**COOPER MEDICAL SCHOOL OF ROWAN UNIVERSITY**

**Curriculum Vitae**

 **Date:** August 2023

**Name**: Valerie J. Carabetta, Ph.D.

**Title:** Assistant Professor

**Office Address**:

Cooper Medical School of Rowan University

Department of Biomedical Sciences

MEB-530

401 S. Broadway

Camden, NJ 08103

856-956-2736

carabetta@rowan.edu

**Citizenship**: United States

**Education**:

8/1999-5/2003 B.A. (Genetics), Rutgers University, NJ

8/2003-1/2010 Ph.D. (Molecular Biology), Princeton University, NJ

**Postgraduate Training and Fellowships:**

1/2010-1/2015 Post doc, Public Health Research Institute (Rutgers University), Newark, NJ

**Academic Appointments**:

2/2015-6/2018 Research Associate II, Public Health Research Institute (Rutgers University), Newark, NJ

7/2018-Present Assistant Professor, Department of Biomedical Sciences, Cooper Medical School of Rowan University, Camden, NJ

2/2021-Present Adjunct Associate Professor, Rowan School of Osteopathic Medicine, Stratford, NJ

**Hospital Appointments**: N/A

**Licensure**: N/A

 **Specialty Certification**: N/A

**Professional Organizations/Committees**:

2014-Present American Society for Microbiology (ASM)

2020-Present Theobald Smith Society

## Awards, Honors and Membership in Honorary Societies:

## 2000-Present Phi Eta Sigma

2000-Present National Society of Collegiate Scholars

2001-Present Golden Key International Honor Society

## 2002-Present Phi Beta Kappa

1999-2003 Deans list every semester, Rutgers University, New Brunswick, NJ

09/2002-05/2003 Henry Rutgers Scholar, Rutgers University, New Brunswick, NJ

05/2003 Graduated with Highest Honors, Rutgers University, New Brunswick, NJ

05/2003 Duncan and NancyMacMillian Awardfor Research Excellence, Department of Genetics, Rutgers University

05/2003 Deans Award for Academic Excellence, Rutgers College, Rutgers University

05/2009 Annual Molecular Biology retreat award for outstanding poster presentation, Princeton University, Princeton, NJ

**Editorial Positions**:

2020-2022 Co-Guest Editor, with Dr. Julie Hardouin, for Frontiers in Microbiology. “Bacterial Post-translational Modifications” special topic collection.

2021-Present Guest Editor for Antibiotics. Special Issue: "Novel Antimicrobial Strategies to Combat Multidrug-Resistant (MDR) Gram-Negative Bacteria"

2022-Present Co-Guest Editor, with Dr. Olatian Akintunde for Springer Publications, Methods in Molecular Biology. Book collection: “High Throughput Gene Screening: Methods and Protocols.”

**Service on National Grant Review Panels, Study Sections, Committees**:

2019-present External Expert Reviewer, Agence Nationale de la Recherche (France), research grants (approx. $630,000 direct costs)

2/2022-3/2022 IAR reviewer for NIH pathway to Independence Awards (K99/R00), section ZGM1 TWD-X (KR)

2/2023-3/2023 IAR reviewer for NIH pathway to Independence Awards (K99/R00), section 05 ZGM1 TWD-X (KR)

**Service on Manuscript Peer Review for Scientific Journals:**

Manuscript reviewer for *Molecular Cell Proteomics, mSystems, Molecular Microbiology, Journal of Bacteriology, Journal of Proteome Research, Journal of Proteomics, ACS Chemical Biology, Microbiology, PLoS ONE, mBio, Frontiers in Physiology, Microbiology Open, Proteomes, Journal of Clinical and Translational Medicine, Antibiotics, Pharmaceuticals, Pharmaceutics, Microorganisms, Environmental Microbiology, Frontiers in Microbiology, International Journal of Molecular Sciences, Microbiology Spectrum, Antioxidants, BMC Infectious Diseases, Molecules, Future Microbiology, International Microbiology, Proceedings of the National Academy of Sciences, Microbiology Spectrum.*

Member of the Reviewer board for *Microorganisms*, Topical Advisory board for *Antibiotics*, and review editor for *Frontiers in Bacteriology*.

**Service on Rowan University Committees**:

2019-2020 University Senate Student Relations Committee

2019-2022 University Senate Intercollegiate Athletics Committee

2021-Present University Senate Research Committee

2021-Present Alternate for the Graduate Advisory Council

**Service on Cooper Medical School of Rowan University Committees:**

2019-Present Blinded Interviewer for the Admissions committee

2019-Present Member of the Curriculum Phase I subcommittee

2019, 2022 Member of the BMS Lab space task force

2019 Member of faculty search committee for Assistant Professor of Immunology

2019-Present Volunteer member of the ALG case review committee

2019-Present Member of the Conflict-of-Interest committee

2019-2021 Member of the Faculty Development committee

2019-2021 Coordinator of the BMS monthly seminar series

2019-2020 Member of the Ad Hoc subcommittee for Review of Medical Education Program Objectives

2020-Present Member of BMS Research Council

2021-Present Member of the Research committee

2021 Member of the Ad Hoc Scholar’s Workshop Review Subcommittee

2021 Chair of the faculty search committee for an Assistant Professor of Biochemistry

**Service on Other Graduate School Committees:**

2019-2022 Member of Thesis Committee for Mehdi Benmassaoud, Rowan University, Biomedical Engineering department; Advisor: Dr. Sebastian Vega

2021-Present Member of Thesis Committee for Jie Yang, Rowan School of Osteopathic Medicine, Department of Molecular Biology; Advisor: Dr. Brian Weiser

2021-Present Member of Thesis Committee for Shannon Dwyer, Rowan School of Osteopathic Medicine, Department of Molecular Biology; Advisor: Dr. Sal Caradonna

2021-Present Member of the Rowan GSBS Curriculum Committee

2022-Present Member of the Thesis Committee for Goutham Kodakandla, Cooper Medical School of Rowan University, Department of Biomedical Science; Advisor: Darren Boehning

2022-Present Member of the Thesis Committee for Emily Hansen, Cooper Medical School of Rowan University, Department of Biomedical Science; Advisor: James Holaska

2022-Present Member of the Thesis Committee for Nicholas Marano, Cooper Medical School of Rowan University, Department of Biomedical Science; Advisor: James Holaska

2023-Present Member of Thesis Committee for Jill Thompson, Graduate School of Biomedical Sciences, Department of Molecular Biology; Advisor: Dr. Sal Caradonna

2023-Present Member of the Thesis Committee for Christal Rolling, Graduate School of Biomedical Sciences, Department of Biomedical Sciences; Advisor James Holaska

2023-Present Member of the Thesis Committee for Tamarty Robinson, Graduate School of Biomedical Sciences, Department of Molecular Biology; Advisor Katrina Cooper

**Service on Hospital Committees: N/A**

**Service to the Community:**

2018-2020 Member of the Faculty Learning Community (FLC); Promotion of STEMM disciplines with students from Wiggins College Preparatory Family School in Camden.

2020 Volunteered at the Rowan School of Osteopathic Medicine vaccine clinic. I worked with the vaccine prep group, where we prepared the syringes for injection, and distributed vaccines.

2022-present Participation in CMSRUs Primary Urban Partnership (PUP) outreach program. Run one scientific session with 6th graders at St. Joseph Pro-Cathedral school.

**Sponsorship of Candidates for Postgraduate Degree:**

1/2022-Present Liya Popova, PhD candidate, Graduate School of Translational Biomedical Sciences, Rowan University

9/2022-Present Maxwell Akantibila, master’s candidate, Masters of Pharmaceutical Sciences, Rowan University

**Sponsorship of Postdoctoral Fellows:**

7/2021-2/2023 Olaitan Akintunde, Ph.D.

4/2023-present Mohamed Hawala, Ph.D.

**Teaching Responsibilities:**

2018 MED 1501, “Fundamentals,” Active Learning Group, Fall semester, 6 contact hours per week for 16 weeks; 12 non-contact hours/week of additional teaching and prep.

2018 MED 1501, “Fundamentals,” Lectures on Bacterial pathogenesis I and II. 1 contact hour per week for each lecture (2 hours total). ~30 non-contact hours per lecture (~60 hours total non-contact hours) for preparation and additional teaching. Ran the Bacteriology Team-based learning activity (2 non-contact hours preparation, 2 contact hours). Participated in running the Microbiology laboratory session, 2 contact hours.

2019 MED 1502, “Life Stages,” Active Learning Group, Spring semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1503, “Infectious Diseases,” Co-director with Dr. Carrasco. Organized faculty lecturers for the course, including putting together exams, quizzes and TBL activities. 2-5 non-contact hours per week for the four-week course.

2019 MED 1503, “Infectious Diseases,” Lecturer. Lecture on Antibiotic Resistance. ~30 non-contact hours for the lecture for preparation and additional teaching. Ran the Bacteriology Team-based learning activity; 2 non-contact hours preparation, 2 contact hours per session (4 total; 8 non-contact hours and contact hours total). Participated in running the two Microbiology laboratory sessions, 4 contact hours.

2019 MED 1503, “Infectious Diseases,” Active Learning Group, Spring semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1504, “Hematology and Oncology,” Active Learning Group, Spring semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1509, “Skin/Musculoskeletal,” Active Learning Group, Spring semester, 6 contact hours per week for 8 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1611, “Cardiovascular,” Active Learning Group, Fall semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1612, “Pulmonary,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1614, “Endocrine,” Active Learning Group, Fall semester, 6 contact hours per week for 3 weeks; 12 non-contact hours/week of additional teaching and prep.

2019 MED 1613, “Gastroenterology,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep

2019 MED 1501, “Fundamentals,” Block IV director. Organized faculty lecturers for the course, including putting together exams, quizzes and Jigsaw/TBL activities. 2-5 non-contact hours per week for the four-week course.

2019 MED 1501, “Fundamentals,” Lectures on Bacterial pathogenesis I and II. 1 contact hour per week for each lecture (2 hours total). ~6 non-contact hours per lecture (~12 hours total non-contact hours) for preparation and additional teaching. Ran the Bacteriology Jigsaw (30 non-contact hours to put together activity and prepare, 2 contact hours). Participated in running the Microbiology laboratory session, 2 contact hours.

2019-2020 MED 1602, “Urology-Renal,” Active Learning Group, Fall semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2020 MED 1603, “Women’s Health,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2020 MED 1503, “Infectious Diseases,” Co-director with Dr. Carrasco. Organized faculty lecturers for the course, including putting together exams, quizzes and TBL activities. 2-5 non-contact hours per week for the four-week course.

2020 MED 1503, “Infectious Diseases,” Lecturer. New lecture: “Introduction to Bacterial Pathogens.” 1 contact hour and ~30 non-contact hours for the lecture for preparation and additional teaching. Lecture on Antibiotic Resistance. 1 contact hour, 6 non-contact hours to update and prepare for teaching. Ran the Bacteriology Team-based learning activity; 2 non-contact hours preparation, 2 contact hours per session (4 total; 8 non-contact hours and contact hours total). Participated in running the two Microbiology laboratory sessions, 4 contact hours.

2020 MED 1609, “Otolaryngology,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2020 MED 1604, “Neurology-Psychiatry,” Active Learning Group, Fall semester, 6 contact hours per week for 6 weeks; 12 non-contact hours/week of additional teaching and prep.

2020 MED 1501, “Fundamentals,” Active Learning Group, Fall semester, 6 contact hours per week for 16 weeks; 12 non-contact hours/week of additional teaching and prep.

2020 MED 1501, “Fundamentals,” Lectures on Bacterial pathogenesis I and II. 1 contact hour per week for each lecture (2 hours total). ~6 non-contact hours per lecture (~12 hours total non-contact hours) for updates, preparation and additional teaching. Ran the Bacteriology Jigsaw activity (2 non-contact hours preparation, 2 contact hours). Participated in running the Microbiology laboratory session, 2 contact hours.

2021 MED 1502, “Life Stages,” Active Learning Group, Spring semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1503, “Infectious Diseases,” Co-director with Dr. Carrasco. Organized faculty lecturers for the course, including putting together exams, quizzes and TBL activities. 2-5 non-contact hours per week for the four-week course.

2021 MED 1503, “Infectious Diseases,” Two lectures on “Introduction to Bacterial Pathogens”, and “Antibiotic Resistance”. One contact hour per lecture (2 hours total), 6 non-contact hours to update and prepare for teaching (~12 hours total). Ran the Bacteriology Team-based learning activity; 2 non-contact hours preparation, 2 contact hours per session (3 total; 6 non-contact hours and contact hours total). Participated in running the two Microbiology laboratory sessions, 4 contact hours.

2021 MED 1503, “Infectious Diseases,” Active Learning Group, Spring semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1504, “Hematology and Oncology,” Active Learning Group, Spring semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1509, “Skin/Musculoskeletal,” Active Learning Group, Spring semester, 6 contact hours per week for 8 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1611, “Cardiovascular,” Active Learning Group, Fall semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1612, “Pulmonary,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1614, “Endocrine,” Active Learning Group, Fall semester, 6 contact hours per week for 3 weeks; 12 non-contact hours/week of additional teaching and prep.

2021 MED 1613, “Gastroenterology,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep

2021 MED 1501, “Fundamentals,” Lectures on Bacterial pathogenesis I and II. 1 contact hour per week for each lecture (2 hours total). ~6 non-contact hours per lecture (~12 hours total non-contact hours) for preparation and additional teaching. Ran the Bacteriology Jigsaw (30 non-contact hours to put together activity and prepare, 2 contact hours). Participated in running the Microbiology laboratory session, 2 contact hours.

2021-2022 MED 1602, “Urology-Renal,” Active Learning Group, Fall semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2022 MED 1603, “Women’s Health,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2022 MED 1503, “Infectious Diseases,” Co-director with Dr. Carrasco. Organized faculty lecturers for the course, including putting together exams, quizzes and TBL activities. 2-5 non-contact hours per week for the four-week course.

2022 MED 1503, “Infectious Diseases,” Lecturer. New lecture: “Introduction to Bacterial Pathogens.” 1 contact hour and ~30 non-contact hours for the lecture for preparation and additional teaching. Lecture on Antibiotic Resistance. 1 contact hour, 6 non-contact hours to update and prepare for teaching. Ran the Bacteriology Team-based learning activity; 2 non-contact hours preparation, 2 contact hours per session (4 total; 8 non-contact hours and contact hours total). Participated in running the two Microbiology laboratory sessions, 4 contact hours.

2022 MED 1609, “Otolaryngology,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2022 MED 1604, “Neurology-Psychiatry,” Active Learning Group, Fall semester, 6 contact hours per week for 6 weeks; 12 non-contact hours/week of additional teaching and prep.

2022 MED 1501, “Fundamentals,” Active Learning Group, Fall semester, 6 contact hours per week for 16 weeks; 12 non-contact hours/week of additional teaching and prep.

10/2022 CMB802, “Experimental Design.” Lectures on “The power of model organisms and the art of the genetic screen.” Ran follow up discussion session the following week. 1-1.5 contact hours per week for each lecture (2.5 hours total). ~25 non-contact hours to prepare lecture and quiz, and additional teaching.

2023 MED 1502, “Life Stages,” Active Learning Group, Spring semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2023 MED 1503, “Infectious Diseases,” Co-director with Dr. de la Torre. Organized faculty lecturers for the course, including putting together exams, quizzes and TBL activities. 2-5 non-contact hours per week for the four-week course.

2023 MED 1503, “Infectious Diseases,” Two lectures on “Introduction to Bacterial Pathogens”, and “Antibiotic Resistance”. One contact hour per lecture (2 hours total), 6 non-contact hours to update and prepare for teaching (~12 hours total). Ran the team-based learning activity; 2 non-contact hours preparation, 2 contact hours per session (3 total; 6 non-contact hours and contact hours total). Participated in running the two Microbiology laboratory sessions, 4 contact hours.

2023 MED 1503, “Infectious Diseases,” Active Learning Group, Spring semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

2023 MED 1504, “Hematology and Oncology,” Active Learning Group, Spring semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2023 MED 1509, “Skin/Musculoskeletal,” Active Learning Group, Spring semester, 6 contact hours per week for 8 weeks; 12 non-contact hours/week of additional teaching and prep.

2023 MED 1611, “Cardiovascular,” Active Learning Group, Fall semester, 6 contact hours per week for 5 weeks; 12 non-contact hours/week of additional teaching and prep.

2023 MED 1612, “Pulmonary,” Active Learning Group, Fall semester, 6 contact hours per week for 4 weeks; 12 non-contact hours/week of additional teaching and prep.

**Clinical Responsibilities: N/A**

**Grant Support:**

GM138303 **PI:** Valerie J. Carabetta. **Title:** Investigation of the physiological significance of protein acetylation in *Bacillus subtilis.* **Total direct costs:** $1,151,716. **Total indirect costs:** $702,547. **Project period:** 09/01/2020-06/30/2025.

**Publications**:

1. **Refereed Original Articles in Journals:**
2. Peterson CN, **Carabetta VJ**, Chowdhury T, Silhavy T. LrhA regulates *rpoS* translation in response to the Rcs phosphorelay system in *Escherichia coli*. *J. Bateriol* 2006; 188 (9): 3175-3181.
3. **Carabetta VJ**, Mohanty BK, Kushner SR, Silhavy TJ. The stationary phase response regulator SprE (RssB) has a novel function involved in the control of mRNA stability. *J. Bateriol* 2009; 191(22): 6812-6821.
4. **Carabetta VJ**, Li T, Shakya A, Greco TM, Cristea IM. Integrating Lys-N proteolysis and N-terminal guanidination for improved fragmentation and relative quantification of singly-charged ions. *J Am Soc Mass Spetrom* 2010; 21(6): 1050-1060.
5. **Carabetta VJ**, Silhavy TJ, Cristea IM. The response regulator SprE (RssB) is required for maintaining PAP I-degradosome association during stationary phase. *J Bacteriol.* 2010; 192(14): 3713-3721.
6. **Carabetta VJ**, Tanner AW, Greco TM, Defrancesco M, Cristea IM, Dubnau D. A complex of YlbF, YmcA and YaaT regulates sporulation, competence, and biofilm formation by accelerating the phosphorylation of Spo0A. *Mol Microbiol* 2013;88(2): 283-308.
7. Mann JM, **Carabetta VJ**, Cristea IM, Dubnau D. Complex formation and processing of the minor transformation pillins of *Bacillus subtilis*. *Mol Microbiol* 2013;90(6): 1201-1215.
8. Zafar AM\*, **Carabetta VJ\***, Mandel MJ, Silhavy, TJ. Transcriptional occlusion caused by overlapping promoters. *Proc Natl Acad Sci USA* 2014; 111(4): 1557-1561. \*These authors contributed equally to this work.
9. Hahn J, Tanner AT, **Carabetta VJ**, Cristea IM, Dubnau D. Persistence and the role of ComGA in outgrowth from the *Bacillus subtilis* K-State. *Mol Microbiol* 2015; 97(3): 454-457.
10. **Carabetta VJ\***, Greco TM\*, Tanner AW, Cristea IM, Dubnau D. Temporal regulation of the *B. subtilis* acetylome and evidence for a role of MreB acetylation in cell wall growth. *mSystems* 2016; 1(3): pii e00005-16. \*These authors contributed equally to this work.
11. Dubnau EJ, **Carabetta VJ***,* Tanner AW, Miras M, Diethmaier C, Dubnau D. A protein complex supports the production of Spo0A-P and plays additional roles for biofilms and the K-state in *Bacillus subtilis*. *Mol Microbiol* 2016; 101(4): 606-624.
12. Tanner AW, **Carabetta VJ**, Martinie RJ et al. The RicAFT (YmcA-YlbF-YaaT) complex carries two [4Fe-4S]2+ clusters and may respond to redox changes. *Mol Microbiol* 2017;104(5): 837-850.
13. Tanner AW, **Carabetta VJ**, Dubnau D. ClpC and MecA, components of a proteolytic machine, prevent Spo0A-P-dependent transcription without degradation. *Mol Microbiol* 2018; 108(2): 178-186.
14. **Carabetta VJ\***, Greco TM, Cristea IM and Dubnau D\*. YfmK is an N-lysine acetyltransferase that directly acetylates the histone-like protein HBsu in *Bacillus subtilis*. *Proc Natl Acad Sci U.S.A.* 2019: 116 (9): 3752-3757. \*Co-corresponding authors.
15. Luu J, Mott CM, Schreiber OR, Giovinco HM, Betchen M and **Carabetta VJ**. N-lysine acetylation of the histone-like protein HBsu regulates the process of sporulation and affects the resistance properties of *Bacillus subtilis* spores. *Front Microbiol* 2022; 12: 782815.
16. Betchen M, Giovinco HM, Curry M, Luu J, Nahra R, Fraimow H and **Carabetta VJ**. Evaluating the effectiveness of hospital antiseptics on multidrug-resistant *Acinetobacter baumannii*: Understanding the relationship between microbicide and antibiotic resistance. *Antibiotics* 2022, 11(5), 614; https://doi.org/10.3390/antibiotics11050614
17. Deolankar MS, Carr RA, Fliorent R, Roh S, Fraimow H, and **Carabetta VJ**. Evaluating the efficacy of eravacycline and omadacycline against extensively drug-resistant *Acinetobacter baumannii* patient isolates. *Antibiotics* 2022; 11(10): 1298; doi: 10.3390/antibiotics11101298.
18. **Invited Articles (reviews, editorials, etc.) in Journals; Chapters; Books; Other Professional Communications:**
19. **Carabetta VJ** and Cristea IM. The regulation, function, and detection of protein acetylation in bacteria. *J Bacteriol.* 2017;199(16): e00107-17.
20. **Carabetta VJ** (2021). Addressing the possibility of a histone-like code in bacteria. *J Proteome Res.* 20(1): 27-37.
21. **Carabetta VJ**\*, K Esquilin-Lebron, E Zelzion, JM Boyd\* (2021). “Genetic approaches to uncover gene products involved in iron-sulfur protein maturation: High throughput genomic screening using transposon-sequencing” in Fe-S Protein: Methods and Protocols, P.C. Dos Santos, Ed. (Springer US, New York, NY), pp. 51-68.\*Co-corresponding authors
22. Luu J and **Carabetta VJ** (2021). The contribution of N-lysine acetylation towards regulation of bacterial pathogenesis. *mSystems*, 6(4):e0042221.
23. Copling A, Akantibila M, Kumaresan R, Fleischer G, Cortes D, Tripathi RS, **Carabetta VJ\*,** and Vega SL\* (2023) Recent advances in antimicrobial peptide hydrogels. *Int J Mol Sci* 24(8): 7563. \*Co-corresponding authors
24. Akintunde, A, Tucker, T and **Carabetta VJ** (2023). “The evolution of high throughput genetic screening technologies” in High Throughput Gene Screening: Methods and Protocols, VJ Carabetta and O Akintunde, Eds. (Springer US, New York, NY). Accepted, publication expected Sept 2023.
25. Popova, L and **Carabetta VJ** (2023). “The use of high-throughput sequencing in personalized medicine” in High Throughput Gene Screening: Methods and Protocols, VJ Carabetta and O Akintunde, Eds. (Springer US, New York, NY). Accepted, publication expected Sept 2023.
26. **Abstracts:** N/A
27. **Electronic/ Internet Contributions:** N/A

**Presentations (Regional, National, International):**

1. *Characterization of the nitrogen starvation signaling pathway in E. coli.* Gordon Research Conference Microbial Stress Responses, South Hadely, MA, July 9-14, 2006.
2. *The stationary phase response regulator SprE has a novel role in the control of mRNA degradation in Escherichia coli.* **Molecular Genetics of** **Bacteria & Phages, Cold Spring Harbor, NY, August 20-24, 2008.**
3. *Novel interacting partners of the Escherichia coli poly(A) polymerase I (PAPI): in vivo evidence for interaction with the degradosome.* American Society for Mass Spectrometry (ASMS) annual meeting, Philadelphia, PA, May 31-June 4, 2009.
4. *Integrating Lys-N proteolysis and N-terminal guanidination for improved fragmentation and relative quantification of singly-charged ions.* American Society for Mass Spectrometry (ASMS) annual meeting, Salt Lake City, UT, May 23-27, 2010.
5. *Do the competence, biofilm and sporulation regulators YlbF and YmcA work via the phosphorelay?* New York *Bacillus* Interest Group meeting, New York, NY, June 3, 2011.
6. *YmcA, YlbF and YaaT regulate the phosphorelay.* New York *Bacillus* Interest Group meeting, New York, NY, June 8, 2012.
7. *Does redox sensing regulate stationary phase development in Bacillus subtilis?* Public Health Research Institute, Newark, NJ, June 12, 2013.
8. *Bacteria are people too, protein acetylation in Bacillus subtilis.* Public Health Research Institute, Newark, NJ, March 26, 2014.
9. *Characterization of the Bacillus subtilis acetylome.* American Society for Microbiology (ASM) General meeting, Boston, MA, May 17-20, 2014.
10. *Characterization of the Bacillus subtilis protein acetylome.* New York *Bacillus* Interest Group meeting, New York, NY, June 13, 2014.
11. *Exploring the acetyl proteome of Bacillus subtilis: Could there be a histone-like code in bacteria?* Public Health Research Institute, Newark, NJ, March 11, 2015.
12. *Acetylome profiling of Bacillus subtilis supports an evolutionary link to human mitochondria.* US HUPO, Next Generation Proteomics, Tempe, AZ, May 15-18, 2015.
13. ***Characterizing growth phase-dependent changes in the Bacillus subtilis acetylome and proteome using label-free quantification.*** American Society for Mass Spectrometry (ASMS) annual meeting, St. Louis, MO, May 31-June 4, 2015.
14. *Using Tn-seq to unravel a complex biological process: Iron trafficking in Bacillus subtilis.* Public Health Research Institute, Newark, NJ, March 2, 2016.
15. *Does HBsu acetylation regulate nucleoid compaction in Bacillus subtilis?* New York *Bacillus* Interest Group meeting, New York, NY, June 8, 2017.
16. *Does HBsu acetylation regulate nucleoid compaction in Bacillus subtilis?* Public Health Research Institute, Newark, NJ, September 27, 2017.
17. *Does HBsu acetylation regulate nucleoid compaction in Bacillus subtilis?* Microbiology at Rutgers University: 2018 Symposium, New Brunswick, NJ, February 2, 2018.
18. *YfmK is a novel protein acetyltransferase that directly acetylates the histone-like protein HBsu and regulates nucleoid compaction in Bacillus subtilis.* New York *Bacillus* Interest Group meeting, New York, NY, June 15, 2018.
19. *YfmK is a novel N-lysine acetyltransferase that directly acetylates the histone-like protein HBsu in Bacillus subtilis.* Rutgers, Camden College of Arts and Sciences, Biology seminar series. November 1, 2018. Invited by Dr. Eric Klein.
20. *YfmK is an N-lysine acetyltransferase that directly acetylates the histone-like protein HBsu in Bacillus subtilis.* Theobald Society meeting, New Jersey Branch of ASM (American Society for Microbiology). Rutgers University, New Brunswick, April 25, 2019. Invited by Dr. Jeffery Boyd.
21. *YfmK is an N-lysine acetyltransferase that directly acetylates the histone-like protein HBsu in Bacillus subtilis.* Federation of American Societies for Experimental Biology (FASEB): “The Reversible Protein Acetylation in Health and Disease conference.” Lisbon Portugal, August 4-9, 2019. Invited by Dr. Ileana Cristea.
22. CMSRU Virtual Event for Rowan Alumni and CMSRU Friends, Faculty and Students. Invited participant (November 5, 2021).
23. *Evaluating the effectiveness of hospital disinfectants on multidrug-resistant Acinetobacter baumannii*." Poster, World Microbe Forum (Virtual), June 20-24, 2021.
24. *Investigating the role of YlaN in iron homeostasis in Staphylococcus aureus*. Poster, World Microbe Forum (Virtual), June 20-24, 2021.
25. *Nε-lysine acetylation of the histone-like protein HBsu regulates sporulation and resistance properties of Bacillus subtilis spores.* ASM Microbe 2022, June 9-13, 2022, Washington DC.
26. *Addressing the possibility of a histone-like code in bacteria.* Theobald Smith Society Symposium. July 22, 2020, virtual meeting. Invited by Dr. Eric Klein.
27. *Is there a histone-like code in bacteria?* Rowan School of Osteopathic Medicine, Stratford, NJ, January 21, 2021. Invited by Dr. Brian Weiser.
28. *Deciphering a histone-like code in bacteria.* Rowan School of Osteopathic Medicine, Research day. May 6, 2021. Invited by Dr. Adarsh Gupta
29. *Characterization of antibiotic susceptibility profiles of extensively- and pan-drug resistant Acinetobacter baumannii clinical isolates.* Theobald Smith Society meeting, November 30, 2022.
30. *Evaluating the activities and targets of new lysine acetyltransferases from* *Bacillus subtilis*. Theobald Smith Society meeting, November 30, 2022.
31. *Uncovering the mechanism by which HBsu acetylation regulates the process of sporulation in* *Bacillus subtilis*.” Poster, Theobald Smith Society meeting, November 30, 2022.
32. *Revitalizing old antibiotics for the fight against extensively drug-resistant (XDR) Acinetobacter baumannii.* Coriell Research Institute. May 3, 2023. Invited by Dr. Shoghag Panjarian.
33. *Nε-lysine acetylation of the histone-like protein HBsu regulates sporulation and resistance properties of Bacillus subtilis spores.* Poster, Theobald Smith Society meeting, May 19, 2023, Piscataway NJ.

**Other:** N/A