

CURRICULUM VITAE

DONALD GREGORY MATZ

Professor and Chair, Department of Anatomy
Des Moines University – Osteopathic Medical Center
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Education:

<u>School</u>	<u>Dates</u>	<u>Degrees</u>
St. Cloud State University	9/81 - 3/87	B.S., Biology (Physiology Emph.) Cum Laud
St. Cloud State University	9/88 - 5/89	
University of North Dakota	8/89 - 12/94	Ph.D., Anatomy & Cell Biology

Research/Professional Experience:

3/08	Professor, Department of Anatomy, Des Moines University-Osteopathic Medical Center, Des Moines, IA
7/03-	Chair of Anatomy and Director of Body Donor Program, Des Moines University – Osteopathic Medical Center, Des Moines, IA
7/02 -6/03	Interim Chair of Anatomy and Director of Body Donor Program, Des Moines University – Osteopathic Medical Center, Des Moines, IA
8/02-	Adjunct Assistant Professor, Mercy College of Health Sciences, Des Moines, IA
1/97 -5/16	Clinically-Oriented Human Anatomy Course Coordinator, Physician Assistant Program, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA
1/97 -7/02	Immediate Supervisor of Body Donor Program, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA
6/96 - 8/96	Applied Human Anatomy Course Co-Coordinator, Physician Assistant Program, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA
1/96 -4/16	Gross Human Anatomy Course Co-Coordinator, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA
8/16-	Gross Human Anatomy Course Director, Department of Anatomy, Des Moines University – Des Moines, IA
8/10-12/15	Foundational Sciences (DPT)-Anatomy Course Co-Coordinator, Physical Therapy Program and Anatomy Department, Des Moines University, Des Moines, IA
6/96 - 7/96	Gross Anatomy Tutorial Course Coordinator, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA
6/96 -5/16	Supervisor, Anatomy Summer Teaching Assistants, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA

1/02-3/08	Associate Professor, Department of Anatomy, Des Moines <u>University-</u> Osteopathic Medical Center, Des Moines, IA
8/95 -1/02	Assistant Professor, Department of Anatomy, Des Moines University – Osteopathic Medical Center, Des Moines, IA.
1/95 - 6/95	Instructor, Gross Anatomy (Anatomy 513/642), Department of Anatomy and Cell Biology, University of North Dakota, Grand Forks, ND.
8/89 - 12/94	Graduate Teaching Assistant, Department of Anatomy and Cell Biology, University of North Dakota, Grand Forks, ND.
8/94 - 12/94	Course Coordinator for Anatomy 204 Laboratory, Department of Anatomy and Cell Biology, University of North Dakota, Grand Forks, ND.
8/92 - 8/93	Christopher J. Hamre Fellow, Department of Anatomy and Cell Biology, University of North Dakota, Grand Forks, ND.
1/91 - 12/91	Graduate Students' Faculty Representative, Department of Anatomy and Cell Biology, University of North Dakota, Grand Forks, ND.
8/91 - 12/91	Course Coordinator for Anatomy 204 Laboratory, Department of Anatomy and Cell Biology, University of North Dakota, Grand Forks, ND.
9/88 - 5/89	Graduate Teaching Assistant, Department of Biological Sciences, St. Cloud State University, St. Cloud, MN.

Competitive Funding History:

6/05-8/06	\$3,640, Iowa Osteopathic Education Resources No. 112-1742-50000. “MRI of the Foot and Ankle Made Simple”
10/96 – 6/99	\$20,000, Iowa Osteopathic Educational Fund Account No. 145-1594- 41560: “Characterization of Growth Factors, Heat Shock Proteins and Genes Involved in Regeneration of Newt Cardiac Myocardium”.
03/03 – 03/04	\$2,989, Iowa Osteopathic Educational Fund, “Center for Learning of the Structural Sciences” with Dr. Craig Canby.

Research/Academic Honors and Awards:

Christopher J. Hamre Fellowship (University of North Dakota)
 Physician Assistant Program, Class of 1998, Pre-Clinical Faculty Teaching Award
 Physician Assistant Program, Class of 1999, Pre-Clinical Faculty Teaching Award
 Iowa Podiatric Medical Students’ Association, Class of 2002, Basic Science Outstanding
 Teaching Award
 Physician Assistant Program, Class of 2001, Pre-Clinical Faculty Teaching Award
 Iowa Podiatric Medical Students’s Association, Class of 2004, Basic Science Outstanding
 Teaching Award
 College of Osteopathic Medicine and Surgery, D.O. Class of 2004 Basic Science
 Teaching Award
 Physician Assistant Program, Class of 2004, Pre-Clinical Faculty Teaching Award
 Physician Assistant Program, Class of 2005, Pre-Clinical Faculty Teaching Award
 Nominated for the Northrup Educator of the Year Award at the Student Osteopathic
 Medical Association National Convention, Spring 2006
 Mercy College of Health Sciences, Adjunct Faculty Excellence Award, 2005-2006

Des Moines University Summer Professional Medical Institute Service and Support
Award, June 16, 2006

Physician Assistant Program, Class of 2006, Pre-Clinical Faculty Teaching Award
Invited Speaker at the Commencement for the Master's Degree Physician Assistant
Program at Des Moines University's Graduation Ceremony, Class of 2007,
August 18, 2007

Physician Assistant Program, Class of 2008, Pre-Clinical Faculty Teaching Award

Physician Assistant Program, Class of 2011, Pre-Clinical Faculty Teaching Award

College of Osteopathic Medicine Dean's Award for Teaching Excellence 2012 and 2024

Physician Assistant Program, Class of 2013, Pre-Clinical Faculty Teaching Award

Physician Assistant Program, Class of 2016, Pre-Clinical Faculty Teaching Award

Iowa Podiatric Medical Student's Association, Class of 2019, Basic Science Outstanding
Teaching Award

College of Osteopathic Medicine Dean's Award for Teaching Excellence
2024

Scientific Research Techniques:

Cell Culture

Small Animal Handling and Surgery

Histological Preparation

Paraffin embedding and sectioning of tissues

Lowacryl and Epon embedding of tissues

Ultramicrotome sectioning (Thick and Thin sectioning)

General Histological staining

Cryostat tissue preparation and sectioning

Immunostaining for Dark-field and Light Microscopy

Immunogold staining for Ultrastructural Characterizations

Scanning and Transmission Electron Microscopy Preparation

Darkroom Techniques

Photograph and Slide Preparation

Teaching Experiences:

St. Cloud State University

Biol 104 (Human Biology Laboratory)

Biol 201 (General Biology Laboratory)

University of North Dakota

Anatomy 204 (Anatomy Laboratory)

Anatomy 513 (642 (Gross Anatomy)

Anatomy 522/662 (Neuroscience)

Des Moines University – Osteopathic Medical Center

Anatomy 11101/12101 (Gross Anatomy)

Anatomy 11106/12106 (Basic Histology)

Anatomy 22206 (Lower Limb Anatomy)

Anatomy 13101 (Clinically-Oriented Human Anatomy for Physician Assistants)
 Anatomy 11114/12114 (Neuroanatomy)
 PTFS 1650 (Foundational Sciences-Anatomy, DPT program)
 Oste2134 (Introduction to Clinical Problem Solving I)
 DHM 657 (Survey of Human Health and Disease)
 SYST*2201 (DPM: Cardio/Respiratory System, Heart and Great Vessels)
 SYST*2211 (DPM GI System, Anatomy of the GI, Renal)
 SYST*2105 (DO Renal System, Overview of Anatomy and Histology of the Urinary)
 PA Respiratory Module (Pulmonary Circulation)
 Anatomy Laboratory Manuals Authored or Co-Authored
 Online DO/DPM/MSA/DPT Gross Anatomy Laboratory Dissection Guide
 Online PA Clinically-Oriented Anatomy Laboratory Dissection Guide
 CPMS Lower Limb Anatomy Lecture Manual
 DO/DPM/MSA Narrated Powerpoint Neuroanatomy Laboratory Exercises and Guide

Mercy College of Health Sciences

Bio 133 (Health Science Anatomy)
 Bio 410 (Advanced Human Anatomy)

Service

Des Moines University – Osteopathic Medical Center

2021-	Educational Resources and Technology Committee
2016-2021	Facilities Committee
2015	Ultrasound Task Force
2014-2018	Professional Integrity Committee
2013	Faculty Welfare Committee
2012	Faculty Teaching Workload Taskforce
2010-2012	HLC Accreditation, Criterion 5, Co-Chair
2009	Ad Hoc Committee for Conflict of Interest
2011-2012	Ad Hoc Committee for Secretarial Pool
2008- 2012	Bylaws Committee, Chair
2005-2007	Faculty Student Forum
2003-2006	Bylaws Committee, Chair
2002-2003	Presidential Interview Committee
2002-2003	University Faculty President
2001-2002, 2003-2006, 2008-2012	Bylaws Committee
2001-2002	University Faculty Organization Vice President
2000-2001	University Faculty Organization Secretary/Treasurer
1999-2001	Chairperson, Research and Grants Committee
1998-2001	Research and Grants Committee
1999-2000, 2008	Nominating Committee
1998-	University Records Management Committee
1998-	Seminar speaker of DMU -OMC Body Donor Program
1997-	Faculty advisor of Anatomy Club
1996 - 1998	Chair, Faculty Student Forum
1996 - 2006	Representative of DMU - OMC. at Iowa State Fair Booth

1995 - Co-coordinator of campus tours and demonstrations of anatomical specimens

College of Biomedical Sciences

1996 - 1997 Strategic Planning Committee

College of Osteopathic Medicine

2022- COM Curriculum Committee
2016-2019 Academic Performance Committee
2014-2016 Academic Performance Committee, Chair
2013-2014 Student Promotion and Evaluation Committee, Chair
2012-2013 Student Promotion and Evaluation Committee
2011, 2013 Nominating Committee
2008- Gold Humanism Award Selection Committee
2008-2010 COM Curriculum, Chair
2006-2010 COM Curriculum
2003-2005 COM Nominating Committee, Chair
2000-2004 C.O.M.S. Curriculum Committee
1999 - 2000 Mock Oral Examination – PGY₂-PGY₅
1997 -1999 C.O.M.S. Appeals Committee
1996 - Academic Advisor (10-12 students from 1st and 2nd year classes)
1996 - 1997 Secretary, Faculty Welfare Committee

College of Podiatric Medicine and Surgery

1999 - C.P.M.S Curriculum Committee

College of Health Sciences

2010 Committee to Research the Implementation of an Occupational Therapist Program
2007 Search Committee for Director of Physician's Assistant Program
2007-2008, 2010-2014 Student Promotion and Evaluations Committee
2004-2005 Student Promotion and Evaluations Committee
2001 Physical Therapy Faculty Search Committee
2001-2004 Member of Advisory Board for Masters Degree in the Physician's Assistant Program and a Grant from Health Educational Programs for Rural Areas
2001-2004 Member of Advisory Board for Doctorate in Physical Therapy
1998-2003 Chair, Student Promotion and Evaluations Committee
1996 - 1998 Curriculum Committee

Department of Anatomy

2003- Director of Body Donor Program
2002 - 2003 Interim director of Body Donor Program
1996 - 2006 Anatomy Student Advisor to DO/DPM Gross Anatomy students

1996- 2002	Assistant Supervisor of Body Donor Program
1995 - 2002	Chair, Faculty Development Committee
1995 - 2002	Chair, Good and Welfare Committee
1995 - 2002	Scholarly Activity Committee
1995 - 2002	Community Liaison Committee

Professional Society Membership:

American Association of Anatomists
Sigma XI

Publications:

Peer Reviewed Journal Articles

Gary Lienhart D.O., Donald Matz, PhD. (2021) Des Moines University Cadaveric study tracking dye spread after cervical erector spinae block with low volumes for potential treatment of a variety of chronic neck pain conditions in the outpatient setting. Completed in 2021 and currently working on publication: Low Volume Cadaveric Cervical Erector Spinae Injection and Dissection to the Cervical Nerve Roots.

Matz, D. G., J. O. Oberpriller and J. C. Oberpriller. (1998) Comparison of Mitosis in Binucleated and Mononucleated Newt Cardiac Myocytes. The Anatomical Record, 251:245-255.

Published Abstracts:

Jessica Hensley, Donald Matz, Ph.D. Semilunar-like Valve over the Ostium of the Right Coronary Artery. Poster presentation at American Association of Anatomy, Anatomy Connected (March 25, 2023), Washington DC.

Laura Rudberg-Post, Olivia Matz MSA, Hannah Gustafson MSA, MSBS, Donald Matz Ph.D. Superficial Approach to the Sphenopalatine (Pterygopalatine) Ganglion, Emphasizing Relevance to Osteopathic Manipulation. Des Moines University Research Symposium (Dec 1, 2022), American Academy of Osteopathic International Convocation (March 16, 2023), 2023 AOCOO-HNS (American Osteopathic College of Otolaryngology and Ophthalmology- Head and Neck Surgery) Annual Clinical Assembly (April 26, 2023)

Nick Melott, Morgan Schlee, Truman Perry, Gary Lienhart DO., Donald Matz PhD. Spread of injectant in a cadaveric suprascapular nerve injection. 2022 Des Moines University Research Symposium

Dr. James Mahoney, Noreen Anwar, DPM '17, Morgan Mack, DPM '16, Dr. Donald Matz, Dr. Simon Geletta. Scientific poster titled, "Using Sheet Plastination Models to Enhance Podiatric Students Understanding of Cross-sectional Relationships in the Lower Extremities." Presented at the 2014 Des Moines University Research Symposium.

C. Canby, K. Hisley, G. Kolbinger, C. Stanton, V. Vardaxis, D. Matz, and M. Khan. Real-time interactive fusion of physical/electronic auscultation simulation and 3D CT/MRI-based anatomical modeling applied to training in lung sounds detection, discrimination and classification. **The FASEB Journal**, 2008, Abstract # 769.11

M.A. Khan, D.G. Matz, C.A. Canby, W.J. Dyche, and K.C. Hisley. An advanced anatomy dissection lab environment combining physical dissection with digital dissector and real-time video display. *The FASEB Journal*, 2008, Abstract # 385.1. Invited Platform Presentation.

PS Lacy, W Dyche, DG Matz, (2006) Unannounced quizzes improve performance on neuroanatomy course. *The FASEB Journal* 20(4), p. A434.

M Khan, DG Matz. (2006) Absence of left coronary artery in a cadaveric heart. *The FASEB Journal* 20(4), p A445.

S Vadivelu, EP Finnerty, K Reed, S Mori, WT Thack and DG Matz. (2005) Assymetric Three-Dimensional Morphology of Dentate White Matter Pathways. *The FASEB Journal* 19(4): A487.4

Canby, CA, DG Matz, and MA Khan. (2005) Incidence of a duplicated inferior vena cava. *The FASEB Journal* 19(4): A198.6

Khan, MA, DG Matz, and C Canby. (2005) Dorsalis pedis artery: variations in branching patterns. *The FASEB Journal* 19(4): A198.5

Canby, Craig and Donald Matz. (2004) Center for Learning Advancement of the Structural Sciences (CLASS), The FASEB Journal, Abstract 300.12.

Matz, Donald, Craig Canby and Makhdoom Khan. (2004) Incidence of Retroesophageal Right Subclavian Artery Occurs Less Frequently than Published Results, The FASEB Journal, Abstract 313.2.

Khan, Makhdoom, Donald Matz and Craig Canby. (2004) Variations of Axillary Artery Branching Pattern, The FASEB Journal, Abstract 313.1.

Matz, Donald Gregory. (2003) A Living Anatomy Laboratory Further Integrates a Traditional Anatomy Course with a Clinical Profession. The FASEB Journal, Abstract 35.18: T18

Matz, Jeannine M. and Donald G. Matz (2003). No Significant Difference Between Grant-Aided and Traditional Nursing Student Performance in the Basic Sciences. The FASEB Journal. 534.9:T83

Matz, Donald Gregory. (2001) Utilization of the Internet and Cross-Sectional Anatomy Online to Educate Students During Their Clinical Rotations. The FASEB Journal, 15 (5): A721.

Matz, D. G., J. O. Oberpriller and JC. Oberpriller. (1992) Characterization of the Cytoskeleton of the Dividing Newt Cardiac Centriculomyocyte. Anat Rec., 232: 57A.

Matz, D. G., J. O. Oberpriller and J. C. Oberpriller. (1994) The Cytoskeleton in the Cultured Newt Ventriculomyocyte. The FASEB Journal, 89 (5): A260.

Matz, D. G. J. O. Oberpriller and J. C. Oberpriller. (1995) Mitosis in the Cultured Newt Ventricular Myocyte. The FASEB Journal, 9 (4): A828.

Book Chapters:

Oberpriller, J. O., J. C. Oberpriller, D. G. Matz and M. H. Soonpaa. (1994) Stimulation of Proliferative Events in the Adult Amphibian Cardiac Myocyte. IN: *Cardiac Growth and Regeneration*. Annals of the New York Academy of Sciences, 752: 30-46.

AACPM Council of Faculties, Curricular Guide for Podiatric Medical Education. Member of Authoring group from its inception in 2009 and currently editing the 2022 edition. Website of the 2020 edition: <https://aacpm.org/wp-content/uploads/2020-AACPM-Curricular-Guide-4.pdf>

Invited Presentations:

Donald Matz, Ph.D. The Answer is in the Anatomy: The Anatomy Department's Relationship with the Department of Osteopathic Clinical Medicine. Osteopathic Foundations at the Des Moines University, College of Osteopathic Medicine Faculty Meeting. March 10, 2022

Donald Matz, Ph.D. Lower Extremity Radiology. American Club of Podiatric Medicine, Des Moines University Chapter, November 16, 2021

David A Plundo, DO, MPH, FACP; Terri L Plundo, DO, FACP, Donald Matz, Ph.D; Incorporating Basic Sciences into Residency Curriculum Using an Inter-professional Grand Rounds Format. The 7th International Conference on Inter-professional Practice and Education, Pittsburgh, PA, June 7, 2014

Des Moines University Grand Round Presentations

Petersen, Shannon, Jose Figueroa, and Donald Matz, DIFFERENTIAL DIAGNOSIS; LOWER BACK PAIN AND LEG PAIN, September 7, 2023

Benzoni, Thomas; Matz, Donald; Minikus, Amy. MEDICAL MYSTERY; TRUST THE FACTS, February 23, 2023

Haas, Hilary, Anna Johnson, and Donald Matz. THE ANSWER IS IN THE ANATOMY: HOW OMM ALTERED THE COURSE OF RECOVERY FROM RECURRENT SUBDURAL HEMORRHAGES, March 7, 2019

Ripley, Brett, Drew Lewis, Shannon Petersen, and Donald Matz. PAIN IN THE NECK, October 4, 2018

Benzoni, Thomas, Sarah Clayton, Donald Matz, Noreen O'Shea, Julie Ronnebaum, and Sean Van Aken. WHY SIM IS DANGEROUS: WHEN A MEDICAL STUDENT DEVELOPS CHEST PAIN, November 2, 2017

Brown, Michelle, Vassilios Vardaxis, and Donald Matz. WHERE IS PHYSICAL THERAPY IN THE MANAGEMENT OF A PATIENT POST TOTAL HIP ARTHROPLASTY?, March 2, 2017

Feilmeier, Mindi, Paul Dayton, Laura Covill, and Donald Matz. THE CRUX OF ANKLE STABILITY: BONE OR SOFT TISSUE, February 2, 2017

Aoki, Teresa, Craig Clark, and Donald Matz. A TIMELY CASE OF SHORTNESS OF BREATH, November 5, 2015

Rand, Joel and Donald Matz. AN ASYMMETRICAL SITUATION: BELL'S PALSY, October 1, 2015

Ripley, Bret, Donald Matz, and Shane McClinton. LOW BACK PAIN: THE PRIMARY CARE DOCTOR'S SCOURGE, September 3, 2015.

Figueroa, Jose and Donald Matz. PATIENT WITH PARSONAGE TURNER SYNDROME'S RESPONSE TO OMM, May 7, 2015

O'Shea, Noreen, Michelle Brown, and Donald Matz. HIP PAIN IN A YOUNG ADULT, March 5, 2015

Robel, Juanita, Julie Ronnebaum and Donald Matz. MENDED HEART, December 4, 2014

Ripley, Bret, Shannon Petersen, and Donald Matz. PAIN IN THE NECK, November 6, 2014

Green, Thomas, Drew Lewis, and Donald Matz. HEAD INJURY REHABILITATION, September 4, 2014

Malcom, Mary, Roberta Baldus and Donald Matz. UPPER EXTREMITY TRAUMA, May 1, 2022.

Feilmeier, Mindi, Donald Matz, and Juanita Robel. VENOUS STASIS ULCERATION: IT'S NOT JUST SWELLING ANYMORE, April 3, 2014

Figueroa, Joe and Donald Matz. ADULT MALE WITH CHRONIC PELVIC PAIN, February 6, 2014

Baldus, Roberta, Elizabeth Trausch, and Donald Matz. "MY PARTNER MADE ME COME HERE", ADULT MALE WITH CHRONIC FECAL INCONTINENCE. December 5, 2013

Ripley, Bret, Donald Matz, and Shane McClinton. LOW BACK PAIN: THE PRIMARY CARE DOCTOR'S SCOURGE, November 7, 2013

Shah, Yogesh, Laura Covill, and Matz, Donald. UPPER BACK & VERTEBRAE: 60 YEAR OLD MALE WITH ACL DEFICIENT KNEE, October 3, 2013

Means, Jeffrey, Donald Matz, Teri Plundo, and Traci Bush. MULTIDISCIPLINARY CASE STUDY: FEMALE IN EARLY 30'S PRESENTS WITH PANIC ATTACKS, September 5, 2013

Matz, Donald. (1992) Immunofluorescent Localizations in the Newt Heart. 9th Annual UND/UM Anatomy Exchange Day.

Matz, Donald. (1998) Regenerative Capabilities of Cardiac Muscle in *Notophthalmus viridescens*. Drake - UOMHS Lecture Series.

Matz, Donald and C.J. Carlson. (Four presentations in March and May of 1998) The Body Donor Program at the University of Osteopathic Medicine and Health Sciences. Veterans Administration Medical Center (VMAC), Knoxville and Des Moines, IA.

Matz, Donald and CJ Carlson. (January 27, 1999) The Body Donor Program at the University of Osteopathic Medicine and Health Sciences. Rights and Choices You Need to Know at the Osceola Senior Center, Osceola, IA

Matz, Donald and C.J. Carlson. (Three presentations, June 2, 1999) The Body Donor Program at the University of Osteopathic Medicine and Health Sciences. Coronary Intensive Care Unit, Iowa Lutheran Hospital, Des Moines, IA.

Matz, Donald and C.J. Carlson. (October 1, 1999) The Body Donor Program at the University of Osteopathic Medicine and Health Sciences. Health Care Managers at the Health Education Center, Fort Dodge, IA.

Matz, Donald, Craig Canby and Makhdoom Khan. (2004) Incidence of Retroesophageal Right Subclavian Artery Occurs Less Frequently than Published Results, April 17, 2004 at the American Association of Veterinarian Anatomists' Poster and Discussion Session at Experimental Biology '04 in Washington DC.