CURRICULUM VITAE AND BIBLIOGRAPHY

DATE: March 2018

NAME: Phillip Brian Carpenter

PRESENT TITLE: Associate Professor of Biochemistry and Molecular Biology

ADDRESS: University of Texas-Houston Medical School
Department of Biochemistry & Molecular Biology
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6431 Fannin
Houston, TX 77030
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Email: Phillip.B.Carpenter@uth.tmc.edu

BIRTH DATE: April 14, 1966

CITIZENSHIP: USA

UNDERGRADUATE EDUCATION:

1988 B.A. in Biochemistry, University of California at Santa Barbara
Santa Barbara, California
Graduated *Magna Cum Laude*

GRADUATE EDUCATION:

1994 Ph.D. in Biochemistry, University of Illinois at Urbana-Champaign
Champaign, Illinois
Thesis: "*Molecular Characterization of Motility Genes in Bacillus Subtilis*"
Advisor: Professor George Ordal

POSTGRADUATE TRAINING:

1994-1998 Postdoctoral Research Fellow in laboratory of William G. Dunphy
California Institute of Technology
"*Cell cycle control of DNA replication in Xenopus laevis*"

ACADEMIC APPOINTMENTS:

1986-1988 Undergraduate Research Assistant in laboratory of George Taborsky, Department of Biology, UCSB
Purified and characterized phosvitin from Grunion eggs.

1988-1993	Graduate Research Assistant in laboratory of George Ordal Department of Biochemistry, University of Illinois Characterized genes responsible for chemotaxis and motility in *Bacillus subtilis*; demonstrated that guanosine nucleotides are required for flagellar synthesis in *Bacillus*; showed a relationship between certain virulence genes and flagellar genes.
1994-1998	Postdoctoral Research Fellow in laboratory of William G. Dunphy Division of Biology, Howard Hughes Medical Institute, California Institute of Technology Cell cycle control of DNA replication in *Xenopus laevis.*
1998-2005	Assistant Professor of Biochemistry and Molecular Biology The University of Texas Health Sciences Center Department of Biochemistry and Molecular Biology Cell cycle control in *Xenopus laevis.*
1999-Present	Graduate Program Affiliated with Biochemistry and Molecular Biology, Cancer Biology
2005-Present	Associate Professor of Biochemistry and Molecular Biology The University of Texas Health Sciences Center Department of Biochemistry and Molecular Biology

HONORS AND AWARDS:

1985	Golden Key Honor Society
1985	Alpha Lambda Delta Honor Society
1987-1988	President's Undergraduate Research Fellowship
1988	Graduated *Magna cum laude*, Univ of California, Santa Barbara
1989	Excellence in Teaching Award, University of Illinois
1994-1997	American Cancer Society Postdoctoral Fellowship
1997-1998	E.S. Gosney Postdoctoral Fellowship
1999-2003	Ellison Medical Foundation Junior Research Scholar
2001-2002	Dean’s Teaching Excellence Award
2002-2003	Dean’s Teaching Excellence Award
2003-2004	Dean’s Teaching Excellence Award
2005, 2007, 2008	Distinguished Young Investigator, UTHSC
2006	Reappointed to the GSBS Faculty with Commendation
2007	Dean’s Excellence in Teaching Award
2008	Dean’s Excellence in Teaching Award
2009	Dean’s Excellence in Teaching Award
2010	Dean’s Excellence in Teaching Award
2010	Best Lecturer in Biochemistry (Student’s Award)
2011	Dean’s Excellence in Teaching Award

2012	Dean's Excellence in Teaching Award
2013	Dean's Excellence in Teaching Award
2012-2013	Best Lecturer in Biochemistry (Student's Award)
2014	Elected to Academy of Master Educators
2015	Best Course Director UT Med School
2014-2017	Dean's Excellence in Teaching Award

SERVICE ON NATIONAL GRANT REVIEW PANELS, STUDY SECTIONS, COMMITTEES:

CNRS (France)
Reviewed grants for the Israel Science Foundation
Reviewed grants for the Wellcome Trust Foundation (UK)
DOD Breast Cancer Review Panel
NIH special study panel 2013
Qatar National Priorities Research Program Peer Reviewer, 2011-2014

SERVICE ON THE UNIVERSITY OF TEXAS-HOUSTON HEALTH SCIENCE CENTER COMMITTEES (Partial List):

Curriculum Committee
TIME committee
New Curriculum committee
Medical School Admissions Committee
Academy of Master Educators Review Committee
Admissions Committee

SERVICE ON GRADUATE SCHOOL COMMITTEES:

Advisory Committee for:
Sataluri, Anupama
Sarah May
Omid Tavana
Lauren Wiggins
Xiaofeng Zheng
Thang Van Hguyen
Melanie Dujka
Hoainam Nguyen-Jackson
Patrick Gibney
Rina Bhagat
Corina Rosales
Hannah Wingate
Lance Shaner
Jun Xie
Jonathan Volmer

Pierrette Lo
Jason Grier

Supervisory Committee for:
Sarah May
Tamara Laskowski
Lauren Wiggins
Thang Van Nguyen
Patrick Gibney
Hye Won Song
Lance Shaner
Jason Grier
Jonathan Volmer
Robert Dejournett
Pierette Lo

Chair of Advisory Committee for:
Melissa Adams-Singh
Julio Morales
Karen La-Follete-Shumway

Chair of Supervisory Committee for:
Melissa Adams-Singh
Julio Morales

Examining Committee for:
Omid Tavana
Xiaofeng Zheng
Isadora Daniels
Jennifer Gonzalez-Mc Gee
Jordan Bell
Thang Van Ngyuyen
Patrick Gibney
Sharon Edwards
Rebecca Corrigan
Lance Shaner
Raegan Hunt
Janci Chunn
Melissa Adams-Singh
Helen Huang
Jason Rall
Hannah Wingate
Jason Grier
Cheri Turman
Jonathan Volmer
Robert Dejournett
Jennifer Brannan
Hays Young

Wei Zhang
Xuefeng Su

SERVICE TO THE COMMUNITY:

2000	Committee Member - Department of Cell Biology, Baylor College of Medicine, Houston, Texas
2000-2011	GSBS Applicant Interviews
2002	Medical School Research Day
2006	Student Poster Session Judge
2006	GSBS Faculty Retreat Participant
2006	Judge for Sowell-Huggins Scholarship
2007	Medical School Poster Judge
2007	Judge for McGovern Poster Session
2008	Judge for GSBS Poster Session
2014	Judge for High School Science Fair, George R Brown Convention Center
2015	Volunteer for Career Gear Homeless Vets

SPONSORSHIP OF CANDIDATES FOR POSTGRADUATE DEGREE:

2002	Karen Shumway
2004-2008	Melissa Adams
2002-2005	Julio Morales

SPONSORSHIP OF POSTDOCTORAL FELLOWS:

04/2003	Pervez Firoz
12/2008-08/2010	Karina Eterovic
06/2011-2013	Kavitha Reddy

TEACHING RESPONSIBILITIES:

Graduate School of Biomedical Sciences
Current Methods in Molecular Research I (1999)
Topics in Biochemistry and Molecular Biology (2000)
Molecular Basis of Oncogenes (2000)
Topics in Biochemistry and Molecular Biology (2001)
Molecular Basis of Oncogenes (2001)
Current Methods in Molecular Research I - Co-Coordinator(2001)
Topics in Biochemistry and Molecular Biology (2002)
Molecular Basis of Oncogenes (2002)
Current Methods in Molecular Research – Coordinator (2002)
Seminar in Biochemistry and Molecular Biology (2002)

Current Methods in Molecular Research – Co-Coordinator (2002)
Topics in Biochemistry and Molecular Biology (2003)
Molecular Basis of Oncogenes (2003)
Current Methods in Molecular Research - Coordinator (2003)
Current Methods in Molecular Research – Co-Coordinator (2003)
Topics in Biochemistry and Molecular Biology (2004)
Current Methods in Molecular Research - Coordinator (2004)
Current Methods in Molecular Research – Co-Coordinator (2004)
Topics in Biochemistry and Molecular Biology (2005)
Metabolic Biochemistry (2005)
Topics in Biochemistry and Molecular Biology (2006)
Metabolic Biochemistry (2006)
Topics in Biochemistry and Molecular Biology (2007)
Topics in Biochemistry and Molecular Biology (2008)
Topics in Biochemistry and Molecular Biology (2009)
Topics in Biochemistry and Molecular Biology (2010)
Biomedical Ethics (2010)
Topics in Biochemistry and Molecular Biology (2011)
Methods Course 2013, 2014, 2017
GSBS Core Course 2015-2017
Foundations Medical School Co-director 2016-present
Pre Entry Program Co-director 2107

Medical School Teaching

Medical School Biochemistry - Conference Leader Block II (1999)
Medical School Biochemistry - Conference Leader Block II (2000)
Medical School Biochemistry - Conference Leader Block II (2001)
Medical School Biochemistry - Conference Leader Block II (2002)
Medical School Biochemistry - Conference Leader Block II (2003)
Medical School Biochemistry - Conference Leader Block I (2004)
Medical School Biochemistry - Conference Leader Block II (2004)
Medical School Biochemistry - Conference Leader Block II (2005)
Medical School Biochemistry - Lecturer Block II (2005)
Medical School Biochemistry - Conference Leader Block II (2006)
Medical School Biochemistry - Lecturer Block II (2006)
Medical School Biochemistry - Conference Leader Block II (2007)
Medical School Biochemistry - Lecturer Block II (2007)
Medical School Biochemistry - Conference Leader Block II (2008)
Medical School Biochemistry - Lecturer Block II (2008)
Medical School Biochemistry - Conference Leader Block II (2009)
Medical School Biochemistry - Lecturer Block II (2009)
Medical School Biochemistry - Conference Leader Block II (2010)
Medical School Biochemistry - Lecturer Block II (2010)
Medical School Biochemistry - Conference Leader Block II (2011)
Medical School Biochemistry - Lecturer Block II (2011)
Co-director of Medical School Biochemistry 2011
Course director of Medical School Biochemistry 2012-2016
Co-director of Clinical Applications 2013-2015

Problem Based Learning (PBL) 2013-present
New Curriculum Co-Director for Foundations Module
New Curriculum Teaching: TBLs and lectures
Joint Admission Medical Program (JAMP) 2012-present
Pre entry Program 2012-present
Co-director Pre-Entry Program 2017
Small Group Ethics 9-20-17

PAST GRANT SUPPORT:

Grant # 1 R21 AI076747 9/25/08-8/31/12 16%
NIH/NIAID $409,830 (total costs)
Exploring the Mechanisms of 53BP1-driven Immune Deficiency and DNA Repair
Role: PI

Grant # AU-1569 6/1/10-5/31/13 2%
The Welch Foundation $100,000 (total costs)
Coordinating Methylation with Chromatin Function Through the Action of the Sotos Protein Nsd1

Role: P.I.

Grant # AU-1569 6/1/07-5/31/10 5%
The Welch Foundation $150,000 (total costs)
How Methylation Influences the DNA Damage Response
Role: P.I.

Grant # 2 R56 GM065812 8/01/07-7/31/08 30%
National Institutes of Health $272,893 (total costs)
Role of 53BP1 During the DNA Damage Response
Role: P.I.

Grant # 1 R01 GM65812 4/1/02-7/31/07 30%
National Institute of Health $1,244,299 (total costs)
Role of 53BP1 During the DNA Damage Response
Role: P.I.

Grant # AU-1569 6/1/04-5/31/07 10%
The Welch Foundation $150,000 (total costs)
How Methylation Influences the DNA Damage Response
Role: P.I.

Grant # NS-0042-99 9/1/99-8/31/03 25%
The Ellison Medical Foundation $200,000 (total costs)
Biochemical Characterization of Putative p53-binding Protein in Cell-free Extracts.
Role: P.I.

Grant # AU-1447 6/1/00-5/31/03 10%
The Welch Foundation $153,500 (total costs)
Phosphorylation of a Putative Cell Cycle, DNA Damage Response Element
Role: P.I.

PUBLICATIONS:

A. Abstracts (Partial List)

Carpenter, P.B. and Dunphy, W.G.: Isolation of an Origin Recognition Complex subunit homolog from *Xenopus laevis.:* Eukaryotic DNA Replication. Cold Spring Harbor Laboratory, Cold Spring Harbor, NY, September, 1995.

Carpenter, P.B. and Dunphy, W.G.: The *Xenopus* Origin Recognition Complex.:Eukaryotic DNA Replication. Cold Spring Harbor Laboratory, Cold Spring Harbor, NY, September, 1997.

Carpenter, P.B.: Role of 53BP1 during the DNA damage response.: The Cell Cycle. Salk Institute, La Jolla, CA, June 2001.

Carpenter, P.B.: 53BP1 links DNA repair to immunoglobulin class switch recombination.: Salk Instititute, Conference on DNA Replication and Genomic Stability, August 14, 2004.

Hanlon, D.W., Marquez-Magana, L.M., **Carpenter, P.B.**, Chamberlin, M.J., and Ordal, G.W. (1992) Sequence and characterization of *Bacillus subtilis* CheW. *J. Biol. Chem.* **267:**12055-12060.

Lucio-Eterovic, A.K., Adams, M.M., and **Carpenter, P.B.** (2009) NSD1 transcriptional regulation of new targets in Sotos sindrome. Chromatin: structure and function meeting. Liberia-Costa Rica.

Lucio-Eterovic, A.K., Adams, M.M., Gardner, J., Veerappan, C.S., Rice, J.C., and **Carpenter, P.B.** (2010) Role for the NSD1 methyltransferase in coordinating H3-K36 methylation with RNA polymerase II function. The American Society for Biochemistry and Molecular Biology (ASBMB) meeting. Tahoe City-USA.

Carpenter, P.B., Wagner, E.J. and Strobel, H.W. (2013) "From Biochemistry to Molecular Basis of Disease: this is not your daddy's Krebs cycle". UT Innovations Education conference Austin, Texas

B. Refereed Original Articles in Journals

Hanlon, D.W, **Carpenter, P.B.**, and Ordal, G.W. (1992) Influence of attractants and repellents on methyl-group turnover on methyl-accepting chemotaxis proteins on *Bacillus subtilis* and role of CheW**.** *J. Bacteriol.* **174:**4218-4222.

Carpenter, P.B., Hanlon, D.W., and Ordal, G.W. (1992) FlhF, a *Bacillus subtilis* flagellar gene that encodes a putative GTP-binding protein. *Mol. Microbiol.* **6**: 2705-2713.

Carpenter, P.B., and Ordal, G.W. (1993) *Bacillus subtilis* FlhA, a flagellar protein related to a new family of signal-transducing receptors. *Mol. Microbiol.* **7:**735-743.

Carpenter, P.B., Zuberi, A.R., and Ordal, G.W. (1993) *Bacillus subtilis* flagellar proteins FliP, FliQ, FliR, and FlhB are related to *Shigella flexneri* virulence factors. *Gene* **137**:243-245.

Carpenter, P.B., Hanlon, D.W., Kirsch, M.L., and Ordal, G.W. (1994) Novel aspects of chemotactic sensory transduction in *Bacillus subtilis*. *Res. Microbiol.* **145:**413-419.

Kirsch, M.L., **Carpenter, P.B.**, and Ordal, G.W. (1994) A putative ATP-binding protein from the CHE/FLA Locus of *Bacillus subtilis*. *DNA Seq.* **4**:271-275.

Carpenter, P.B., Mueller, P.R., and Dunphy, W.G. (1996) Role for a *Xenopus* ORC2-related protein in controlling DNA replication. *Nature* **379**:357-360.

Coleman, T.R., **Carpenter, P.B.**, and Dunphy, W.G. (1996) The *Xenopus* Cdc6 protein is essential for the initiation of a single round of DNA Replication in cell free extracts. *Cell* **87:**53-63.

Carpenter, P.B. and Dunphy, W.G. (1998) Identification of a novel 81-kD component *Xenopus* Origin Recognition Complex Subunit. *J. Biol. Chem.* **273**:24891-24897.

Xia, Z., Morales, J., Dunphy, W.G., and **Carpenter, P.B**. (2001) Negative cell cycle regulation and DNA damage-inducible phosphorylation of the BRCT protein 53BP1. *J. Biol. Chem.* **276**:2708-2718.

Richie, C.T., Peterson, C., Lu, T., Hittelman, W.N., **Carpenter, P.B.**, Legerski, R.J**.** (2002) hSnm1 colocalizes and physically associates with 53BP1 before and after DNA damage. *Mol. Cell. Biol.* **24:**8635-47.

Wang, B., Matsuoka, S., **Carpenter, P.B.,** and Elledge, S.J. (2002) 53BP1 a mediator of the DNA damage checkpoint, *Science* **298**:1435-1438.

Fernandez-Capetillo, O., Chen, H.T., Celeste A., Irene Ward, Romanienko, P.J., Morales, M.C., Naka, K., Xia, Z., Camerini-Otero, R.D., Motoyama, N., **Carpenter, P.B**., Bonner, W., Chen, J., and Nussenzweig, A. (2002) DNA damage-induced G_2-M checkpoint activation by histone H2AX and 53BP1. *Nature Cell Biology* **4:**993-997.

Morales, J.C., Xia, Z., Lu, T., Aldrich, M.B., Wang, B., Rosales, C., Kellems, R.E., Hittelman, W.N., Elledge, S.J., **Carpenter, P.B.** (2003) Role for the BRCA1 C-terminal repeats (BRCT) protein 53BP1 in maintaining genomic stability. *J Biol Chem* **278:**14971-14977.

Manis, J.P., Morales, J.C., Xia, Z., Kutok, J.L., Alt, F.W., and **Carpenter, P.B.** (2004) 53BP1 links DNA damage-response pathways to immunoglobulin heavy chain class-switch recombination. *Nature Immunol.* **5**:481-487.*
**Refer to comment on News and View from Posey, J.E., Brandt, V.L., and Roth, D.B.: Paradigm switching in the germinal center. Nature Immunol. 5:476-477, 2004.*

Adams, M.M., Xia, Z., Wang, B., Morales, J.C., Lu, X., Bochar, D.A., Donehower, L., Elledge, S.J. and **Carpenter, P.B.** (2005) Methylation and dimerization of the 53BP1 DNA damage response protein. *Cell Cycle*, **4**:1854-1861.

Franco, S., Gostissa, M., Zha, S., Lombard, D.B., Murphy, M.M., Zarrin, A.A., Yan, C., Tepsuporn, S., Morales, J.C., Adams, M.M., Lou, Z., Bassing, C.H., Manis, J.P., Chen, J., **Carpenter, P.B.** and Alt, F.W. (2006) H2AX prevents DNA breaks from progressing to chromosome breaks and translocations. *Molecular Cell*, 21: 201-214.

Morales, J.C., Franco, S., Murphy, M.M., Bassing, C.H., Mills, K.D., Adams, M.M., Manis, J.P., Rassidaks, G.Z., Alt, F.W., and **Carpenter, P.B.** (2006) 53BP1 and p53 synergize to suppress genomic instability and lymphomagenesis. *Proc. Natl. Acad. Sci. U.S.A.*, 103: 3310-3315.

Adams, M.M. and **Carpenter, P.B.** (2006) Tying the loose ends together in DNA double strand break repair with 53BP1. *Cell Division*, **1**:19.

Houston, S.I., McManus, K.J., Adams, M.M, Sims, J.K., **Carpenter, P.B.**, Hendzel, M.J., and Rice, J.C. (2008) Catalytic function of the PR-Set7 histone H4 lysine 20 monomethyltransferase is essential for mitotic entry and genomic stability. *J. Biol. Chem.*, **283**:19478-19488.

Rai, R., Zheng, H., He, H., Luo, Y., Multani, A., **Carpenter, P.B.**, and Chang, S. (2010) The function of classical and alternative non-homologous end-joining pathways in the fusion of dysfunctional telomeres. *EMBO J*, **29**:2598-610

Dou, H., Huang, C., Singh, M., **Carpenter, P.B.**, and Yeh, E.T. (2010) Regulation of DNA repair through deSUMOylation and SUMOylation of replication protein A complex. *Molecular Cell*, **13**:333-345.

Lucio-Eterovic, A.K., Singh, M.M., Gardner, J.E., Veerappan, C.S., Rice. J.C., and **Carpenter, P.B.** (2010) Role for the nuclear receptor-binding SET domain protein 1 (NSD1) methyltransferase in coordinating lysine 36 methylation at histone 3 with RNA polymerase II function. *Proc. National Acad. Sci. U.S.A.*, **107**: 16952-16957.

Lucio-Eterovic, A.K. and **Carpenter, P.B.** (2011) An Open and shut case for the role of NSD proteins as oncogenes. *Transcription*. 2:158-161.

Wagner. E.J. and **Carpenter, P.B.** (2012) Understanding the language of Lys36 methylation at histone H3. *Nature Reviews Molecular Cell Biol*. 13:115-126.

Feldman, S., Wuerffel, R., Achour , I., Wang, L **Carpenter, P.B.** ,and Kenter, A.L. (2017) 53BP1 contributes to Igh locus chromatin topology during class switch recombination. *J Immunol.* 2017 198: 2434-2444.

Cleary, L. and Carpenter, P.B. (2017) Standardizing the standardized exams: coordinating the

AP, MCAT, and USMLE exams in a spiral learning curve. In preparation

C. Invited Articles (Reviews, Editorials, etc.) in Journals

Morales, J.C. and **Carpenter, P.B.** (2004) Breaking in a new function for casein kinase 2. *Sci Aging Knowledge Environ.* 22:24.

Lucio-Eterovic, A.K. and **Carpenter, P.B**. (2011) An open and shut case for the role of NSD proteins as oncogenes. *Transcription* **2**: 158-161.

D. Chapters

Adams, M.M., and **Carpenter, P.B.** (2009) DNA damage and repair in ataxia telangiectasia. In S.I. Ahmed (Ed.), *Molecular Mechanisms of Ataxia Telangiectasia* (pp. 23-41). Austin: Landes Bioscience.

E. Books

Case Files (2017) Three cases currently under review: Niemann-Pick disease, Phenylketonuria, and Maple syrup urine disease.

F. Other Professional Communications

1. Presentations

Carpenter, P.B.: Biochemical characterization of a putative p53-binding protein. Ellison Foundation New Scholars Presentation, Woods Hole, Massachussetts, August 2000.

Carpenter, P.B.: ATM-dependent control of the BRCT protein 53BP1 and the BRCA1 tumor suppressor during a DNA damage response. Texas A&M University, College Station, Texas, September 13, 2001.

Carpenter, P.B.: ATM dependent control of the BRCT protein 53BP1 and the BRCA1 tumor suppressor during a DNA damage response. Biomedical Research Forum, Texas Southern University, Houston, Texas, December 6, 2001.

Carpenter, P.B.: 53BP1 and the DNA Damage Response:Controlling Genomic Stability. Wright State University, Dayton, Ohio, November 15, 2002.

Carpenter, P.B.: Role of 53BP1 in the cellular response to DNA damage. The University of Illinois at Urbana Champaign, Department of Biochemistry, June 2002.

Carpenter, P.B.: The DNA damage Response: 53BP1 as a novel tumor suppressor. The University of Texas Health Science Center at Houston, Department of Integrative Biology and Pharmacology, January 28, 2003.

Carpenter, P.B.: 53BP1, DNA repair and tumorigenesis. The University of Texas M.D. Anderson Cancer Center, Houston, Texas, April 16, 2003.

Carpenter, P.B.: Role of 53BP1 during the DNA damage response. The University of Michigan Medical School, Department of Biological Chemistry, Ann Arbor, Michigan, December 2, 2003.

Carpenter, P.B.: 53BP1 links DNA repair to immunoglobulin class switch recombination.: Salk Instititute, Conference on DNA Replication and Genomic Stability, August 14, 2004.

Carpenter, P.B.: 53BP1, linking DNA repair and class switch recombination. The University of Illinois, September 3, 2004.

Carpenter, P.B.: Linking DNA Damage Response and Methylation. University of Southern California, November, 2006.

Carpenter, P.B.: Role of 53BP1 in the DNA Damage Response. The University of Texas at San Antonio, September 2007.

Carpenter, P.B.: NSD proteins in chromatin and disease. Texas Heart Institute, Houston, Texas, May 5, 2010.

Carpenter, P.B.: Nuclear receptor-binding SET domain proteins: Linking chromatin to disease. University of California, Riverside, June 3, 2011

Carpenter, P.B. NSD1 links chromatin to disease. Barretos Cancer Hospital, Barretos, Brazil Sept 7, 2011.

2013 TIME commission “Next Generation Biochemistry” July, Houston

2014 “Next Generation Biochemistry” February, Austin. Innovators meeting of the Ken Shine Academy, Poster Presentation

2017 UT Collaborative Education Symposium, May 12, 2017 “Standardizing the standardized exams with a spiral curriculum”

2. Non-refereed publications
None

3. Letters to the Editor
None

4. **Scientific Exhibits**
   None

5. **Videos**
   2017: Flipped classroom videos for Biochemistry

6. **Other**
   None

G. Visiting Professorships
None