

**Curriculum Vitae**  
**Andrew Todd Ludlow, Ph.D.**

**Contact information**

University of Michigan  
School of Kinesiology  
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**PRESENT POSITION**

2017 – present      Assistant Professor, The University of Michigan, Ann Arbor, MI

**EDUCATION**

2011- 2017      **Postdoctoral training** – Cell Biology, Department of Cell Biology, University of Texas Southwestern Medical School, Dallas, TX 75309. W. E. Wright and J. Shay, mentors.  
2011      **Ph.D.** – Kinesiology (Exercise Physiology), Department of Kinesiology, School of Public Health, University of Maryland, College Park, MD 20742. S.M. Roth, advisor.  
2007      **M.A.** – Kinesiology (Exercise Physiology), Department of Kinesiology, School of Public Health, University of Maryland, College Park, MD 20742. S.M. Roth, advisor.  
2005      **B.S.** - Dept. of Exercise Science and Athletics (Exercise Science major, Chemistry minor), Bloomsburg University, Bloomsburg, PA 17815. E.S. Rawson, advisor.

**PROFESSIONAL EXPERIENCE**

2015 - 2017      Assistant Instructor, Pathway to Independence Award, UTSWMC Cell Biology

**HONORS AND AWARDS**

2016      UT Southwestern Post-Doctoral Association travel award recipient  
2015      Simmons Cancer Center Post-Doctoral travel award – awarded for oral presentation of work completed at UTSWMC – Title of talk - Regulation and manipulation of hTERT (telomerase) splicing in cancer cells  
2011      NIH/NCI Postdoctoral Training Fellowship (T32 CA124334)  
2009      Goldhaber Graduate Student Travel Award (\$600) for travel to Keystone Symposia on Molecular and Cell Biology – Telomere Biology and DNA Repair to present an abstract entitled, “High levels of physical activity accelerate telomere shortening in Cast/Ei J mice”. Conference located in Ashmore, Queensland, Australia, 2009.  
2008      Department of Kinesiology Humphery Award recipient for outstanding graduate student publication for ‘Relationship between physical activity, telomere length, and telomerase activity in peripheral blood mononucleocytes.’ *Medicine and Science in Sports and Exercise*, 40 (10): 1764-71, 2008.  
2007      NIH Predoctoral Training Fellowship (T32 AG000268).  
2005      Bill Sproule Award for senior exercise science major with highest GPA. Bloomsburg University of Pennsylvania.  
2002      Bloomsburg University Wrestling Scholar Athlete Representative  
2001      Stroudsburg High School wrestling team scholar athlete representative to district XI  
2001      Cap Curtis Scholarship: one of five scholarships awarded to outstanding scholar athletes

**PROFESSIONAL AFFILIATIONS**

American College of Sports Medicine  
American Physiological Society

## RESEARCH

### GRANTS – Active Support

#### Extramural Funded:

- October 2017 American Association for Cancer Research (AACR) in collaboration with Pacific Biosciences and Genewiz: 2017 Cancer SMRT Grant program winner – 4 samples sequenced on 8 Sequel SMRT cells with data analysis at no cost.
- September 2017 NIH/NCI R00 Pathway to Independence award (1K99CA197672-01). Title: Manipulating hTERT splicing in lung cancer cells.

### GRANTS – Previous Awards

- May 1, 2016 NIH/NCI K99/R00 Pathway to Independence award (1K99CA197672-01). Title: Manipulating hTERT splicing in lung cancer cells. Impact score of 20.

#### Intramural Funded:

- November 1, 2016 SPORE Lung Cancer – Career Development Award Manipulating hTERT splicing in lung cancer cells. \$25,000. UTSWMC.
- April, 2010 Dept. Kinesiology Graduate Research Initiative Project (GRIP) grant: The role of shelterin and DNA damage response elements in C2C12 muscle cells. \$2500 University of Maryland
- April 1, 2008 Dept. Kinesiology Graduate Research Initiative Project (GRIP) grant: Comparison of telomere length, telomerase enzyme activity and running endurance in CAST/Ei mice. \$2500 University of Maryland
- 2004-2005 Kozloff Undergraduate Research Grant Award. \$300 Bloomsburg University

### **PUBLICATIONS:**

Refereed Research Papers: 23 total, 8 first author, one book chapter as of 11/08/17

1. Deeny, S. P., Poeppel, D., Zimmerman, J. B., Roth, S. M., Brandauer, J., Witkowski, S., Hearn, J. W., **Ludlow, A.T.**, Contreras-Vidal, J. L., Brandt, J., & Hatfield, B. D. Exercise, APOE, and working memory: MEG and behavioral evidence for benefit of exercise in middle-aged e4 carriers. *Biological Psychology*, 78: 179-187, 2008. PMID: 18395955.
2. Charbonneau D.E., Hanson E.D., Delmonico M.J., **Ludlow A.T.**, Hurley B.F., & Roth, SM. The influence of ACE genotype on muscle hypertrophic and strength responses to strength training in older adults. *Medicine and Science in Sports and Exercise*, 40: 677-683, 2008. PMID: 18317377.
3. **Ludlow, A.T.**, Zimmerman, J.B., Witkowski, S., Hearn J.W., Hatfield, B.D., Roth, S.M. Relationship between physical activity, telomere length, and telomerase activity in peripheral blood mononucleocytes. *Medicine and Science in Sports and Exercise*, 40 (10): 1764-71, 2008. PMID: 18799986.
4. Hanson, E.D., **Ludlow, A.T.**, Sheaff, A.K., Park, J., and Roth, S. M. ACTN3 R577X polymorphism is not predictive for differences in muscle performance phenotypes. *International Journal of Sports Medicine*, 31(11) 834-38, 2010. PMID: 20830656.
5. McKenzie J. A., Witkowski, S., **Ludlow, A. T.**, Roth, S. M., and Hagberg, J.M. AKT1 G205T Genotype Influences Obesity-Related Metabolic Phenotypes and Their Responses to Aerobic Exercise Training in Older Caucasians. *Exp Physiol* 96.3 pp 338–347, 2010. PMID: 21097644.
6. **Ludlow A.T.** and Roth, S. M. Physical Activity and Telomere Biology: Exploring the Link with Aging-Related Disease Prevention. *Journal of Aging Research Volume 2011 (2011), Article ID 790378, 12 pages.* PMID: 21403893.

7. **Ludlow A.T.**, Witkowski, S., Marshall, M. R., Wang, J., Lima, L. C. J., Guth, L. M., Spangenburg, E. E., and Roth, S. M. Chronic Exercise Modifies Age-Related Telomere Dynamics in a Tissue-Specific Fashion. *J Gerontol A Biol Sci Med Sci*. 2012 Sep;67(9):911-26. Epub 2012 Mar 1. PMID: 22389464.
8. **Ludlow A.T.**, Lima, L. C. J., Hanson, E.D., Wang, J., Guth, L. M., Spangenburg, E. E., and Roth, S. M. p38 MAPK mediates mRNA expression of telomere-repeat binding factor 1 in skeletal muscle. *Appl Physiol* (1985). 2012 Dec 1;113(11):1737-46. doi: 10.1152/jappphysiol.00200.2012. Epub 2012 Oct 4. PMID: 23042912.
9. Guth, L. M., **Ludlow, A.T.**, Witkowski, S., Lima, L. C. J., Marshall, M. R., Venezia, A. C, Xiao, T., Lee, M. T., Spangenburg, E. E., and Roth, S. M. Sex-specific Effects of Exercise Ancestry on Metabolic, Morphological, and Gene Expression Phenotypes in Multiple Generations of Mouse Offspring. *Exp Physiol*. 2013 Oct;98(10):1469-84. doi: 10.1113/expphysiol.2012.070300. Epub 2013 Jun 14. PMID: 23771910.
10. **Ludlow A. T.**, Spangenburg, E. E., Chin, E. R., Cheng, W. H., Roth, S. M. Telomeres shorten in response to ROS exposure in adult skeletal muscle fibers cultured in reduced oxygen conditions. *Journal of Gerontology: Biological Sciences* (2013). PMID: 22389464.
11. **Ludlow A. T.**, Ludlow L. W., Roth S. M. Do Telomeres Adapt to Physiological Stress? Exploring the Effect of Exercise on Telomere Length and Telomere-Related Proteins. *Biomed Res Int*. 2013;2013:601368. Epub 2013 Dec 24. Review. PMID: 24455708.
12. **Ludlow A. T.**, Robin J. D., Sayed M, Litterst C. M., Shelton D. N., Shay J. W., Wright W. E. Quantitative telomerase enzyme activity determination using droplet digital PCR with single cell resolution. *Nucleic Acids Res*. 2014 May 26. pii: gku439. [Epub ahead of print] PMID: 24861623.
13. Robin J. D., **Ludlow A. T.**, Batten K, Magdinier F, Stadler G, Wagner K. R., Shay J. W., Wright W. E. Telomere position effect: regulation of gene expression with progressive telomere shortening over long distances. *Genes Dev*. 2014 Nov 15;28(22):2464-76. doi: 10.1101/gad.251041.114. PMID: 25403178.
14. Fleisig H. B., Hukezalie K. R., Thompson C. A., Au-Yeung T. T., **Ludlow A. T.**, Zhao C. R., Wong J. M. Telomerase reverse transcriptase expression protects transformed human cells against DNA-damaging agents, and increases tolerance to chromosomal instability. *Oncogene*. 2016 Jan 14;35(2):218-27. doi: 10.1038/onc.2015.75. Epub 2015 Apr 20. PMID: 25893297.
15. Robin J. D., **Ludlow A. T.**, Batten, K., Gaillard, M., Chen, M., Wagner, K., Stadler, G., Rouillard, J., Magdinier, F., Shay, J. W., Wright W. E. SORBS2 Transcription is Activated Upon Telomere Shortening in Muscle Cells from Patients with Facioscapulohumeral Dystrophy. *Genome Res*. 2015 Dec;25(12):1781-90. doi: 10.1101/gr.190660.115. Epub 2015 Sep 10. PMID: 26359233.
16. Walsh, S. E., **Ludlow, A.T.**, Metter, E.J., Ferrucci, L., Roth. S.M. Replication study of the vitamin D receptor (VDR) genotype association with skeletal muscle traits and sarcopenia. *Aging Clin Exp Res*. 2015 Sep 28. [Epub ahead of print] PMID: 26415498.
17. Robin J. D., **Ludlow A. T.**, LaRanger R, Wright WE, Shay JW. Comparison of DNA Quantification Methods for Next Generation Sequencing. *Sci Rep*. 2016 Apr 6;6:24067. doi: 10.1038/srep24067. PMID: 27048884.
18. Gelsomino, L., Gu, G., Rechoum, Y., Beyer, A., Pejerrey, S., Tsimelzon, A., Huffman, K., **Ludlow, A. T.**, Ando, S., and Fuqua, S. A. W. ESR1 Mutations Affect Anti-proliferative Responses to Tamoxifen through Enhanced Cross-Talk with IGF Signaling. *Breast Cancer Res Treat*. 2016 Jun;157(2):253-65. doi: 10.1007/s10549-016-3829-5. PMID: 27178332
19. Schafer, C., Mohan, A., Burford, W., Driscoll, M. K., **Ludlow, A. T.**, Wright, W. E., Shay, J. W., Danuser, G. Protein levels of KrasV12 control a switch of lung cancer cell morphology and motility. Published 20 September 2016 • © 2016 IOP Publishing Ltd., *Convergent Science Physical Oncology*, *Converg Sci Phys Oncol*. 2016 Sep;2(3):035004. doi: 10.1088/2057-1739/2/3/035004. Epub 2016 Sep 20. PMID:29057096

20. Kim W.,\* **Ludlow A. T.**,\* Min J., Robin J. D., Stadler G., Mender I., Lai T. P., Zhang N., Wright W. E., Shay J. W. Regulation of the Human Telomerase Gene TERT by Telomere Position Effect-Over Long Distances (TPE-OLD): Implications for Aging and Cancer. *PLoS Biol.* 2016 Dec 15;14(12):e2000016. doi: 10.1371/journal.pbio.2000016. PMID: 27977688

\* **Co-First Authors**

21. Liu, J., Hu, J., **Ludlow, A. T.**, Pham, J. T., Shay, J. W., Rothstein, J. D., and Corey, D. R. c9orf72 Disease-Related Foci are Each Composed of One Mutant RNA Molecule. *Cell Chem Biol.* 2017 Feb 16;24(2):141-148. doi: 10.1016/j.chembiol.2016.12.018. Epub 2017 Jan 26. PMID: 28132891

22. **Ludlow, A. T.**, Gratidao, L., Ludlow, L. W., Spangenburg, E. E., Roth, S. M. Acute exercise activates p38 MAPK and increases the expression of telomere protective genes in cardiac muscle. *Exp Physiol.* 2017 Apr 1;102(4):397-410. doi: 10.1113/EP086189. Epub 2017 Mar 14. PMID: 28166612.

23. Huang EE, Tedone E, O'Hara R, Cornelius C, Lai TP, **Ludlow A**, Wright WE, Shay JW. The Maintenance of Telomere Length in CD28+ T Cells During T Lymphocyte Stimulation. *Sci Rep.* 2017 Jul 28;7(1):6785. doi: 10.1038/s41598-017-05174-7. PMID: 28754961

**BOOK CHAPTERS:**

1. **Ludlow, A. T.**, Shelton D. N., Wright W. E., Shay, J. W. ddTRAP: A method for Sensitive and Precise Quantification of Telomerase Activity. *Methods in Molecular Biology.*

**RESEARCH PRESENTATIONS:**

National/ International:

1. **Ludlow, A.T.**, Zimmerman, J.B.,Witkowski, S., Hearn J.W., Hatfield, B.D., Roth, S.M. Relationship between physical activity level, telomere length, and telomerase activity in peripheral blood mononucleocytes. Late-breaking poster presentation for the 2007 Experimental Biology meeting, Washington D.C.

2. **Ludlow, A.T.**, Liu, D., Metter, E.J., Ferrucci, L., Roth S.M. *AKT1* G205T polymorphism associated with muscle strength. Slide presentation for the 2007 American College of Sports Medicine Annual Meeting, New Orleans, LA. *Med. Sci. Sports Exerc.*, 39 (5 Supp.): S13, 2007.

3. **Ludlow, A.T.**, Metter, E.J., Ferrucci, L., Roth. S.M., The vitamin D receptor (*VDR*) FokI polymorphism is associated with muscle mass and strength in men. Slide presentation for the American College of Sports Medicine Annual Meeting, Indianapolis, IN. *Med. Sci. Sports Exerc.*, 40 (5 Supp.): S44-45, 2008.

4. Zimmerman, J.B., Hearn, J.W., **Ludlow, A.T.**, Savin-Murphy, J., Rietschel, J.C., Conery, R., Deeny, S.P., Roth, S.M., Hatfield, B.D. Executive and memory performance is moderated by *APOE* and physical activity in middle-aged adults. Slide presentation for the American College of Sports Medicine Annual Meeting, Indianapolis, IN. *Med. Sci. Sports Exerc.*, 40 (5 Supp.): S89, 2008.

5. Savin-Murphy, J. Zimmerman, J.B., Deeny, S.P., **Ludlow, A.T.**, Poeppel, D., Roth, S.M., Contreras-Vidal, J., Hatfield, B.D. Fitness and cognitive decline of the aging brain – a preliminary investigation. Slide presentation for the American College of Sports Medicine Annual Meeting, Indianapolis, IN. *Med. Sci. Sports Exerc.*, 40 (5 Supp.): S90, 2008.

6. McKenzie J. A., Witkowski, S., **Ludlow, A.T.**, Roth, S. M., and Hagberg, J.M. *AKT1* G205T genotype influences the response of glucose and insulin variables to aerobic exercise training. Poster presentation for the American College of Sports Medicine Annual Meeting, Indianapolis, IN. *Med. Sci. Sports Exerc.*, 40 (5 Supp.): S185, 2008.

7. **Ludlow, A.T.**, Auriemma, M., Nadendla, P., Ngai, K.Y., Spangenburg, E.E., Roth, S.M. Does DNA methylation of the myosin heavy chain IIb gene promoter regulate expression during skeletal muscle

differentiation? Poster presentation for the Integrative Biology of Exercise meeting, Hilton Head, SC, Sept 2008. *The Physiologist*. 51: 66-67, 2008.

8. **Ludlow, A.T.**, Nadendla, P., Witkowski, S., Wohlers, L.M., Spangenburg, E.E., Roth, S.M. Physical activity ancestry affects body composition phenotypes and gene expression in mice offspring. Poster presentation for the American College of Sports Medicine Annual Meeting, Seattle WA, 2009. *Med. Sci. Sports Exerc.*, 41 (5 Supp.): S584, 2009.

9. Zimmerman, J.B., **Ludlow, A.T.**, Witkowski, S., Kayes, M., Poeppel, D., Roth, S.M., Hatfield, B.D. APOE genotype, aerobic fitness, and cerebral cortical activation during working memory challenge in middle-aged adults. Slide presentation for the American College of Sports Medicine Annual Meeting, Seattle WA, 2009. *Med. Sci. Sports Exerc.*, 41(5 Supp.): S52, 2009.

10. McKenzie, J.A., Witkowski, S., **Ludlow, A.T.**, Roth, S.M., Hagberg, J.M. Visfatin genotypes influence glucose and obesity-related variables and their aerobic exercise training responses. Poster presentation for the American College of Sports Medicine Annual Meeting, Seattle WA, 2009. *Med. Sci. Sports Exerc.*, 41 (5 Supp.): S583, 2009.

11. Hanson, E.D., **Ludlow, A.T.**, Sheaff, A.K., Park, J., Roth, S.M. *ACTN3* R577X genotype is not associated with muscle fatigue performance. Poster presentation for the American College of Sports Medicine Annual Meeting, Seattle WA, 2009. *Med. Sci. Sports Exerc.*, 41 (5 Supp.): S583, 2009.

12. **Ludlow, A.T.**, Marshall, M., Witkowski, S., Spangenburg, E.E., Roth S.M. High levels of physical activity accelerate telomere shortening in Cast/ei J mice. Poster presentation for the Keystone Symposium, Telomere Biology and DNA Repair, Ashmore, Queensland, Australia, 2009.

13. **Ludlow, A.T.**, Witkowski, S., Marshall, M.R., Wang, J., Guth, L.M., Spangenburg, E.E., Roth, S.M. Year Long Wheel Running Alters Telomere Dynamics and Markers of DNA Damage in Mice. Poster presentation for the American College of Sports Medicine Annual Meeting, Baltimore, MD, 2010. *Med. Sci. Sports & Exerc.*, 42 (5 Supp.): S375, 2010.

14. Marshall, M. R. **Ludlow, A.T.**, Witkowski, S., Wang, J., Guth, L.M., Frank, S., Spangenburg, E.E., Roth, S.M. Chronic Wheel Running Alters Telomere Length and Telomere-related Gene Expression In Cast/ei Mouse Liver Tissue. Poster presentation for the American College of Sports Medicine Annual Meeting, Baltimore, MD, 2010. *Med. Sci. Sports & Exerc.*, (5 Supp):463, 2010.

15. Kayes, M. K, Zimmerman, J.B., Rietschel, J.C., Deeny, S.P., Roth, S.M., **Ludlow, A.T.**, Hatfield B.D. Cognitive Performance In Relation To APOE Genotype, Physical Activity, And Cardiovascular Fitness. Slide presentation for the American College of Sports Medicine Annual Meeting, Baltimore, MD, 2010. *Med. Sci. Sports & Exerc.*, 42(5 Supp):71, 2010.

16. Guth, L.M., **Ludlow, A.T.**, Witkowski, S., Marshall, M.R., Lima, L., Perret, K., Caffes, N., Venezia, A.C., Spangenburg, E.E., and Roth, S. M. Abstract presented at American College of Sports Medicine Integrative Physiology of Exercise Meeting, Miami Beach, FL, 2010.

17. Venezia A.C., **Ludlow, A.T.**, Witkowski, S., Marshall, M.R., Spangenburg, E.E., Roth, S.M. Effect of one year of voluntary wheel running on transcript specific hippocampus *Bdnf* gene expression. Abstract presented at American College of Sports Medicine Integrative Physiology of Exercise Meeting, Miami Beach, FL, 2010.

18. **Ludlow A.T.**, Lima, L., Spangenburg, E.E., Roth, S.M. Telomere binding protein mRNA expression in response to an acute exercise bout. Abstract presented at American College of Sports Medicine Integrative Physiology of Exercise Meeting, Miami Beach, FL, 2010.

19. Lima L, **Ludlow, A.T.**, Spangenburg, E.E., Roth, S.M. MAPK signaling is associated with acute exercise-induced changes in mRNA levels of telomere-related genes. Abstract accepted for a poster presentation at Experimental Biology, Washington D.C., 2011.

20. Soni N., Jenkins, N.T., **Ludlow, A.T.**, Hagberg, J.M. *KLOTHO* KL-VS Genotype is Associated with Cardiovascular Disease Risk Factors and Adaptations to Exercise Training. Abstract accepted for a poster presentation at Experimental Biology, Washington D.C., 2011.
21. Guth L.M., **Ludlow, A.T.**, Witkowski, S., Marshall, M.R., Lima, L., Venezia, A.C., Xiao, T., Lee, M.T., Spangenburg, E.E., and Roth, S.M. Exercise ancestry decreases lipogenesis-related gene expression in skeletal muscle of male offspring. Abstract accepted for a poster and a slide presentation at Experimental Biology, Washington D.C., 2011.
22. **Ludlow A.T.**, Witkowski, S., Marshall, M.R., Wang, J., Guth, L.M., Spangenburg, E.E., Roth, S.M. Exercise modifies age-related telomere dynamics in multiple tissues of CAST/Ei mice. Late-breaking abstract accepted for a poster presentation at Experimental Biology, Washington D.C., 2011.
23. **Ludlow A.T.**, Spangenburg, E.E., Chin, E.R., Cheng, W.H., Roth, S.M. Adult skeletal muscle fiber telomere dynamics following oxidative stress treatment: A comparison between short (CAST/ Ei) and long (C57/Bl6) telomere strains of mice. Poster presentation at ACSM annual meeting 2013.
24. **Ludlow, A.T.**, Robin, J.D., Shay, J.W., Wright, W.E. Accurate detection and quantitation of rare transcripts (hTERT) and enzyme activity (telomerase) using droplet digital PCR. Oral presentation at Cold Spring Harbor Laboratories: Telomeres and Telomerase meeting 2013.
25. Robin, J. D., **Ludlow, A.T.**, Stadler, G., Magdinier, F., Wright, W.E., Shay, J.W. Length dependent telomere looping affects long-distant gene expression (5Mb). Poster presentation at Cold Spring Harbor Laboratories: Telomeres and Telomerase meeting 2013.
26. **Ludlow, A. T.**, Robin, J. D., Batten, K., Yuan, L., Dahlson, N., Shay, J. W., Wright, W. E. Regulation and manipulation of hTERT splicing in cancer cells. Poster presentation at Cold Spring Harbor Laboratories: Telomeres and Telomerase meeting 2015.
27. Sayed, E. M., Cheng, A., Ludlow, A. T., Robin, J. D., Wright, W.E., Shay, J.W, Jiang, Q. Unique kinetic properties of the human telomerase holoenzyme suggests a catalysis dependent brake on its activity. Poster presentation at Cold Spring Harbor Laboratories: Telomeres and Telomerase meeting 2015.
28. **Ludlow, A. T.**, Wong, S., Robin, J. D., Batten, K., Yuan, L., Dahlson, N., Mender, I., Zhang, L., Shay, J. W., Wright, W. E. Regulation and manipulation of hTERT splicing in cancer cells. Poster presentation at Keystone Symposia: Epigenetic and Metabolic Regulation of Aging and Aging Related Disease meeting 2016.

#### **INVITED LECTURES/WEBINARS:**

1. Bio-Rad digital PCR Road Show - Invited lectures at UTSWMC Cell Biology and MD Anderson, Houston Texas. Presented digital PCR techniques on developing enzyme assays and gene expression assays using digital PCR. July 2014.
2. The Scientist Webinar Series – PCR-Moving beyond traditional methods. December 4, 2014. <http://www.the-scientist.com/?articles.view/articleNo/41267/title/PCR--Moving-Beyond-Traditional-Methods/>
3. Bio-Rad digital PCR Road Show - Invited lectures at UTSWMC Cell Biology. Title: Opportunities for Discovery Using ddPCR: Telomeres/Telomerase, Gene Expression and Next Generation Sequencing. July 2015.
4. Invited lecture at UT Arlington Biomedical Engineering seminar series. Title: Opportunities for Discovery Using droplet digital PCR: Telomeres/Telomerase, Gene Expression, and Next Generation Sequencing. September 21, 2016.

5. Invited lecture at UT Southwestern Medical Center, Hamon Cancer center Lecture series. Title: Manipulation and regulation of telomerase alternative splicing in lung cancer. April 27, 2017.
6. Invited lecture at University of Michigan, Center for Exercise Research Lecture series. Title: Regulation and Manipulation of hTERT (telomerase) alternative splicing in cancer and aging. September 14, 2017.

## TEACHING

### **University Courses Taught**

MOVESCI 340 – Exercise Physiology – Win 2018

### **Post-doctoral Trainees**

Mohammed Sayed, Ph.D. 2017 – present



## PROFESSIONAL SERVICE

### Invited Reviewer for Professional Journals

Age  
Aging research reviews  
Aging cell  
American Journal of Physiology – Renal Physiology  
American Journal of Physiology – Cell Physiology  
Data in Brief  
Ebiomedicine  
European Journal of Hematology  
Experimental Physiology  
International Journal of Sports Physiology and Performance  
Journal of Applied Physiology  
Journal of Experimental Biology  
Journal of Gerontology: Biological Sciences  
Medicine and Science in Sport and Exercise  
Nucleic Acids Research  
Physiological Genomics  
PLOS One  
Rejuvenation research

### INVITED GRANT REVIEWER

2017 Hong Kong Grant Review Counsel

### OTHER PROFESSIONAL SERVICE

#### KINESIOLOGY SERVICE

#### COMMITTEES

2009-2010	Member, Graduate Committee to the Graduate Coordinator
2007-2008	Member, Department Chair's Graduate Student Advisory Committee
2007-2008	Member, Search Committee for Exercise Physiology Faculty
2006-2011	Functional Genomics Laboratory Coordinator
2006-2011	Mentored several (7 plus) undergraduate students in the Functional Genomics Laboratory