# DR. AHMAD ALI

Molecular Biochemistry Laboratory
Department of Life Sciences
University of Mumbai
Vidyanagari, Mumbai – 400 098, INDIA

Email: ahmadali@mu.ac.in

ORCID ID - <u>orcid.org/0000-0003-4467-5387</u> https://www.researchgate.net/profile/Dr\_Ahmad\_Ali

> Phone: - +91 22 26543370 Cell: +91 9870941656

#### **RESEARCH AREA**

Biochemistry, Biotechnology and Molecular Biology

#### RESEARCH INTEREST

- DNA and protein damage, Non-enzymatic Glycosylation (Glycation),
   Oxidative stress, Antiglycating properties of natural products, Phytochemistry
- Signal transduction, Metabolic regulation, Spirulina platensis

#### **CURRENT POSITION**

Assistant Professor in the University Department of Life Science, University of Mumbai, Mumbai, India from 01-09-2012

#### **ACADEMIC QUALIFICATIONS**

- Ph.D. (Life Sciences) 2007, University of Mumbai, Mumbai,
  - Thesis entitled "Signaling mechanism in the regulation of nitrate assimilation in Oryza sativa (Rice)"
- MSc. (Biochemistry) -1998, Jamia Hamdard (Hamdard University), New Delhi
- Qualified the 'National Eligibility Test' (NET) conducted by CSIR-UGC (New Delhi, INDIA) in June 1998.

## PROFESSIONAL EXPERIENCE (TEACHING & RESEARCH)

01.09.2012 - till date

: Presently working as **Assistant Professor** in the University Department of Life Sciences, University of Mumbai, Mumbai

National Institute of Pharmaceutical Education and Research (NIPER), Hajipur, Bihar  11.06.2007-14.06.2010: Worked as Lecturer in the Dept. of Biotechnology, Thakur College of Science & Commerce, University of Mumbai: Worked as Lecturer in the Dept. of Biotechnology, Smt. C. H. M. College, Ulhasnagar, University of Mumbai: Worked as Research-cum-Teaching Assistant in the Dept. of Life Sciences, University of Mumbai, Mumbai: Worked as Project Assistant for three years on a University Grants Commission, Government of India major research project titled "Molecular Biology of	28.06.2010-30.08.2012	: Worked as <b>Lecturer</b> in the Dept. of Biotechnology,
11.06.2007-14.06.2010  : Worked as Lecturer in the Dept. of Biotechnology, Thakur College of Science & Commerce, University of Mumbai  08.02.2007-30.04.2007  : Worked as Lecturer in the Dept. of Biotechnology, Smt. C. H. M. College, Ulhasnagar, University of Mumbai  25.11.2005-07.02.2007  : Worked as Research-cum-Teaching Assistant in the Dept. of Life Sciences, University of Mumbai, Mumbai  07.09.1999-30.07.2002  : Worked as Project Assistant for three years on a University Grants Commission, Government of India		National Institute of Pharmaceutical Education and
Thakur College of Science & Commerce, University of Mumbai  08.02.2007-30.04.2007 : Worked as Lecturer in the Dept. of Biotechnology, Smt. C. H. M. College, Ulhasnagar, University of Mumbai  25.11.2005-07.02.2007 : Worked as Research-cum-Teaching Assistant in the Dept. of Life Sciences, University of Mumbai, Mumbai  07.09.1999-30.07.2002 : Worked as Project Assistant for three years on a University Grants Commission, Government of India		Research (NIPER), Hajipur, Bihar
of Mumbai  : Worked as <b>Lecturer</b> in the Dept. of Biotechnology, Smt. C. H. M. College, Ulhasnagar, University of Mumbai  : Worked as <b>Research-cum-Teaching Assistant</b> in the Dept. of Life Sciences, University of Mumbai, Mumbai  : Worked as <b>Project Assistant</b> for three years on a University Grants Commission, Government of India	11.06.2007-14.06.2010	: Worked as <b>Lecturer</b> in the Dept. of Biotechnology,
<ul> <li>Worked as Lecturer in the Dept. of Biotechnology, Smt. C. H. M. College, Ulhasnagar, University of Mumbai</li> <li>Worked as Research-cum-Teaching Assistant in the Dept. of Life Sciences, University of Mumbai, Mumbai</li> <li>Worked as Project Assistant for three years on a University Grants Commission, Government of India</li> </ul>		Thakur College of Science & Commerce, University
Smt. C. H. M. College, Ulhasnagar, University of Mumbai  25.11.2005-07.02.2007  : Worked as Research-cum-Teaching Assistant in the Dept. of Life Sciences, University of Mumbai, Mumbai  07.09.1999-30.07.2002  : Worked as Project Assistant for three years on a University Grants Commission, Government of India		of Mumbai
25.11.2005-07.02.2007 : Worked as Research-cum-Teaching Assistant in the Dept. of Life Sciences, University of Mumbai, Mumbai  07.09.1999-30.07.2002 : Worked as Project Assistant for three years on a University Grants Commission, Government of India	08.02.2007-30.04.2007	: Worked as <b>Lecturer</b> in the Dept. of Biotechnology,
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the Dept. of Life Sciences, University of Mumbai, Mumbai  07.09.1999-30.07.2002 : Worked as <b>Project Assistant</b> for three years on a University Grants Commission, Government of India		Mumbai
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07.09.1999-30.07.2002 : Worked as <b>Project Assistant</b> for three years on a University Grants Commission, Government of India		the Dept. of Life Sciences, University of Mumbai,
University Grants Commission, Government of India		Mumbai
,	07.09.1999-30.07.2002	: Worked as <b>Project Assistant</b> for three years on a
major research project titled "Molecular Biology of		University Grants Commission, Government of India
		major research project titled "Molecular Biology of
Nitrogen Metabolism in Crop Plants" in the Dept. of		Nitrogen Metabolism in Crop Plants" in the Dept. of
Life Sciences, University of Mumbai, Mumbai		Life Sciences, University of Mumbai, Mumbai

#### **RESEARCH PROJECTS**

## **ONGOING**

- 1. Title: Drug proving studies, mechanistic insight and development of novel delivery systems of UNIM-H and UNIM-R for effective treatment of arthritis
  - Funding agency: Central Council Research in Unani Medicine (CCRUM), Ministry of AYUSH
  - 2. Title: Study of glycation of proteins by sweeteners
    - Funding Agency: Research Society for the study of Diabetes in India (RSSDI)

## COMPLETED

- 1. Title: Antiglycating properties of Nigella sativa seed extracts
  - o Funding agency: University of Mumbai, Mumbai (2018-19)
- 2. Title: Studies on Non-enzymatic Glycosylation of DNA and Proteins by sugars and dicarbonyls
  - Funding Agency: UGC, New Delhi (Start up grant)
- 3. Title: "In vitro study on the glycation of DNA by sweeteners"
  - o Funding agency: University of Mumbai, Mumbai (2015-16)
- 4. Title: In vitro study on non-enzymatic glycosylation of protein and DNA
  - Funding Agency: University of Mumbai, Mumbai (2013-14)

## STUDENTS GUIDED/ENROLLED

- ▶ Ph. D. students enrolled 03 and Two Junior Research Fellows in CCRUM Project
- M. S. Pharm. Biotechnology (NIPER, HAJIPUR)
- Guided 45 students of MSc Part II Life Sciences for their Review of Literature and Project work
- Presently guiding six students of M. Sc. for their Review of Literature and Project work.

## **FELLOWSHIPS AND AWARDS**

- Received Registration sponsorship by Academy of Excellence in Biosciences (AEB) to participate in the virtual global event "The Asian Conference on Science, Technology & Medicine (ACSTM)" organized by Asian Council of Science Editors (ACSE) on 20<sup>th</sup> November 2021
- ➤ **EMBO Travel Grant** to attend European Molecular Biology Organization (EMBO) Research Course: Research to Service Planning and Running a Bioinformatics Core Facility" from April 8<sup>th</sup> to 12<sup>th</sup>, 2019 at Izmir Biomedicine and Genome Center, Izmir, Turkey
- Received Grant from DST-PURSE fund of University of Mumbai for attending EMBO Workshop
- University Grants Commission, Govt. of India, Project Associateship for 3 years.

## **MEMBERSHIPS**

- ➤ Life Member of Society of Biological Chemists (SBC, India)
- ➤ Life Member of Indian Science Congress Association (ISCA)
- Member of International Maillard Reaction Society (IMARS)
- Member of Asian Council of Science Editors (ACSE)
- Life Member of Research Society for the study of Diabetes in India (RSSDI)
- ➤ Life Member of Association of Pharmaceutical Teachers of India (APTI)
- Life Member of International Natural Product Sciences Taskforce (INPST)
- ➤ Life Member of European Federation of Biotechnology (EFB)
- Member of Bioinformatics Society of India (INBIOS)
- Member of Science Advisory Board (www.scienceboard.net)

## **EDITORIAL BOARDS**

- <u>Review Editor</u> (Cancer Epidemiology and Prevention), Frontiers in Oncology <u>https://www.frontiersin.org/journals/oncology#editorial-board</u>
- <u>Coordinating Editor</u>, Annals of Phytomedicine (<a href="http://ukaazpublications.com/publications/index.php">http://ukaazpublications.com/publications/index.php</a>)
- <u>Executive Editorial Board</u>, Current Perspectives on Medicinal and Aromatic Plants (CUPMAP)
   http://www.cupmap.org/?SyfNmb=2&pt=Editorial+Board

- International Journal of Health Services Research and Policy http://dergipark.org.tr/en/pub/ijhsrp/board
- Section Editor (Molecular Biology and Biochemistry), Journal of Health Sciences of Kocaeli University, Kocaeli Üniversitesi Sağlık Bilimleri Dergisi <a href="http://dergipark.gov.tr/kusbed/board">http://dergipark.gov.tr/kusbed/board</a>
- Biosciences Biotechnology Research Asia <a href="http://www.biotech-asia.org/editorial-board/">http://www.biotech-asia.org/editorial-board/</a>
- International Journal of Academic Medicine and Pharmacy <a href="http://www.academicmed.org/index.jsp?mod=sayfabilgi&sayfa\_alias=Editorial%20Board">http://www.academicmed.org/index.jsp?mod=sayfabilgi&sayfa\_alias=Editorial%20Board</a>

## **REVIEWER OF JOURNALS**

Annals of Phytomedicine, Arabian Journal for Science and Engineering, Biochemistry Journal, 3 Biotech (Springer Journal), Biological Research & Reviews, Chemosphere, Current Perspectives on Medicinal and Aromatic Plants (CUPMAP), Frontiers in Plant Science, Frontiers in Oncology, Indian Journal of Biochemistry and Biophysics (IJBB), Indian Journal of Biotechnology (IJBT), Indian Journal of Experimental Biology (IJEB), International Journal of Biological Macromolecules (IJBM), International Journal of Diabetes in Developing Countries (IJDDC), Journals of Scientific and Industrial Research (JSIR), Journal of Central Research Institute for Field Crops, Journal of Toxicology, Malaysian Journal of Nutrition, Nanotechnology Review, Plant Science Today, Saudi Journal of Biological Sciences, Scientific Reports, Science of the Total Environment (STOTEN), Water Science and Technology (WST)

#### **PUBLICATIONS**

- 1. Kumar, D., Shah, N., Al-Anazi, K. M., Farah, M. A., Ali, M. A., Lee, J., **Ali, A.** 2022. Potential role of *Tribulus terrestris* fruit extract in inhibition of advanced glycation end products. **Pharmacognisy Magazine**. 18:341-7.
- 2. Balyan, P., **Ali, A.** 2022. Comparative analysis of the biological activities of different extracts of Nigella sativa L. seeds. **Annals of Phytomedicine**. 11(1):577-587. <a href="http://dx.doi.org/10.54085/ap.2022.11.1.67">http://dx.doi.org/10.54085/ap.2022.11.1.67</a>.
- 3. Tiwari, A., Chaskar, J., **Ali, A.**, Arivarasan, V. K., Chaskar, A. C. 2022. Role of Sensor Technology in Detection of the Breast Cancer. **BioNanoSci.** https://doi.org/10.1007/s12668-021-00921-7
- 4. Ahmad, F., Siddiqui, S. A., Sundari, R. S., Ahmad, J., Shah, S. M. A., Khan, M. R., Tarigan, R. A. N., Nagdalian, A., Mehdizadeh, M., Moazzem, M. S., **Ali, A.**, Fidan, H., Kasulla, S., Malik, S. J., Blinov, A., Faziili, M. A., Kiptum, C. K., Ibrahim, S. 2022. Assessing Integrated Nitrogen and Planting Density on Growth, Yield Component and Financial Analysis of Maize Crops (Zea Mays). **Journal of Hygienic Engineering and Design. 37:125-134**
- 5. Sundari, R. S., Arshad, A., Siddiqui, S. A., Khan, M. K., Heryadi, Y., Ahmad, F., Kusnandar, H. F., Tarigan, R. A. N., Nagdalian, A., Blinov, A., Mehdizadeh, M., Moazzem, M. S., **Ali, A.**, Kasulla, S., Malik, S. J., Kiptum, C. K., Ibrahim, S. 2022.

- Industrialization Fed Labor Migration in the Countryside: Tasikmalaya's Transition from Agriculture to The Crispy Snacks Industry. **Journal of Hygienic Engineering and Design. 37:135-143**
- 6. Poojari, P., Padgaonkar, A., Paramanya, A., **Ali, A.** 2022. Compendium of polycystic ovarian syndrome and its relevance in glycation and diabetes. **Journal of Experimental and Clinical Medicine**. 39 (1): 256-268. <a href="https://doi.org/10.52142/omujecm.39.1.49">https://doi.org/10.52142/omujecm.39.1.49</a>
- 7. Boubakeur, B., Khadem, H., Drabo, M. S., **Ali, A.,** Meddah, A. T. 2021. Probiotic properties and exopolysaccharides production of Stretptococcus thermophilus CNRZ 447 and Enterococcus durans NCBI 53345. **Ukrainian Food Journal**. 10 (4): 853 872. <a href="http://dx.doi.org/10.24263/2304-974X-2021-10-4-17">http://dx.doi.org/10.24263/2304-974X-2021-10-4-17</a>
- 8. Yasir, M., **Ali, A.**, Ahmad. I., Khan, N., Ashraf, M. Z. 2021. Effect of herbal formulation Sharbat Ahmad Shahi on serum BDNF level in mild to moderate cases of depressive disorder. **Journal of Complementary Medicine Research.** 12 (4), 265-270. <a href="https://doi.org/10.5455/jcmr.2021.12.04.39">https://doi.org/10.5455/jcmr.2021.12.04.39</a>
- 9. Khan, J., Rudrapal, M., Bhat, E. A., **Ali, A.**, Alaidarous, M., Alshehri, B., Banwas, S., Ismail, R., Egbuna, C. 2021. Perspective Insights to Bio-Nanomaterials for the Treatment of Neurological Disorders. **Frontiers in Bioengineering Biotechnology.** 9:724158. doi: https://doi.org/10.3389/fbioe.2021.724158
- 10. Bhatkalkar, S. G., Kumar, D., **Ali, A.,** Sachar, S. 2021. Influence of surfactants on biomolecular conjugation of magnetic nanoparticles. **Journal of Biomolecular Structure and Dynamics**. <a href="https://doi.org/10.1080/07391102.2021.1977701">https://doi.org/10.1080/07391102.2021.1977701</a>
- 11. Rubab, U., Kumar, D., Farah, M. A., Al-Anazi, K. M., Ali, M. A., **Ali, A.** 2021. Inhibitory Roles of *Nigella sativa* seed extracts on in vitro glycation and aggregation. **Pharmacognosy Magazine**. 17(6): 220-224. http://doi.org/10.4103/pm.pm\_604\_20
- 12. Chougle, S., Kumar, D., Khan, A., Zehra, S., **Ali, A.** 2021. Treatment of Alzheimer's Disease by Natural Products. **Journal of Experimental and Clinical Medicine**, 38 (4), 634-644. <a href="http://doi.org/10.52142/omujecm.38.4.42">http://doi.org/10.52142/omujecm.38.4.42</a>
- 13. Zahra, K. F., Lefter, R., **Ali, A.,** Abdellah, E., Trus, C., Ciobica, A., Timofte, D. 2021. The Involvement of the Oxidative Stress Status in Cancer Pathology: A Double View on the Role of the Antioxidants", **Oxidative Medicine and Cellular Longevity**, vol. 2021, Article ID 9965916, 25 pages. https://doi.org/10.1155/2021/9965916
- 14. Padgaonkar, A., Paramanya, A., Poojari, P., **Ali, A.** 2021. Current insights on wastewater treatment and application of Spirulina platensis in improving the water quality. **Marine Science and Technology Bulletin**, 10(3):285-294. <a href="https://doi.org/10.33714/masteb.972128">https://doi.org/10.33714/masteb.972128</a>
- 15. **Ali, A.,** Shahu, R., Balyan, P., Kumari, S., Ghodmare, R., Jobby, R., Jha, P. 2021. Antioxidation and Antiglycation Properties of a Natural Sweetener: *Stevia rebaudiana*. **Sugar Tech.** https://doi.org/10.1007/s12355-021-01023-0
- 16. More, T. A., Shaikh, Z., **Ali, A.** 2021. Artificial Sweeteners and their Health Implications: A Review. **Bioscience Biotechnology Research Asia.** 18(2): 227-237. <a href="http://dx.doi.org/10.13005/bbra/2910">http://dx.doi.org/10.13005/bbra/2910</a>
- 17. Kumar, D., Desa, D., Chougle, Bhatkalkar, S. G., Sachar, S., Kumar, C. S., **Ali, A.** 2021. Evaluation of the antiglycating potential of thymoquinone and its

- interaction with BSA, **Journal of Biomolecular Structure and Dynamics**, <a href="https://doi.org/10.1080/07391102.2021.1912642">https://doi.org/10.1080/07391102.2021.1912642</a>
- 18. Mayekar, V., **Ali, A.**, Alim, H., Patel, N. 2021. A review: Antimicrobial activity of the medicinal spice plants to cure human disease. **Plant Science Today**. 8(3): 629–646.

## https://doi.org/10.14719/pst.2021.8.3.1152

- 19. Khan, A. S., Anavkar, A., **Ali, A.**, Patel, N., Alim, H. 2021. A Review on Current Status of Riverine Pollution in India. **Bioscience Biotechnology Research Asia.** 18(1):9-22. <a href="https://bit.ly/3tjwU0m">https://bit.ly/3tjwU0m</a>
- 20. Balyan, P., Shinde, S., **Ali, A.** 2021. Potential activities of nanoparticles synthesized from Nigella sativa L. and its phytoconstituents: An overview, **Journal of. Phytonanotechnology Pharmaceutical Sciences.** 1(2):1-9. <a href="http://dx.doi.org/10.21276/jpps.2021.1.2.1">http://dx.doi.org/10.21276/jpps.2021.1.2.1</a>
- Shaikh, Z., Sundarrajan, P., Bhagtaney, L., Zehra, S., Zahra, F. K., Badra, B., Yigit, B. Y., Patel, N., Alim, H., Khan, J., Ali, A. 2021. Applicability of vitamins in the management of COVID-19: An overview. Annals of Phytomedicine. 10 Special Issue 1 (COVID-19): S65-S76. DOI: http://dx.doi.org/10.21276/ap.covid19.2021.10.1.7 22. Bhat, A. E., khan, J., Sajjad, N., Ali, A., Aldakeel, F. M., Mateen, A., Algahtani, M. S., Rabbani, S. 2021. SARS-CoV-2: Insight in genome structure, pathogenesis and Updated receptor binding analysis-An Review. **International** 107493. Immunopharmacology, Advance online publication. Vol. 95 https://doi.org/10.1016/j.intimp.2021.107493
- 23. Saraf, A., Padave, O., Sharma, S., Jha, P., Jobby, R., **Ali, A.**, Sachar, S. 2021. Low-frequency ultrasound responsive release and enhanced antibacterial efficacy of sulfamethoxazole decked silver nanocomposite. **Polyhedron**. 195, 114945. <a href="https://doi.org/10.1016/j.poly.2020.114945">https://doi.org/10.1016/j.poly.2020.114945</a>
- 24. Jabborova D, Enakiev Y, Sulaymanov K, Kadirova D, **Ali A**, Annapurna K. 2021. Plant growth promoting bacteria Bacillus subtilis promote growth and physiological parameters of Zingiber officinale Roscoe. **Plant Science Today**. 8(1): 66-71. https://doi.org/10.14719/pst.2021.8.1.997
- 25. Kumar, D. Bhatkalkar, S. Sachar, S., **Ali, A.** 2021. Studies on the antiglycating potential of zinc oxide nanoparticle and its interaction with BSA. **Journal of Biomolecular Structure & Dynamics.** 39:18, 6918-6925. https://doi.org/10.1080/07391102.2020.1803137
- 26. **Ali, A.** 2020. Herbs that Heal: The Philanthropic behavior of Nature. **Annals of Phytomedicine**. 9 (1): 7 17. <a href="http://dx.doi.org/10.21276/ap.2020.9.1.2">http://dx.doi.org/10.21276/ap.2020.9.1.2</a>. (Invited Article).
- 27. Kasmi, H., Doukani, K., **Ali, A.,** Tabak, S., Bouhenni, H. 2020. Epidemiological Profile of *Helicobacter pylori* Infection in Patients with Digestive Symptoms in Algeria. **Journal of Epidemiology and Global Health.** 10(4); 293–297. <a href="https://doi.org/10.2991/jegh.k.200527.001">https://doi.org/10.2991/jegh.k.200527.001</a>
- 28. **Ali, A.** 2020. Nitrate assimilation pathway in higher plants: critical role in nitrogen signalling and utilization. **Plant Science Today**. 7(2): 182-192. http://doi.org/10.14719/pst.2020.7.2.637

- 29. Bhatkalkar, S. Kumar, D. **Ali, A.** Sachar, S. 2020. Influence of surfactants on the interaction of copper oxide nanoparticles with vital proteins. **Journal of Molecular Liquids.** 304: 1-10. https://doi.org/10.1016/j.molliq.2020.112791
- 30. Paramanya, A., Jain, Y., **Ali, A**. 2020. Obesity: its complications and medications. **Journal of Health Sciences of Kocaeli University**. 6(1): 1-9. 10.30934/kusbed.615706
- 31. Paramanya, A., **Ali, A.** 2019. Role of Oxidative Stress in Biological Systems. **Middle East Journal of Science**, 5 (2), 155-162. https://doi.org/10.23884/mejs.2019.5.2.07
- 32. Jha P., Kumari S., Jobby, R., Desai, N., **Ali A**. 2019. Dietary phytonutrients in prevention of diabetes related complications. **Current Diabetes Review**. 16, 657-673. 10.2174/1573399815666190906151319
- 33. Kumar, D., **Ali, A.** 2019. Antiglycation and Antiaggregation potential of Thymoquinine. **Natural Volatiles and Essential Oils**. 6 (1): 25-33
- 34. Shah, S. A. Suji, G., Bhor V. M., **Ali, A.**, Sivakami, S. 2019. Methyl Glyoxal binding to bovine liver Catalase results in loss of activity and Heme dislocation. **Trends** in **Peptide** and **Protein Sciences**. 4(e5);1-8. https://doi.org/10.22037/tpps.v4i0.26261
- 35. Qazi, F., Varshney, P., and **Ali, A.** 2018. Perspective of nitrate assimilation and of bioremediation in *Spirulina platensis* (a non-nitrogen fixing cyanobacterium): an overview. **Journal of Environmental Biology**. 35: 547-557. http://doi.org/10.22438/jeb/39/5/MS-172.
- 36. Ahire, K., Kumar, D., **Ali, A.** 2018. Differential glycation of Arginine and Lysine by Glucose and inhibition by Acesulfame potassium. **Journal of BioScience and Biotechnology**. 7 (1): 11-15
- 37. Jha, P., Momin, A. R., Kumar, D., **Ali, A**. 2018. Reversal of glycoxidative damage of DNA and protein by antioxidants. **Annals of Phytomedicine**. 7(1): 101-105. http://dx.doi.org/10.21276/ap.2018.7.1.12
- 38. Bhatkalkar, S. Kumar, D. **Ali, A.** Sachar, S. 2018. Surface Dynamics Associated with Zinc Oxide Nanoparticles and Biomolecules in Presence of Surfactants. **Journal of Molecular Liquids.** 268: 1-10. https://doi.org/10.1016/j.molliq.2018.07.037
- 39. Pandey, R., Kumar, D., **Ali, A.** 2018. *Nigella sativa* seed extracts prevent the glycation of protein and DNA. <u>Current Perspectives on Medicinal and Aromatic Plants (CUPMAP). 1: 1-7.</u>
- 40. **Ali, A.,** More, T., Hoonjan, A. K., Sivakami, S. 2017. Antiglycating potential of Acesulfame potassium: An artificial sweetener. **Applied Physiology, Nutrition and Metabolism**. 42(10):1054-1063. <a href="http://dx.doi.org/10.1139/apnm-2017-0119">http://dx.doi.org/10.1139/apnm-2017-0119</a>
- 41. **Ali, A.,** Devrukhkar, J. 2016. In vitro study on glycation of plasma proteins with artificial sweeteners (sweeteners induced glycation). **Acta Biologica Szegediensis.** 60(2):65-70.
- 42. Banan, P., **Ali, A.** 2016. Preventive effect of Phenolic Acids on in vitro Glycation. **Annals of Phytomedicine**. 5(2):1-5. <a href="http://dx.doi.org/10.21276/ap.2016.5.2.12">http://dx.doi.org/10.21276/ap.2016.5.2.12</a>.

- 43. **Ali, A.,** Sharma, R. 2015. A comparative study on the role of Lysine and BSA in Glycation-induced damage to DNA. **Bioscience Bioengineering. Communication.** 1: 38-43
- 44. **Ali, A.,** Sharma, R., and Sivakami, S. 2014. Role of Natural Compounds in the Prevention of DNA and Proteins damage by Glycation. **Bionano Frontiers**. 7(12). 25-30
- 45. Qazi, F., Varshney, P., **Ali, A.**, Ahmad, A. 2013. Dissecting the role of Glycine Betaine in plants under abiotic stress. **Plant Stress**. 7(1): 8-18
- 46. **Ali, A.,** Sivakami, S., Raghuram, N. 2011. Effect of light, nitrate, and tungstate on the activity of nitrate reductase in Rice. **Research Dimension.** 1(3): 47-55
- 47. **Ali, A,** Raghuram, N., Sivakami, S. 2010. Differential regulation of nitrate assimilatory enzyme by Methionine sulfoximine in rice. **Journal of Advances in Science and Technology.** 13(3): 97-101
- 48. **Ali, A.,** Jha, P., Singh, K. S., Raghuram, N. 2008. Spirulina nitrate-assimilating enzymes (NR, NiR, GS) have higher specific activities and are more stable than those of rice. **Physiology and Molecular Biology of Plants.** 14(3): 179-182. <a href="https://doi.org/10.1007/s12298-008-0017-z">https://doi.org/10.1007/s12298-008-0017-z</a>
- 49. **Ali, A.,** Sivakami, S., Raghuram, N. 2007. Effect of Nitrate, Nitrite, Ammonium, Glutamate, Glutamine and 2-oxoglutarate on the RNA Levels and Enzyme Activities of Nitrate Reductase and Nitrite Reductase in Rice. **Physiology and Molecular Biology of Plants.** 13(1): 17-25.
- 50. Jha, P., **Ali, A.**, Raghuram, N. 2007. Nitrate induction of nitrate reductase and its regulation by downstream N metabolites in *Spirulina platensis*. **Physiology and Molecular Biology of Plants.** 13(2): 163-167.
- 51. **Ali, A.,** Sivakami, S., Raghuram, N. 2007. Regulation of activity and transcript levels of NR in Rice (*Oryza sativa*): Roles of Protein Kinase and G-proteins. **Plant Science.** 172(2): 406-413. https://doi.org/10.1016/j.plantsci.2006.10.003

#### BOOK

1. Khatri, S., **Ali, A.** 2019. Prevention of Glycoxidation mediated DNA damage by Phenolic compounds. LAP Lambert Academic Publishing Mauritius.

## **BOOK CHAPTERS**

- 1. Ali, A., Shaikh, N. 2022. Concept of Diabetes Mellitus and Antidiabetic Plant in the Unani System of Medicine. In: Antidiabetic Potential of Plants in the Era of Omics. Deepu Pandita, Anu Pandita and Chander Bhanu (Eds.) Apple academic Press. Pp. 101-124
- Vartak, A., Sonawane, S., Alim, H., Patel, N., Hamrouni, L., Khan, J., Ali, A. 2022. Medicinal and Aromatic Plants in the Cosmetics Industry. In: Máthé, Á., Khan, I.A. (eds) Medicinal and Aromatic Plants of India Vol. 1. Medicinal and Aromatic Plants of the World, vol 8. Springer, Cham. <a href="https://doi.org/10.1007/978-3-030-98701-5">https://doi.org/10.1007/978-3-030-98701-5</a> 12
- 3. **Ali, A.,** Khan, J., Alshehri, B. 2022. Diabetes -- a metabolic disorder: Herbal medicines on rescue. In: Herbal Medicines. Maryam Sarwat, Hifzur Siddique

- (Eds.). Academic Press. Pp 223-237. <a href="https://doi.org/10.1016/B978-0-323-90572-5.00013-5">https://doi.org/10.1016/B978-0-323-90572-5.00013-5</a>
- 4. Poojari, P., Paramanya A., Singh, D., **Ali, A.** 2022. Polycystic ovarian syndrome: Causes and therapies by herbal medicine, In: Herbal Medicines. Maryam Sarwat, Hifzur Siddique (Eds.). Academic Press. Pp 435-451. <a href="https://doi.org/10.1016/B978-0-323-90572-5.00028-7">https://doi.org/10.1016/B978-0-323-90572-5.00028-7</a>.
- 5. Anavkar A., Patel N., **Ali A.**, Rajan W., Alim H. 2022. Gut Microbes: Influencers of Human Brain. In: Microbiome-Gut-Brain Axis. Sayyed R.Z., Khan M. (Eds). Springer, Singapore. Pp 3-27. <a href="https://doi.org/10.1007/978-981-16-1626-6">https://doi.org/10.1007/978-981-16-1626-6</a> 1
- Chauhan, J., Chachad, S., Shaikh, Z., Khan, J., Ali, A. 2021. Nitrate in Plant Physiology. In: Nitrate Handbook: Environmental, Agricultural, and Health Effects. Christos Tsadilas (Ed.). CRC Press. Pp. 73-89. <a href="https://doi.org/10.1201/9780429326806-6">https://doi.org/10.1201/9780429326806-6</a>
- Balyan, P., Khan, J., Ali, A. 2021. Therapeutic potential of Nigella sativa in the prevention of aggregation and glycation of proteins. In: Black Seeds (Nigella sativa) Pharmacological and Therapeutic Applications. Andleeb Khan and Muneeb Rehman (Eds.). Elsevier. Pp. 313-335. <a href="https://doi.org/10.1016/B978-0-12-824462-3.00015-9">https://doi.org/10.1016/B978-0-12-824462-3.00015-9</a>
- 8. Khan, J., **Ali, A.**, Balyan, P., Bhat, E. A. 2021. Role of Nigella sativa as immunomodulator. In: Black Seeds (Nigella sativa) Pharmacological and Therapeutic Applications. Andleeb Khan and Muneeb Rehman (Eds.). Elsevier. Pp. 337-353. https://doi.org/10.1016/B978-0-12-824462-3.00005-6
- 9. Shaikh, Z., **Ali, A.** 2021. Nitrate assimilation: cross talk between plants and soil. In: Frontiers in Plant-Soil interaction Molecular Insights into Plant Adaptation. Tariq Aftab and Khalid Rehman Hakeem (Eds.). Academic Press. Chapter 6, Pp. 135-151
  - http://dx.doi.org/10.1016/B978-0-323-90943-3.00002-X
- 10. Paramanya A., Prairna, Şekeroğlu N., **Ali A.** 2021. Secondary Metabolites for Sustainable Plant Growth and Production Under Adverse Environment Conditions. In: Husen A. (Ed.) Harsh Environment and Plant Resilience. Springer, Cham. https://doi.org/10.1007/978-3-030-65912-7\_18
- 11. Paramanya, A., Padgaonkar, A., **Ali, A.** 2021. Detection of Coronavirus (SARS-CoV-2) Using Antibodies. In book: Covid-19 Pandemic and Environmental Implications; Vishnu Sinha (Ed.). Red'shine Publications Pvt. Ltd. Chapter 18. Pp. 181-194
- 12. Paramanya, A., Prairna, Sharma, S., Bagdat, R. B., Ali, A. 2020. Recent practices of medicinal and aromatic plants in nanotechnology. In book: Nanomaterials for Agriculture and Forestry Applications; Azamal Husen and Muhammad Iqbal (Eds.). Elsevier Science Publishing Co Inc. Pp. 435-467. <a href="https://doi.org/10.1016/B978-0-12-817852-2.00018-4">https://doi.org/10.1016/B978-0-12-817852-2.00018-4</a>
- 13. Memariani, Z., Farzaei, M. H., **Ali, A.**, Momtaz, S. 2019. Nutritional and bioactive characterization of unexplored food rich in phytonutrients. In book: Phytonutrients in Food: From Traditional to Rational Usage Edition: First Publisher: Elsevier Science Publishing Co Inc (Imprint Woodhead Publishing). Pp. 157-175. https://doi.org/10.1016/B978-0-12-815354-3.00001-0

- 14. Khatri, S., Paramanya, A., **Ali, A.** 2019. Phenolic acids and their health promoting activity. In Plant and Human Health, Volume 2 Phytochemistry and Molecular Aspects, Munir Ozturk and Khalid Rehman Hakeem (Eds.). Springer Nature Switzerland. Pp. 661-680. https://doi.org/10.1007/978-3-030-03344-6\_27
- 15. Paramanya, A., Jha, P., **Ali, A.** 2019. Bioactive compounds in *Spirulina sp.*: Applications and potential health effects. In Next Generation research in Aquaculture, J K Sundaray and M A Rather (Eds.) Narendra Publishing House, Delhi. Pp. 197-218.
- 16. Jha, P., **Ali, A.** 2019. Bio-nanoparticles in the treatment of glycation-induced secondary complications of diabetes. In Nanomaterials and Plant Potential; Azamal Husen and Muhammad Iqbal (Eds.). Springer Nature Switzerland. Pp. 299-316. https://doi.org/10.1007/978-3-030-05569-1\_12
- 17.**Ali, A.,** Paramanya, A., Prairna, Doukani, K., Zehra, S. 2019. Antioxidants in glycation related diseases. In Oxidative Stress and Antioxidant Defense: Biomedical Value in Health and Diseases, Md. Sahab Uddin and Aman Upaganlawar (Eds.). NOVA Science Publishers, Hauppauge, USA. Pp. 465-488
- 18. Tariq, M., **Ali**, **A.** 2019. Plant derived natural products as anti-glycating agents. "Pharmacological Perspectives of Low Molecular Weight Ligands" Editors: Debarshi Kar Mahapatra, Sanjay Kumar Bharti, Apple Academic Press, Ontario, Canada. Pp. 17-44
- 19.Lochab, S., **Ali, A.** Jha, P., Sharma, V., Abbey, D., and Raghuram, N. (2010). Assay methods for nitrate assimilatory enzymes in *Spirulina* (*Arthrospira*). In Protocols on Algal and cyanobacterial Research, Bagchi, S.N. Kleinber, D. and Mohanty, P. (Eds). Narosa, New Delhi, Pp. 179-189.

## **ADMINSITRATIVE RESPONSIBILITIES**

- **Secretary**, International Conference on Sustainability: Integrated and Scientific Approach (ICS-2022). University of Mumbai. August 4-6, 2022
- Co-coordinator, 16<sup>th</sup> Avishkar Research Convention 2021-22, Zone X University Departments
- Member of International Organizing Committee for MESMAP7, November 18-20, 2021, Izmir – Turkey. (Hybrid)
- Subject Expert for Research Advisory Committee for evaluation of PhD students of Dept. of Life Sciences, Ramnarain Ruia College, Mumbai 20<sup>th</sup> November 2021
- Member of Scientific Committee for International Congress on Biological and Health Sciences (ICBH), Online. February 26-28, 2021.
- Member of **Advisory Board**, Biodiversity Application and Research Center (BİYOMER), Igdir University, Turkey
- Member of **International Organizing Committee** for IHSC 2020 (4<sup>th</sup> International Health Sciences Conference, November 4-6, 2020, Diyarbakir, Turkey
- Member of Organizing Committee as Associate Director, International Web Conference on Perspective on Agricultural and Applied Sciences in Covid-19

- Scenario (PAAS 2020). Organized by AETDS (Uttarakhand), BARI (Bangladesh), Shobhit Institute (Meerut), SWERI and ARC (Egypt). October 4-6, 2020.
- Member of International Organizing Committee for MESMAP6, October 15-17, 2020, Izmir – Turkey.
- **Co-organizing Chairman**, International Conference Global Perspective in Agricultural and Applied Sciences for Food and Environmental Security, Kumaun University, December 1st and 2nd, 2019.
- Member of **International Organizing Committee** for IHSC 2019 (International Health Sciences Conference, November 6-8, 2019, Diyarbakir, Turkey
- Member of Organizing Committee, One-day State Level Seminar on Higher Education and Research: Industrial Opportunities, Organized by the GKS College of Arts, Commerce & Science and Department of Life Sciences, University of Mumbai, August 20<sup>th</sup>, 2019
- Member of Panel of Expert on Natural Sciences, National Council for Promotion of Urdu Language (NCPUL), Ministry of Human Resource Development, Govt. of India
- Honorary Faculty Member of Novel Global Community Educational Foundation (NGCEF), Australia
- Member of International Organizing Committee for MESMAP5 and ISPBS5, April 24-28, 2019, Cappadocia – Turkey
- Convenor and Member of Organizing Committee, National Symposium on Facets of Life Sciences, Organized by the Department of Life Sciences, University of Mumbai, March 26-27, 2019
- Member of Board of Studies, Department of Bioinformatics, Khalsa College (University of Mumbai), Mumbai and Dept. of Life Sciences, K. C. College, Mumbai
- Member of National Advisory Board, 5<sup>th</sup> National Asian PGPR Conference for Sustainable and Agriculture Eco-Friendly Bio-Innovations for Integrated Crop Management & Soil Health. Department of Botany and Microbiology, Acharya Nagarjuna Univ., Guntur, Andhra Pradesh & Indian Chapter of Asian PGPR Society. Feb. 23-25, 2019.
- Member of Local Advisory Committee and Resource Person of Recent Trends in Life Sciences, Poona College of Arts, Science & Commerce, Pune, India. Jan. 4<sup>th</sup> and 5<sup>th</sup>, 2019.
- 'Judge' for University Level Final Round of 13<sup>th</sup> Inter-Collegiate/Institute/Department Avishkar Research Convention: 2018-2019 and 2019-2020.
- **Scientific Program Committee Member**, 2<sup>nd</sup> International Online Conference on Biological Sciences (IOCBS 2018), July 22<sup>nd</sup>, 2018.
- Chairperson M. Sc. Life Sciences Part II (Semester III and IV) Examinations (University of Mumbai) for Academic Year 2018-19, 2019-20 and 2020-21

- External Examiner, University of Technology, Mauritius (June 2017 to June 2019).
- Coordinator, 123<sup>rd</sup> Orientation Programme, UGC-HRDC, University of Mumbai, May 28<sup>th</sup> June 23<sup>rd</sup> 2018.
- **Member of Biosafety Committee**, National Centre for Nanoscience and Nanotechnology, University of Mumbai (2017-18).
- **Chairman** M. Sc. Life Sciences Part I (Semester I and II) Examinations (University of Mumbai) since Academic Year 2017-18.
- Member of **Subject Board** (Board of Studies, BOS) in Life Sciences, Ramnarain Ruia College, University of Mumbai for 2 years from July 2017.
- Member of Organizing Committee for "National Seminar on Facets of Life Sciences". March 22<sup>nd</sup>-23<sup>rd</sup>, 2017. Organized by Department of Life Sciences, University of Mumbai.
- Member of **Organizing Committee** for "8<sup>th</sup> Indian Youth Science Congress". February 16<sup>th</sup> 18<sup>th</sup>, 2017. Co-organized by University of Mumbai and MSSRF.
- Member of National Advisory Committee for "International Conference on Health Implications of Biotechnology". Feb 12<sup>th</sup> - 14<sup>th</sup> 2016. Organized by Central University of South Bihar, Patna, Bihar.
- Member of Screening Committee of Minor Research Projects, University of Mumbai for the year 2015-16
- Member of Project Implementation Group DST-FIST since Nov 2014 (Term 5 years)
- Course In charge M. Sc. Life Sciences (Spl.: Biochemistry formerly Biological Macromolecules) since June 2013
- Departmental member of **Purchase Committee** since June 2013
- Member of Organizing Committee, one-day National Conference on "Advances in Biological Science". Organized by the Department of Biotechnology, University of Mumbai. Dec. 24<sup>th</sup>, 2014.
- Departmental Coordinator for Avishkar (Annual Research Convention) for Academic Year 2014-15
- Chairman M. Sc. Life Sciences Part I Examinations (University of Mumbai) for Academic Year 2013-14
- Worked as Resource Person for Collaborative Undergraduate Biology Education (CUBE) workshop. Organized by Homi Bhabha Center for Science Education (HBCSE), TIFR, Mumbai. June 29<sup>th</sup> and 30<sup>th</sup> 2013.
- Worked as Member, **Board of Examiner**, M. Sc. Biotechnology (2<sup>nd</sup> Semester), Central University of Bihar, 20<sup>th</sup> and 21<sup>st</sup> May 2013.
- External Examiner A. M. U., Amity University, Banasthali University, D. Y. Patil University, Integral University, MGM Medical College, Shivaji College (Akola), NMIMS.

• **Thesis Evaluation** –Banasthali University, Integral University, University of Hyderabad

## **SEMINARS/WORKSHOPS ATTENDED**

- Scientific committee member and Invited speaker, International Congress on Bee Sciences, 16-18 June 2022. (Online)
- Delivered a lecture as Invited speaker on "Sugar toxicity and its consequences:
   Hyperglycemia and Diabetes during the 2<sup>nd</sup> International Congress on Biological and Health Sciences (ICBH) Online. 25-27 February 2022. (Online)
- Keynote speaker to deliver a lecture on "Glycation: molecular mechanism and impact during Diabetes" during 'The 2<sup>nd</sup> International Pharmaceutical and Medical Sciences Conference" organized by Faculty of Pharmacy for Girls - Al-Azhar University, Egypt. 1-3 November 2021. (Online)
- Invited speaker to deliver a lecture on "Plant Metabolic Pathways as Source of Natural Therapeutics" during 7<sup>th</sup> International Agriculture Congress. 16<sup>th</sup> October 2021. (Online)
- Invited speaker to deliver a lecture on "Anti-AGE properties of Acesulfame potassium and its interaction with BSA" during 3<sup>rd</sup> International Conference on "Global Initiative in Agricultural, Forestry and Applied Sciences For Food Security, Environmental Safety and Sustainable Development (GIAFAS-2021) organized by Agricultural & Environmental Technology Development Society (AETDS), U.S. Nagar, Uttarakhand, India at Shri Guru Ram Rai University, Dehradun, Uttarakhand, India. 17-18 October 2021.
- Invited to deliver a Plenary Presentation on "Acesulfame potassium prevents Glycation induced structural alterations in Biomolecules" during XIVth International Symposium on "Actual problems of Chemistry, Biology and Technology of Natural Compounds" devoted to 30-year Anniversary of the Independence of the Republic of Uzbekistan. Organized by "Academy of Science of the Republic of Uzbekistan" at Tashkent on 7-8 October 2021. (Online)
- Delivered a lecture as Guest Speaker on 'An overview of interaction between Ferulic acid and BSA and its antiglycating properties' during 3<sup>rd</sup> International JSPSAAE symposium. Japanese Society for the Promotion of Science Cairo Office. 24-26 September 2021. (Online)
- **Invited Speaker** to deliver a lecture on 'Plant derived natural products as antiglycating agents'' during VIII Simpósio de Plantas Medicinais do Vale do São Francisco and 2st France-Brazil Meeting on Natural Products. Petrolina, Pernambuco, Brazil, 22-25 September 2021.
- Invited Speaker to deliver a lecture on 'Artificial sweeteners and their health implications' during International Congress on Food Science and Public Health. Organized by Tekmaconf, Tehran, Iran. 14-16 September 2021

- **Invited Speaker** to deliver a lecture on 'Skin-Whitening Effect of Extract and Cream Prepared Using Spirulina platensis' during X National Students' Conference of the Silesian College of Medicine in Katowice, Poland on 18.06.2021.
- Invited Speaker to deliver a lecture on 'Traditional and Modern Usage of Nigella Sativa (Black Cumin)' during 1st Kocaeli Traditional and Complementary Medicine Congress, jointly organized by Kocaeli Metropolitan Municipality, Atatürk University, Acupuncture and Complementary Medicine Application and Research Center, and Anatolian Traditional and Complementary Medicine Association on 12.06.2021
- Resource Person to deliver a lecture on 'Research Methodology: Key to success in Research', during International Webinar on "Basics of research Methodology and use of Statistics in Biology" organized by Rizvi College of Arts, Science and Commerce, Bandra, Mumbai on 01.04.2021
- **Guest Speaker** to deliver a lecture on 'Research Misconduct' during National Level Virtual FDP in Prospects and Retrospects in Life Science organized by the Department of Biochemistry, Rathnavel Subramaniam College of Arts and Science, Coimbatore, Tamil Nadu, 22:02.2021.
- Resource Person to deliver a lecture on 'Research Misconduct' FDP on Research Methodology by MGM School of Biomedical Sciences, MGMIHS, Navi Mumbai, India, 6<sup>th</sup> January 2021.
- Invited Speaker to deliver a lecture on 'Nutritional and Health benefits of Spirulina' during 2-days International Conference – Emerging Trends in Life Sciences (ICETLS – 2020) organized by Department of Botany, Telangana University, Nizamabad, Telangana, 16.12.2020.
- Guest speaker to deliver a lecture on 'Phenolic Acids and their role in prevention of Glycation' during AICTE online STTP entitled "Impact of polyphenols in enzyme inhibition and formulation of healthcare apparels". organized by the Department of Biotechnology jointly with Departments of Textile and Fashion Technology, Kumaraguru College of Technology, Coimbatore, Tamil Nadu, 14.10.2020.
- Invited speaker to deliver a lecture on 'Sugar induced changes in Biomolecular Structure during Diabetes' in 'Invited Lecture Series on Biological Science, ILSBS:2020(3) jointly organized by Government P. G. College Bazpur U. S. Nagar Uttarakhand, S. S. College Shahjahanpur U.P. and Society for Research in Biological Science. 24 Aug to 28 Aug 2020.
- Invited Speaker, 2-days International e-conference on "Impact of Covid-19 on Human Health & Environment". Organized by P. G. Dept. of Botany, Tata College, Chaibasa, Jharkhand. July, 29-30, 2020.
- **Invited Speaker**, FDP in Life Sciences, CHRIST (Deemed to be University). May 23<sup>rd</sup>, 2020.

- Attended 3-days "European Molecular Biology Laboratory (EMBL) Course: Exploratory Analysis of Biological Data: Data Carpentry" from January 28<sup>th</sup> to 30<sup>th</sup>, 2020 at EMBL Heidelberg, Germany.
- Attended 2-weeks **Refresher Course** in Basic Science (Interdisciplinary) at UGC-HRDC, Jamia Millia Islamia, New Delhi. November 5<sup>th</sup> to November 19<sup>th</sup>, 2019.
- Invited Speaker and Session Chair for 1. International Aromatic Plants and Cosmetics Symposium-AROPCOS 2019. Oct. 3-6, 2019, Igdir TURKEY
- Invited Speaker and Session Chair for 5<sup>th</sup> International Mediterranean Symposium on Medicinal and Aromatic Plants (MESMAP5) and the 5th International Symposium on Pharmaceutical and Biomedical Sciences JOINT MEETING. April 24-28, 2019, Cappadocia TURKEY
- Attended one week "European Molecular Biology Organization (EMBO)
   Practical Course: Research to Service Planning and Running a Bioinformatics
   Core Facility" from April 8<sup>th</sup> to 12<sup>th</sup>, 2019 at Izmir Biomedicine and Genome
   Center, Izmir, Turkey.
- **Invited Speaker** for 2<sup>nd</sup> International Conference, Advances in Agricultural, Biological and Applied Sciences for Sustainable Future (ABAS 2018), Subharti Univrsity, Meerut, U.P., India. Oct. 20-22, 2018.
- **Invited Speaker** and **Session Chair** for 4<sup>th</sup> International Mediterranean Symposium on Medicinal and Aromatic Plants (MESMAP4). April 18<sup>th</sup> 22<sup>nd</sup>, 2018. Antalya, Turkey.
- Worked as "Resource Person" for Unani Day Celebration and International Conference on Unani Medicine. Organized by CCRUM, Ministry of Ayush, Govt. of India. Feb. 10-11, 2018.
- Attended 3-weeks **Refresher Course** at UGC-Academic Staff College, Jamia Millia Islamia, New Delhi. November 15<sup>th</sup> to December 6<sup>th</sup>, 2017.
- Invited Speaker for National Conference on Protein Structure and Dynamics in Health and Agriculture. Organized by Dept. of Biosciences and Centre for Interdisciplinary Research in Basic Sciences, Jamia Millia Islamia, New Delhi. Nov. 3-4, 2017.
- Science Academics' sponsored Lecture workshop on "OMICS: Basics and Applications". Organized by Indian Women Scientists' Association (IWSA). July 8<sup>th</sup> – 9<sup>th</sup>, 2017.
- Delivered Lectures on **Research Misconduct**" and "**Biochemistry of Diabetes**" at Shri Shivaji College of Arts, Commerce and Science, Akola, March 11<sup>th</sup> and 12<sup>th</sup>, 2016.
- Systematic Review and Meta-analysis. Sept. 19th-21st 2016. NIRRH, Mumbai.
- Participated in 2-weeks "Science Academies' Refresher Course on Developmental Biology". Organized by NIRRH, Mumbai and Sophia College for Women, Mumbai. 16<sup>th</sup>-28<sup>th</sup> November, 2015.

- Participated in 2-days workshop on "Biostatistics in Teaching and Research". Ruparel College, Mumbai. 4<sup>th</sup> and 5<sup>th</sup> September, 2015.
- Attended one-day SBC (I) Mumbai Chapter meet. NIRRH, Mumbai. August 22<sup>nd</sup>, 2015.
- Participated in 102<sup>nd</sup> Indian Science Congress at University of Mumbai. Jan 3<sup>rd</sup>-7<sup>th</sup>, 2015.
- Attended 4-weeks **Orientation Programme** at UGC-Academic Staff College, Jamia Millia Islamia, New Delhi. August 5<sup>th</sup> to September 3<sup>rd</sup>, 2014.
- Attended Six-day workshop on "Hands on Training for Teachers in Biology" at Khalsa College. Jointly organized by National Facility for Biopharmaceuticals (NFB) and UGC Academic Staff College, University of Mumbai. March 10<sup>th</sup>-15<sup>th</sup>, 2014.
- Attended two-days workshop on "Applications in Bioinformatics" organized by ACTREC, Mumbai, Jan 23<sup>rd</sup> and 24<sup>th</sup>, 2014
- Three weeks Refresher Course on "**Advances in Life Sciences**". Academic Staff College, University of Mumbai, Mumbai. 7<sup>th</sup>- 26<sup>th</sup> October 2013.
- Attended two-day's workshop on "Research Methodology in Applied and Basic Sciences" organized by UGC Academic Staff College, University of Mumbai, Mumbai. March 12 & 13, 2013.
- Delivered a Lecture on "Research Misconduct" in **Orientation Course** organized by Patna University, Patna, Bihar, 4<sup>th</sup> December 2011.
- Delivered a Lecture on "Ecological Risk Assessment and Ecotoxicology" in Refresher Course organized by Patna University, Patna, Bihar, 17<sup>th</sup> September 2011.
- Attended 4<sup>th</sup> Bihar Vigyan Congress and delivered a Lecture on "Plagiarism in Science". 9-11<sup>th</sup> June, 2011. Patna, Bihar
- Attended 2-days workshop on "**Applications in Bioinformatics**" organized by ACTREC, Mumbai, Jan 15<sup>th</sup> and 16<sup>th</sup>, 2009.
- Attended 3-day Workshop on "Bioinformatics: Basic Tools and Applications" organized by NIRRH, ICMR, Mumbai. May 21-23, 2008.
- Member of **Technical Committee** for the National Conference on Environmental Technology: Biological Perspectives Issues and Challenges. Feb. 9-10, 2006, Dept. of Life Sciences, University of Mumbai, Mumbai, India.
- Six-Days Training Programme on **Modern Instrumentation Techniques in Biology** at Western Regional Instrumentation Centre, Mumbai, India. May 30<sup>th</sup> to June 4<sup>th</sup>, 2005.

#### **PRESENTATIONS**

• Paramany, A., **Ali, A.** 2022 (Invited Speaker). Antiglycating potential of *Spirulina* platensis, a cyanobacterium. XIIth Conclave of Indian Association for the Study

- of Traditional Asian Medicine, India. Organized by Jamia Hamdard University and IASTAM-India at New Delhi, India, July 29-30th, 2022
- Kumar, D., Ali, A. 2022. (Oral). Potential role of Ferulic acid in Glycation of Serum Albumin. 8<sup>th</sup> International Marmara Sciences Congress, Kocaeli University. May 13-15, 2022. ONLINE
- Paramany, A., Ali, A. 2022 (Oral). Suppression of Advanced Glycation End Products (AGEs) by Phycocyanin from Spirulina platensis. 14<sup>th</sup> International Phytocosmetics and Phytotherapy Congress (IPPC) Egypt. Faculty of Pharmacy at the Fayoum University of Egypt. May 10-12, 2022. ONLINE
- Paramany, A., Ali, A. 2022 (Oral). Analysis of antiglycation and antiaggregation properties of Phycocyanin. İstanbul International Modern Scientific Research Congress – III. Istanbul Gedik University, Istanbul, Turkey. May 6-8, 2022. ONLINE
- Paramany, A., Ali, A. 2022 (Oral). Antiglycating properties of Spirulina platensis.
   Emerging Trends in Biotechnology and Sustainable Chemistry: (ETBSC- 2022)
   Jointly organized by the Department of Biotechnology and Department of Chemistry, Faculty of Sciences, Baba Farid College, Bathinda, Central University of Punjab, Bathinda and Society for Biotechnologists, India. April 27-29, 2022.
   ONLINE
- Kumar, D., Ali, A. 2021. (Oral). Antiglycating potential of zinc oxide nanoparticle and its interaction with BSA. "World Congress on Applied Nanotechnology (W-CAN)", Nanoscience and Nanoengineering Application and Research Center, Atatürk University, Turkey. 24-26 November 2021. ONLINE
- Kumar, D., Ali, A. 2021. (Oral). Antiglycating and Antiaggregation potential of natural products. 4<sup>th</sup> Asian Conference on Science, Technology & Medicine (ACSTM)" organized by Asian Council of Science Editors (ACSE) on 20th November 2021. ONLINE
- Kumar, D., Shah, N., Ali, A. 2021. (Oral). Antiglycation and Antioxidant Properties of *Tribulus terrestris*. The 7<sup>th</sup> International Mediterranean Symposium on Medicinal and Aromatic Plants (MESMAP7). Online. November 18-20, 2021, Izmir, Turkey. ONLINE
- Kumar, D., Ali, A. (Oral). Molecular Mechanism of Antiglycating Phytochemicals.
   XLIV All India Botanical Conference of the Indian Botanical Society on Plant Science Research in Present Scenario: Opportunities and Challenges.
   Organized by Jai Narain Vyas University, Jodhpur, India. October 18-20, 2021.
- Kumar, D., Malik, P., Ali, A. 2021. (Oral). Potential role of extract and bioactives
  of Nigella sativa in the prevention of Glycation and Glycoxidation. 12<sup>th</sup>
  International Phytocosmetics and Phytotherapy Congress (IPPC-Greece). 19-21
  May 2021. ONLINE.
- Kumar, D., Ali, A. 2021. (Oral). Identification of Potential Antiglycating Molecules by Using Molecular Docking and in Vitro Approach. International Congress on Biological and Health Sciences (ICBH), February 26-28, 2021. (<u>Honorable mention award for oral presentation</u>). ONLINE

- Kumar, D., Ali, A. 2020. (Oral). Inhibition of glucose toxicity and aggregation by thymoquinone during diabetes. 4<sup>th</sup> International Health Sciences Conference 2020 (IHSC 2020). Dicle University, Diyarbakir, Turkey. November 5-6, 2020. ONLINE
- Prairna Malik, Ali, A. 2020, (Oral). Prevention of Advanced Glycation End Products by the seed extracts of Nigella sativa. The 6<sup>th</sup> International Mediterranean Symposium on Medicinal and Aromatic Plants (MESMAP6). October 15-17, 2020, Izmir, Turkey. ONLINE
- Kumar, D., Ali, A. 2020. (Oral). Inhibition of advanced Glycation products by natural and artificial compounds. Emerging Trends in Bioscience and Technology (ETBT- 2020). Organized by School of Science, Sandip University, Nasik, India & Biotechnology Society of Nepal (BSN) June, 1-3, 2020. (Econference). (Consolation Certificate for the Best Oral Presentation). ONLINE
- Paramanya, A., Ali, A. 2019. (Oral). Assessment of skin-whitening effect of cream prepared using cyanobacteria. 1st International Aromatic Plants and Cosmetics Symposium (AROPCOS). October 3-6, 2019. Igdir, Turkey. (Best Presentation Award).
- Kumar, D., Ali, A. 2019. (Oral). Glycation induced structural alteration of Biomolecules and their reversal by some artificial and natural compounds. 5<sup>th</sup> International Mediterranean Symposium on Medicinal and Aromatic Plants (MESMAP5) and The 5th International Symposium on Pharmaceutical and Biomedical Sciences JOINT MEETING. April 24-28, 2019, Cappadocia – Turkey (Best Presentation Award).
- Ali, A., Paramanya, A. 2019. (Oral). Antidiabetic and antiglycating properties of Spirulina platensis. 5<sup>th</sup> International Mediterranean Symposium on Medicinal and Aromatic Plants (MESMAP5) and The 5th International Symposium on Pharmaceutical and Biomedical Sciences JOINT MEETING. April 24-28, 2019, Cappadocia – Turkey
- Kumar, D., Ali, A. 2018. (Oral). Artificial Sweeteners and their Preventive Role in the Process of Glycation. International Health Sciences Conference (IHSC 2018). Dicle University, Diyarbakir, Turkey. November 14-17, 2018.
- Kumar, D., Ali, A. 2018. (Invited speaker). Artificial sweeteners prevent the accumulation of advanced glycation end products (AGEs). 2<sup>nd</sup> International Conference, Advances in Agricultural, Biological and Applied Sciences for Sustainable Future (ABAS 2018), Subharti Univrsity, Meerut, U.P., India. Oct. 20-22, 2018. (Received second prize).
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