

CURRICULUM VITAE (C.V)

A. PERSONAL DATA

1. Full Name (Surname first): OGUNWOLE Eunice
2. Date of Birth: 1st April, 1984
3. Details of Contact Address: Department of Physiology, Faculty of Basic Medical Sciences, University of Medical Sciences, Ondo City, Ondo State.
 - a. E-mail Address(es): eogunwole@unimed.edu.ng
 - b. Mobile Phone Number(s): 07059545657
4. Nationality: Nigerian
5. State of Origin: Oyo
6. Local Government Area: Ibadan South East
7. Permanent Home Address: S2/8 Ile Agbaakin, Esu-Awele Compound, Oranyan Ibadan
8. Marital Status: Single
9. Number of Children and their Ages: Nil
10. Next of Kin: Mr. Ebenezer Idowu Ogunwole
11. Details of Contact Address of Next of Kin:
 - a. E-mail Address(es): ogunwoleidowu@gmail.com
 - b. Mobile Phone Number(s): 08132194418
12. Date of Assumption of Duty: 15th June, 2020
13. Rank/Status of First Appointment: Lecturer I
14. Present Status: Senior Lecturer
15. Date of Last Promotion: 1st October 2023
16. Present Salary, Grade Level and Step: CONUASS 5 Step 3
17. Date of Confirmation of Appointment: 15th June, 2023
18. Faculty/Directorate: Faculty of Basic Medical Sciences
19. Department/Unit: Physiology
20. Websites/webpage links

University webpage: <https://www.unimed.edu.ng/staff-profile/eogunwole>

Google Scholar page: <https://scholar.google.com/citations?hl=en&user=WsEH77UAAAAJ>

ORCID: <https://orcid.org/0000-0003-2693-7566>

Scopus ID: [57191370224](https://scopus.com/authorid/57191370224)

PUBMED: <https://pubmed.ncbi.nlm.nih.gov/?term=Eunice+Ogunwole&sort=date>

B. EDUCATIONAL BACKGROUND

1. Higher Educational Institutions Attended with Dates
 - i. University of Ibadan, Ibadan 2013 - 2019
 - ii. University of Ibadan, Ibadan 2011 - 2012
 - iii. Ahmadu Bello University, Zaria 2005 - 2009
2. Academic/Professional Qualifications and Distinctions Obtained with Date
 - i. Ph.D. Physiology 2019
 - ii. M.Sc. Physiology 2012
 - iii. B.Sc. (Hons.) Physiology 2009
 - iv. Diploma in Computer Application Packages 2009
 - v. National Diploma in Agricultural Technology 2005
 - vi. Senior Secondary School Certificate (WAEC) 2002
 - vii. First School Leaving Certificate 1996
3. Other Distinctions and Awards with Dates
 - a. Scholarship Nil
 - b. Fellowship Nil
 - c. Research Grants
 - i. Co-winner: Award of TETFUND Based Research Grant (N4,600,000): Mechanistic assessment of beta (β -) glucan and pioglitazone on hypothalamic-pituitary-testicular impairment and apoptotic-inflammatory influx in streptozotocin-induced diabetic male rats. Currently being administered.
 - d. National Awards Nil
 - e. International Awards
 - 3rd Best Poster Presentation award at the 2024 FBMS week/Conference, University of Medical sciences, Ondo City, Nigeria, June 10th – 11th, 2024,

C. WORK EXPERIENCE WITH DATES

1. Previous Work Experience Outside the University System with Dates:

- a. Industrial Training Scheme: National Animal Production Research Institute, (NAPRI) Zaria. Aug. 2004 - Nov. 2004
 - b. National Youth Service Corps: School of Nursing, Gusau, Zamfara State (Lecturing) Jul. 2009 – Jun. 2010
2. Previous Work Experience in other Universities:
- a. Lecturer I, Bingham University, Karu, Nasarawa State. Oct. 1, 2019- Jun. 2020.
 - b. Lecturer II, Bingham University, Karu, Nasarawa State. Oct. 1, 2016- 2019
 - c. Ass. Lecturer, Bingham University, Karu, Nasarawa State. Oct. 17, 2013- 2016.

Responsibilities in Bingham University

- Taught MBBS/BDS and B.Sc. students (in the faculties of Basic Medical Sciences, Pharmacy, Nursing Science, Applied and Allied sciences) the following courses: General Principles of Physiology, Blood Physiology, Respiratory Physiology, Cardiovascular Physiology, Endocrinology, Neurophysiology, Physiology of the Special Senses, Gastrointestinal physiology, Renal Physiology, Reproductive Physiology, Applied and Comparative Physiology 2013-2020
 - Instruction of MBBS and B.Sc. students during Physiology practical sessions and markings of practical manuals 2013-2020
 - Scoring of MBBS/BDS and B.Sc. students for continuous assessment, written and oral examination 2013-2020
 - Supervised to completion B.Sc. Physiology Students Seminars (18 students) and Research projects (11 students) 2013-2020
 - Assessed undergraduate SIWES reports and presentations 2013-2020
 - GST/BST coordinator (FBMS) 2015-2020
 - 400 level/Seminar coordinator (Physiology) 2017-2019
 - 100 level coordinator (Physiology) 2019-2020
 - Faculty exam officer (FBMS) 2019-2020
3. Work Experience in University of Medical Sciences, Ondo
- a. Senior Lecturer, University of Medical Sciences, Ondo, Ondo State. Oct, 2023-date
 - b. Lecturer I, University of Medical Sciences, Ondo, Ondo State. Jun. 2020-Oct. 2023

Responsibilities within University of Medical Sciences, Ondo

- Taught MBBS/BDS and B.Sc. students (in the faculties of Basic Medical Sciences, Pharmacy, Rehabilitation, Nursing Science, Applied and Allied sciences and the UNIMED Conversion program) courses which includes: Cardiovascular Physiology, Neurophysiology, Literature Review and Research Methodology, Endocrinology, Reproductive Physiology, Blood Physiology, Respiratory Physiology, Advanced Renal Physiology, Molecular Genetics, Advanced Endocrinology and Reproduction.

2020 - till date

- Scoring of MBBS/BDS and B.Sc. students for continuous assessment, written and oral examination.

2020- till date

- Supervised to completion B.Sc. Physiology Student Seminars (17 students) and Research Projects (17 students)

2020- till date

- Taught Exercise physiology to Postgraduate diploma in Physiotherapy (Sport Physiology option)

2023/2024

4. Courses Taught within the Current Session

- Blood and Body fluid physiology (PHS 817)
- Reproduction Physiology and Fetal Programming (PHS 822)
- Comparative Physiology (PHS 411)
- Advanced Endocrinology and Reproduction (PHS 421)
- Molecular Physiology (PHS 423)
- Endocrinology and Reproduction (PHS 312)
- Endocrinology (PHS 311)
- Physiology Entrepreneurship (PHS 317)
- Physiology courses to MBBS/BDS programs

5. Graduate Student Supervision within Current Session

- Currently ongoing: 2 M.Sc. Physiology
- Completed: 1 M.Sc. Physiology (graduated 2025)

6. Undergraduate Supervision

- Completed: 28 BSc. Physiology (graduated 2015-2025)

D. MEMBERSHIP OF PROFESSIONAL BODIES

- Physiological Society of Nigeria Member, 2014
- The Physiological Society, UK Member, 2022

E. PUBLICATIONS

1. Thesis/Dissertation

- Assessment of reproductive functions in male Wistar rats treated with *Saccharum officinarum* molasses. Submitted to the Department of Physiology, University of Ibadan, Nigeria. 2019

2. Books and Monographs - Nil

3. Contribution to Books - Nil

4. Published Journals Articles

- i. Kolawole Victor Olorunshola, Lydia. N. Achie and **Ogunwole Eunice** (2011). Effects of Road Transport stress on Cardio Respiratory Parameters of Young Adult Nigerians during the Harmattan Season. *Asian Journal of Medical Sciences* 3(4): 164-169, ISSN: 2040-8773. <https://maxwellsci.com/print/ajms/v3-164-169.pdf>
- ii. Osheke Shekins Okere, Moses Dele Adams, Uju Dorathy Ejike, **Eunice Ogunwole**, Ejike Daniel Eze. (2014). Hypoglycaemic Potentials of Frog oil in Alloxan-Induced Diabetic Rats. (2014). *American Journal of BioScience*. Vol. 2, No. 4, Pp. 115-121. <https://doi.org/10.11648/j.ajbio.20140204.12>.
- iii. Shekins Osheke Okere, Janet Olayemi Sangodele, Moses Dele Adams, **Eunice Ogunwole** and Mercy Omoye Shafe (2014). Antibacterial and Antifungal Activity of Methanolic Leaf Extract of *Allium Sativum* on Selected Pathogenic Strains. *International Journal of Tropical Disease and Health*. 4(11): 1146-1152. ISSN: 2278-1005. <https://doi.org/10.9734/IJTDH/2014/11611>
- iv. Shekins Osheke Okere, Janet Olayemi Sangodele, **Eunice Ogunwole**, Moses Dele Adams, Mercy Omoye Shafe (2014). Antiplasmodial Activity of Aqueous Leaf Extract of *Cymbopogon Citratus* against *Plasmodium falciparum* Infected Rats. *American Journal of Biomedical and Life Sciences*. Vol. 2, No. 3, 2014, pp. 60-64. <https://doi.org/10.11648/j.ajbls.20140203.12>

- v. Meraiyebu Ajibola, **Ogunwole Eunice**, Izuchukwu Nnnedinma Stephanie (2014). Effects of Aqueous Extract of Moringa Oleifera Seeds on Alloxan Induced Hyperglycemia. *Basic sciences of medicine*. 3 (3): 37-42. <http://article.sapub.org/10.5923.j.medicine.20140303.01.html>
- vi. **Eunice Ogunwole**, Opeyemi O. Akindele, Omobola F. Faseun, S. A. Salami and Y. Raji (2015). Effects of Oral Maternal Administration of Caffeine on the Reproductive Functions of Male offsprings of Wistar Rats. *Nigerian journal of physiological sciences*. Vol 30.pg 051-058. <https://ojshostng.com/index.php/njphysiologicalsciences/article/view/1833>
- vii. Omobola F. Oluwole, Sharkiru A. Salami, **Eunice Ogunwole** and Yinusa Raji (2016). Implication of Caffeine Consumption and Recovery on the Reproductive Functions of Adult Male Wistar Rats. *J Basic Clin Physio Pharmacol*; 27(5): 483-491. <https://doi.org/10.1515/jbcpp-2015-0134>.
- viii. **Ogunwole E**, Mangai E. U (2019). The effect of *Chrysophyllum albidum* fruit on testicular functions in rats. *Andrologia*. e13307. <https://doi.org/10.1111/and.13307>.
- ix. **Ogunwole E**, Kunle-Alabi OT, Akindele OO, Raji Y (2019). Adverse Effects of *Saccharum officinarum* Molasses on Rat Testicular Cells. *Adv Toxicol Toxic Effects* 3(1): 001-008. <https://doi.org/10.17352/ATTE.000003>
- x. **Eunice Ogunwole**, Olufadekemi T. Kunle-Alabi, Opeyemi O. Akindele, Yinusa Raji (2020). *Saccharum officinarum* molasses adversely alters reproductive functions in male Wistar rats. *Toxicology Reports* (7): 345-352. <https://doi.org/10.1016/j.toxrep.2020.02.005>.
- xi. **Eunice Ogunwole**, Olufadekemi T. Kunle-Alabi, Opeyemi O. Akindele, Yinusa Raji (2020). *Saccharum officinarum* juice alters reproductive functions in male Wistar rats. *Journal of Basic and Clinical Physiology and Pharmacology*. 2020; 20190235. <https://doi.org/10.1515/jbcpp-2019-0235>.
- xii. **Ogunwole Eunice**, Jo-Amadi Harmony Homahinuchi, Johnson Dorcas Ariyo (2021). Sugar Intake Disrupts some Reproductive Functions in Female Wistar Rats. *J Infertil Reprod Biol* 9(1): 1-6. [https://doi.org/10.47277/JIRB/9\(1\)/1](https://doi.org/10.47277/JIRB/9(1)/1)
- xiii. **Eunice Ogunwole**, Jemimah Adoh Yakubu, Vivian Tally Giwa (2022). Reproductive effects of *Abelmoschus esculentus* fruit methanol extract in female Wistar rats. *Current*

Research in Physiology. Volume 5, Pages 208-215.
<https://doi.org/10.1016/j.crphys.2022.05.001>

- xiv. **Ogunwole, E.**, Kunle-Alabi, O. T., Akindele, O. O., & Raji, Y. (2022). Effects of *Saccharum officinarum* Molasses on Hematology and Hepatic Functions of Male Wistar Rats. *International Journal of Current Research in Physiology and Pharmacology*, 6(1), 1–8. <https://www.ijcrpp.com/index.php/ijcrpp/article/view/47>
- xv. Emojevwe, V., Nwangwa, E. K., Naiho, A. O., Oyovwi, M. O., Igiehon, O., **Ogunwole, E.**, Makinde-Taylor, M. S., Ayotomide, O. A., Akinola, A. O., Edesiri, P. T., Oghenetega, B. O., & Ovuakporaye, S. I. (2022). Therapeutic efficacy of N-acetylcysteine and zinc sulphate against di-(2-ethylhexyl) phthalate-induced testicular oxido-nitrergic stress in male Wistar rat. *Andrologia*, e14508. <https://doi.org/10.1111/and.14508>.
- xvi. **E. Ogunwole**, J.E. Ebong, L.A. Audu (2023). Detrimental Effects of *Saccharum officinarum* Juice on Reproductive Functions of Female Wistar Rats. *Nigerian Journal of Physiological Sciences*, 38 (1), 107-112. <https://doi.org/10.54548/njps.v38i1.15>
- xvii. **Eunice Ogunwole**, Victor Oghenekparobo Emojevwe, Hannah Bolutife Shittu, Iyanuoluwa Elizabeth Olagoke, Favour Omolewami Ayodele. Deleterious Effects of Caffeine Consumption on Reproductive Functions of Female Wistar Rats. *JBRA Assisted Reproduction* 2024;28(4):658-669. <https://doi.org/10.5935/1518-0557.20240055>.
- xviii. Adeniran O. Akinola, Wahab A. Oyeyemi, Dayo R. Omotoso, Oore-Oluwapo O. Daramola, Victor O. Emojevwe, **Eunice Ogunwole**, Blessing A. Adetula, Oluwatobiloba D. Adeleke. Cadmium Induced Adverse Alteration of Reproductive Parameters and Testicular Histoarchitecture of Wistar Rats: Protective Role of Palmitic Acid (2025). *Annals of Health and Allied Sciences* Vol. 1 (1): 17-24
- xix. Bamimore, V. O., Manuel-Mosi, E. D., Fayehun, O. O., Olawuni, J. I., Ogunwole, E., Elusiyan, C. A., & Olayiwola, G. (2025). Acute and Sub-Chronic Toxicological Evaluation of *n*-Hexane Fraction of *Uvaria chamae* Leaves. *African journal of infectious diseases*, 19 (2 Suppl), 89 - 98. <https://pmc.ncbi.nlm.nih.gov/articles/PMC12627220/>

- xx. **Ogunwole, E.**, Ogunmiluyi, O. E., Adesida, A. O., Akinwa, P. O., Akinya, A. O., Fakeye, O. A., & Oyetoyan, B. O. (2025). Elucidation of the effects of caffeine consumption on estrous cycle, hematology, and lipid profile of female Wistar rats. *Scientific reports*, 15(1), 34395. <https://doi.org/10.1038/s41598-025-17309-2>

5. Edited and Refereed Conference Proceedings

S/No	Title	Place	Date
1.	Eunice Ogunwole , Victor Emojevwe, Adeniran Oluwadamilare Akinola, Hannah Bolutife Shittu, Praise Oluwaseyi Akinwa, Iyanuoluwa Elizabeth Olagoke and Favour Omolewami Ayodele. Mechanistic Effects of Caffeine Consumption on Reproductive Functions of Female Wistar Rats.	Abstracts of the Proceedings of the XLth Annual Scientific Conference of the Physiological Society of Nigeria: 7-11 February, 2023, University of Ibadan, Ibadan, Oyo State, Nigeria. (2023). <i>Nigerian Journal of Physiological Sciences</i> , 38(1), i-xv. https://doi.org/10.54548/njps.v38i1.17	7-11 February, 2023
2	Eunice Ogunwole, Victor Emojevwe, James Bayode Ojo, Precious Elohor Luwah, Folakemi Peace Oloruntoba, Olamide Abraham Akinsefunmi, Oluwabukola Esther Enigbokan, Omotayo Feranmi Odewale. Impacts of caffeine consumption on reproductive functions of peri-pubertal female Wistar rats	Erlwanger, K. H. (2024). Abstracts of the 1st East African Society of Physiological Sciences (EASPS) and Special African Association of Physiological Sciences (AAPS) Conference that was held from 29th November to 1st December, 2023 in Dar es Salaam, Tanzania. <i>Journal of African Association of Physiological Sciences</i> , 11(2), S1–86. https://doi.org/10.4314/jaaps.v11i2.5	2023
3	Victor Emojevwe, Alexander Obidike Naiho, Adeniran Oluwadamilare Akinola, Victor Oluwadamilola Ajayi, Mega Obukohwo Oyovwi, Oluwafunmbi Ebenezer Ogunmiluyi, Onoriode Andrew Udi, Eunice Ogunwole , Ifedolapo Beatrice Jolayemi, Daniel Oluwasegun Arokun, Ifedayo Victory Omole, Evelyn Akingbade. N-Hexane Extract of Parkia Biglobosa Seeds Effectively Protected against Ciprofloxacin-Induced Testicular Dysfunction in Rats via Inhibition of Oxido-Inflammation and Apoptotic Pathways.	(Northumbria University, UK), Proc Physiology in Focus., Physiol. Soc 59, PCA027. https://static.physoc.org/app/uploads/2024/06/24084608/Physiology-in-Focus-2024-Abstracts-Poster-Communications.pdf	2024

4	Adeniran Oluwadamilare Akinola, Wahab Adekunle Oyeyemi, Dayo Rotimi Omotoso, Oore-Oluwapo Ololade Daramola, Victor Oghenekparobo Emojevwe, Eunice Ogunwole , Oluwafunmito Queenesther Adegoke, Eniola Hephzibah Ayeni, Toluwani Elizabeth Oladele. Hepatic and Reproductive Toxicity of Sub-Chronic Exposure to Dichlorvos and Cadmium on Male Wistar rats.	Physiology Conference, Department of Physiology, FBMS, University of Medical Sciences, Ondo City, Nigeria. https://journals.unimed.edu.ng/index.php/ahas/article/view/35	February 18 th -19 th , 2025
5	Emojevwe, Victor Oghenekparobo, Ogunmiluyi, Ebenezer, Ogunwole Eunice , Akinola, Adeniran Oluwadamilare, Oyovwi, Mega Obukohwo, Ciprofloxacin-induced reproductive toxicity: Disruption of hormones, steroidogenesis and receptor binding pathways - <i>In vivo</i> and <i>In silico</i> evidence. https://doi.org/10.70019/ahas.v1i1.40	2 nd FBMS International Conference and Symposium, University of Medical sciences, Ondo City, Nigeria. https://doi.org/10.70019/ahas.v1i1.40	June 4-6, 2025
6	Ogunwole Eunice. , Ogunmiluyi, Oluwafunmbi. Ebenezer, Adesida, Adedayo. Oluwadamilola., Akinwa, Praise. Oluwaseyi., Akinya, Atinuke. Oseyemi., Fakeye, Oluwaseun. Alexander and Oyetoyan, Beloved. Oyetola. Impact of Caffeine Consumption on Estrous Cycle Hematology and Lipid Profile of Female Wistar Rats.	2 nd FBMS International Conference and Symposium, University of Medical sciences, Ondo City, Nigeria. https://doi.org/10.70019/ahas.v1i1.40	June 4-6, 2025

6. Articles Accepted for Publication

7. Manuscript submitted for Publication

a. **Eunice Ogunwole**, Victor Oghenekparobo Emojevwe, Adedayo Oluwadamilola Adesida, Oluwafunmbi Ebenezer Ogunmiluyi, James Bayode Ojo, Precious Elohor Luwah, Folakemi Peace Oloruntoba, Omotayo Feranmi Odewale, Oluwabukola Esther Enigbokan, Olamide Abraham Akinsefunmi. Effects of Caffeine on the Reproductive Functions of Peri-Pubertal Female Wistar Rats. *Journal of Food Biochemistry*.

8. Creative Work: Sewing, Singing

9. Technical Report

10. Papers and Work in Progress

- a. We are currently working on the article on the reproductive effects of Evodiamine on Wistar Rats.
- b. Mechanistic assessment of beta (β -) glucan and pioglitazone on hypothalamic-pituitary-testicular impairment and apoptotic-inflammatory influx in streptozotocin-induced diabetic male rats

F. Professional Accomplishment

- Completion of a PhD degree

G. Conferences, Seminars and Workshops Attended with Dates

1. A 2-day Physiology Conference 2026 at the University of Medical Sciences, Ondo State, Nigeria, held between 25th-26th March, 2026. Themed: Bio-Synergy: Integrating physiological research and advanced technologies for a healthier nation.
2. 2026 Annual Leadership Excellence Attainment Program (LEAP) Conference by RCCG held virtually on 21st March, 2026. Themed: "ASCEND".
3. 42nd Annual Scientific Conference of the Physiological Society of Nigeria, University of Lagos, Nigeria 2025. Themed: Artificial intelligence in Physiology: Exploring the intersection of intelligence and life, September 24-26, 2025. **Paper presented:** Caffeine consumption reduces lipid profile but disrupts liver cytology and reproductive functions of Peri-pubertal female Wistar rats.
4. 2nd FBMS International Conference and Symposium, University of Medical sciences, Ondo City, Nigeria. Themed: Innovating Biomedical Research for Transformative National Policies, June 4-6, 2025. **Paper presented:** Impact of Caffeine Consumption on Estrous Cycle Hematology and Lipid Profile of Female Wistar Rats.
5. Two-day Physiology conference, Department of Physiology, University of Medical sciences, Ondo City, Nigeria. Themed: Advancing Physiological Research and Innovations for Better Health and Well-being, February 18th -19th, 2025. **Paper presented:** Sugar Intake Disrupts some Reproductive Functions in Female Wistar Rats.
6. 2024 FBMS week/Conference, University of Medical sciences, Ondo City, Nigeria. Themed: Innovating Biomedical Research for Transformative National Policies, June 10th

- 11th, 2024. **Paper presented:** Reproductive effects of *Abelmoschus Esculentus* Fruit Methanol Extract in Female Wistar Rats.
7. Joint 1st East African Society of Physiological Sciences (EASPS)/Special African Association of Physiological Sciences (AAPS) Scientific Conference, Dar es Salaam, Tanzania. Themed: Advancing Physiological Training, Research and Practice in Africa, November 29th-December 1st 2023. **Paper presented:** Impacts of Caffeine Consumption on Reproductive Functions of Peri-pubertal Female Wistar rats.
 8. Advanced Digital Empowerment Programme for Tertiary Institutions (ADEPTI) Training on “Data Analysis using SPSS and MS Power BI” held at University of Medical Sciences, Ondo City, Nigeria, April 17th - 21st, 2023.
 9. 40th Annual Scientific Conference of Physiological Society of Nigeria, University of Ibadan, Ibadan, Nigeria, 7th - 11th February, 2023. **Paper presented:** Mechanistic Effects of Caffeine Consumption on Reproductive Functions of Female Wistar Rats.
 10. ACURET-UNIMED Ondo Animal Ethics Training Program, held at the University of Medical Sciences, Ondo, Nigeria, December 5th – 6th, 2022.
 11. One day training workshop in Basic Biomolecular Techniques held at the Department of Physiology, University of Medical Sciences, Ondo City, Nigeria, June 1st 2022.
 12. Grantsmanship Workshop, UNIMED Central Office for Research and Development (CORD) held at University of Medical Sciences, Ondo City, Nigeria, November. 29th - 30th, 2021.
 13. Academic Staff Training Workshop on Pedagogy Teaching and Learning in Higher Education held at University of Medical Sciences, Ondo City, Nigeria, November. 23rd - 25th, 2021.
 14. Advanced Digital Appreciation Programme for Tertiary Institutions (ADAPTI) Training on Internet and Microsoft Office Productivity Tools, Cyber Security and Internet Governance and Internet of Things, held at University of Medical Sciences, Ondo City, Nigeria, July 5th - 9th, 2021.
 15. Capacity building Workshop on Academic Integrity, held at the University of Medical Sciences, Ondo City, Nigeria, on May 19th, 2021.

16. Society of Toxicology 2021 Annual Meeting and ToxExpo held virtually between March 12th-26th, 2021. **Paper presented:** *Saccharum officinarum* Molasses Adversely Alters Reproductive Functions in Male Wistar Rats.
17. One day workshop on Strengthening Research Capacity in the Nigerian University System, held at Bingham University, Karu, Nasarawa State, Nigeria, September 24th, 2019.
18. Training workshop on Writing effective test items (OSCE/OSPE, STANDARD SETTINGS) by College of Medicine and Health Sciences, Bingham University, Karu, Nasarawa State, Nigeria in collaboration with Association of Medical Preceptors of Nigeria. July 22nd-24th, 2019.
19. Molecular Biology Practical Workshop: 1st Trend Bingham Molecular Biology Practical Course at Bingham University, Karu, Nasarawa State, Nigeria. January 23rd-27th, 2017.
20. ADInstruments Physiology Workshop in collaboration with the IUPS and Physiological Society of Nigeria held at the University of Lagos, Nigeria, October 23rd, 2014.
21. 3rd Unibadan Conference of Biomedical Research on Biotechnology for Health and Sustainable Development, held at the University of Ibadan, Nigeria. July 24-27, 2012.
22. 32nd Annual Scientific conference of Physiological society of Nigeria, University of Calabar Nigeria, August 22nd-24th, 2012. **Paper presented:** Effects of oral Maternal Administration of Caffeine on the Reproductive Functions of Male Albino Rats.

H. Current Research Activities

- a. We are currently assessing the effects of exercise and graded caloric intake on low energy availability, bone mineral density and reproductions functions in a rat model of the Female Athlete Triad (FAT).
- b. Mechanistic assessment of beta (β -) glucan and pioglitazone on hypothalamic-pituitary-testicular impairment and apoptotic-inflammatory influx in streptozotocin-induced diabetic male rats

I. Current Relevant Information

1. Services within the Department

- Acting Head of Department 2025 - till date
- Chairman, Departmental postgraduate committee 2025- till date
- Member, Departmental promotion review committee 2025- till date
- Member, Departmental Curriculum review committee 2020-till date

- Departmental Examination Officer 2022-2024
- SIWES Coordinator, Department of Physiology 2022-2023
- Seminars and Project Coordinator, Department of Physiology 2024-2025
- Student's Academic Advisor and Course coordinator, Department of Physiology 2021-2025.

2. Services within the Faculty

- Cognate Staff Representative from FBMS to School of Public Health 2024 – till date

3. Services within the University

- Panelist, at the 1st Annual Students' Research Conference, organized by the UNIMED Journal Club in collaboration with Central Office for Research and Development, Dec 12th, 2023.
- Member, University of Medical Sciences (UNIMED) Ondo, Central Committee on Animal Related Care and Services (CCARECS) 2023-2024.
- Deputy Chair UNIMED, Ondo Animal House 2024-2025.
- Assistant Hall Mistress, Odosida I Hall, UNIMED, Ondo 2024-2025.

4. Services outside UNIMED

- JAMB Proctor Officer, MIS/CBT Centre, Adeyemi College of Education, Ondo, Ondo State, Nigeria, 2023-2024.

J. Contributions to Knowledge

Upon being trained in human physiology, my academic work as a scholar cut across the fields of reproductive physiology (with a major research concern on dietary lifestyle and its mechanistic impacts on male and female reproductive functions and developmental programming), pharmacology, toxicology, and experimental medicine. The following are the areas that my studies have contributed to the body of knowledge:

1. Medicinal and Dietary Plant Safety

My studies on *Chrysophyllum albidum*, *Abelmoschus esculentus*, and *Uvaria chamae* made significant contributions to the scientific understanding of the reproductive and systemic toxicological profiles of commonly consumed African plants. Specifically, as follows:

a. My research in **Ogunwole et al. (2019) [Paper viii]** examined the reproductive activities of *Chrysophyllum albidum*, demonstrating the first experimental evidence that the methanol

fraction of its fruits exerted a dose-dependent androgenic disruption in male Wistar rats which dissociated sperm count from hormonal and structural testicular integrity. This study established that numerical sperm parameters alone are inadequate reproductive health markers following phytochemical exposure.

b. My investigation in **Ogunwole et al. (2022) [Paper xiii]** extended the above paradigm to the female, demonstrating that *Abelmoschus esculentus* fruit methanol extract induced subclinical gonadotoxicity through ovarian and uterine cytoarchitectural disruption, which were undetectable by estrous cycle assessment alone.

c. My study **Bamimore et al. (2025) [Paper xix]** addressed a critical gap in the safety profile of *Uvaria chamae* (used in African traditional medicine) by providing the first fraction-specific, preclinical acute and sub-chronic toxicological profile of its n-hexane fraction, which is an advancement on fractionation-guided phytomedicine development for this ethnomedicinally important plant.

2. Reproductive and Systemic Toxicological Consequences of *Saccharum officinarum* Products

My explorative studies on *Saccharum officinarum* collectively provided the first systematic, preclinical, sex-disaggregated description of the reproductive toxicological profile of sugarcane in its multiple commercially relevant forms (fresh juice, molasses, and refined sugar), substantially advancing understanding of dietary sugar as a gonadotoxic agent. Against the established backdrop that dietary habits are among the most common etiological factors in male-factor infertility, my studies challenged the predominant assumption that *S. officinarum* juice and its byproduct molasses represent safer reproductive alternatives to refined sugar, by demonstrating that both products adversely alter male and female reproductive function. For example:

a. My *in vitro* assessment of *S. officinarum* molasses fractions **Ogunwole et al. (2019) [Paper ix]** showed it contains biologically active compounds capable of altering testicular cell viability and function at the cellular level. The GC-MS profile result of *S. officinarum* molasses fractions was of much concern due to the presence of diethyl phthalate (a well-established endocrine disruptor known to inhibit testosterone biosynthesis). Performing the *in vitro* study provided mechanistic groundwork for the subsequent *in vivo* investigations and raised important concerns

about the safety of molasses as a food substitute, particularly regarding its potential anti-gonadal properties.

b. My critical investigation of *S. officinarum* molasses-treated rats **Ogunwole et al. (2020) [Paper x]** showed that it exhibited greater seminiferous tubule and epididymal aberrations than sugar-treated counterparts, with adverse alterations in sperm morphology, count, and viability, suggesting that molasses may harbor compounds with capability of disrupting spermatogenesis more potently than refined sugar itself. At the biochemical level, my study demonstrated that the methanol fraction of molasses elevated epididymal malondialdehyde levels, thus implicating oxidative stress as a mechanistic pathway of gonadotoxicity.

c. My further evaluation of *S. officinarum* molasses on hematological and hepatic safety **Ogunwole et al. (2022) [Paper xiv]** revealed an adverse effect on hematological indices and hepatic function markers in males (though in a dose-dependent manner), implying that it possesses systemic toxicity beyond the reproductive system.

d. My research demonstrated that freshly extracted *S. officinarum* juice consumed by male rats **Ogunwole et al. (2020) [Paper xi]** reduced sperm quality, disrupted testicular architecture, and impaired the histological integrity of the testes and epididymides.

e. The extension of my studies across the female reproductive axis in which refined sugar **Ogunwole et al. (2021) [Paper xii]** and freshly extracted *S. officinarum* juice **Ogunwole et al. (2023) [Paper xvi]** were investigated further established the disruption of multiple components of female reproductive functions such as hormonal regulation, estrous cyclicity, and the cytoarchitecture of the ovary and uterus.

Consequently, my research work on *S. officinarum* properly established a rigorous, multi-endpoint, bidirectional reproductive toxicology framework for *S. officinarum* products. This is a noteworthy contribution to knowledge with direct public health significance, due to the extensive global consumption of sugarcane juice and molasses as perceived natural health foods.

3. Caffeine and Reproductive Health

My research on caffeine and reproductive functions collectively established a comprehensive, sex-grouped and life-stage-stratified preclinical evidence base for the reproductive toxicological

consequences of caffeine (one of the most globally consumed psychoactive substances). For instance:

a. My study provided the first evidence that gestational caffeine exposure programmed long-term male reproductive dysfunction in offspring **Ogunwole et al. (2015) [Paper vi]** and demonstrated dose-dependent decreases in birth weight, altered anogenital distance index, reduced serum testosterone, reduced testicular weight, and histological abnormalities (such as interstitial congestion, edema, and detachment of the basal membrane) in the testes of male offspring.

b. Extending the study to adult exposure in which caffeine was administered for 30 days **Oluwole et al. (2016) [Paper viii]** showed impaired reproductive organ weight, sperm characteristics, and testicular cytoarchitecture in adult males, with these effects reversed following a 30-day recovery period. This implies that caffeine intake can alter reproductive functions in males with a possibility of restoration upon stoppage by such individuals.

c. Upon translating this model to the female **Ogunwole et al. (2024) [Paper xviii]**, my study demonstrated that caffeine caused dose-dependent ovarian, fallopian tube, and uterine oxidative stress as well as structural distortion in female Wistar rats. Also, hormonal disruption and myometrial inflammation persisted even after 21 days of caffeine withdrawal, indicating that caffeine-induced female reproductive toxicity is not fully reversible in the short term.

d. My investigation in **Ogunwole et al. (2025) [Paper xx]** further elucidated that caffeine reduced white blood cell count, gonadotropin-releasing hormone, and progesterone levels while increasing TNF- α and adversely disrupting estrous cycle phase distribution in female rats (effects that were reversible upon caffeine withdrawal). This study provided the first concurrent characterization of caffeine's impact on female reproductive, immune, and cardiometabolic indices.

My research has collectively constructed a rigorous, multi-generational, bidirectional reproductive toxicology framework for caffeine with direct public health relevance.

4. Environmental Toxicology and Protective Agents

a. My examination of phthalates toxicity **Emojevwe et al. (2022) [Paper xv]** demonstrated that co-administration of *N*-acetylcysteine and zinc sulphate significantly reversed DEHP-induced testicular oxido-nitric stress in male Wistar rats, evidenced by restoration of malondialdehyde,

nitric oxide, antioxidant enzyme activity, and testicular histoarchitecture. The study established a mechanistically grounded, combinatorial antioxidant basis for mitigating phthalate-induced gonadotoxicity, and it is particularly relevant because of the widespread human exposure to plasticizers.

b. My findings identified palmitic acid as a novel lipid-based protective agent against cadmium-induced reproductive disruption and testicular histoarchitectural damage in Wistar rats **Adeniran et al. (2025) [Paper xviii]**, demonstrating an advancement in evidence-based therapeutic strategies against environmentally mediated male reproductive toxicity.

5. Minor Research Thrust: Antidiabetic, Antimicrobial, and Antimalarial Natural Products

My earlier studies validated traditional Nigerian remedies (frog oil, *Moringa oleifera*, *Allium sativum*, *Cymbopogon citratus*) for hypoglycemic and antimicrobial properties. Collectively, my research endeavor has advanced the scientific evidence base for natural products as antidiabetic, antimicrobial, and antimalarial agents as highlighted below:

a. As the first experimental evidence of the hypoglycemic potential of frog oil, my study introduced frog oil as a novel, non-conventional animal-derived antidiabetic agent and demonstrated a significant dose-dependent reduction in blood glucose in alloxan-induced diabetic rats **Okere et al. (2014) [Paper ii]**.

b. My further study established that aqueous *Moringa oleifera* seed extract effectively lowers hyperglycemia in a route-independent way (whether in a mild or severe hyperglycemic state), and this provided relevant clinical evidence of its therapeutic usefulness **Meraiyebu et al. (2014) [Paper v]**.

c. My work also expanded the pharmacological description of *Allium sativum* beyond its conventional bulb form, representing broad-spectrum antibacterial and antifungal activity specifically in the methanolic leaf fraction **Okere et al. (2014) [Paper iii]**.

d. In **Okere et al. (2014) [Paper iv]**, my study translated existing ethnopharmacological data on *Cymbopogon citratus* into a validated *in vivo* antiplasmodial framework, supporting its application in natural product-based antimalarial drug discovery amidst rising drug resistance in Nigeria.

Additional Contributions

a. My early work on road transport stress **Kolawole et al. (2011) [Paper i]** provided foundational insights into the effects of environmental stressors on cardiorespiratory parameters in young adult Nigerians during the harmattan season, contributing to the understanding of physiological responses to seasonal and transportation-related stress.

Summary: Across 20 publications spanning over a decade, my research has systematically advanced knowledge in reproductive toxicology, environmental health, and natural product pharmacology. The coherence of my work lies in its rigorous, mechanistic, and sex-disaggregated approach to understanding how dietary and environmental factors (particularly commonly consumed substances such as sugarcane products, caffeine, and medicinal plants) impact reproductive function across the lifespan. This body of work holds significant public health relevance, providing evidence-based insights for dietary recommendations, phytomedicine safety, and therapeutic strategies against environmental toxicants.



Signature

March 28th, 2026.

Date