

DR. HOORIA YOUNAS



Father's Name: Muhammad Younas (Late)

Date of Birth: August 04, 1981

Nationality: Pakistani

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EDUCATION

- **Ph.D. Biological Sciences (Biochemistry)**, 2003–2009, GPA 4.0 (Distinction) School of Biological Sciences, University of the Punjab, Lahore, Pakistan
- **M.Sc. (Biochemistry)**, 2000–2002, cGPA 3.56
Institute of Biochemistry and Biotechnology, University of the Punjab, Lahore
- **B.Sc. (Zoology, Botany & Chemistry)**, 1998–2000, A grade
Government College for Women, Gulberg, Lahore, Pakistan
- **F.Sc. (Pre-medical)**, 1996–1998, A grade
Government College for Women, Wahdat Road, Lahore, Pakistan
- **Matric (Science)**, 1994–1996, A grade
Government Comprehensive Girls High School, Wahdat Road, Lahore, Pakistan

THESES

Ph.D. Thesis: Studies on Recombinant Buffalo (*Bubalus bubalis*) Proinsulin and its Derivatives

M.Sc. Thesis: Isolation and Purification of Heparin

WORK EXPERIENCE

- Dean of Life Sciences, Kinnaird College for Women, Lahore from January 30, 2025 till date
- Head of Biochemistry Department, Kinnaird College for Women, Lahore from October 2009 till date.
- Associate Professor, Kinnaird College for Women, Lahore from April 29, 2022 till date
- Assistant Dean of Biological and Life Sciences, Kinnaird College for Women, Lahore, August 24, 2015 till August 24, 2019
- Assistant Professor, Kinnaird College for Women, Lahore from October 2009 till April 28, 2022.
- Research Officer in the School of Biological Sciences, University of the Punjab, Lahore from April–September 2009.

AWARDS/HONORS/MEMBERSHIPS

- Full scholarship for Ph.D. in School of Biological Sciences, University of the Punjab, Lahore
- First position (cGPA 4.0) in comprehensive examination of Ph.D. held on May 14, 2007.
- Sixth position in M.Sc. (Biochemistry)
- Got cash prize on achieving second position in poster competition entitled “Production of Glucose/Xylose Isomerase from different bacterial strains” in ‘Kinnaird Multidisciplinary Research Conference’ held in Kinnaird College for Women Lahore on Nov18 – 19, 2013
- Member of Academic Planning Committee, Kinnaird College for Women, Lahore
- Member of Financial
- Member of Academic Council, Kinnaird College for Women, Lahore, January 12, 2016 to 2017.
- Member of Academic Review and Quality Assurance Committee, Kinnaird College for Women, Lahore, August 2013 till date
- Member of Defense Committee, Kinnaird College for Women, Lahore, June 2013 till date
- Member of Ethical Review Committee, Kinnaird College for Women, Lahore, May 2016 till date
- Member of Lab Management Committee, Kinnaird College for Women, Lahore, July 26, 2018 till date.
- Member of ‘National Curricular Revision Committee (NCRC) HEC for Biochemistry’ attended two meetings (February 26-28, 2018 & April 25-27, 2018) at HEC Regional Centre, Peshawar to revise and update the Biochemistry BS and MPhil curricula.
- Member of the editorial board of "Journal of Natural and Applied Sciences Pakistan" February 2019 to date
- Member and Focal Person of Anti-drug and Tobacco Committee, Kinnaird College for Women, Lahore, July 1st 2022 till date
- Member of Discrimination and Harassment Committee, Kinnaird College for Women, Lahore, January 20th 2023-2024.
- Member of Mentorship Program Committee, Kinnaird College for Women, Lahore, January 17th 2025 till date.
- Successfully mentored two faculty members under “Women Empowerment and Mentoring Program” during 24th Jan- 7th April, 2025 at Kinnaird College for Women
- External paper setter for the University of Health Sciences
- External Examiner for Thesis Defense of BS and MPhil students from UHS, FCCU, UOL, LCWU, UVAS, SBS (PU), Minhaj University.
- Member of Board of Studies of Biological Sciences Department, Superior University.
- Member of Board of Studies of Faculty of Allied Health Sciences, Minhaj University.
- Member of Kinnaird Multidisciplinary Research Group (KMRG)
- Member of Technical Expert Group (TEG) of Pakistan Standards and Quality Control Authority (PSQCA) WTO-TBT

- Peer reviewed an article for 'Journal of King Saud University: Science' in May 2021, another for 'Journal of Biological and Allied Health Sciences' in March 2022, and another for 'International Journal of General Medicine' in April 2022.
- Peer reviewed an article for the journal 'Diabetes, Metabolic Syndrome and Obesity', 'International Journal of Nephrology and Renovascular Disease' 'International Journal of General Medicine', and 2 articles for 'The Protein Journal' during 2023.
- Peer reviewed an article for 'Journal of Basic and Emerging Sciences (JBES)' in Oct 2024, two articles for the 'Journal of Virological Methods' during December 2024 and January 2025 and an article for 'Journal of Mammary Gland Biology and Neoplasia' in Jan 2025 and an article for 'Journal International Journal of General Medicine' in June 2025
- Supervision of 51 BS and 26 MPhil students, co-supervision of 8 MPhil students at Kinnaird College, and co-supervision of one MPhil student of LCWU.
- HEC Approved Supervisor since 2022
- Co-Chair the 'Exploring Translational Research Through Chemistry/ Biochemistry' session in 1st Biennial International Conference on Pharmaceutical and Life Sciences (Hybrid) 2023 on 9th December 2023 organized by Gulab Devi Teaching Hospital Lahore.
- Invited as a Judge for poster, banner, and model competition on Green Day Festival on April 25th, 2024
- Invited as a Judge for the 'Scipreneur Nexus Competition' on KC SciFest-I'25 on 21st January 2025.
- Served as 'Evaluator/ Reviewer' to evaluate and shortlist the submitted research proposal concepts/outlines (total 24) in response to "Call for Research Proposal 2024-25" under its "National Research Programme for Universities" in March 2025 at HEC Regional office, Lahore.
- Internal Member for the Review of Institutional Performance and Enhancement (RIPE) of Kinnaird College for Women scheduled on June 26–27, 2025.

FUNDED PROJECTS

- Studies on Recombinant Buffalo Prochymosin: A Precursor of Milk Clotting Enzyme Chymosin used in Cheese Industry (NRPU-HEC-2016) of 1.679030 million as Principal investigator (PI) started in December 2017 for three years (completed)
- Molecular Characterization of Families Affected with Primary Microcephaly (NRPU-HEC-2016) of 2.363828 million as Co-PI started in June 2017 for three years (Completed)
- Expression enhancement of the recombinant 4- α -glucanotransferase (Pcal_0768) by various strategies (SRGP-HEC) of 0.360076 million as Co-PI started in March 2017 for one year (completed)
- Up-gradation and Strengthening of the Biochemistry Laboratory, Kinnaird College for Women, Lahore (ISULL- HEC) of 2.907450 million as PI started in April 2017 for one year (Completed)

PUBLICATIONS

IF=35.865

1. Gardner, Q. A., **Younas, H.**, Rashid, N., Wright, J. N. and Akhtar, M. Inventory of 'slow exchanging' hydrogen atoms in human proinsulin and its derivatives: Observations on the mass spectrometric analysis of deuterio-proteins in D₂O. *Biochimica et Biophysica Acta-Proteins and Proteomics*, 2009; 1794(8), 1224–1233. (**Impact factor 3.635, Category W**)
2. **Younas, H.**, Gardner, Q. A., Rashid, N., Wright, J. N. and Akhtar, M. Conformational transmission in proinsulin and its derivatives: A study using H/D exchange. *International Journal of Mass Spectrometry*, 2011; 302, 36–43. (**Impact factor 2.549, Category W**)
3. Gardner, Q. T., **Younas, H.** and Akhtar, M. Studies on the regioselectivity and kinetics of the action of trypsin on proinsulin and its derivatives using mass spectrometry. *Biochimica et Biophysica Acta-Proteins and Proteomics*. 2013; 1834(1), 182-190. (**Impact factor 3.635, Category W**)
4. Sabir S and **Younas H.** Molecular Studies on Preproinsulin gene. *MATEC Web of Conferences*, 2016; 49, 07002
5. Akram A, Khalil S, Halim SA, **Younas H**, Iqbal S and Mehar S. Therapeutic uses of HSP90 inhibitors in Non-Small Cell Lung Carcinoma (NSCLC), *Current Drug Metabolism*, 2018;19(4), 335-341. (**Impact factor 2.659, Category X**)
6. Iftikhar R, **Younas H**, Waqar A and Tariq M. Optimization of growth medium and conditions for the maximum production of Glucose Isomerase by CS1 bacterial strain, *Journal of Natural and Applied Science Pakistan*, 2019; 1(1), 31-45.
7. Aslam F, **Younas H** and Bajwa SI. Genomic sequencing and recombinant expression of proinsulin isolated from cow and buffalo in Pakistan. *African Journal of Biotechnology*. July, 2019, 18(27), 664-669.
8. Nasir Ahmad, Sajida Munir, Ramzan Ali, **Hooria Younas**, Naeem Rashid Sumaira Mehboob. Gene cloning, expression enhancement in *Escherichia coli* and biochemical characterization of a highly thermostable amylomaltase from *Pyrobaculum calidifontis*. *International Journal of Biological Macromolecules*. December 2020, 165, 645–653. (**Impact factor 5.162, Category W**)
9. Komal Fatima, Fatima Naqvi, **Hooria Younas**. A Review: Molecular Chaperone-mediated Folding, Unfolding and Disaggregation of Expressed Recombinant Proteins. *Cell Biochemistry and Biophysics* 2021 Jun;79(2):153-174. doi: 10.1007/s12013-021-00970-5. Epub 2021 Feb 25. PMID: 33634426 (**Impact factor 2.073, Category X**)
10. Mahmood N, **Younas H**, Zafar M, Shahid S, Ajmal S, Qursehi ZU, Nasir SB. Effects of plants extracts on the expression of major genes of JAK/STAT pathway. *Nucleosides Nucleotides Nucleic Acids*. 2021;40(4):434-469. doi: 10.1080/15257770.2021.1896000. Epub 2021 Mar 22. PMID: 33749513 (**Impact factor 1.556, Category Y**)
11. Sadia Mahmood, **Hooria Younas**, Amna Younus, Sammar Nathaniel, A narrative review on role of folate-mediated one-carbon metabolism and its associated gene polymorphisms in posing risk to preeclampsia. *Clinical and Experimental Hypertension*. 2021 August 18; 43(6):487-504. doi: 10.1080/10641963.2021.1916942. (**Impact factor 1.78, Category W**)
12. Haroon Latif Khan, Shahzad Bhatti, Sana Abbas, Celal Kaloglu, Ahmed M Isa, **Hooria Younas**, Rachel Ziders, Yousaf Latif Khan, Zahira Hassan, Nilgün Öztürk Turhan,

- Aysegul Yildiz, Hikmet Hakan Aydin, Ender Yalcinkaya Kalyan. Extracellular microRNAs: Key players to explore the outcomes of in vitro fertilization. *Reproductive Biology and Endocrinology*, 15 May 2021, 19 (1): 72 doi: 10.1186/s12958-021-00754-9. PMID: 33992122 (**Impact factor 3.235, Category W**)
13. **Hooria Younas**, Tahira Ijaz, Nakhshab Choudhry. Investigation of angiotensin-1 converting enzyme 2 gene (G8790A) polymorphism in patients of type 2 diabetes mellitus with diabetic nephropathy in Pakistani population. *PLoS ONE*, 17 Feb 2022, 17(2): e0264038. <https://doi.org/10.1371/journal.pone.0264038> (**Impact factor 3.4, Category W**)
 14. Laiba Ajmal, Sidra Ajmal, Maleeha Ajmal, Gul Nawaz, Rabail Hassan Toor, **Hooria Younas**, Tassaduq Hussain Sheikh and Raazia Tasadduq. HLA system and its participation in recurrent pregnancy loss. *Pakistan Journal of Zoology*. 1-12, 2022. DOI: <https://dx.doi.org/10.17582/journal.pjz/20210826180821> (**Impact factor 0.831, Category X**)
 15. Laiba Ajmal, Amna Hamid, Faiz Ahmed Raza, Safee Ullah Chaudhary, Kanzal Iman, Sidra Ajmal, **Hooria Younas**, Ruqyya Khalid, Mazhar Iqbal, Raazia Tasadduq. Repellent activity of trans-anethole and tea tree oil against *Aedes aegypti* and their interaction with OBPI, a protein involved in olfaction. *Entomologia Experimentalis et Applicata*. July 2022, 170 (7): 547– 554. <https://doi.org/10.1111/eea.13179> (**Impact factor 2.250, Category W**)
 16. Haroon Latif Khan, Shahzad Bhatti, Zirva Sehole, **Hooria Younas**, Sammar Nathaniel, Sana Abbas, Celal Kaloglu, Rachel Ziders, Aysegul Yildiz, Ahmed M Isa. Putative Role of the Kisspeptin/Kiss1R System in Promoting Hypothalamic GnRH Release, Pubertal Maturation, and Regulation of Ovulation Considering the Central Reproductive Axis. *Fertility & Reproduction*. March 26, 2022, 4(1), 36-44. (**Impact Factor=NA, Category NA**)
 17. Tuba Ahmad, Rashid Saif, Muhammad Hassan Raza, Muhammad Osama Zafar, Saeeda Zia Mehwish Shafiq Laraib Ali **Hooria Younas** Computational Prediction of Cymbopogon Citratus Compounds as Promising Inhibitors of Main Protease of SARS-CoV-2. *Futuristic Biotechnology*, 2022, 2 (1) (**Impact Factor=NA, Category NA**)
 18. Sidra Ajmal, Mahwish Shafqat, Laiba Ajmal, **Hooria Younas**, Raazia Tasadduq and Nasir Mahmood. Evaluation of Anti-cancer and Anti-proliferative Activity of Medicinal Plant Extracts (Saffron, Green Tea, Clove, Fenugreek) on Toll Like Receptors Pathway. *Natural Product Sciences*. 30th Sep 2022. 28(3): 121-129. (**Impact Factor=NA, Category Y**)
 19. Hooria Younas, Sidra Ajmal, Nasir Mahmood, Saman Shahid and Maryam Zafar. Death receptor pathway genes (Caspase and BID) expression analysis in cancerous cells in response to extracts of amla and turmeric *Pakistan Journal of Pharmaceutical Science*. March 2023, 36 (2);.437-445 (**Impact Factor= 0.8, Category Y**)
 20. Sadia Mahmood, Amna Younus, Sammar Nathaniel & Hooria Younas. MTHFR A1298C polymorphism: a predictor of reduced risk of preeclampsia in Punjab, Pakistan, *Hypertension in Pregnancy*, December 2023, 42:1. (**Impact Factor= 1.5, Category X**)
 21. Mehnaz Ghulam Hussain, Rashid Saif, Amna Younus, Mehmoona Zahid, Sadia Jabeen, Hooria Younas. Genetic Association of SLC47A1 Gene Variant (17: 19571562C> T) and Bioinformatics Analyses of MATE1 Protein in Chronic Kidney Disease Patients of

- Pakistani Origin. bioRxiv, 12 August 2023. **(Preprints)**
22. Mehmoona Zahid, Rashid Saif, Amna Younus, Mehnaz Ghulam Hussain, Sadia Jabeen, Hooria Younas. Genetic Association of UMOD Gene Variant (16: 20353266A> G) and Bioinformatics Analyses of the Uromodulin Protein in CKD Patients of Pakistani Origin. 22 August 2023 **(Preprints)**
 23. Hooria Younas, Mehak Shahid, Zara Khan, Komal Fatima, Raazia Tasadduq. Investigating the association of angiotensin II type I receptor A1166C polymorphism with Breast Cancer Risk in the Pakistani population. Asian Pacific Journal of Cancer Prevention. 2024 Jan 1;25(1):79-85. **(Impact Factor= NA, Category Y)**
 24. Sammar Nathaniel, Tabinda Nadeem, Sadaf Aslam, Amna Younus, Muhammad Aasim, Hooria Younas & Ramisha Saleem. Association of angiotensinogen gene polymorphisms (M235T and T174M) with preeclampsia among Pakistani women. Discover Medicine. 2024. 1:135.
 25. Raazia Tasadduq, Sana Shahid, Amna Younus, Laiba Ajmal, Sidra Ajmal, Kalsoom Akhtar Chaudhry, Hooria Younas and Hafsa Naveed. Effect of Caffeine and Soda Consumption on the Level of Serum Electrolytes and Hepatic Enzymes in Healthy Population of Punjab: A Cross-Sectional Analysis. Current Nutrition and Food Science. Available online:15 May 2025 **(Impact Factor= 0.8)**

DNA SEQUENCES PUBLISHED IN DDBJ/EMBL/GENEBANK

- Akhtar, M., Rashid, N., Younas, H., Gardner, Q. A. and Aslam, F. 2006. *Bubalus bubalis* bpi mRNA for proinsulin, partial cds. Accession No. AB234871.
- Gardner, Q. A., Younas, H., Rashid, N., Akhtar, M. 2009. Synthetic human M-proinsulin gene hpi, Accession No. AB501190.
- Aslam, F., Younis, H., Gardner, Q. A., Rashid, N., and Akhtar, M. 2012. *Bos Taurus* proinsulin mRNA, partial cds. Accession No. JX041514.
- Younas, H., Bashir, A. 2016. *Bubalus bubalis* mRNA for prochymosin, partial cds. Accession No. KU524074

SEMINAR CONDUCTED

- Online seminar was conducted on 'Vaccines: combat infections' on 30th April 2020 at Superior University Lahore.
- Organized an awareness seminar on 'Say NO TO DRUGS' on 2nd November, 2022 at Kinnaird College for Women by Anti-Drug and Tobacco Committee, KCW.
- Organized a poster competition on 'Say NO TO DRUGS' on 2nd November, 2022 at Kinnaird College for Women by Anti-Drug and Tobacco Committee, KCW.
- Organized an awareness seminar on 'Role of Women on Drug use prevention' in collaboration with Drug Advisory Training Hub (DATH) & YOCFAN on February 8, 2023.
- Organized a seminar on 'Preconception Care and Precision Medicine' by the Department of Biochemistry, Kinnaird College for Women on 22 November 2023.
- Organized an awareness seminar on 'Dialogue on Future Threat of New Chemical

Drugs' in collaboration with Drug Advisory Training Hub (DATH) &YOCFAN on March 5, 2024.

- Organized a seminar on “Bacteriophage Therapy: An Innovative and Sustainable Approach to Combat Antimicrobial Resistance” on May 10, 2024.

ORAL/ POSTER PRESENTATION

- **Hooria Younas**, Mashmoom Suhail, Komal Fatima. ‘Chaperones assisted expression of Prochymosin in *Escherichia coli*’ in Kinnaird’s 3rd International Conference on Science, Technology and Innovation on 18th -20th February 2025. (Oral Presentation)
- Haiqa Muneer, Fizza Zehra, Tehreem Humayun, **Hooria Younas**. ‘Computational Prediction & Characterization of A Multi Epitopic Vaccine Against HCV Genotype 3a’ in Kinnaird’s 3rd International Conference on Science, Technology and Innovation on 18th - 20th February 2025. (Oral Presentation)
- Tehreem Humayun, Haiqa Muneer, Fizza Zehra, **Hooria Younas**. ‘Immuno Informatics Analysis of a Multi-Epitope Vaccine Targeting the E2 Protein of HCV Genotype 3a’ in Kinnaird’s 3rd International Conference on Science, Technology and Innovation on 18th - 20th February 2025. (Oral Presentation)
- Ayesha Abbas, Dr Amna Younus, **Hooria Younas**. ‘Pruritic Urticarial Papules & Plaques of Pregnancy (PuPPP)’ in Kinnaird’s 3rd International Conference on Science, Technology and Innovation on 18th -20th February 2025. (Poster Presentation)
- Komal Fatima, **Hooria Younas** ‘Molecular chaperone-based approach to increase the solubility of recombinant prochymosin produced in *E. coli*’ in the 1st Biennial International Conference on Pharmaceutical and Life Sciences (Hybrid) 2023 on 9th December 2023 organized by Gulab Devi Teaching Hospital Lahore. (Oral Presentation)
- Laila Tahir, **Hooria Younas** ‘Molecular docking of Cannabis sativa compounds as potential drug agents for Epilepsy’ in the 1st Biennial International Conference on Pharmaceutical and Life Sciences (Hybrid) 2023 on 9th December 2023 organized by Gulab Devi Teaching Hospital Lahore. (Oral Presentation)
- **Hooria Younas**, Naeem Rashid, Muhammad Akhtar. ‘Determination of biological activities of buffalo insulin and its derivatives’ presented in Kinnaird’s 2nd International Conference on Science, Technology and Innovation organized by Kinnaird College for Women, Lahore on 8th -10th March, 2023. (Oral Presentation)
- **Hooria Younas**, Komal Fatima, Fatima Naqvi, Shaista Zulfiqar, Sheezah Imran, Durr-e-Adun Bajwa. ‘Improving the Soluble Expression of Prochymosin in *Escherichia coli* using the Chaperone-based Approach by Co-expression with GroEL-GroES’ presented in International conference on ‘Advances in Biological Science’ on 6-8th March 2023 at School of Biological Sciences, University of the Punjab, Lahore (Oral Presentation)
- **Hooria Younas**, Naeem Rashid, Muhammad Akhtar. Sequence of C-Peptide and residues on the Acyl-side of scissile bond determines the cleavage specificity of trypsin for conversion of Proinsulin to Insulin presented in First Virtual Pakistan Congress of Zoology (40th Pakistan congress of Zoology (International)) on December 17-19, 2021 (Oral Presentation)

- **Hooria Younas**, Komal Fatima, Ammara Bashir. Co-expression of Chaperonin GroEL to enhance soluble expression of recombinant prochymosin in *Escherichia coli* presented in First Virtual Pakistan Congress of Zoology (40th Pakistan congress of Zoology (International)) on December 17-19, 2021 (Oral Presentation)
- **Hooria Younas**, Naeem Rashid, Muhammad Akhtar. RP-HPLC and Mass spectrometric analysis to evaluate proper *in vitro* refolding of proinsulin and its conversion to insulin presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Oral Presentation)
- Sidra Tul Muntaha, **Hooria Younas**. Effect of Sumo tag on expression and solubility of recombinant Prochymosin presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Oral Presentation)
- Aiman Kaleem, **Hooria Younas**. Expression and purification of recombinant buffalo prochymosin using PelB leader sequence and 6x-Histidine tag presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Oral Presentation)
- Uswa Rafiq, **Hooria Younas**, Nakhshab Choudhry. Association of *eNos* gene Intron 4VNTR (4a/B) polymorphism with Albuminuria in type II diabetic patients in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April 2019 (Oral Presentation)
- Khadija Abdul Majeed, **Hooria Younas**, Dildar Ahmed, Raazia Tasadduq. Evaluation of Biological activities and GC-MS analysis of acetone extract of Cannabis seeds presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Oral Presentation)
- Misfa Tanvir, Sammar Nathaniel and **Hooria Younas**. Association of endothelial nitric oxide synthase gene polymorphism (Intron 4) with preeclampsia among Pakistani females presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Oral Presentation)
- Tabinda Nadeem, Sadaf, Amna Younus, Sammar Nathaniel, **Hooria Younas**. Association of M235T and T174M polymorphisms of angiotensinogen gene with preeclampsia among Pakistani females presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Oral Presentation)
- Zainab Akram, **Hooria Younas**, Dildar Ahmed, Raazia Tasadduq. Determination of biological activities and GC MS analysis of various *cannabis* seed extracts presented in International Conference on ‘Recent Advances in Molecular Sciences’ on 6th- 8th November, 2019 at University of the Punjab, Lahore. (Poster Presentation)
- Ailia Waqar, **Hooria Younas**, Hira Nizam, Kalsoom Akhtar and Uswa Rafique. Association of eNOS polymorphism intron 4 VNTR (4a/b) with breast cancer development in pakistani population: a case control study’ presented in International Conference on ‘Recent Advances in Molecular Sciences’ on 6th- 8th November, 2019

at University of the Punjab, Lahore. (Poster Presentation)

- Ammara Naeem, **Hooria Younas**. Molecular studies of E1 protein of HCV-3apresented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Poster Presentation)
- Zainab Akram, **Hooria Younas**. Determination of phytochemicals and DNA damage protection activity of various cannabis seed extracts presented in 1st International Conference on Science, Innovation and Commercialization” at Kinnaird College for Women, Lahore on 2–4 April, 2019 (Poster Presentation)
- Sana Akbar and **Hooria Younas**, ‘Screening of Biological Activities of Peppermint Plant Extracts’ in 1st National Conference on Bioactivity of Phytochemicals organized by University of Lahore held on October 4th June, 2017. (Poster Presentation).
- Sarah Sabir and **Hooria Younas** ‘Molecular Studies on Preproinsulin gene’ in 6th International Conference on Bioscience, Biochemistry and Bioinformatics (ICBBB 2016) held at **Pattaya, Thailand** on January 23-25, 2016 (Oral Presentation)
- Ammara Bashir and **Hooria Younas** ‘Cloning and expression of Buffalo Prochymosin’ in International Conference of Biochemistry, Biotechnology, and Biomaterials (ICCB-2016) held at University of Agriculture Faisalabad on Feb 22-24, 2016. (Oral Presentation)
- Aysha Saeed, **Hooria Younas**, Semeen Khan ‘Anticancerous Potential Analysis of Some Plant Extracts against Human Cervical Carcinoma Cell Line’ in International Conference of Biochemistry, Biotechnology, and Biomaterials (ICCB-2016) held at University of Agriculture Faisalabad on Feb 22-24, 2016. (Oral Presentation)
- Hina Maqsood and **Hooria Younas** ‘Phytochemical Analysis and Screening of Antibacterial and Antioxidant Properties of Plant Extracts’ in the 1st Multidisciplinary Students Research Conference (MDSRC-2015) at University of Wah on November 14-15, 2015.(Oral Presentation)
- Aysha Saeed, **Hooria Younas** and Seemen Khan. Antiproliferative activity of Some Plant Extracts against Human Cervical Carcinoma Cell Line (Hela) presented in Kinnaird Multidisciplinary Research Conference held in Kinnaird College for Women Lahore on Nov18 – 19, 2013 (Oral Presentation)
- Anum Waqar and **Hooria Younas** “Production of Glucose/Xylose Isomerase from different bacterial strains” in Kinnaird Multidisciplinary Research Conference held in Kinnaird College for Women Lahore on Nov18 – 19, 2013. (Poser presentation)
- Aysha Saeed, Zara Rana, **Hooria Younas**, Nasir Mahmood, Seemen Khan. Potential Analysis of Some Plant Extracts against Human Cervical Carcinoma Cell Line presented in 11th Biennial conference ‘Molecular Biosciences-Challenges and Opportunities’ held in the University of the Punjab on November 25 – 28, 2013. (Poster presentation)
- **Hooria Younas** and Sadia Sher ‘Isolation and Purification of Rennin’ in 7th international conference of the Pakistan Society for Biochemistry and Molecular Biology Trends in Biochemistry and Molecular Biology held in Institute of Biochemistry and Biotechnology on April 2–5, 2003. (Poster presentation)

TRAINING COURSES

- Attended a basic training course of **MALDI-TOF (Voyager)** organized in School of Biological Sciences by ABI Biosystems conducted by AlekDoley (Application engineer of ABI Biosystems) in Jan 2007.
- Attended a **MALDI-TOF-MS Operator Training Course 'Proteomics'** with the Bruker Daltonik GmbH Autoflex III TOF/TOF™ from 19–21 May, 2008 in Bremen, Germany.
- Attended **Agilent LCMS Time of Flight Training Course** at NUS-Singapore MIT Alliance for Research and Technology from 22–25 September, 2009 in Singapore.
- Participated in the Practical Training Course on **Commercial Plant Tissue Culture and Biotechnology** held at Institute of Agri-Biotechnology and Genetic Resources, National Agricultural Research Center, Islamabad, Pakistan on March 1 –4, 2010.
- Participated in ‘Indigenous On campus training program under Modern University Governance Program’ held at Kinnaird College for Women, Lahore on March 10th, 11th, 16th–18th, 2015.
- attended a FREE Online Course- Shaping the Future of Education: AI Across Campus’ (A series of 7 Webinars) from 13th -30th, 2024 organized by Center for Learning and Teaching (CLT), FCCU.
- Attended a Professional Development Series ‘Leveling the Playing Field in Higher Education: Systemic Strategies For Inclusive Excellence’ April 07 - April 16, 2025 organized by Center for Learning and Teaching (CLT), FCCU.

WORKSHOPS ORGANIZED

- Organized one day workshop on ‘Endnote: sharpen your writing skills’ in Kinnaird College for Women on June 3, 2016.
- Organized a two days national workshop on ‘Bioinformatics and Computational Drug Design’ in Kinnaird College for Women on January 27-28, 2017 funded by HEC
- Organized one day workshop ‘Application of Statistics in Biological Research: A Training Workshop’ in Kinnaird College for Women on 3rd November, 2018.
- Organized a one day workshop entitled ‘Biosafety Training for Young Researchers’ on February 22nd, 2020 in collaboration with Pakistan Biological Safety Association (PBSA)
- Workshop on “Innovations in Control and Management of Arboviral Diseases in Pakistan” organized by the Department of Biochemistry in collaboration with ORIC, Kinnaird College for Women on 9th March, 2023.
- A Hands-on training is organized for lab staff on ‘Conventional and Innovative Techniques for effective Lab management’ on 20th June 2023 as a member of Lab management committee of Kinnaird College for Women, Lahore
- Organized a training program "Teachers Training Workshop on Drug Use Prevention" on 10th May 2024 at Kinnaird College for Women Lahore as a member of Anti-Drug and Tobacco Committee.

- Organized a hands-on workshop on “Advances in Molecular Docking and Drug Designing” by the Department of Biochemistry in collaboration with ORIC, Kinnaird College for Women on 2nd December 2024.
- Organized a workshop on ‘Consent and Ethics in Public Health and Research’ organized by the Department of Biochemistry in collaboration with ORIC, Kinnaird College for Women, Lahore on 29th April, 2025.

WORKSHOPS ATTENDED

- Participated in organizing an international workshop on ‘**Separation Science and the Omics**’ held in School of Biological Sciences during April 06–10, 2009 and conducted a laboratory session on mass spectrometric (MALDI–TOF) analysis of proteins.
- Participated in a workshop on ‘**Development of Sustainable and Collaborative Research Networks**’, Talented Researcher Exchange programme–INSPIRE Pakistan held at Kinnaird College for Women, Lahore on 08–09 December, 2010.
- Participated in a workshop on ‘**Immunoassays**’ under the INSPIRE Strategic Partnership, program of British Council, organized by National Health Research Complex (PMRC), Sheikh Zayed Medical Complex, Lahore on 23–26 February, 2011.
- Attended a workshop on ‘**Bioinformatics Applications in Biotechnology for Young Biotechnologists**’ held at Forman Christian College University, Lahore on December 9th – 11th, 2011.
- Participated in a workshop on ‘**MATLAB**’ rendered by Dr. Imran Akhtar held at Kinnaird College for Women, Lahore on 25th February, 2012.
- Participated in a workshop on ‘**LATEX**’ rendered by Dr. Kevin J. Keen held at Kinnaird College for Women, Lahore on 22 March, 2012.
- Participated in a workshop on ‘**R**’ rendered by Dr. Kevin J. Keen held at Kinnaird College for Women, Lahore on 22 March, 2012.
- Participated in a workshop on ‘**How to develop a Research Culture in an Educational Institution of a Developing Country**’ rendered by Dr. Marina Meilat Kinnaird College for Women, Lahore on 04 – 08 September, 2012.
- Participated in the ‘**Assessment Team Training Workshop**’ held at Kinnaird College for Women, Lahore on October 12th, 2012.
- Attended a one day National Workshop on ‘**Recombinant Technologies in Vaccine Development**’ held at Institute of Biochemistry and Biotechnology University of Veterinary and Animal Sciences, Lahore on 11th April, 2013.
- Attended a one day workshop ‘**Article Writing Workshop**’ held at Nur Center for Research and Policy, Fatima Memorial Hospital on 25th April, 2013.
- Participated in ‘**Alternative Assessment in Service Training Workshop**’ held at Kinnaird College for Women, Lahore on March 7th, 2014.
- Attended two days’ workshop on ‘**Developing and Assessing Proposals**’ organized by IM Sciences and Tertiary Education Support Program, Higher Education Commission (TESP-HEC) in Islamabad from 15th – 16th May, 2015.
- Attended a five days workshop on ‘**Project planning, implementation and evaluation**’ organized by IM Sciences and Tertiary Education Support Program, Higher Education

Comission (TESP-HEC) in Islamabad from 26th – 30th October, 2015.

- Statistical Package For Social Sciences Module I 26th February 2016 organized by QEC, Kinnaird College for Women, Lahore
- Statistical Package For Social Sciences Module II 28th May 2016 organized by QEC, Kinnaird College for Women, Lahore
- Participated in workshop on '**Fund Winning Opportunities**' organized by Pakistan Science Foundation in 5th Invention to Innovation Summit 2016, university of the Punjab on March 2-3, 2016.
- Participated in workshop on '**Workshop on Research/Academic Writing**' by Dr Andrea Fleschenberg dos Ramos-Pinéu organized by Forman Christian College University on April 22, 2016
- Participated in workshop on '**Modern Strategies in Drug Discovery & Vaccine Design**' by School of Science, Lahore University of Management Sciences (LUMS) on December 2, 2016
- Participated in an International Workshop on '**Microarray for Gene Expression**' held at center of Excellence in Molecular Biology (CEMB) on February 14-17, 2017.
- Participated in a Hands-on-workshop on '**Advancements in Vaccine Design and Drug Discovery**' organized by SSE, LUMS on 19th March 2018
 - Participated in a workshop on '**DNA in the Perspective of Forensic Applications**' on 19th October, 2018 in Government College University (GCU).
- Attended a one day workshop on '**Application of Statistics in Biological Research: A Training Workshop**' on 3rd November 2018 at Department of Biochemistry, Kinnaird College for Women, Lahore.
- Attended a one day workshop on '**ISO 21001 Educational Organization Management System (EOMS)**' on 17th November, 2018 organized by QEC, Kinnaird College for Women, Lahore
- Attended a workshop '**Toxicological Screening in New Drug Development**' on 3rd April 2019 at Kinnaird College for Women.
- Attended a workshop '**Advanced NMR Techniques in Structural Biology and Chemistry**' on 30th April 2019 at Department of Biology, LUMS
- Attended an Awareness Seminar on '**Corona – A Life Threatening Virus**' 25th Feb 2020 organized by Department of Environmental Sciences in collaboration with ORIC
- Attended an online Workshop on '**Outcome Based Education (OBE)**' on 28th November 2020 organized by QEC, Kinnaird College for Women, Lahore
- Attended a webinar on '**Coronavirus: How it infects us and how we might stop it**' on 27th August 2020 organized by Scientific American.
- Attended a webinar on '**Awareness and Management of children with intellectual disabilities**' on 7th May 2021 organized by Department of Biochemistry, Kinnaird Science Club and Fukuoka School for Special Education.
- Attended a webinar on '**Awareness of Blood Donation**' on 5th June 2021 organized by Department of Biochemistry, Kinnaird College (HaemSavers) in collaboration of Health Society

- One day workshop on '**Mushrooms, its Secrets and Entrepreneurship**' organized by Department of Botany in collaboration with ORIC, Kinnaird College for Women on 14th March, 2022.
- One day workshop on '**Training for growing edible gardens**' organized by Department of Botany in collaboration with ORIC and GYM club, Kinnaird College for Women on 4th October, 2022.
- Conference and hands on workshop on '**Structural Biology approaches in drug discovery and vaccine research**'. 13th and 14th March 2023 by Department of Biology, SBASSE, LUMS
- One day workshop on '**Innovations in Control and Management of Arboviral Diseases in Pakistan**' organized by Department of Biochemistry, Kinnaird College for Women, Lahore on 9th March, 2023.
- Three days Hands-on-training workshop on '**Python Essentials**' organized by the Department of Mathematics, Kinnaird College for Women, Lahore on 14th-16th May, 2023.
- Attended a workshop on '**Capacity Building Workshops- Faculty Development Plan**' at Kinnaird College for Women on 22nd May 2024.
- Attended a training program '**Teachers Training Workshop on Drug Use Prevention**' at Kinnaird College for Women on 10th May 2024.
- Attended an online training session on "**Turnitin**" organized by HEC on 23rd May 2024.
- Attended hands-on Training on '**MultiOmics Data Analysis & Whole Genome Sequencing**' at the School of Biochemistry and Biotechnology, University of the Punjab, Lahore on 30-31 October and 1 November 2024.
- Attended a hands-on workshop on "**Advances in Molecular Docking and Drug Designing**" by the Department of Biochemistry in collaboration with ORIC, Kinnaird College for Women on 2nd December 2024.
- attended a workshop on "**Enhancing the communication skills for leaders**" on 25th March, 2025 at Kinnaird College for Women.
- attended a workshop on "**Growth and reflection in a personal and professional context**" on 28th March, 2025 at Kinnaird College for Women.
- attended a workshop on "**Conflict resolution and management**" on 7th April, 2025 at Kinnaird College for Women.
- Attended a '**Involvement of Internal and External Stakeholders in Higher Education Curricula Development**' by Dr Irine Darchia on 14 April, 2025 during Pakistan Network of Quality Assurance in Higher Education (PNQAHE) conference at FCCU
- Attended a Capacity Building Workshop on "**Empowering Educators: Inclusive STEAM Tools for Transformative Pedagogy**", jointly organized by the University of Education, Lahore, with UK-Pakistan Science Innovation Global Network (UPSIGN) on 21-22 April, 2025 and 24-25 April 2025.
- Attended a workshop on 'Consent and Ethics in Public Health and Research' organized by the Department of Biochemistry, Kinnaird College for Women, Lahore on 29th April, 2025.

CONFERENCES ORGANIZED/ATTENDED

- Active participation and organization of 7th international conference of the Pakistan Society for Biochemistry and Molecular Biology **Trends in Biochemistry and Molecular Biology** held in Institute of Biochemistry and Biotechnology on April 2–5, 2003.
- Participation as an active member of Organizing Committee of 18th **Federation of Asian and Oceanian Biochemists and Molecular Biologists (FAOBMB) Symposium** being held at Lahore on November 20–23, 2005.
- Attended the **10th Annual Congress of Pakistan Society of Hepatology** held at Lahore on April 24–25, 2010.
- Attended the National Conference on **Women, Religion and Politics in Pakistan** held at Lahore on 21–22 May, 2010.
- Participation as an active member of Organizing Committee of **Kinnaird Multidisciplinary Research Conference** held in Kinnaird College for Women Lahore on Nov18 – 19, 2013.
- Attended a conference cum expo on ‘**Higher education in Science and Technology for Socio-Economic development of Pakistan**’ on 11-13 February 2019 at PCSIR Labs complex, Lahore in collaboration with Ministry of Science and Technology.
- Attended an International Conference on ‘**Microbes for Sustainable Agriculture- An exploration into the interactive world of microbes and plants**’ at Forman Christian College University, Lahore on March 25-28, 2019.
- Active participation and organization of ‘**1st International Conference on Science, Innovation and Commercialization**’ from 2–4 April, 2019 at Kinnaird College for Women, Lahore.
- Attended 3 days International Conference ‘**Recent Advances in Molecular Sciences**’ on 6th- 8th November, 2019 at University of the Punjab, Lahore.
- Attended a First Virtual Pakistan **Congress of Zoology** (40th Pakistan congress of Zoology (International)) on December 14,17-19, 2021 organized by Department of Parasitology, Sindh Agriculture University, Tandojam.
- Attended International conference on ‘**Advances in Biological Science**’ on 6-8th March 2023 at School of Biological Sciences, University of the Punjab, Lahore
- Organized and attended **Kinnaird’s 2nd International Conference on Science, Technology and Innovation**, organized by Kinnaird College for Women, Lahore on 8th -10th March, 2023.
- Conference and hands-on workshop on ‘**Structural Biology approaches in drug discovery and vaccine research**’ on 13th and 14th March 2023, organized by the Department of Biology, SBASSE, LUMS
- Attended **1st Biennial International Conference on Pharmaceutical and Life Sciences** (Hybrid) 2023 on 9th December 2023, organized by Gulab Devi Teaching Hospital Lahore.
- Attended **Kinnaird’s 3rd International Conference on Science, Technology and Innovation** on 18th -20th February 2025, organized by Kinnaird College for Women, Lahore.

- Attended **5th International Conference of Pakistan Network of Quality Assurance in Higher Education (PNQAHE)**, April 14-16, 2025, at FCCU

SYMPOSIUMS ORGANIZED/ATTENDED

- Contributed as an active member of organizing committee of an international symposium on **"Nanochemistry of Enzymes"** held in School of Biological Sciences, University of the Punjab, Lahore on September 20–21, 2006.
- Symposium on **"Biomarker Measurements in Complex Matrices"** organized by Pakistan Society for Biochemistry and Molecular Biology at School of Biological Sciences, University of the Punjab, Lahore on 25–26 April, 2007.
- Contributed as an active member of organizing committee of an international symposium on **"Role of Glycoproteins in Health and Diseases"** held in School of Biological Sciences on May 27–29, 2008.
- Attended one day symposium on **‘Wild life conservation and animal rights’** on 21st November, 2019 at Kinnaird College for Women.
- Attended **Virtual Drug Discovery Symposium 2022** held via Zoom on September 16, 2022 by Department of Biology, SBASSE, LUMS
- Attended **Virtual Organic & Medicinal Chemistry Symposium 2022** held via zoom on December 09, 2022 by Department of Chemistry & Chemical Engineering, SBASSE, LUMS
- attended the symposium on **‘MultiOmics Data Analysis & Whole Genome Sequencing’** at School of Biochemistry and Biotechnology, University of the Punjab, Lahore on 30-31 October and 1 November, 2024.

SEMINARS ATTENDED

- attended the seminar on **‘Navigating the pathways of publishing in High-quality journals by using Scopus’** at Higher Education Commission Pakistan, on 15 November, 2022 by Elsevier.
- attended the seminar on **‘Enabling a perfect research ecosystem with Science Direct’** at Higher Education Commission Pakistan, at Higher Education Commission Pakistan, on 28 November, 2022 by Elsevier
- attended a seminar on **‘Innovative Techniques in Livestock and Aquaculture’** organized by Zoology and Food and Nutrition Departments, Kinnaird College for Women, Lahore on January 28, 2020
- attended a seminar on **‘Sericulture: A pathway to Economic Growth’** organized by Zoology Department, Kinnaird College for Women, Lahore on February 21, 2023
- Webinar on **“High Throughput Cell-Based Assay** by Dr Saeed Syed Mohammad organized by Shifa Tameer -e- Millat University, on 21st August 2023.
- Webinar, **“Host-Gut microbes-diet interactome”** by Prof. Dr Jia Li organized by Shifa Tameer -e- Millat University on 18th of September 2023
- Attended a seminar on **“Preconception Care and Precision Medicine”** organized by the Department of Biochemistry, Kinnaird College for Women on 22 November 2023.

- Attended international seminar on ‘Leadership Role in Quality Assurance, by Dr James R Appleton, University of Redlands by Forman Christian College on February 15, 2024.
- Attended an awareness seminar on ‘Dialogue on Future Threat of New Chemical Drugs’ at Kinnaird College for Women on 5th March 2024
- attended a Panel Talk on Botanical and Environmental Resilience Through International Relation in achieving SDG’s’ organized by the Department of Botany and Department of International Relations in collaboration with ORIC on 29th April 2024
- Attended a seminar on Nature vs Nurture: Exploring the Interplay of Environment, Genetics, and Psychology organized by the Department of Genetics, Kinnaird College for Women, Lahore on 30 April 2024
- Attended a seminar on ‘Bacteriophage Therapy: An Innovative and Sustainable Approach to Combat Antimicrobial Resistance’ organized by the Department of Biochemistry, Kinnaird College for Women on 8 May 2024.
- Attended a seminar on ‘Smog’ organized by the Department of Chemistry at Kinnaird College in October 2024.
- attended an International Webinar on Women Leadership in Higher Education: Empowering Change & Advancing Global Excellence on March 8, 2025.
- Younas attended the webinar on ‘Mapping Multiple Dimensions of Educational Inequity and Impact on Holistic Student Development’ by Penny Jane Burke & Helen Geng on 07 April 2024 organized by CLT, FCCU
- webinar on ‘Institutional Support Systems for Equity’ by Zoe Allman & Paul Ashwin on 08 April 2024 organized by CLT, FCCU
- Attended a webinar on ‘AI Trends in Higher Education: Emerald/HETL Webinar on March 26, 2025.
- Attended an International Webinar on ‘Women Leadership in Higher Education: Empowering Change & Advancing Global held on March 08, 2025
- Attended Inter Services Public Relations HilalTalks-2025 from May 26 – 31 2025.

COURSES TAUGHT AT UNDERGRADUATE LEVEL

- Introductory Biochemistry
- Fundamentals of Molecular Biology
- Biochemistry of Body Fluids
- Recombinant DNA and Related Techniques
- Plant Biochemistry
- Advanced Topics in Molecular Biology
- Cell and Tissue Culture
- Disease and Inheritance
- Genetic Engineering (Biotechnology Department)

COURSES TAUGHT AT POSTGRADUATE LEVEL

- Advanced Molecular Biology

- Analytical and Biochemical Techniques
- Molecular and Biochemical Techniques
- Genetic Engineering and Applications
- Review Article Writing
- Data Analysis and Scientific Writing

LABORATORY SKILLS

- Microbial culturing techniques
- Recombinant DNA techniques (RNA, plasmid and genomic DNA isolation, Polymerase chain reaction (PCR), RT-PCR, PCR-RFLP, Allele specific PCR, ARMS-PCR, cloning and expression of recombinant proteins, Dialysis, Agarose gel electrophoresis, SDS-PAGE)
- UV/Visible-Spectroscopy
- Chromatographic techniques: Paper Chromatography, Thin Layer Chromatography, Size exclusion chromatography, Ion exchange chromatography, Affinity chromatography, High performance liquid chromatography (HPLC), Fast performance liquid chromatography (FPLC)
- Estimation of blood analytes through commercial kits
- Familiar with basic techniques of microbiology (culturing, staining methods, antimicrobial sensitivity etc.)
- Familiar with various bioinformatics tools
- Mass spectrometry (MALDI-TOF, LCMS-TOF)

REFERENCES

Prof. M. Akhtar (FRS)

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Prof. Naeem Rashid

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E.mail: naeemrashid37@hotmail.com

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