Dr. Kishor Singh Chouhan, Ph.D., CSIR UGC-NET

Proctor, Assistant Professor

Sangam University, Bhilwara

Contact: +918890199252

E-Mail: drksc21@gmail.com,

chouhanks21@gmail.com

kishor.chouhan@sangamuniversity.ac.in

ORCID: 0000-0002-7321-6991

LinkedIn: https://www.linkedin.com/in/dr-kishor-singh-chouhan-843839171/



Currently engaged in multidisciplinary research work, focused on the isolation, identification, and characterization of bioactive compounds to combat multidrug-resistant pathogens, especially in the context of biofilm producing bacterial isolates of diabetic foot ulcer.

The core ongoing research involves the analysis of plant extracts for phytochemical profile using GCMS which have demonstrated superior efficacy compared to standard antibiotics like tetracycline in antimicrobial assay. Using a combination of *in vitro* techniques and computational biology tools, focusing on the phytochemicals responsible for inhibition of bacteria. The computational pipeline integrates molecular docking and dynamics studies of phytochemicals to predict the inhibition potential of these phytochemicals against key genes responsible for biofilm formation in MDR bacteria.

Moreover, extending research through *in silico* drug design and ADMET profiling to optimize these phytochemicals for drug development. Additionally, investigating the broader pharmacological applications of these plant-based bio active compounds for conditions such as hemorrhoids and other chronic inflammatory diseases.

Academic Qualifications

2023 Ph.D. Biotechnology

Bhupal Noble's University, Udaipur

Thesis title: In vitro antimicrobial studies of some tree barks on biofilm

producing bacterial isolates of diabetic foot ulcer

2015 M.Sc. Biotechnology

Mohanlal Sukhadia University, Udaipur 63.66%

2013	B.Sc. Biotechnology	
	Mohanlal Sukhadia University, Udaipur	66.16%
2010	Senior Secondary (12 th) School Education	
	Board of Secondary Education Rajasthan	65.17%
2008	Secondary (10 th) School Education	
	Board of Secondary Education Rajasthan	65.17%

National Exams

2017 CSIR UGC NET (Life Sciences)

Qualified with All India Rank 69

Computer Knowledge

2015 RS-CIT certified course in Basic computer 87.16%

MOOC NPTEL SWAYAM Course

2024 Experimental Biotechnology IIT Guwahati

Research Guidance

Ph.D. Supervisor Two Research Scholar from Department of Botany

Two Research Scholar from Department of Zoology

M.Sc. Students Guided 7 students of Zoology for their dissertation

Research Publications

Patents

2023	National	202311049841	Drosophila melanogaster capture
			instrument useful in genetic engineering
2023	National	202311060746	Smart E- Token system for customer in
			post office for speed & registered post.
2023	National	202311086596	Hussimeter equipment for rapid
			photochemical analysis experiments in
			plants and chemical industries.

Journal Articles

Web of Science

1. Arora A, Singh K, Nagda V and Kumar D (2023). Phytochemical screening and *in vitro* antimicrobial study of *Prosopis cineraria* L. bark. Soth Asian J Exp Biol; 13 (1): 6-11. DOI: 10.38150/sajeb.13(1).p6-11

UGC- Care Journal

1. Yadav S, Hussain S, Summarwar S, Chouhan KS, Praveen A and Quazi S (2022). The study of some selected ethno-medicinal plants of Kumbhalgarh wildlife sanctuary of Rajasthan, India. ANVESAK; Vol. 52, No. 9 (I): 96-105. ISSN: 0378 – 4568.

Conference Proceedings

- Singh K and Hussain S (2022). A review of Anti-Diabetic medicinal plants of India. International Conference on Analytical & Interdisciplinary Research (ICAIR-2022), Sangam University, Bhilwara.
- 2. Singh K and Hussain S (2022). A review on Indian traditional medicine used as antiulcer, Anti-Diabetic and Anticancer. International Conference on Analytical & Interdisciplinary Research (ICAIR-2022). Sangam University, Bhilwara.
- 3. Hussain S and Singh K (2022). The study of some ethnomedicinal plants of Kumbhalgarh wildlife sanctuary of Rajasthan, India. International Conference on Analytical & Interdisciplinary Research (ICAIR-2022). Sangam University, Bhilwara.
- 4. Vaishnav P and Singh K (2025). Pharmacological importance of some medicinal plants from Bassi Wildlife Sanctuary. International Conference on Analytical & Interdisciplinary Research (ICAIR-2025). Sangam University, Bhilwara.

Books and Book chapters

Book Chapter Sensor-Based Farming: Based on IoT in Agriculture Trends

Book name: Trends in Agriculture using IoT- A Book Which Covers Entomology and

Machine Learning Computer Science.

Research Projects:

Major Research Projects

2021-2022 IFFCO (Indian Fertilizer Cooperative Limited) Member 1,00,000 Research project entitled "Evaluation of Toxicity within Nanoparticles (Nano Urea, Nano Zinc, Nano Copper and Nano DAP) in Aquatic organisms"

Minor Research Projects

2012-2013 Department of biotechnology, Bhupal Noble's college, Udaipur Research project entitled "Micropropagation of medicinal plant '*Plumbego Zeylanica*'

Research Appreciation Awards and Honours

26 January 2023 Appreciated and Awarded 4,000 Sangam University, Bhilwara.

15 August 2023 Appreciated and Awarded 13,330 Sangam University, Bhilwara.

Consultancy

1,22,000 RTIAS- 24 Industry and Companies of Bhilwara

Short Term Training Programs

Three Months Research Methodology Bhupal Noble's college, Udaipur

Six Months Biotechnological Techniques Bhupal Noble's college, Udaipur

8 days NEP Orientation & Sensitization MMC-062-2025-FEB-B-03373 (20-

02-2025 to 28-02-2025) from UGC- MMTTC, DAVV, Indore.

Participate in Conferences

International conferences

1. Indian Science Congress, Jammu, 2014.

- 2. Indian Science Congress, Mumbai, 2015.
- 3. Desert Environmental Conservation Association (DECO) Jodhpur at B.N. College Udaipur, 2015
- 4. Indian Science Congress, Mysore, 2016.
- 5. Indian science congress, LPU, Panjab, 2019.
- 6. One-day international conference on Photobiology, Phytochemistry & Plant Biotechnology, 8th 9th May 2019.
- 7. Two-day International conference on 'Environmental & Climate Consequences: Changes and Mitigation Strategies" organized by the School of Basic & Applied Science, Sangam University, Bhilwara, from 21 to 22 December 2019.
- 8. Multidisciplinary international conference RTIAS-24 on 22-23 January 2024 at Sangam university, Bhilwara
- 9. Multidisciplinary international conference RTIAS-25 on 10-11 March 2025 at Sangam university, Bhilwara

National Conferences

 Mankind: Facing Environmental Challenges & Tackling Disasters on 3-4 December 2016 organized by Vishwa Bharti P.G. College, Siker, Rajasthan State pollution control Board, Govt of Rajasthan, Jaipur.

International and National Seminars

- Biotechnology for Sustainable Development of Science and Technology, Government of Rajasthan on 22 February 2020.
- 2. The future of "Science Technology and Innovation": Impact on Education Skills and Work on 28the February 1 March 2021 on the occasion of national science day organized by the School of Basic and Applied Science, Sangam University, Bhilwara.

Workshops

- Two days I.P. Awareness Workshop on Patent, Copyright & Trademark on 8th 9th September 2017 organized by N.I.B.M., Nathdwara.
- 2. N.P.T.E.L. awareness workshop conducted by the Indian Institute of Technology, Kanpur, at Sangam University on 17 October 2019.
- 3. Intellectual Property Rights,
- 4. NAAC sponsored Two days National workshop on "Challenges before HEIs in remote areas for achieving quality improvement through assessment & accreditation process" organized by Internal Quality Assurance Cell [IQAC] held at Sangam University, Bhilwara on November 24-25, 2022.

Faculty Development Programs

- 1. I.C.T. Tools for effective teaching from 26 July to 02 August 2021.
- 2. Faculty development program from 20-24 December 2021 organized by Internal Quality Assurance Cell, Sangam University, Bhilwara.
- 3. Two days faculty Development Programme on "Benchmarking Quality Enhancement Initiatives through Innovative Practices" organized by Internal Quality Assurance Cell [IQAC] held at Sangam University, Bhilwara on 12th & 13th July 2022.
- 4. Seven day Virtual National Level Faculty Development Program on "RESEARCH METHODOLOGY" organized by Department of Commerce, PPG College of Arts and Science, Coimbatore held during 12th December 19th December, 2022.
- 5. FDP on Experimental Biotechnology offered by IIT Guwahati under the guidance of Prof. Vishal Trivedi from July to December 2024.

International and National Webinars

- 1. Role of teaching in Nation Building" held on 08 September 2020.
- 2. Sustainable Utilizations of Herbal Resources: conservation & Challenges" organized on 02 September 2020.
- 3. Two days national webinar on "Awareness of Covid Pandemic."
- 4. Two days national webinar on "Chemical Modeling, Design & Developments for Sustainable life."
- 5. "Advocacy to Action" held on 06.08.2021, Thursday at Shrinathji Institute of Technology & Engineering & Nathdwara Institute of Engineering & Technology.

Professional Affiliations

Life Time Membership

A lifetime member of "The Indian science congress Association."

Reviewer

2023- Reviewer International Journal of Microbiology and Biotechnology (IJMB).

Certificate of Appreciation

- Appreciated as 'Member of Organizing Committee' in a two-day national conference on 'Research and Innovation Trends in Applied Science' (N.C.R.I.A.S.) organized by the School of Basic & Applied Science, Sangam University, Bhilwara on 22 to 23 December 2018.
- Appreciated as Best Performance faculty of the Department of Biology, School of Basic & Applied Sciences on Teachers Day 2019.
- Appreciated as 'Member of Technical Committee' Two days international conference on 'Environmental & Climate Consequences: Changes and Mitigation Strategies" organized by the School of Basic & Applied Science, Sangam University, Bhilwara 21 to 22 December 2019.
- 4. Appreciated for Head of registration and payment committee and member of food and Budget committee of RTIAS-24. I lead the invitation & Sponsorship and Accommodation & hospitality committee, collected 1,22,000/- as consultancy for RTIAS-24.
- 5. Appreciated for contributions to NAAC Criteria IV.

Short-Term Training Programs

1. Completed two weeks Short Term Training Programme through I.C.T. mode on 'Problem Based Learning' organized by N.I.T.T.T.R., Kolkata.

Employment History

2019-	Assistant Professor	Department of Zoology Sangam University, Bhilwar
2018- 2019	Assistant Professor	Department of Botany Sangam University, Bhilwara
2017-2018	Lecturer	Department of Botany Nathdwara Institute of
		Biotechnology and Management,
		Nathdwara

Cambridge Academy, Deogarh (Rajsamand, Raj.)

Academic Responsibilities

Teacher

2016-2017

2018- 2022	Program Coordinator	Bachelors of Science	CBZ
2019- 2022	Program Coordinator	Masters of Science	Zoology

2019- 2021	Program Coordinator	Masters of Science	Botany
2020-	Program Coordinator	Masters of Science	Microbiology
2022-2023	Lab coordinator	Zoology Labs	
2018-2025	BOS Member		
2020-2022	Online Exam Committee me	ember	

Other Academic Responsibilities

2019 Member of technical committee in Internation Conference

Two-day International conference on 'Environmental & Climate Consequences: Changes and Mitigation Strategies" organized by the School of Basic & Applied Science, Sangam University, Bhilwara, 21 to 22 December 2019

2020 Member of the organizing committee of the international webinar on "COVID-19: Past, Present, and Future organized by the School of Basic and Applied Science, Sangam University, Bhilwara held on 14 April 2020.

2021-2022	Coordinator: NAAC Criteria-1, 3 and 4
2023-2024	Coordinator: NAAC Criteria-1 and 4
2023-2025	Member of competitive exam study center
2023-205	Member of paper moderation committee of SOBAS
2023-2024	Mentor of B.Sc. I & II Year
2023-2024	Library incharge of SOBAS
2024-2025Proctor, Sangam University, Bhilwara	

Technical Skills

Research: Diabetic Foot Ulcer, Biofilm, Phytochemistry, *Insilco* Drug Synthesis and Microbial Biotechnology.

Analytical Techniques: Phytochemical analysis, Antimicrobial analysis, MIC, Biofilm inhibition, Chromatographic Techniques, HPLC, LC-MS, GC-MS, NMR, Gel electrophoresis, DNA isolation and Protein identification and purification.

Writing skills: Manuscript and Research articles, Book and Book chapter, Research proposals and Projects for fundings.

Computational techniques: MS-Office, Autodock Vina, Schrodinger Suit 2024, Discovery studio 2024, CorelDraw graphic suit 2017, SPSS 2021, OpenBebel 2.4.1, Origin 2018, PyMOL, SwissADME, admetASR, GROMACS and other bioinformatics software.

Azhanhan.

(Dr. Kishor Singh Chouhan)