REENA C. JHAMTANI, Ph.D

Mobile No.: +91-8320321528; +91-8000079969

Email: reenajhamtani@gmail.com

PROFESSIONAL AFFILIATIONS

Research Officer (November 2018 to June 2019)

Senior Research Fellow (DST-INSPIRE) (February 2016 to October 2018)

❖ Junior Research Fellow (DST-INSPIRE) (February 2014 to January 2016)

Ecotoxicology Section
Jai Research Foundation, Vapi

Laboratory of Analytical and Molecular Toxicology, Institute of Forensic Science,

Gujarat Forensic Sciences University, Gandhinagar Laboratory of Analytical and Molecular Toxicology, Institute of Forensic Science,

Gujarat Forensic Sciences University, Gandhinagar

JOB ROLE AND SKILLS

Introduction and knowledge of GLP

- ❖ Hands on experience to conduct aquatic (fish [Zebrafish, Common carp, Rainbow trout], Alga [P.subcapitata, L.gibba, L.minor, Cynobacteria], Daphnia magna) and Terrestrial (Earthworm [Eisenia foetida], honeybee [Apis mellifera], Avian [Japanese quail]) ecotoxicology studies.
- ❖ As Research Officer, the role focus on conducting, coordinating and monitoring guideline based aquatic and terrestrial eco-toxicology studies placed at contract research organizations (CRO) to support new and existing product registrations and product stewardship for chemical portfolio.

ADVANCED TECHNICAL SKILLS

- ❖ Biochemical Methods/Techniques: Oxidative Stress/ Antioxidant enzyme assays using Biochemical Analyzer and Multiplate Reader.
- ❖ Molecular Biological Methods /Techniques: Isolation of nucleic acids, PCR, cDNA synthesis, Gene expression studies using q-PCR (Real-Time PCR).
- ❖ Analytical Instrumentation: Chromatography: UHPLC, HPLC, GC, TLC; Spectrophotometery: ICP-OES, UV visible, FT-Raman, Multiscan EX-Reader, Zetasizer.
- ❖ Stereomicroscope, VSC5000 (Video spectral comparator), VISPEC, ESDA, Electrostatic Dust lifter; Polarimeter, Refractometer, Potentiometer; Karl Fischer Titrimetry Apparatus; IR Moisture Balance Apparatus; Friability Tester, Disintegration & Dissolution Test Apparatus.

RESEARCH EXPERIENCE

❖ Doctoral Studies:

Worked at Laboratory of Analytical and Molecular Toxicology (Forensic Chemistry and Toxicology Laboratory) on "Toxicological Assessment of Aldrin and Titanium Dioxide Nanoparticles & Potential Influence of their Interaction in Zebrafish" under supervision of Dr. Rakhi Agarwal, Associate Professor, Institute of Forensic Science, GFSU, Gandhinagar, Gujarat.

Associate Fellow (SSIP p\rojects):

- A. Impact of titanium dioxide nanoparticles on Caenorhabditis elegans
- B. Potential removal of arsenic from aqueous sample through adsorbent and its influence on arsenic toxicity in Caenorhabditis elegans

Supervisor: Dr. Rakhi Agarwal, Associate Professor, Institute of Forensic Science, GFSU, Gandhinagar, Gujarat

Post-graduation project:

Underwent project training at Pharmaceutics Division, CSIR-Central Drug Research Institute during semester IV (2^{nd} January 2012 - 09^{th} May2012) on title, "Development and validation of HPLC method for estimation of ar-turmerone, $\alpha\beta$ -turmerone & Compound in Herbal Medicament." Project investigator: Dr. A K Dwivedi, Chief Scientist, CDRI-Pharmaceutics division.

TEACHING EXPERIENCE

- ❖ Taken lectures on Instrumentation (Analytical), Forensic Toxicology and Chemistry and Post Blast Investigation and Explosive analysis for M.Sc. Forensic Science students.
- ❖ Taken specialized lectures in P.G. Diploma in Forensic Toxicology & Post Basic Diploma in Forensic Nursing courses.

ADMINISTRATIVE ACTIVITIES

- ❖ In-charge, Gujarat Forensic Sciences University Girls Hostel from Sept'2014 to Oct'2018, Gandhinagar.
- ❖ Member of Gujarat Forensic Sciences University's Sexual Harassment Committee since 2015 to 2018.

ACADEMICS

2019 Ph.D. (Forensic Science: *Toxicology*)

University: Gujarat Forensic Sciences University (GFSU), Gandhinagar, Gujarat, India

2012 M. Sc. (Forensic Science Specialization: Forensic Chem & Toxi); Ist Division (CPI: 8.3; 78%)

University: Gujarat Forensic Sciences University (GFSU), Gandhinagar, Gujarat, India

2010 B. Pharm (Pharmacy), Ist Division (**68. 81%**)

University: Rastrasant Tukdoji Maharaj Nagpur University, Maharashtra, India

2005 HSC (**Science**), Ist Division (**67.67%**)

Board: Maharashtra State Higher Secondary Education Board (MSHSEB), India.

2003 SSC (**Science**), Ist Division (**79.20%**)

Board: Maharashtra State Higher Secondary Education Board (MSHSEB), India.

OTHER QUALIFICATIONS

- ❖ Certificate Course of **French Language** from Rashtrasant Tukdoji Maharaj Nagpur University (RTMNU) in 2006, Ist Division (66.55%).
- ❖ Qualified **Rashtrabasha** Pre-examination and entrance test with 1st Division in 1999 and 2001 respectively.

AWARDS AND ACHIVEMENTS

- ❖ Awarded Best Paper Prize for Oral Presentation by Amity University, Noida during XXXVI Annual Conference of Society of Toxicology [STOX], India 2016.
- ❖ Awarded Senior Research Fellowship by DST-INSPIRE, New Delhi India (July 2016).
- Awarded Junior Research Fellowship by DST-INSPIRE, New Delhi, India (May 2014).
- ❖ Awarded two Gold Medals (University topper and Laxmi memorial Award) for securing first position in post graduate course-2012 at Gujarat forensic Sciences University, Gandhinagar.
- Secured 1st position in National Pharmacy Week Quiz competition, held by Indian Pharmaceutical Association (Nagpur) during 16th to 22nd November 2008.
- Achieved 2nd position in Intercollegiate Pharma Quiz Competition held by Sharad Pawar College of Pharmacy, Wadandongri Nagpur (Maharashtra) India.
- ❖ Achieved 3rd position in Intercollegiate Pharma Debate Competition held by Sharad Pawar College of Pharmacy, Wadandongri Nagpur (Maharashtra) India.
- Achieved 3rd position in Intercollegiate Pharma Debate Competition held by Institute of Pharmaceutical Education and Research, Wardha (Maharashtra) India.
- ❖ Achieved 1st position in Intracollegiate Quiz Competition held by SSPSS, Department of Pharmacy, Kamptee (Maharashtra) India.
- Awarded certificate for being first in kho-kho during Inter-sports meet'2000 held by St. Joseph Convent High School, Kamptee (Maharashtra) India.

MEMBERSHIP OF SOCIETIES

- Society of Toxicology, India (Life Member, No: 1035L)
- ❖ Indian Science Congress Association, India (Life Member, No: L30762)
- ❖ Maharashtra State Pharmacy council, India (Pharmacists Professional Profile No.: N/05126)

RESEARCH PAPERS PUBLISHED

- ❖ Jhamtani, R.C., Shukla, S., Agarwal, R., 2018. Aldrin Induce Acute Toxicity at Enzymatic and m-RNA Expression Levels in Zebrafish. Toxicology International. 25(1), 1-6. http://dx.doi.org/10.22506/ti/2018/v25/i1/21411 (IF-0.72)
- ❖ Jhamtani, R.C., Shukla, S., Dahiya, M.S., Agarwal, R., 2018. Evaluation of Oxidative Stress Biomarkers Due to Acute Exposure to Sub-Lethal Concentration of Deltamethrin in Zebrafish. Biochemical and Cellular Archives. 18(1), 309-314. (IF-0.03)
- ❖ Jhamtani, R.C., Shukla, S., Dahiya, M.S., Agarwal, R., 2018. Assessment of environmental hazards caused by industrial effluent discharge using zebrafish as an aquatic biomarker. Currents Topics in Toxicology. 13, 105-112 (IF-0.38)
- ❖ Jhamtani, R.C., Shukla, S., Dahiya, M.S., Agarwal, R., 2018. Impact of Co-exposure of Aldrin and Titanium dioxide Nanoparticles at Biochemical and Molecular Levels in Zebrafish. Environmental Toxicology and Pharmacology. 58, 141-155. https://doi.org/10.1016/j.etap.2017.12.021 (IF-3.06)
- ❖ Jhamtani, R.C., Shukla, S., Dahiya, M.S., Agarwal, R., 2017b. Evaluation of Acute Effects of Lead at Sub-lethal Concentration in Zebrafish. Research Journal of Environmental Toxicology. 11, 97-103. http://dx.doi.org/10.3923/rjet.2017.97.103 (IF-0.42)
- ❖ Shukla, S., Jhamtani, R.C., Agarwal, R., 2018. Emergence of zebrafish as a biomarker for pesticide poisoning in forensic toxicology research. Toxicology International, 25(1), 68-77. http://dx.doi.org/10.22506/ti/2018/v25/i1/22803 (IF-0.72)

❖ Shukla, S., Jhamtani, R.C., Dahiya, M.S., Agarwal, R., 2017a. Oxidative Injury caused by Individual and Combined Exposure of Neonicotinoid, Organophosphate and Herbicide in Zebrafish. Toxicology Reports. 4, 240-244. http://dx.doi.org/10.1016/j.toxrep.2017.05.002. (IF-1.12)

RESEARCH PAPAERS PRESENTED IN CONFERENCES

Paper Presentation

- ❖ Aldrin induced alterations on acetylcholinesterase activity in zebrafish: modulation by coadministration of titanium dioxide nanoparticles at International conference on Potential Impact of Pesticides on Environment and Human Health (ICPIPEHH-2017) organized by Department of Chemistry, School of Engineering, Dayananda Sagar University, Bangalore, India from 2nd to 4th November 2017.
- ❖ Assessment of impacts of industrial effluents discharge on zebrafish at International conference compendium on "Forensic Science and Cyber Security" at Gujarat Forensic Sciences University in collaboration with BPR&D, New Delhi, India on 5th & 6th October 2017.
- ❖ Combined effects of aldrin and titanium dioxide-NPs in zebrafish at XXXVIth Annual conference of society of toxicology (STOX), India 2016 on "New insights and multidisciplinary approach in toxicological studies" at Amity institute of environmental toxicology, safety and management, amity university Uttar Pradesh (AUUP) from 3rd 5th August 2016.
- ❖ Gene expression profiling in association with biochemical alterations in zebrafish at XXXVIth Annual conference of society of toxicology (STOX), India 2016 on "New insights and multidisciplinary approach in toxicological studies" at Amity institute of environmental toxicology, safety and management, amity university Uttar Pradesh (AUUP) from 3rd 5th August 2016.
- ❖ Individual effects of dichlorovos and imidacloprid induced oxidative stress in zebrafish at XXXVIth Annual conference of society of toxicology (STOX), India 2016 on "New insights and multidisciplinary approach in toxicological studies" at Amity institute of environmental toxicology, safety and management, amity university Uttar Pradesh (AUUP) from 3rd 5th August 2016.
- ❖ Biological alterations due to cocktail of pesticides in zebrafish at XXXVth Annual conference of society of toxicology (STOX), India 2015 on "Challenges and opportunities in toxicology research, education and product safety assessments" at Palamur biosciences private limited, Telangana in association with SVS Medical College, Telangana from 19th 21st November 2015.

Poster Presentation

- ❖ Aldrin induced alterations at endogenous enzymatic levels in zebrafish at 104th Indian Science Congress, Science & Technology for National Development organized by Sri Venkateswara University, Tirupati from 3rd to 7th January 2017.
- ❖ Imidacloprid and atrazine induced oxidative stress in zebrafish at 104th Indian Science Congress, Science & Technology for National Development organized by Sri Venkateswara University, Tirupati from 3rd to 7th January 2017.
- ❖ Impact of titanium dioxide on aldrin toxicity in zebrafish at National Conference on "Nanosciences, Nanotoxicology and Nanoinformatics" Present and Future Perspectives organized by Department of Bioengineering and Biosciences held at Integral University, Lucknow on 14th and 15th March 2015.
- Cypermethrin induced biochemical alterations in zebra fish at XXXIV Annual Conference of Society of Toxicology (STOX), India for "Challenges and Strategies in Toxicology for Food Safety & Drug Development- Regulatory Perspectives in Livestock" at PLAFFS, Tamil Nadu Veterinary and Animal Health Studies, Chennai from 10th -12th December 2014.
- ❖ Obesity: its co-morbidities and therapy. Poster presentation at Ist National Convention on "Recent Advances in Pharmaceutical Sciences and Drug Discovery" held by Kamala Nehru College of Pharmacy, Butibori, Nagpur from 22nd 23rd November 2009.

❖ QSAR-An Approach to Drug Design. Poster presentation at 1st National Convention on "Recent Advances in Pharmaceutical Sciences and Drug Discovery" held by Kamala Nehru College of Pharmacy, Butibori, Nagpur from 22nd - 23rd November 2009.

TRAINING ATTENDED

- ❖ Underwent application training on "Gas Chromatography and Mass Spectrometry" at Institute of Forensic Science (IFS), Gujarat Forensic Sciences University (GFSU), Gandhinagar for two days from 10th to 11th August 2016.
- ❖ Underwent Training on "Techniques and Procedure for Water and Waste Water Analysis" at Gujarat Pollution Control Board (GPCB), Gandhinagar for two months from March to May 2014.
- ❖ Underwent Industrial Training in Tablets, Capsules, Liquid orals, Ointments. Creams, Quality Control and Quality Assurance Departments at Lesanto laboratories, Borivali (W) Mumbai for 4 weeks from 14th May to 13th June 2009.

COMPUTER SKILLS

- ❖ Windows operating systems and application software like Microsoft Office package. Competent with Internet surfing and Statistical Software Application like SPSS. Good knowledge in literature search and data retrieval using various scientific search engines like Pub med, Google scholar, & scifinder.
- Familiar with writing and analyzing Documentation and reports.

PERSONAL SKILLS

Comprehensive problem-solving abilities, excellent verbal and written communication skills, ability to deal with people diplomatically, willingness to learn team facilitator hard worker.

Date: 2019

Place: Maharashtra, India

(Dr. Reena C. Jhamtani)