	1	DMS 790 Practicum I	3
	2	DMS 795 Practicum II	3
Psychiatry (Concentration courses to be taken in sequence)			
Concentration Courses	1	PMH 710 Advanced Neuroscience of Psychiatry	3
	2	PMH 720 Psychiatry Diagnostics & Therapeutics I	3
	3	PMH 730 Psychiatry Diagnostics & Therapeutics II	3
Practicum Courses	1	PMH 790 Psychotherapy Practicum I	3
	2	PMH 795 Psychotherapy Practicum II	3

Course Descriptions

Doctor of Medical Science Core Courses:

DMS 504 Research Methods (3 credits, Fall)

This course provides an in-depth exploration of research methodologies tailored for bachelor's-prepared Physician Assistants (PAs). Students will explore quantitative, qualitative, and mixed-methods research designs, with a focus on applying these methodologies to clinical practice and healthcare improvement. Students will additionally develop the ability to critically review the medical literature with a focus on the application of evidence-based medicine principles. Key topics include research ethics, hypothesis formulation, data collection and analysis, interpretation, and critical evaluation of statistical and clinical significance on a basic level. Emphasis will be placed on the practical application of research methods in the development of clinical guidelines, protocols, and patient care strategies.

DMS 610 Evidence-Based Practice (3 credits, Winter & Fall)

Serving as a prelude to the applied scholarly project, this course focuses on concepts of evidence-based practice. Specifically, the course covers the foundational principles of research design, epidemiology, biostatistics, and searching the medical literature. Additional focus for the course includes critical evaluation of the literature and synthesis of EBP principles into realistic practice settings.

DMS 614 Professional & Scientific Writing (3 credits, Winter & Fall)

This course reviews PubMed, Index Medicus, other search methodologies, American Medical Association Manual of Style editorial format, the composition of a scientific/professional manuscript, the style of scientific and professional writing, its construction and formats. Students will complete a literature review and a case report during this course, with emphasis placed on professional and scientific writing techniques, as well as proper formatting and citation.

HLA 700 Healthcare Legal & Ethical Issues (3 credits, Winter & Summer)

This course explores the legal and ethical issues and dilemmas in the delivery of healthcare. The principles and practical application of laws and regulations affecting operational decisions of healthcare providers, health plans, and third-party payers are discussed. Also addressed are social, moral, and ethical issues encountered in the balance of patient interests, needs and rights.

HLA 740 Healthcare Delivery (3 credits, Winter & Fall)

This course will train healthcare leaders to implement or teach principles of delivering better healthcare at lower costs through improving clinical and non-clinical processes. This course will introduce methods and tools for conducting quality improvement projects. Also discussed will be methods of health services research, teams and teamwork, outcome measurement, & medical informatics. A key learning experience of this course will be developing and implementing a quality improvement project.

Applied Scholarly Project Courses:

ASP 710 ASP I: Project Development & Proposal (3 credits, Winter & Summer)

During the first half of the semester, students are guided through the project development and proposal process. The latter half of the course is for students to revise and submit a proposal for their project. Approval of the project is accomplished prior to completion of this course. Students are advised to develop a proposal that is a comprehensive and in-depth study of a highly relevant issue encountered as a PA in the clinical, academic, or administrative setting. The expectation is that this project will be accomplished over multiple semesters. *Prerequisites: DMS 610, DMS 614*

ASP 720 ASP II: Literature Review (3 credits, Summer & Fall)

In this course, the approved applied scholarly project is initiated and principles of scientific inquiry will guide the investigation. Students will be searching and gathering available, recent literature and composing several aspects of their comprehensive and in-depth study of a highly relevant issue encountered as a PA in the clinical, academic, or administrative setting. *Prerequisites: DMS 610, DMS 614, ASP 710*

ASP 730 ASP III: Dissemination (3 credits, Winter & Fall)

In this course, students continue the investigation of the literature and composition of the final aspects of the comprehensive and in-depth study of a highly relevant issue encountered as a PA in the clinical, academic, or administrative setting. Students compile their final written product suitable for publication. The final product is compiled from segments of the proposal and project, comprising an extensive, in-depth review of the literature as it pertains to the selected issue. Students will then create an abbreviated version of the project following the submission guidelines of an appropriate peer-reviewed journal. Additionally, students will create a poster presentation that will be submitted for presentation at an appropriate professional conference of the student's choice. *Prerequisites: DMS 610, DMS 614, ASP 710, ASP 720*

Practicum Courses:

DMS 790 Practicum I (3 credits, Summer & Fall)

During this course, students will design and propose a graduate practicum based on clinical practice, healthcare administration, or medical education that they feel will help them gain practical knowledge and skills that may be applied in clinical, administrative, or academic settings. Key topics include the development of learning objectives, the design of learning activities, and the determination of assessment methods. Emphasis will be placed on the enhancement of scientific inquiry proficiency, synthesis of evidence-based practice principles, and achievement of personal and professional growth.

DMS 795 Practicum II (3 credits, Winter & Fall)

During this course, students complete the practicum project developed and approved during the Practicum I course. Students collaborate with their selected mentor and DMSc

faculty as they execute the practicum project. Through the execution of the practicum, students apply specialized knowledge and skills to increase their capabilities and develop as leaders in clinical, administrative, or academic settings. Prior to the end of the semester, students submit a standardized and comprehensive report on the execution and completion of this practicum. *Prerequisite: DMS 790*

PMH 790 Psychotherapy Practicum I **(3 credits, Summer & Fall)**

The focus of this course is Motivational Interviewing (MI) for advanced graduate-level students. Learners will be provided with a comprehensive review of MI as a person-centered therapeutic modality, its clinical application to a wide range of behavioral and psychological conditions involving diverse clinical settings and populations across the life span. Learners will receive access to online therapy supervision asynchronously from a licensed mental health therapist while they complete 500 hours of clinical practice at their current location of employment. Learners will conduct systematic and continuous process and outcome measurements during their practical application of established psychotherapeutic methods and procedures. This course will include proctored case scenarios and real-time audio-visual patient/client interactions to promote mastery of the course material. Learners will receive instructive feedback through evidence-based clinical supervision models that include session recording, transcription, and analysis. *Prerequisite: PMH 710*

PMH 795 Psychotherapy Practicum II **(3 credits, Winter & Fall)**

This course focuses on the “gold-standard” of contemporary psychotherapy practice, Cognitive-Behavior Therapy (CBT), for advanced graduate students. Learners will be guided through a comprehensive review of CBT based on the theoretical models and strategies proposed by CBT pioneers, Aaron and Judith Beck. Learners will receive access to online therapy supervision asynchronously from a licensed mental health therapist while they complete 500 hours of clinical practice at their current location of employment. The learner will expand their proficiency in clinical case formulation and the therapeutic application of CBT in a variety of clinical settings with diverse populations (individuals/families and groups) across the lifespan. This course will incorporate clinical conceptualizations, reflective strategies, practice exercises, interactive videos, and case examples to stimulate learner skill acquisition, fostering needed social, cognitive, behavioral, and affective change in clients/patients. This course will include proctored case scenarios and real-time audio-visual client/patient interactions to promote mastery of the course material. Learners will receive instructive feedback through evidence-based clinical supervision models that include session recording, transcription, and analysis. *Prerequisite: PMH 790*

Concentration Tracks

Advanced Clinical Practice Concentration Track

Students in the Advanced Clinical Practice concentration track will become greater assets to clinic and hospital settings by advancing medical practice. During the DMSc program, students will develop practical skills beyond their current abilities that benefit patients and the settings they work in. PAs who complete this track will add value to their clinics by increasing access to specific procedures for their community of patients.

Advanced Clinical Practice Concentration Course Descriptions:

ACP 710 Lifestyle Medicine (3 credits, Winter)

This course explores the principles and practices of Lifestyle Medicine, with particular focus on the integration of Lifestyle Medicine into PA practice. An in-depth exploration of Lifestyle Medicine occurs, centering around the use of evidence-based lifestyle therapeutic approaches, such as predominantly whole food plant-based diet, exercise, sleep, tobacco cessation and alcohol moderation, stress management, emotional resilience, and other non-drug modalities. Discussion includes the utilization of Lifestyle Medicine to prevent, treat, and even reverse lifestyle-related chronic disease.

ACP 720 Patient Safety in Clinical Practice (3 credits, Fall)

This course provides an introduction to the science of safety and how it relates to problems with patient safety in the healthcare setting. Discussion includes the role of both individuals and the healthcare system in improving patient safety and reducing medical errors. The course reviews institutional responses to adverse events, including the topics of medical malpractice and risk management. The course emphasizes the importance of teamwork and good communication. Students learn models for improving safety in hospitals and other healthcare settings.

ACP 730 Population Health Issues (3 credits, Summer)

This course explores the definition of Population Health and how principles of population health integrate into clinical practice. Topics discussed include attributes and components of the population health paradigm, health promotion, elimination of health disparities, behavior change, continuity of care, information technology, decision making support, and the ethical dimension of population health. The business value of better health from a population health approach is also discussed, with some discussion of the role of health advocacy and assistance programs.

Healthcare Leadership & Administration Concentration Track

Students in the Healthcare Leadership & Administration concentration track will gain knowledge and skills that will prepare them to lead teams and organizations in the rapidly-changing healthcare environment. The DMSc credential will facilitate the advancement of highly-competent PAs into leadership positions to ultimately improve patient care.

Healthcare Leadership & Administration Course Descriptions:

HLA 620 Healthcare Leadership (3 credits, Winter)

Concepts of leadership related to current healthcare organizations are examined. Specific concepts including communications, public relations, team building, negotiation, and conflict resolution are explored. Strategic aspects such as vision, viewpoint admission included. Managing uncertainty is discussed in relation to healthcare organizations. Contemporary leadership challenges, communication strategies and crisis communication are explored. Leadership functions and decision-making are analyzed.

HLA 670 Organizational Behavior & Management in Healthcare (3 credits, Summer)

This course supports knowledge of the theories of organizations, the use of leadership, management processes, and organizational structures and outcomes. Specific topics include governance, strategic management and marketing, human resources management, recruiting, training, process improvement, management theory, and employee wellbeing. This course is designed for future managers and leaders of healthcare organizations and those who expect to have extensive involvement with prospective buyers, insurers, or policymakers. The course provides students with knowledge about how the best healthcare provider organizations deliver high quality, cost-effective healthcare, how they respond to their environment, and how they reach and implement decisions about future activities.

HLA 680 Strategic Change Management for Healthcare Organizations (3 credits, Fall)

This course offers student opportunities to investigate and integrate change management practices to strategically position healthcare organizations for the future. Organization strategic position will be discussed with application to relevant theoretical models, and necessary change management practices resulting in development of organizational adaptability.

related, neurocognitive, and personality disorders will be covered in this course.
Prerequisites: PMH 710, PMH 720