CHRISTOPHER KUENZE PHD, ATC

CONTACT INFORMATION

Michigan State University School of Education Department of Kinesiology 308 W. Circle Drive, Room 105C East Lansing, MI 48824

Phone: (517) 432-5018 Email: kuenzech@msu.edu

EDUCATION

University of Virginia, Charlottesville, VA

Doctor of Philosophy, 2013 Curry School of Education

Department of Human Services, Kinesiology Program Area

Dissertation: Lower Extremity Function in Active Individuals following ACL Reconstruction

University of North Carolina, Chapel Hill, NC

Master of Arts: August, 2009

Department of Exercise and Sports Science

Program: Athletic Training

Thesis: The Effects of Functional Ankle Instability and Induced Fatigue on Ankle Stiffness

Boston University, Boston, MA Bachelor of Science: May, 2007

Sargent College of Health and Rehabilitation, Department of Athletic Training

Major: Athletic Training

College of Arts and Science, Department of Biology

Minor: Biology

WORK EXPERIENCE

Michigan State University, 2015-present Assistant Professor Director of the Sports Medicine Research Laboratory Graduate Program Director School of Education Department of Kinesiology

University of Miami, 2013-2015 Assistant Professor School of Education and Human Development Department of Exercise and Sport Sciences Sports Medicine and Athletic Training Division

University of Virginia, 2009-2013 Research Assistant Department of Orthopaedics Sports Medicine Division

University of North Carolina Chapel Hill, 2007-2009 Graduate Assistant Athletic Trainer Department of Exercise and Sports Science

TEACHING EXPERIENCE

Michigan State University

Assistant Professor

Fall 2015

KIN 125: First Aid and Personal Safety (Instructor of Record)

KIN 320: Pathology of Sports Injury

University of Miami

Assistant Professor

Spring 2015

KIN 615: Evidence Based Medicine in Sports Medicine

KIN 415: Evidence Based Medicine in Sports Medicine

KIN 345: Kinesiology

Fall 2014

KIN 470: Administrative Aspects of Athletic Training

KIN 455: Athletic Training Clinical Laboratory III

KIN 234: Functional Human Anatomy

KIN 184: Athletic Sports Injuries

Summer 2014

KIN 184: Athletic Sports Injuries

Spring 2014

KIN 615: Evidence Based Medicine in Sports Medicine

KIN 415: Evidence Based Medicine in Sports Medicine

Fall 2013

KIN 234: Functional Anatomy

KIN 455: Athletic Training Clinical Laboratory III

University of Virginia

Teaching Assistant

Spring 2013

EDHS 3640: Biomechanics and Motor Control of Human Movement

EDHS 8999: Masters Thesis Seminar

Fall 2012

EDHS 3000: Human Anatomy

EDHS 8999: Masters Thesis Seminar

Spring 2012

EDHS 3640: Neuromuscular Basis of Human Movement

EDHS 8999: Masters Thesis Seminar

Spring 2011

EDHS 8410: Orthopaedic Basis of Athletic Training

EDHS 8999: Masters Thesis Seminar

Fall 2010

EDHS 8999: Masters Thesis Seminar

Shenandoah University

Co-Instructor *Summer 2011*

AT663: Clinical Research I

University of North Carolina Chapel Hill

Instructor

Spring 2009

PHYA 206: Beginning Golf

Fall 2008

LFIT 104: Exercise and Conditioning

Spring 2008

LFIT 109: Racquet Sports, Spring 2008

Fall 2007

LFIT 109: Racquet Sports, Fall 2007

PUBLISHED MANUSCRIPTS IN REFEREED JOURNALS

- 1. Ni M, Signorile JF, Mooney K, Balachandran A, Potiaumpai M, Luca C, Moore JG, Kuenze CM, Eltoukhy M, Perry AC. Comparative Impact of Power Training and High-Speed Yoga on Motor Function in Older Patients with Parkinson's Disease. *Arch Phys Med Rehabil*. PMID: 26546987. Impact Factor: 2.565 (EPUB)
- 2. Eltoukhy M, Jun HP, Kelly A, Campbell R, Kim CY, **Kuenze CM**. Validation of the Microsoft Kinect camera system for measurement of lower extremity landing and squatting kinematics. *Sports Biomech*. Impact Factor: 1.154 (IN PRESS)
- 3. **Kuenze CM**, Eltouhky M, Thomas A, Sutherlin M, Hart JM. Validity of torque data collection at multiple sites: a framework for collaboration on clinical outcomes research in sports medicine. *J Sport Rehabil*. PMID: 26308985. Impact Factor: 1.267 (EPUB)
- 4. Eltouhky M, **Kuenze C.** Moving Toward Clinic-Based Motion Analysis: Kinect® Camera as an Example. *Sports and Exercise Medicine Journal*. (EPUB)
- 5. Eltouhky M, **Kuenze C**, Hyung-Pil J, Asfour S, Travascio F. Assessment of Dynamic Balance via Measurement of Lower Extremities Tortuosity. *Sports Biomech*. Mar; 14(1): 18-27. PMID: 25895607. Impact Factor: 1.154
- 6. Goetschius J, **Kuenze CM**, Hart JM. Knee Extension Torque Variability and Exercise in ACL Reconstructed Knees. *J Ortho Res*. 2015 Aug: 33(8): 1165-70. PMID: 25994515. Impact Factor: 2.986
- 7. **Kuenze CM**, Foot N, Saliba S, Hart JM. Drop landing performance and knee extension strength following ACL reconstruction. *J Athl Train*. Jun; 50(6): 596-602. PMID: 25978101. Impact Factor: 2.017
- 8. **Kuenze CM**, Hertel J, Weltman A, Diduch DR, Saliba SA, Hart JM. Persistent Neuromuscular and Corticomotor Quadriceps Asymmetry after Anterior Cruciate Ligament Reconstruction. *J Athl Train* Mar; 50(3): 303-12.. PMID: 25622244. Impact Factor: 2.017
- 9. **Kuenze CM**, Hertel J, Saliba SA, Diduch DR, Weltman AR, Hart JM. Clinical thresholds for quadriceps assessment following ACL reconstruction. *J Sport Rehabil*. 2015 Feb; 24(1): 36-46. PMID: 25203517. Impact Factor: 1.267
- 10. **Kuenze CM**, Hertel J, Hart JM. Quadriceps Muscle Function following Exercise in Males and Females with a History of ACL Reconstruction. *J Athl Train*. 2014 Nov-Dec; 49(6): 740-6. PMID: 25243735. Impact Factor: 2.017
- 11. Hart JM, **Kuenze CM**, Diduch DR, Ingersoll CM. Quadriceps Function after Rehabilitation with Cryotherapy in Patients with ACL Reconstruction. *J Athl Training*. Nov-Dec; 49(6): 733-9. PMID: 25299442. Impact Factor: 2.017
- 12. **Kuenze CM**, Hertel J, Weltman A, Diduch DR, Saliba S, Hart JM. Jogging Biomechanics After Exercise in Individuals with ACL Reconstructed Knees. *Med Sci Sports Exerc*. 2014 June; 46(6): 1067-76. PMID: 24247199; Impact Factor: 4.431
- 13. Norte GE, **Kuenze CM**, Hart JM. Closed Chain Assessment of Quadriceps Activation Using the Superimposed Burst Technique. *J Electromyogr Kines*. 2014 June; 24(3): 341-47. PMID: 24731724; Impact Factor: 1.647
- Tompkins M, Kuenze CM, Diduch DR, Miller M, Milewski M, Hart JM. Clinical and Functional Outcomes Following Primary Repair versus Reconstruction of the Medial Patellofemoral Ligament for Recurrent Patellar Instability. *J Sports Med*. 2014 March. PMID: 26464893

- 15. **Kuenze CM**, Hertel J, Hart JM. Effects of exercise on lower extremity muscle function following ACL reconstruction. *J Sport Rehabil*. 2013 February; 22(1): 33-40. PMID: 23307572; Impact Factor: 1.267
- Goetschius J, Kuenze CM, Saliba SA, Hart JM. Reposition Acuity and Postural Control After Exercise in ACL Reconstructed Knees. *Med Sci Sports Exerc*. 2013 December; 45(12): 2314-21. PMID: 24240119; Impact Factor: 4.431
- 17. Hart JM, **Kuenze CM**, Pietrosimone BG, Ingersoll CD. Quadriceps function in anterior cruciate ligament-deficient knees exercising with transcutaneous electrical nerve stimulation and cryotherapy: a randomized controlled study. *Clin Rehabil*. 2012 November; 26(11): 974-981. PMID: 22399575; Impact Factor: 2.239
- 18. Roberts D, **Kuenze CM**, Saliba S, Hart JM. Accessory activation during the superimposed burst technique. *J Electromyogr Kines*. 2012 August; 22(4): 540-5. PMID: 22321959; Impact Factor: 1.64 7
- 19. Stern A, **Kuenze CM**, Herman DC, Sauer LK, Hart JM. A gender comparision of central and peripheral neuromuscular function after exercise. *J Sport Rehabil*. 2012 August; 21(3): 209-217. PMID: 22234944; Impact Factor: 1.267
- 20. Cross KM, **Kuenze CM**, Grindstaff TL, Hertel J. Does thoracic manipulation improve pain and function in patients with mechanical neck pain: a systematic review. *J Orthop Sport Phys.* 2011 September, 41(9): 633-643. PMID: 21885904; Impact Factor: 3.011
- 21. **Kuenze CM**, Zinder S, Blackburn JT, Norcross MF. The effects of chronic ankle instability and induced fatigue on ankle stiffness. *Athletic Training and Sports Health Care*. 2011 September, 3(5): 211-217.
- 22. **Kuenze CM**, Hart JM. Cryotherapy to treat persistent muscle weakness after joint injury. *The Phys Sportsmed*. 2010 October; 38(3): 38-44. PMID: 20959694; Impact Factor: 1.085

PUBLISHED BOOK CHAPTERS

- 1. Hart JM, **Kuenze CM**. Sports Knee Rating Systems and Related Statistics. In: Insall JN & Scott WN. Surgery of the Knee. Churchill Livingstone, Inc., New York, NY. 2011.
- 2. Hart JM, **Kuenze CM**, Ingersoll CD. Weightlifting. In: O'Connor FG, Casa DJ, Sallis RE, Wilder RP, St. Pierre P, eds., ACSM's Sports Medicine: A Comprehensive Review. McGraw-Hill; 2010.

ACCEPTED REFEREED ABSTRACTS

- 1. **Kuenze CM**, Hertel J, Weltman A, Diduch DR, Saliba SA, Hart JM. Temporo-spatial asymmetry in Individuals with a History of ACL Reconstruction. THEMATIC POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Saint Louis, MO. June 2015.
- 2. Jun H, **Kuenze C**, Eltoukhy M, Lee SY, Kim CY, Harriell K, Signorile J. Immediate Effects of Therapeutic Tapings in Individuals with Patellofemoral Pain during Functional Task Performance. POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Saint Louis, MO. June 2015.
- 3. **Kuenze CM**, Tourville TM, Hart JM. Mitigating the Impact of Muscle Dysfunction on Joint Health and Physical Activity after Knee Injury. SYMPOSIUM PRESENTATION. The American College of Sports Medicine Annual Meeting. San Diego, CA. June 2015.
- 4. **Kuenze** C, Jun HP, Kim CY, Kelly A, Eltouhky M. Impact of a 2 Week Quadriceps Strengthening Program on Response to Fatigue following ACL Reconstruction. ORAL PRESENTATION. The American College of Sports Medicine Annual Meeting. San Diego, CA. June 2015.

- 5. Gribbin T, Slater L, Herb C, **Kuenze** C. Chapman R, Hertel J, Hart JM. Differences in Hip-Knee Joint Coupling During Gait After ACL Reconstruction. THEMATIC POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. San Diego, CA. June 2015.
- 6. Eltouhky M, Wagener G, Ordille A, Drozdowicz K, Epstein C, **Kuenze C**, Signorile JF. Effect of Individualized High-Velocity Resistance Training on Balance Performance in Children with Cerebral Palsy. POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. San Diego, CA. June 2015.
- 7. Jun HP, Travascio F, Eltoukhy M, **Kuenze C**, Asfour S, Signorile JF. Fluoroscopic Video Imaging as a Clinical Tool for Assessing Patellar Maltracking. POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. San Diego, CA. June 2015.
- 8. Rendos NK, **Kuenze** C, Eltoukhy M, Travascio F, Jun HP, Asfour S, Signorile JF. Tortuosity as a Novel Assessment Tool of Dynamic Balance. THEMATIC POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. San Diego, CA. June 2015.
- 9. **Kuenze CM**, Hertel J, Weltman A, Diduch DR, Saliba SA, Hart JM. Jogging Biomechanics in Individuals with ACL Reconstructed Knees. DOCTORAL AWARDS POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Indianapolis, IN. June 2014.
- 10. Foot N, **Kuenze CM**, Saliba SA, Hart JM. The Relationship between Drop Landing Performance and Knee Extension Torque following ACL Reconstruction. MASTERS AWARDS PODIUM PRESENTATION. National Athletic Trainer's Association Annual Meeting. Indianapolis, IN. June 2014.
- 11. Mitha Z, Norte GE, **Kuenze CM**, Read K, Handsfield G, Blemker S, Hertel J, Hart JM. Lower Extremity Muscle Volumes in ACL Deficient Patients. POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Indianapolis, IN. June 2014.
- 12. Norte GE, Mitha Z, **Kuenze CM**, Read K, Handsfield G, Blemker S, Hertel J, Hart JM. Thigh Muscle Volume in Relation to Knee Extensor Torque, Quadriceps Central Activation Ratio, and Patient Reported Outcomes following ACL Rupture. POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Indianapolis, IN. June 2014.
- 13. **Kuenze CM**, Hertel J, Weltman A, Diduch DR, Saliba SA, Hart JM. Neuromuscular Symmetry following Return to Activity in Individuals with a History of ACL Reconstruction. POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. Orlando, FL. May 2014.
- 14. Goetschius J, Kuenze CM, Hart JM. Knee Extensor Torque Variability after Exercise in Patients with a History of ACL Reconstruction. MASTERS AWARDS ORAL PRESENTATION. The American College of Sports Medicine Annual Meeting. Orlando, FL. May 2014.
- 15. Jun H, Harriell K, **Kuenze CM**, Signorile JF, Whole Body Vibration Effect on Time-to-Boundary Measures in Persons with Chronic Ankle Instability. POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. Orlando, FL. May 2014.
- 16. Werner BC, **Kuenze CM**, Griffin JW, Matthew LL, Garrett C, Hart JM, Brockmeier SF. Validation of an Innovative Measurement Method of Shoulder Range of Motion. POSTER PRESENTATION. American Academy of Orthopaedic Sugeons Annual Meeting. New Orleans, LA. March 2014.
- 17. Goerger B, **Kuenze CM**. Biomechanical Outcomes of ACLR: Strategies for Improving Rehabilitation. PODIUM PRESENTATION. Southeastern Athletic Trainers Association Annual Meeting. Atlanta, GA. February 2014.
- 18. Werner BC, **Kuenze CM**, Griffin JW, Matthew LL, Hart JM, Brockmeier SF. Shoulder Range of Motion: Validation of an Innovative Measurement Method using a Smartphone. PODIUM PRESENTATION. American Orthopaedic Society for Sports Medicine Annual Meeting. Chicago, IL. July 2013.

- 19. **Kuenze CM**, Hertel J, Hart JM. Gender Differences in Lower Extremity Neuromuscular Function Following 30 Minutes of Sub-Maximal Exercise in ACL Reconstructed Individuals. THEMATIC POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Las Vegas, NV. June 2013.
- Goetschius J, Kuenze CM, Saliba SA, Hart JM. Unipedal Postural Control After Exercise in Individuals with ACL Reconstructed Knees. THEMATIC POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Las Vegas, NV. June 2013.
- 21. Norte GE, **Kuenze CM**, Hart JM, Assessment of Quadriceps Activation via Burst Superimposed in a Closed Chain Position: A Novel Approach. POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. Las Vegas, NV. June 2013.
- 22. **Kuenze** C, Diduch DR, Blemker S, Gaskin C, Ingersoll CD, Hart JM. The Relationship between Clinical and MRI-based Measures of Quadriceps Function following ACL Reconstruction. POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. Indianapolis, IN. June 2013.
- 23. Goetschius J, Kuenze CM, Saliba SA, Hart JM. Reposition Accuity After Exercise in Individuals with ACL Reconstructed Knees. POSTER PRESENTATION. The American College of Sports Medicine Annual Meeting. Indianapolis, IN. June 2013.
- 24. Kuenze C, Hertel J, Hart JM. A Comparison of Lower Extremity Neuromuscular Function in Healthy and ACL Reconstructed Individuals Following a Sub-maximal Exercise Protocol. DOCTORAL AWARDS PODIUM PRESENTATION. National Athletic Trainers Association Annual Meeting. St. Louis, MO. June, 2012.
- 25. Hart JM, **Kuenze CM**, Diduch DR, Ingersoll CD. Quadriceps Central Activation Ratios Following 2-weeks of Rehabilitation Exercises Augmented with Cryotherapy. PODIUM PRESENTATION. National Athletic Trainers Association Annual Meeting. St. Louis, MO. June, 2012.
- 26. Roberts D, **Kuenze CM**, Saliba SA, Hart JM. Muscle Activation during the Quadriceps Superimposed Burst Technique. MASTERS AWARDS PODIUM PRESENTATION. National Athletic Trainers Association Annual Meeting. St. Louis, MO. June, 2012.
- 27. Lockerby M, **Kuenze CM**, Hertel J, Hart JM. Isometric Hamstrings to Quadriceps Mean Torque Ratio after Exercise in Persons with a History of Low Back Pain. PODIUM PRESENTATION. National Athletic Trainers Association Annual Meeting. St. Louis, MO. June, 2012.
- 28. Tompkins M, **Kuenze CM**, Milewski MD, Hart J, Miller MD, Diduch DR, Hart JM. Clinical and Functional Outcomes Following Primary Repair Versus Reconstruction of the Medial Patellofemoral Ligament for Chronic Patellar Instability. PODIUM PRESENTATION. The American Orthopaedic Society for Sports Medicine Annual Meeting. San Diego, CA, July 2011.
- 29. **Kuenze CM**, Hertel J, Hart JM. A Comparison of Lower Extremity Neuromuscular Function in Healthy Individuals following a Sub-maximal Exercise Protocol. PODIUM PRESENTATION. National Athletic Trainer's Association Annual Meeting. New Orleans, LA, June 2011.
- 30. Hart JM, **Kuenze CM**, Pietrosimone BG, Diduch DR, Miller MD, Carson EW, Hart JA, Ingersoll CD: Quadriceps Function in ACL Deficient Knees after Rehabilitation Exercises Augmented by TENS and Cryotherapy. THEMATIC POSTER PRESENTATION. National Athletic Trainer's Association Annual Meeting. New Orleans, LA, June 2011.
- 31. Stern AJ, **Kuenze CM**, Cross, KM, Hart JM: Gender Comparison of Central and Peripheral Neuromuscular Function following a Sub-maximal Exercise Protocol. PODIUM PRESENTATION. National Athletic Trainer's Association Annual Meeting. New Orleans, LA, June 2011.
- 32. **Kuenze CM**, Hertel J, Hart JM. A Comparison of Lower Extremity Neuromuscular Function in Healthy Individuals following a Sub-maximal Exercise Protocol. PODIUM PRESENTATION. Mid-Atlantic Athletic Trainers' Association Meeting. Restin, VA, May 2011.

- 33. **Kuenze CM**, Zinder S, Blackburn JT, Norcross MF. The Effects if Functional Ankle Instability and Induced Fatigue on Ankle Stiffness. Poster presentation. POSTER PRESENTATION. National Athletic Trainers' Association Annual Meeting, Philadelphia, PA, June 2010.
- 34. Cross KM, **Kuenze CM**, Grindstaff TL, Hertel J. Does thoracic manipulation improve pain and function in patients with mechanical neck pain: a systematic review. PODIUM PRESENTATION. Mid-Atlantic Athletic Trainers' Association Meeting. Virginia Beach, VA, May 2010.
- 35. Kim KM, Ingersoll CD, Hertel J. Decreased Hoffman reflex modulations of the soleus but not the peroneals with chronic ankle instability. PODIUM PRESENTATION. Mid-Atlantic Athletic Trainers' Association Meeting. Virginia Beach, VA, May 2010. (substitute presenter)

INVITED PRESENTATIONS

- 1. **Kuenze CM.** Foundations of Evidence Based Sports Medicine. McBride Orthopaedic Hospital, Oklahoma City, OK. July 2015.
- 2. **Kuenze CM.** Improving Patient Outcomes Following ACL Reconstruction. Korean Society of Biomechanics. Ewha Women's University, Seoul, South Korea. March 2015.
- 3. **Kuenze CM.** Improving Patient Outcomes Following ACL Reconstruction. Yonsei University, Seoul, South Korea. March 2015.
- 4. **Kuenze CM.** Quadriceps Weakness and Return to Activity: The Impact of Quadriceps Avoidance Gait after Knee Injury. National Athletic Trainers Association Evidence Based Webinar. February 2015.
- 5. **Kuenze CM.** Introductions to Research Methods and Evidence Based Practice. SEATA Athletic Training Student Symposium. February 2015.
- 6. **Kuenze CM.** Concepts in Evidence Based Practice. SEATA Athletic Training Student Symposium. February 2015.
- 7. **Kuenze CM**. Physical Activity after Return to Play. Art and Science of Sports Medicine Symposium. Charlottesville, VA. June 2014.
- 8. **Kuenze CM.** Evidence Based Sports Medicine at the Undergraduate Level. Florida Athletic Training Educators Symposium. Lakeland, FL, May 2014.
- 9. **Kuenze CM**. Neuromuscular and Biomechanical Impact of ACL Reconstruction. Art and Science of Sports Medicine Symposium. Charlottesville, VA, June 2014.
- 10. **Kuenze CM**. Physical Activity Following ACL Reconstruction. Art and Science of Sports Medicine Symposium. Charlottesville, VA, June 2013.
- 11. **Kuenze CM**. The Effect of Exercise Exertion in Previously Injured Orthopedic Populations. Virginia Athletic Trainers Association Meeting. Restin, VA, January 2013.
- 12. **Kuenze CM**. Return to Activity following Knee Injury. Art and Science of Sports Medicine Symposium. Charlottesville, VA, June 2012.
- 13. **Kuenze CM**. Effects of Fatigue on Muscle Inhibition. Art and Science of Sports Medicine Symposium. Charlottesville, VA, June 2011.
- 14. **Kuenze CM**. Return to Play Considerations following Joint Injury. Virginia Athletic Trainers Association Meeting. Richmond, VA, January 2011.

- 15. **Kuenze CM**. Effects of Fatigue on Muscle Inhibition. Art and Science of Sports Medicine Symposium. Charlottesville, VA, June 2010.
- 16. Kuenze CM. Ankle Impingement Syndromes. Carolina Sports Medicine Seminar, Chapel Hill, NC, February 2009.
- 17. **Kuenze CM**, Venis L. Psychological Barriers to Orthopedic Rehabilitation. College Athletic Trainers' Society Meeting. Anaheim, CA, June 2007.

EXTRAMURAL GRANT FUNDING

Source: Mid Atlantic Athletic Trainer's Association. (\$1,000.00)

Title: Influence of gender on neuromuscular control of the lower extremity following an

exercise program.

PI: Joseph M. Hart, PhD, ATC (Co-PI: Christopher Kuenze MA, ATC)

Role Co-Principal Investigator

Period: 2010-2011

Description: Gender comparison after exercise regarding neuromuscular control.

Source: Genzyme, Inc (\$305,000.00)

Title: Prospective, randomized, double blind evaluation of the efficacy of a single dose of

Synvisc-One® (6.0 cc) for the treatment of patellofemoral chondromalacia.

PI: Joseph M. Hart, PhD, ATC (CO-PI: David R. Diduch, MD)

Role: Research Assistant Period: 2009-present

Description: Clinical Trial; investigator initiated FDA IDE application.

Source: National Institute of Neurological Disorders and Stroke - National Institutes of Health

Title: Validation of a Motor Fatigue Measure in Multiple Sclerosis

PI: Myla Goldman, MD Role: Research Assistant

Period: 2009-2014

Description: A K23 mentored patient-oriented research career development award to assess the validity of a new motor fatigue measure in patients with Multiple Sclerosis when compared to current standard protocols.

Source: American Orthopaedic Society for Sports Medicine (\$20,000.00) Title: Improving Quadriceps Function Following ACL reconstruction Surgery

PI: Joseph M. Hart, PhD, ATC Role: Research Assistant Period: 2009-2010

Description: Two-week rehabilitation intervention study using a disinhibitory modality (cryotherapy) to improve quadriceps muscle function measured with functional magnetic resonance imaging.

INTERNAL GRANT FUNDING

Source: University of Miami Provost Research Award (\$15,500.00)

Title: The impact of power training versus progressive strength training on lower extremity function and response to exercise in patients with ACL reconstruction.

PI: Christopher Kuenze PhD, ATC

Period: 2015-2016

Description: An investigation to measure the effects of quadriceps strengthening on response to fatiguing exercise in individuals with a history of ACL reconstruction.

Source: University of Miami Citizen's Board (\$4,000.00)

Title: The Effectiveness of Kinesio® Tape and the McConnell Taping Technique on Neuromuscular Characteristics of the Vastus Medialis Oblique and Vastus Lateralis, Joint Kinematics, and Pain in Individuals with and without Patellofemoral Pain Syndrome during Functional Task Performance.

Co-PI: Moataz Eltoukhy, PhD, Christopher Kuenze PhD, ATC, Joseph Signorile, PhD

Period: 2013-2014

Description: Collaborative student driven project to investigate the effectiveness of common taping techniques in

improving patellofemoral pain symptoms.

GRANT PROPOSALS (NOT FUNDED)

Source: National Institute of Arthritis, Musculoskeletal and Skin Disease Research (R21: 10/16/2014)

Title: Response to Exercise as an Outcome following ACL Reconstruction

PI: Christopher Kuenze, PhD, ATC

Effort: 15%

Amount: \$275,000 (Direct)

Period: 2014-2015

Description: Determine the natural course of response to exercise following ACL reconstruction and its ability to predict

patient reported knee related function.

Source: University of Miami Scientific Advisory Committee Pilot Grant Program

Title: The Effect of Foot Architecture on Throwing Mechanics in Collegiate Baseball Players

PI: Luis Feigenbaum, DPT

Effort: 5%

Amount: \$16,000 (Direct)

Period: 2014-2015

Description: To determine the relationship between medial longitudinal arch height and throwing mechanics in collegiate

baseball player and to assess the impact of a custom orthotic shoe insert in changing throwing mechanics

Source: Southeast Athletic Trainers' Association Research Grant Program (\$2,000.00)

Title: Effects of strength based rehabilitation on response to fatigue following anterior cruciate ligament reconstruction

(ACLR).

PI: Christopher Kuenze PhD, ATC

Period: 2014-2015

Description: An investigation to measure the effects of quadriceps strengthening on response to fatiguing exercise in

individuals with a history of ACL reconstruction.

Source: University of Miami Clinical and Translational Science Institute (\$50,000.00)

Title: Clinical assessment of knee joint kinematics during common dynamic lower extremity tasks using the Microsoft

Kinect® camera system. (NOT FUNDED)

PI: Christopher Kuenze PhD, ATC

Period: 2014-2015

Description: A pilot grant to investigate the feasibility of assessing lower extremity biomechanics using the Microsoft

Kinect® camera system in individuals with a history of ACL reconstruction.

Source: University of Miami Provost Research Award (\$16,500.00)

Title: The impact of traditional rehabilitation on response to exercise in participants with a history of knee ligament injury.

(NOT FUNDED)

PI: Christopher Kuenze PhD, ATC

Period: 2014-2015

Description: An investigation to measure the effects of quadriceps strengthening on response to fatiguing exercise in

individuals with a history of ACL reconstruction.

Source: American College of Sports Medicine (\$4,875.00)

Title: Exercise Induced Gait Changes following ACL Reconstruction (NOT FUNDED)

PI: Christopher Kuenze MA, ATC

Role Principal Investigator

Period: 2012-2013

Description: Comparison of gait parameters after exercise and their relation to laboratory and clinical measures of lower

extremity neuromuscular function

UNIVERSITY SERVICE

Michigan State Universi	Jniversity	State	Michigan
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Director: Graduate Athletic Training Program	2015-present
Director: Sports Injury Research Laboratory	2015-present
Member: Undergraduate Curriculum Committee	2015-present

University of Miami

Member: Graduate Curriculum Committee	2014-2015
Mentor: Undergraduate Honors Research Program	2014-2015

PROFESSIONAL SERVICE

Committee Member: Athletic Trainers' Osteoarthritis Consortium	2015-present
Grant Reviewer: National Athletic Trainers Association Research and Education Foundation	2015-present
University of Miami Sports Institute Member	2014-present
Evidence Based Practice CEU Provider: University of Miami	2014-present
Proposal Reviewer: National Athletic Trainers Association Annual Meeting	2013-present
Session Moderator: Student SEATA Annual Meeting	2014-present
Session Proposal Reviewer: National Athletic Trainers Association Annual Meeting	2014
Session Moderator: Curry Research Conference, Charlottesville, VA	2012
Session Moderator: Virginia Athletic Trainers Association Annual Meeting	2012
Blog Contributor: Sports Medicine Research Blog	2011-present
Quiz Bowl Item Writer: Mid-Atlantic Athletic Trainers Association Annual Meeting	2011
Quiz Bowl Coordinator: Virginia Athletic Trainers Association Annual Meeting	2010 - 2013

MANUSCRIPT REVIEWER

European Journal of Physical and Rehabilitation Medicine	2015-present
Physiotherapy Theory and Practice	2015-present
Athletic Training and Sports Health Care	2015-present
Journal of Sports Sciences	2015-present
American Journal of Sports Medicine	2014-present
Sports Health	2014-present
Archives of Physical Medicine and Rehabilitation	2013-present
American Journal of Physical Medicine and Rehabilitation	2013-present
International Journal of Athletic Therapy & Training	2012-present
Journal of Athletic Training	2011-present
Journal of Sports Rehabilitation	2010-present

AWARDS

Doctoral Dissertation Award Finalist. Awarded by the National Athletic Trainers Association Research and Education Foundation. June 2015.

Doctoral Poster Award Finalist. Awarded by the National Athletic Trainers Association Research and Education Foundation. June 2014.

Alice Becker Hinchliffe Williams Scholarship. Awarded by The Curry School of Education Foundation, University of Virginia. April, 2013.

Doctoral Oral Award Finalist. Awarded by the National Athletic Trainers Association Research and Education Foundation. June 2012.

Elsie Hughes Cabell Scholarship. Awarded by the Curry School of Education. University of Virginia. April 2012.

David H. Perrin Athletic Training and Sports Medicine Scholarship. Awarded by The Curry School of Education Foundation, University of Virginia. April, 2011.

Awarded Membership into The McCue Society for recognition of leadership, education and service in sports medicine. June 2010.

PROFESSIONAL ORGANIZATIONS AND CERTIFICATIONS

National Athletic Trainers Association	2006-present
Southeast Athletic Trainers Association	2013-present
Mid-Atlantic Athletic Trainers Association	2009-2013
Virginia Athletic Trainers Association	2009-2013
American Red Cross Professional CPR Certified	2004-present
Florida, Licensed Athletic Trainer	2013-present
Commonwealth of Virginia, Licensed Athletic Trainer	2010-2013
North Carolina, Licensed Athletic Trainer	2007-2009

PROFESSIONAL DEVELOPMENT

NATA Research & Education Foundation's Research Mentor Program Research Mentor: Erik Wikstrom, University of North Carolina at Charlotte June 2014

DOCTORAL STUDENT ADVISED

Adam Kelly (2013-present)

DOCTORAL DISSERTATION COMMITTEE MEMBERSHIP

University of Miami

Nicole Rendos. Identification of Sling Systems in Economical and Non-economical runners.

Arturo Leyva. The Comparative Effects of Treadmill Training Versus Multi-Directional Variable-Speed Training on Muscle Fiber Types, Daily Living and Executive Function in Elderly Men and Women.

Hector Heredia. Squat vs. Power Cleans: Post-activation Potentiation Effects in Division I Track Athletes.

Meng Ni. The Comparative Impacts of a Specifically Designed Yoga Program and Power Training on Physical Performance in Older Adults with Parkinson's disease.

Connie Sol. Effectiveness of a Proprioceptive Resistance Device in Changing Landing Style in Recreational Runners Learning to Land on the Ball of the Foot.

Hyung-Pil Jun. The Effectiveness of Kinesio Tape and McConnell Tape on Neuromuscular Characteristics of VMO and VL, Joint Kinematics, and Pain in Individuals with PFP during Functional Task. Summer 2014

Cole Myers. Bicycle Shoe Insoles and their Effect on Foot Excursion, Leg Muscle Activation Patterns and Performance in Experienced Cyclists. Spring 2014

MASTERS THESIS COMMITTEE MEMBERSHIP

University of Virginia

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Foot N, Kuenze CM, Saliba SA, Hart JM. Drop Landing Performance Following ACL Reconstruction. 2012-2013

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