

Curriculum Vitae of Tanzina Akter

Tanzina Akter

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Research Gate: <https://www.researchgate.net/profile/Tanzina-Akter-5>

Educational Qualifications

Title, Year Awarded	Institution, GPA
Doctor of Philosophy (PhD) (September 2022 to current)	School of Optometry and Vision Science (SOVS), Faculty of Medicine and Health, University of New South Wales (UNSW), Sydney, Australia
Master of Science, M.Sc. (Thesis Group), 2013	Department of Microbiology, Jahangirnagar University, Savar, Dhaka 1342, Bangladesh. GPA: 3.98 (Out of 4.00) Position: First (1 st) (Top scorer in Biological Faculty of Sciences of Jahangirnagar University in her academic year)
Bachelor of Science, B.Sc. (Hons.), 2012	Department of Microbiology, Jahangirnagar University, Savar, Dhaka 1342, Bangladesh. CGPA: 3.96 (Out of 4.00) Position: First (1 st) (Top scorer among all the Departments of Jahangirnagar University, was awarded Prime Minister Gold Medal 2013 for being the top scorer of Biological Faculty of Sciences in Bachelor of Science, B.Sc. (Hons.) in her academic year)
Higher Secondary Certificate, 2007	Dhaka City College, Dhaka 1205, Bangladesh. GPA: 5.00 (Out of 5.00)
Secondary School Certificate, 2005	Mirpur Mofid-E-Um School and College, Dhaka 1348, Bangladesh. GPA: 5.00 (Out of 5.00)

Thesis Details

I completed my thesis part of Master of Science, M.Sc. on “Comparative study on the survival of altered and hybrid *Vibrio cholerae* O1 El Tor variants in association with *Anabaena variabilis*” at “Laboratory of Environmental Health” in “**International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B)**”, Dhaka, Bangladesh.

Employment History

Current Position

Position: Scientific Officer, Microbial Biotechnology Division, National Institute of Biotechnology (NIB), Dhaka-1349, Bangladesh.

Period: From 1 April 2021 to till date.

Employer: National Institute of Biotechnology (NIB), Dhaka-1349, Bangladesh.

Responsibilities: Involved in research designing, conduction of research work, data analysis and interpretation, delivering hands-on training and supervision of graduate and undergraduate research students and relevant official activities.

Former Position

1. Position: Scientific Officer, Environmental Biotechnology Division, National Institute of Biotechnology (NIB), Dhaka-1349, Bangladesh.

Period: From 23 June, 2016 to 31 March 2021.

Employer: National Institute of Biotechnology (NIB), Dhaka-1349, Bangladesh.

Responsibilities: Involved in research designing, conduction of research work, data analysis and interpretation, delivering hands-on training and supervision of graduate and undergraduate research students and relevant official activities.

2. Position: Lecturer, Department of Microbiology, Primeasia University, Banani, Dhaka-1213, Bangladesh.

Period: From 25 February, 2015 to 22 June 2016.

Employer: Primeasia University, Banani, Dhaka-1213, Bangladesh.

Responsibilities: Delivering lectures on particular courses (theoretical and practical), administering class tests and quizzes, invigilation, evaluation of examination scripts and supervision of undergraduate research students.

Technical Skills

General Microbiology: Bacteriological Media Preparation, Spreading, Streaking, Isolation of Bacterial Pure Culture, Gram Staining, Biochemical Tests, Stocking of Isolated Organisms, Identification of Unknown Bacteria, Isolation of Antibiotic Resistant Microbes, Bacterial Enumeration (Most Probable Number Method), Serial Dilution, Antibiotic Sensitivity Test, Paper Chromatography, API Test, MIC and MBC Test Assay, Direct Fluorescence Antibody Technique, Biofilm Assay, Enzyme Assay, Enzyme Purification etc.

Molecular Biology: Bacterial DNA Extraction, DNA Amplification by Polymerase Chain Reaction (PCR), PCR Product Purification, Plasmid Extraction from Bacteria, Agarose Gel Electrophoresis, RAPD, ARDRA, Bacterial 16s rRNA Sequencing etc.

Bioinformatics: Exploring Nucleic Acid Databases & Data Mining, Primer Designing, Proteomics: Biochemical Properties, Structure & Interactions of Proteins, Sanger Sequence Data Analysis: Quality Assurance & Information Mining from DNA Sequence Data, Sequence Data Submission to Public Databases, DNA Amplification & Cloning, Comparative Genomics: Species/Gene

Identification & Sequence Determination, Evolutionary Relationship Determination, Network Biology, Whole Genome Assembly & Annotation, and Molecular Docking etc.

Animal Research: Mouse model research for producing antibody against specific antigen.

Writing and Presentation: Project synopsis and manuscript writing, oral presentation, and poster preparation.

Computer Proficiency

Operating System: Windows 13, Windows 10, Windows 7, Windows 8.1.

Microsoft Office: MS Word, MS Excel, MS Power Point.

Compose: English & Bengali.

Data analysis: Data Analysis with **R** and **SPSS**.

Training Participation

1. Successfully completed trainings entitled “Industrial Training” at **Square Pharmaceuticals Ltd**, Dhaka Unit, Kaliakoir, Gazipur.
2. Successfully completed trainings entitled “Biosafety and Biosecurity” at **International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B)**, Dhaka, Bangladesh.
3. Successfully completed trainings entitled “Project Planning, Development and Management, Maintenance of Biosafety and Biosecurity in the Laboratory, Food Safety & Security Using Nuclear Technology, Training on Statistical Analysis, Bioinformatics Data Analysis with R, and Fundamentals of Bioinformatics for Biologist” at **National Institute of Biotechnology (NIB)**.

Language Proficiency

Good command over both English and Bengali. I got overall **7** band score in Ielts exam.

List of Publications

1. **Tanzina Akter**, Zahid Hayat Mahmud, Mohammad Shafiqul Islam, Hafij Al Mahmud, Mir Alvee Ahmed, Mohammad Hasibur Rahman, Mohammad Anowar Khasru Parvez, Khairul Islam, John David Clemens and Mohammad Sirajul Islam (2017). Comparative Study of Survival of Altered and Hybrid *Vibrio cholerae* O1 El Tor in Association with *Anabaena variabilis* in Fresh and Brackish Water Microcosms. Water and Environment Journal (Publisher: Wiley online library, Journal ISSN: 1747- 6593 (Electronic), Volume: 31, Issue:4, Pages: 584-591. [doi:10.1111/wej.12282](https://doi.org/10.1111/wej.12282)
2. **Tanzina Akter**, Md Sumon Khan, Shamsun Nahar, Kaniz Fatema, Modhusudon Shaha, Mohammad Jakir Hossain, Shazeed-Ul-Karim, Hoomyra Sultana, (2019). Determination of Prevalence and Antimicrobial Sensitivity Pattern of *Klebsiella pneumoniae* from Sputum Sample of a Tertiary Care Hospital. International Medical Journal (Journal ISSN: 1341205, Volume: 24, Issue: 3, Pages: 29-35.
3. **Tanzina Akter**, Kaniz Fatema, Shamsun Nahar, Shazeed-Ul-Karim, Hoomyra Sultana, Md Sumon Khan, Md. Shahidul Alam, Sadia Afrin, Mohammad Jakir Hossain (2020). Spectrum of Antimicrobial Susceptibility of *Escherichia coli* Isolated from Urine Samples of a Tertiary Care Hospital of Bangladesh. International Medical Journal. (Journal ISSN: 13412051, Volume: 24, Issue: 3, Pages: 429-434.
4. **Tanzina Akter**, Kaniz Fatema, Md. Razibul Alam, Md. Anowar Khasru Parvez, Shamsun Nahar, Muhammad Ekhlash Uddin, Safirun Pervin and Tasmia Farzana (2016). Investigation of Urine Samples for Isolation, Identification and Antibiotic Susceptibility Analysis of Bacterial Pathogens from Suspected Urinary Tract Infected Patients of Bangladesh. British Journal of

Medicine & Medical Research (Publisher: Sciencedomain International, Journal ISSN:2231-0614 (Electronic), Volume:18, Issue:2, Pages:1-10. [DOI: 10.9734/BJMMR/2016/28576](https://doi.org/10.9734/BJMMR/2016/28576)

5. **Tanzina Akter**, Mohammad Jakir Hossain, Md Sumon Khan, Hoomyra Sultana, Kaniz Fatema, Sohana Al Sanjee and Suvamoy Datta (2016). Isolation, Identification and Antimicrobial Susceptibility Pattern Analysis of *Escherichia coli* Isolated from Clinical Samples of Bangladesh. Asian Journal of Biomedical and Pharmaceutical Sciences (Publisher: AJBPS Publisher, Journal ISSN: 2249-622X(Electronic), Volume: 6, Issue: 54, Pages:13-16.
6. **Tanzina Akter**, Mohammad Jakir Hossain, Md Sumon Khan, Sohana Al Sanjee, Kaniz Fatema and Suvamoy Datta (2016). Prevalence and Antimicrobial Susceptibility Pattern of *Salmonella* spp. Isolated from Clinical Samples of Bangladesh. American Journal of Pharmacy and Health Research (Publisher: AJPHR Publisher, Journal ISSN: 2321–3647 (Electronic), Volume: 4, Issue: 3, Pages: 102-111. <http://ajphr.com/archive/volume-4/march-2016-issue-3#>
7. Kaniz Fatema, Shamsun Nahar, Safirun Pervin, Ani Chakma, Mohammad Jakir Hossain, Sabrin Bashar, and **Tanzina Akter** (2017). Urine Analysis and Determination of Drug Sensitivity Pattern of Isolated *Escherichia coli* from Urinary Tract Infected Patients. Asian Journal of Medicine and Health (Publisher: Sciencedomain International, Volume: 2, Issue: 1, Pages: 1-7. [DOI: 10.9734/AJMAH/2017/30197](https://doi.org/10.9734/AJMAH/2017/30197)
8. Muhammad Ekhlash Uddin, **Tanzina Akter**, Md. Anowar Khasru Parvez, Shamsun Nahar, Safirun Per- vin, Bishajit Debnath, and Suvamoy Dattan (2017). Microbial Safety of Street Vended Fruit Juices in Dhaka City of Bangladesh. Journal of Advances in Microbiology, (Publisher: Sciencedomain International, Journal ISSN: 2456-7116 (Electronic), Volume: 3, Issue: 2, Pages: 1-7. [DOI: 10.9734/JAMB/2017/33651](https://doi.org/10.9734/JAMB/2017/33651)
9. Muhammad Ekhlash Uddin, **Tanzina Akter**, Papia Sultana, Md. Ikramul Hasan, Mahbuba Akter Lubna, Hasan Al Monem, Md. Anowar Khasru Parvez, Shamsun Nahar, Md. Sumon Khan (2018). Isolation, Identification and Antimicrobial Susceptibility Profile Analysis of *Vibrio cholerae* O1 from Stool Samples of Bangladesh. Advances in Microbiology (Publisher: Scientific Research Publishing Inc., Journal ISSN: 2165-3410 (Electronic), Volume: 8, Issue: 3, Pages:188-196. <https://doi.org/10.4236/aim.2018.83013>
10. Shuvra Kanti Dey, Shamsun Nahar, **Tanzina Akter**, Hoomyra Sultana, Anjuman Akter, Omar Sadi Sarkar, Firoz Ahmed, Ali Azam Talukder and Farjana Ahmed (2014). A Retrospective Analysis of Viral Gastroenteritis in Asia. Journal of Pediatric Infectious Diseases (Publisher: IOS Publisher, Journal ISSN: 1305-7693 (Electronic), Volume: 9, Issue: 6, Pages: 53-65. [DOI 10.3233/JPI-140419](https://doi.org/10.3233/JPI-140419)
11. Kaniz Fatema, Komol Mondal, **Tanzina Akter** and Suvamoy Datta (2016). Investigation of Diarrheal Stool from Hospitalized Patient and Compare Their Soci-economical Condition, Dhaka, Bangladesh. British Journal of Medicine & Medical Research (Publisher: Sciencedomain International, Journal ISSN: 2231-0614 (Electronic), Volume: 15, Issue: 9, Pages: 1-6. [DOI: 10.9734/BJMMR/2016/25769](https://doi.org/10.9734/BJMMR/2016/25769)
12. Avijit Banik, Noor Mohammad, **Tanzina Akter**, Kaniz Fatema, Maruf Abony (2018). Prevalence, Identification and Antibiotic Susceptibility of *Enterococcus* Species Isolated from Chicken and Pigeon Meat in Gazipur Area of Bangladesh. Open Journal of Medical Microbiology. (Publisher: An Academic Publisher, Journal ISSN: 2165-3380 (Electronic), Volume:8, Issue:3, Pages: 74-83. <https://doi.org/10.4236/ojmm.2018.83007>
13. Sohana Al Sanjee, Md. Ekramul Karim, **Tanzina Akter**, Md. Anowar Khasru Parvez, Monower Hossain, Bushra Jannat, and Safirun Pervin (2017). Prevalence and Antibigram of Bacterial Uropathogens of Urinary Tract Infections from a Tertiary Care Hospital of Bangladesh. Journal of Scientific Research, Bangladesh (Publisher: JSR Publisher, Journal ISSN: 2070-0245 (Electronic), Volume: 9, Issue: 3, Pages: 317-328. <http://dx.doi.org/10.3329/jsr.v9i3.31677>

14. Safirun Pervin, Aeyasa Akter, Muhammad E. Uddin and **Tanzina Akter** (2016). Characterization of Pathogenic Bacteria from Raw and Pasteurized Milk of Different Location of Dhaka City in Bangladesh. *Scholars Academic Journal of Biosciences* (Publisher: Scholars Academic and Scientific Publisher, Journal ISSN: 2321-6883 (Electronic), Volume: 4, Issue: 5, Pages: 377-381. saspublisher.com/wp-content/uploads/2016/06/SAJB-45377-381.pdf
15. Kaniz Fatema, Komol Mondol, **Tanzina Akter** and Suvomoy Datta (2016). Detection of Pus Sample of Various Pyogenic Infections from Diabetic and Non Diabetic Patient and Compare their Socioeconomic Status in Bangladesh. *American Scientific Research Journal for Engineering, Technology, and Sciences* (Publisher: Global Society of Scientific Research and Researchers, Journal ISSN: 2313-4402 (Electronic), Volume: 26, Issue: 1, Pages: 159-165.
16. Kaniz Fatema, Tanzina Azad Trisha, Abu Mohammad Azmal Morshed, Md. Moyeen Uddin Pk, **Tanzina Akter**, Bushra Jannat, and Suvamoy Datta (2016). Epidemiological Study of Antibiotic Resistance of *Salmonella typhi* and *Salmonella paratyphi* - A from Clinical Samples in Dhaka City. *Journal of Applied Life Sciences International* (Publisher: Sciencedomain International, Journal ISSN: 2394-1103 (Electronic), Volume: 8, Issue: 4, Pages: 1-5. [DOI: 10.9734/JALSI/2016/27965](https://doi.org/10.9734/JALSI/2016/27965)
17. Modhusudon Shaha, Bithi Roy, **Tanzina Akter**, Md. Ekramul Karim, Md Moniruzzaman and Abu Hashem (2018). Detection of Genetic Alteration of Polymerase Protein of Hepatitis B Virus Strain C2 Isolated From Bangladesh. *Advances in Biotechnology and Microbiology* (Publisher: Juniper Publisher, Journal ISSN: 2474-7637 (Electronic), Volume: 9, Issue: 2, Pages: 1-3.
18. Modhusudon Shaha, Bithi Roy, **Tanzina Akter**, Md. Ekramul Karim and Md Mizanur Rahaman. Host Immune Responses to the Infections Caused by the Infectious Viruses (2018). *Acta Scientific Microbiology* (Publisher: Acta Scientific, Journal ISSN: 2581-3226 (Electronic), Volume: 1, Issue: 6, Pages:13-16
19. Zakaria Ahmed, Md. Mahamudul Haque, Nasif Sayeed, Muhammad Ekhlash Uddin and **Tanzina Akter** (2016). Reviews on Probiotics – It's Uses and Applications. *World Journal of Pharmaceutical Research*. (Publisher: World Journal of Pharmaceutical Research, Journal ISSN: 2277-7105 (Electronic), Volume:5, Issue: 5, Pages: 24-34. [DOI: 10.20959/wjpr20165-6067](https://doi.org/10.20959/wjpr20165-6067)
20. Kaniz Fatema, Shahina Sultana, Mohammad Hedayet Ali, **Tanzina Akter**, Khadiza-Tul-Kobra, Shiful Islam (2021). Detection of Pathogenic Microorganisms from Burn Patients Admitted in Tertiary Medical College Hospital and Their Antimicrobial Patterns. *Open Journal of Medical Microbiology*. (Journal ISSN: 21653380, Volume: 11, Issue: 1, Pages: 58-67. <https://doi.org/10.4236/ojmm.2021.111005>

Book Chapters

1. **Tanzina Akter**, Modhusudon Shaha, Mohammad Al Mamun, Sayem Khan, & Abu Hashem. (2022). The role of the proton exchange membrane (PEM) in microbial fuel cell performance. In *Microbial Fuel Cells: Emerging trends in electrochemical applications* (pp. 7-1). Bristol, UK: IOP Publishing.
2. **Tanzina Akter**, Modhusudon Shaha, Fatema Tuj Zohora, Anika Tasnim Protity, Mohammad Al Mamun, Abu Hashem (2023). The Impact of Textile Dyes on the Environment. Chapter in Book: *Nanohybrid Materials for Treatment of Textiles Dyes*. Springer Nature (Accepted).

Conference Abstracts

1. **Tanzina Akter**, Md. Mahaddes Ali, Kaniz Fatema, Shiful Islam, Maruf Abony, Mahbuba Akter Lubna, Fiona Stapleton and Mark Willcox. Detection of blaSHV, blaTEM, blaCTX-M and blaOXA genes and determination of their correlation of biofilm production in ESBL producing *Escherichia*

coli and *Klebsiella pneumoniae* from Bangladesh. *Conference:* 11st Annual Conference of International Chemical Biology Society (ICBS) organized by ICBS at Brisbane, Australia on December 3-7, 2022.

2. **Tanzina Akter**, Sanzida Sharmin, Keshob Chandra Das, Shamima Akhtar Sharmin and Md. Salimullah. Morphological and Molecular Identification of Biosurfactant Producing *Brevibacillus gelatine* from Hydrocarbon Contaminated Soil. *Conference:* 10th AFOB Regional Symposium- (ARS) 2018, organized by AFOB and Department of Microbiology at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, Dhaka 1000, Bangladesh on January 27-29, 2018. **(Awarded as the best poster in Environmental Biotechnology Category)**

3. **Tanzina Akter**, Shakaout Hossain, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das, Md. Abu Bin Hasan Susan and Md. Salimullah. Screening and Molecular Based Characterization of Biosurfactants Producing Bacteria from Hydrocarbon Contaminated Soil Sample. *Conference:* “ASM Microbe 2020 Virtual Symposium” organized by **American Society for Microbiology (ASM) in Chicago, Illinois, USA** on June 18-22, 2020.

4. **Tanzina Akter**, Mahbuba Akter Lubna and Mohammad Jakir Hossain. *Escherichia coli* Isolated from Patients Suspected for Urinary Tract Infections in a Tertiary Care Hospital of Bangladesh. *Conference:* 30th Annual Conference of Bangladesh Society of Microbiologists (BSM), organized by BSM and Department of Microbiology at Dhaka University, Dhaka, Bangladesh on April 29, 2017.

5. **Tanzina Akter**, Zahid Hayat Mahmud, Mohammad Shafiqul Islam, Mohammad Hasibur Rahman, Mohammad Anowar Khasru Parvez, and Mohammad Sirajul Islam. Comparative study on the survival of altered and hybrid *Vibrio cholerae* O1 El Tor variants in association with *Anabaena variabilis*. *Conference:* 30th Annual Conference of Bangladesh Society of Microbiologists (BSM), organized by BSM and Department of Microbiology at Dhaka University, Dhaka, Bangladesh on April 29, 2017.

6. **Tanzina Akter**, Kaniz Fatema, Mohammad Ruhul Amin, Shamsun Nahar and Md. Anowar Khasru Parvez. Prevalence and antibiotic susceptibility of pathogens isolated from patients of ventilator associated pneumonia in intensive care unit. *Conference:* 31st Annual Conference of Bangladesh Society of Microbiologists (BSM), organized by BSM and Department of Microbiology at Dhaka University, Dhaka, Bangladesh on March 10, 2018.

7. **Tanzina Akter**, Kaniz Fatema, Md. Anowar Khasru Parvez, Shamsun Nahar, Tasmia Farzana, Mohammad Jakir Hossain and Md Sumon Khan. Antibiotic susceptibility of *Escherichia coli* from urine samples of urinary tract infected patients in Bangladesh. *Conference:* 31st Annual Conference of Bangladesh Society of Microbiologists (BSM), organized by BSM and Department of Microbiology at Dhaka University, Dhaka, Bangladesh on March 10, 2018.

8. Tasmia Farzana, **Tanzina Akter** and Mahmudul Haque. Prevalence of Salmonellosis in Pediatric Patients from a Tertiary Clinic in Dhaka City, Bangladesh. *Conference:* 10th AFOB Regional Symposium- (ARS) 2018, organized by AFOB and Department of Microbiology at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, Dhaka 1000, Bangladesh on January 27-29, 2018.

9. Mohammad Jakir Hossain, **Tanzina Akter**, Md Sumon Khan, Hasan Al Monem, Tasmia Farzana, Md. Anowar Khasru Parvez, and Shamsun Nahar. Analysis of prevalence and antimicrobial sensitivity pattern of *Klebsiella pneumoniae* from sputum sample of a tertiary care hospital. *Conference:* 10th AFOB Regional Symposium- (ARS) 2018, organized by AFOB and

Department of Microbiology at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, Dhaka 1000, Bangladesh on January 27-29, 2018.

10. Mohammad Jakir Hossain and **Tanzina Akter**. Determination of Antimicrobial Sensitivity Pattern of *Salmonella spp.* Isolated from Blood Samples. *Conference*: 30th Annual Conference of Bangladesh Society of Microbiologists (BSM), organized by BSM and Department of Microbiology at Dhaka University, Dhaka, Bangladesh on April 29, 2017.

11. Shamsun Nahar, Bibi Ayesha Dhalia, **Tanzina Akter**, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Screening of phosphate solubilization by diazotrophic bacteria isolated from rhizospheric soil. *Conference*: 33rd Annual Conference of Bangladesh Society of Microbiologists (BSM) organized by BSM and Department of Microbiology at Dhaka University, Dhaka, Bangladesh on December 26, 2019.

12. **Tanzina Akter**, Shiful Islam, Shamsun Nahar, Md Abu Sayem Khan, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Screening, optimization and molecular based characterization of extracellular pectinase enzyme producing *Klebsiella aerogenes* from soil samples. *Conference*: 4th Young Scientist Congress organized by Bangladesh Academy of Sciences at National Museum of Science and Technology Bhaban, Agargaon, Dhaka 1000, Bangladesh on December 13-15, 2019.

13. Shamsun Nahar, Md. Shahinul Yeamin, Bibi Ayesha Dhalia, **Tanzina Akter**, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Screening and molecular identification of phosphate solubilizing bacteria for their plant growth promoting activities. *Conference*: 4th Young Scientist Congress organized by Bangladesh Academy of Sciences at National Museum of Science and Technology Bhaban, Agargaon, Dhaka 1000, Bangladesh on December 13-15, 2019.

14. Md. Abu Sayem Khan, Afroza Akter, Shamsun Nahar, **Tanzina Akter**, Md. Salimullah, and Shamima Akhtar Sharmin. Detoxification of hexavalent chromium by potential chromate reducing bacteria isolated from tannery dump. *Conference*: 4th Young Scientist Congress organized by Bangladesh Academy of Sciences at National Museum of Science and Technology Bhaban, Agargaon, Dhaka 1000, Bangladesh on December 13-15, 2019.

15. **Tanzina Akter**, Shakaout Hossain, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Characterization of petroleum degrading and biosurfactant producing bacteria from hydrocarbon contaminated soil. *Conference*: CESSD 2019 organized by Conference on environmental solutions for sustainable development: towards developed Bangladesh at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, and CIRDAP, Chameli House, 17 Topkhana Road, Dhaka 1000, Bangladesh on November 27-28, 2019.

16. **Tanzina Akter**, Shiful Islam, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Isolation, determination and growth optimization of pectin degrading and pectinase enzyme producing *Pseudomonas aeruginosa* from rotten vegetables samples. *Conference*: CESSD 2019 organized by Conference on environmental solutions for sustainable development: towards developed Bangladesh at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, and CIRDAP, Chameli House, 17 Topkhana Road, Dhaka 1000, Bangladesh on November 27-28, 2019.

17. Shamsun Nahar, Md. Shahinul Yeamin, **Tanzina Akter**, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Co-relation of Indole Acetic Acid production with nitrogen fixation and phosphate solubilization of some diazotrophic bacteria. *Conference*: 4th IPFS-ICBHA 2019 organized by Global networks of Bangladeshi biotechnologists (GNOBB) and 4th IPFS-

ICBHA 2019 at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, Dhaka 1000, Bangladesh on November 11-13, 2019.

18. **Tanzina Akter**, Shakaout Hossain, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Screening and molecular characterization of biosurfactant producing and diesel degrading bacteria from hydrocarbon contaminated soil. *Conference*: 4th IPFS-ICBHA 2019 organized by Global networks of Bangladeshi biotechnologists (GNOBB) and 4th IPFS-ICBHA 2019 at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, Dhaka 1000, Bangladesh on November 11-13, 2019.

19. **Tanzina Akter**, Shiful Islam, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Isolation and molecular based identification of pectinase enzyme producing *Bacillus flexus* from soil samples. *Conference*: 4th IPFS-ICBHA 2019 organized by Global networks of Bangladeshi biotechnologists (GNOBB) and 4th IPFS-ICBHA 2019 at Nawab Ali Chowdhury Senate Bhaban, University of Dhaka, Dhaka 1000, Bangladesh on November 11-13, 2019.

20. Shamsun Nahar, Md. Shahinul Yeamin, Bibi Ayesha Dhalia, **Tanzina Akter**, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Corelation of phosphate solubilizing activity of bacteria along with P^H change for production of biofertilizer. *Conference*: International Conference on Advancement of Life Sciences 2019, organized by Mawlana Bhashani Science and Technology University, Bangladesh on April 5-6, 2019.

21. **Tanzina Akter**, Shah Rucksana, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md. Salimullah. Isolation and molecular characterization of pectinase enzyme producing *Enterobacter hormaechei* from rotten vegetables samples. *Conference*: International Conference on Advancement of Life Sciences 2019, organized by Mawlana Bhashani Science and Technology University, Bangladesh on April 5-6, 2019.

22. Bibi Ayesha Dhalia, Shamsun Nahar, **Tanzina Akter**, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Screening of phosphate solubilizing capacity of some nitrogen fixing bacteria isolated from rice root and root associated soil. *Conference*: 6th International Conference on Natural Science and Technology (ICNST'19), organized by Asian University for Women (AUW), Chittagong, Bangladesh on March 29-30, 2019.

23. **Tanzina Akter**, Shiful Islam, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Screening and molecular characterization of pectinase enzyme producing *Enterobacter cloacae* from rotten fruits samples. *Conference*: 6th International Conference on Natural Science and Technology (ICNST'19), organized by Asian University for Women (AUW), Chittagong, Bangladesh on March 29-30, 2019.

24. **Tanzina Akter**, Shakaout Hossain, Shamsun Nahar, Shamima Akhtar Sharmin, Keshob Chandra Das and Md Salimullah. Isolation and molecular characterization of biosurfactant producing *Pseudomonas aeruginosa* from hydrocarbon contaminated soil samples. *Conference*: 6th International Conference on Natural Science and Technology (ICNST'19), organized by Asian University for Women (AUW), Chittagong, Bangladesh on March 29-30, 2019.

Reviewer of International Journal

Work as a reviewer of different international peer reviewer journals.

Research Grants

1. Research grant from “**Ministry of Science and Technology, Bangladesh**” on project entitled “Screening and characterization of biosurfactant producing bacteria from pesticides contaminated soil” in 2016-17. **Role: Principal Investigator**
2. Research grant from “**National Institute of Biotechnology**” on project entitled “Screening and characterization of biosurfactant-producing microorganisms from hydrocarbon contaminated soil” in 2016-18. **Role: Principal Investigator**
3. Research grant from “**Ministry of Science and Technology, Bangladesh**” on project entitled “Isolation and molecular characterization of pectinase enzyme producing bacteria from fruits and vegetables wastes” in 2017-18. **Role: Principal Investigator**
4. Research grant from “**Ministry of Science and Technology, Bangladesh**” on project entitled “Isolation, screening and molecular characterization of hydrocarbonoclastic bacteria from hydrocarbon contaminated soil” in 2018-19. **Role: Principal Investigator**
5. Research grant from “**Ministry of Science and Technology, Bangladesh**” on project entitled “Heavy metal accumulation in several belowground spices plants of Bangladesh.” in 2018-19. **Role: Co-Investigator**
6. Research grant from “**Establishment of National Gene Bank**” on project entitled “Collection and study of genetic diversity and molecular phylogeny of rice associated nitrogen fixing microorganism from various agro-ecological zones of Bangladesh” in 2018-21. **Role: Co-Investigator**
7. Research grant from “**Ministry of Science and Technology, Bangladesh**” on project entitled “Screening and molecular characterization of biosurfactant producing bacteria from petroleum contaminated soil” in 2019-20. **Role: Principal Investigator**
8. Research grant from “**National Institute of Biotechnology**” on project entitled “Isolation, screening and molecular characterization of phenol degrading bacteria from phenol contaminated sites in Bangladesh” in 2019-20. **Role: Principal Investigator**
9. Research grant from “**Ministry of Science and Technology, Bangladesh**” on project entitled “Screening and molecular characterization of extracellular pectinase enzyme producing bacteria from environmental wastes” in 2020-21. **Role: Principal Investigator**

Involvement on Current Research Projects:

1. Screening and characterization of potential microbes for biotechnological application. Work as: **Co-Investigator**

Awards and Achievements

1. “University International Postgraduate Award (UIPA)” for PhD at UNSW (Sydney, Australia).
2. “Jahangirnagar University Merit Scholarship” for obtaining the highest GPA and securing top position in Master of Science in the Biological Faculty of Sciences of Jahangirnagar University.
3. “National Science and Technology (N.S.T) Fellowship” for Master of Science (Thesis) from the Government of Peoples Republic of Bangladesh.
4. “Prime Minister Gold Medal 2013” for obtaining the highest CGPA in Biological Faculty of Sciences in Bachelor of Science (Hons.) in her academic year.

5. “Asadul Kabir Gold Medal and Scholarship” for obtaining the highest CGPA and securing top position in Bachelor of Science (Hons.) among all the Faculties of Jahangirnagar University in her academic year.
6. “Jahangirnagar University Merit Scholarship” for all terminal examination results of Bachelor of Science (Hons.) (4 Years).
7. “Dr. Akhlakur Rahman Scholarship”, “Shorfuiddin Scholarship”, “University Talent pool Scholarship”, “Mir Muazzem Ali and Azifa Ali Scholarship” for obtaining the highest CGPA and securing top position in Bachelor of Science (Hons.) among all the Departments of Jahangirnagar University in her academic year.
8. Best poster presentation award in “Environmental Category” from an International Conference named “10th AFOB Regional Symposium-(ARS) 2018”.

Students Supervision

I have successfully supervised 8 undergraduate and 3 postgraduate students at National Institute of Biotechnology (NIB) and 10 undergraduate students at Primeasia University (PAU).

Training Delivery

Deliver hands-on training entitled “**Basic Training on Biotechnology**” on “**Extraction of Bacterial DNA by Phenol Chloroform Extraction Method**” to undergraduate and postgraduate students throughout the year.

Extra-curricular Activities

1. Active member of Jahangirnagar University Microbiology Alumni Association (**JUMAA**).

Declaration

I hereby declare that all the above information are true and given by an honest and cool brain and any willing or unwilling mistake or false information will result in my disqualification.

(Tanzina Akter)

19/09/2023